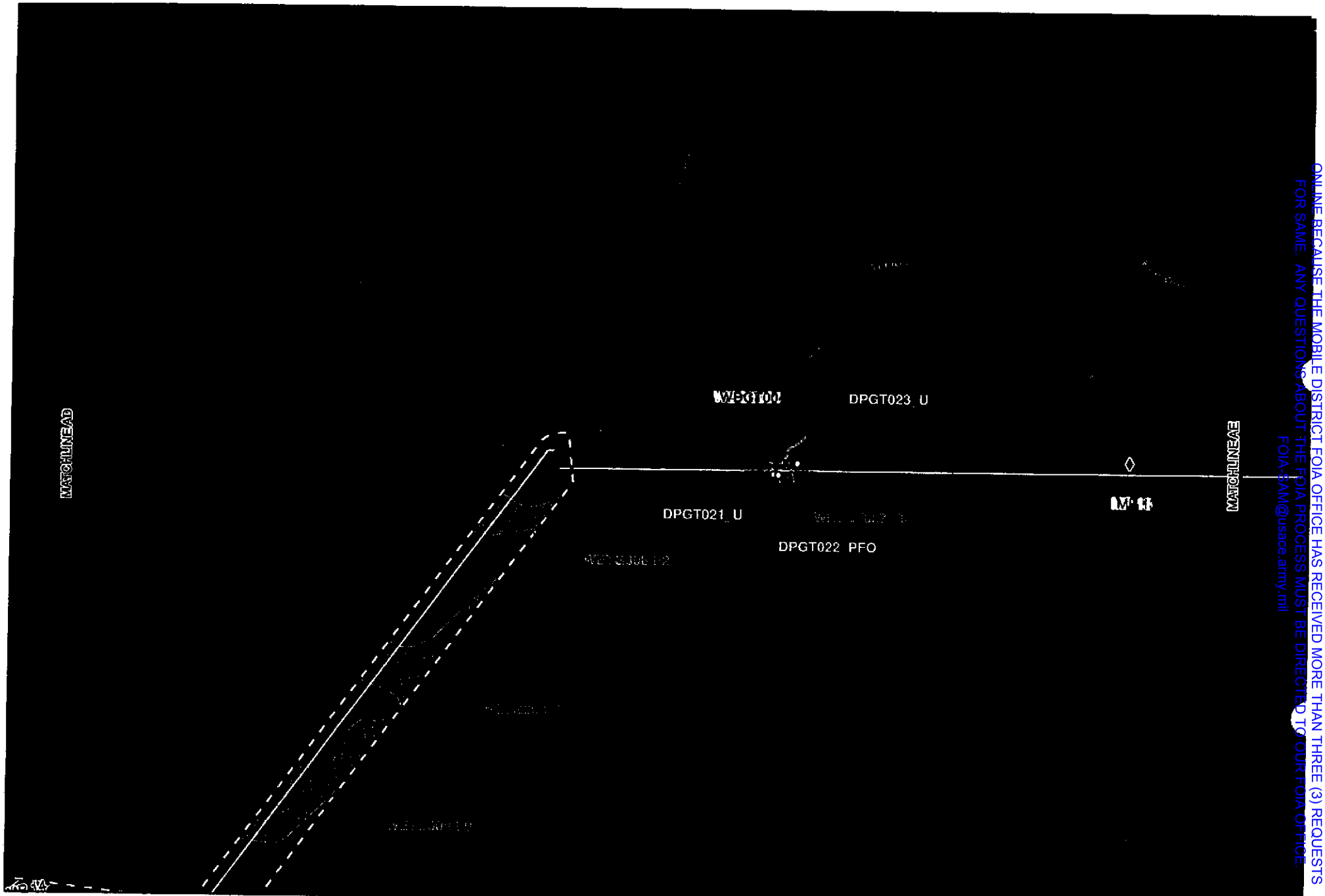


SWCA
ENVIRONMENTAL CONSULTANTS

Sheet 17 of 47

FLANNS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
441-KM LEE-LONG TERM KM LEE FACILITY TO
PASSCAGOULA A PIPELINE PROJECT
MOBILE COUNTY, AL

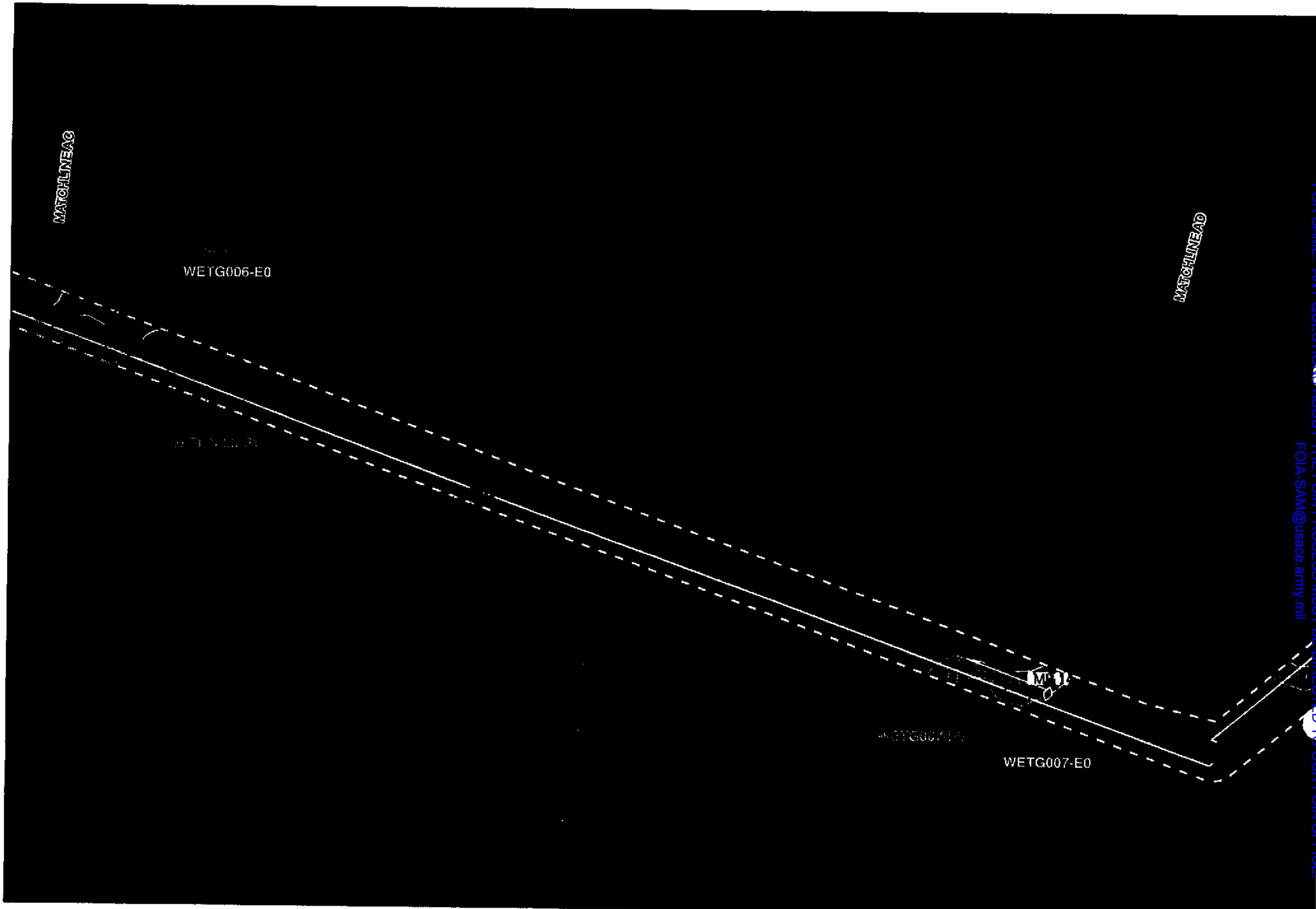
- Centerline
- Permanent RoW
- Temporary RoW
- Additional Workspace
- 200' Survey
- Unsurveyed Areas
- PEM
- PFO
- PSS
- EEM
- Streams
- Sample Point
- Milepost
- HDD Entry/Ex

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JF
Approved By: Preliminary Draf
SWCA Project No: 22932
Date Produced: 3/20/2013
Revision Date:

0 250 500 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US



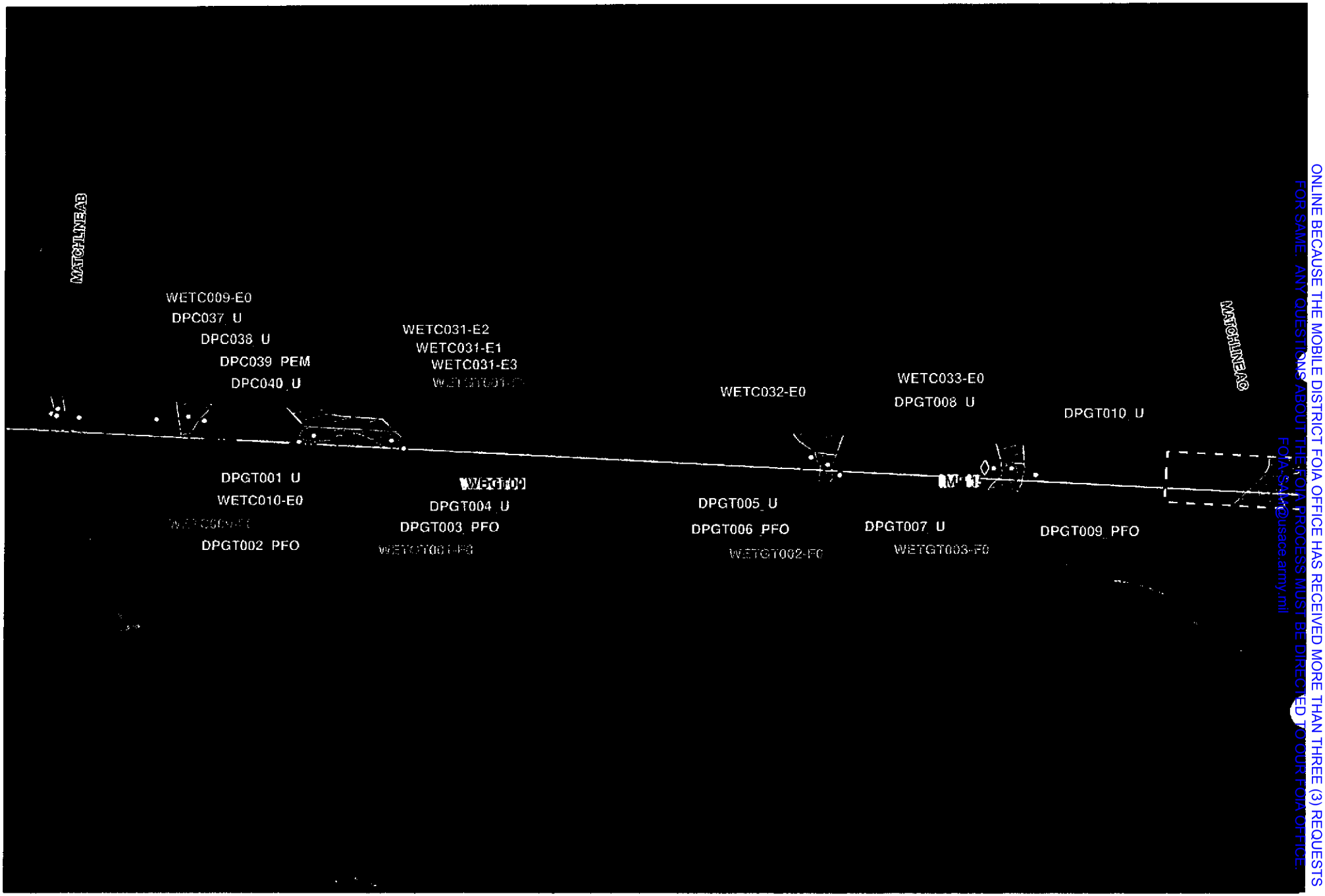
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 16 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
4.1-MILE-LONG TEN-INCH LINE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline	PEM	Sample Point
Permanent RoW	PFO	Milepost
Temporary RoW	PSS	HDD Entry/Exit
Additional Workspace	EEM	
200' Survey	Streams	
Unsurveyed Areas		

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 2293
Date Produced: 8/20/2013
Revision Date:
0 250 500 Feet
Coordinate System: NAD 1983 UTM Zone 16N
Units: Foot US



SWCA
ENVIRONMENTAL CONSULTANTS

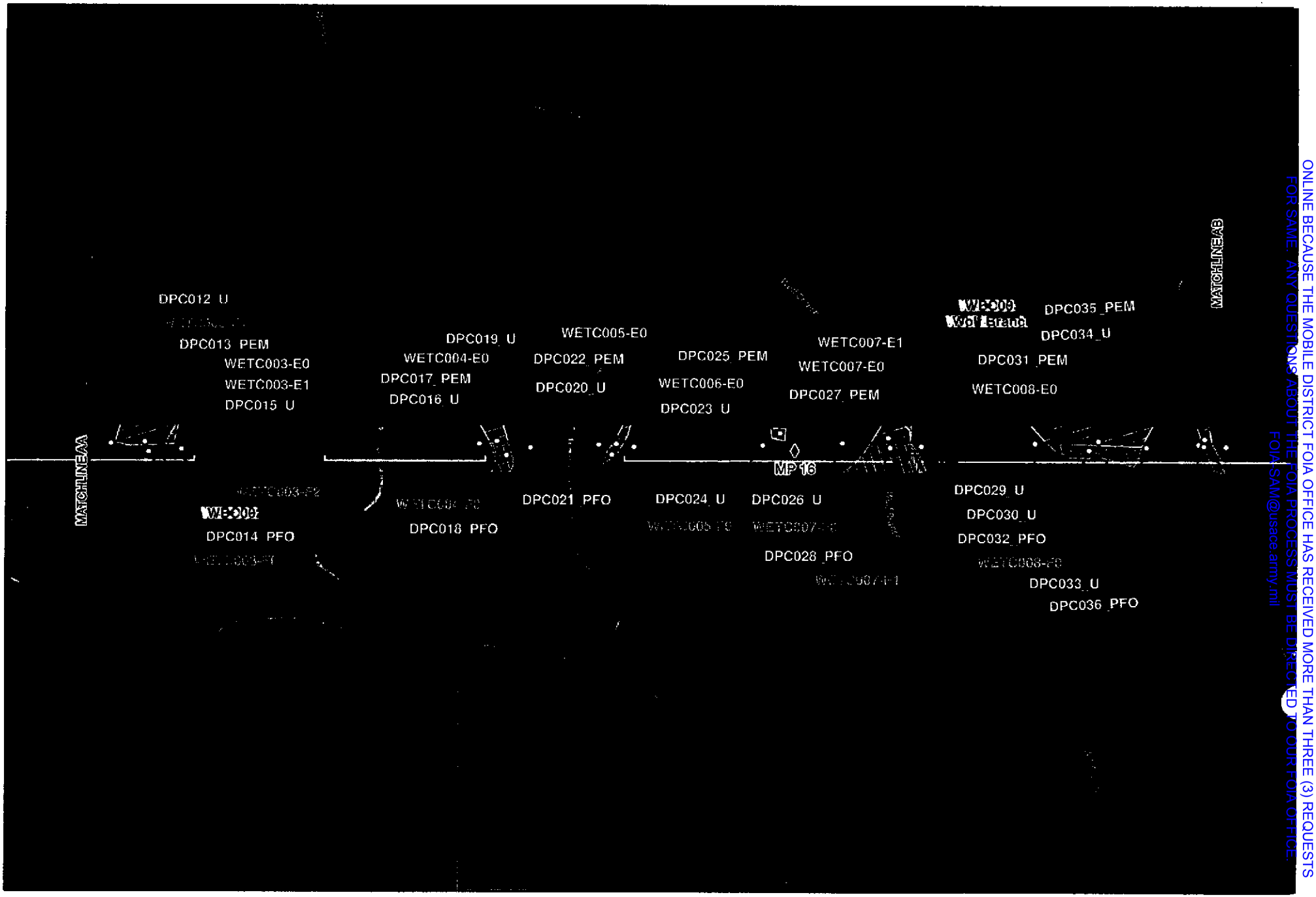
Sheet 19 of 47

PLANNS SOUTHEAP L.L.C.
WETLAND DELINEATION MAP
441-MILE LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JF
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 9/20/2012
Revision Dates:
0 250 500 Feet
Coordinate System: NAD 1983 UTM Zone 16N
Units: Foot US



SWCA
ENVIRONMENTAL CONSULTANTS

Sheet 20 of 47

PLAINS SOUTHCAP, L.L.C.
WETLAND DELINEATION MAP
441-MILE LONG TENNESSEE PIPELINE PROJECT
MOBILE COUNTY, AL

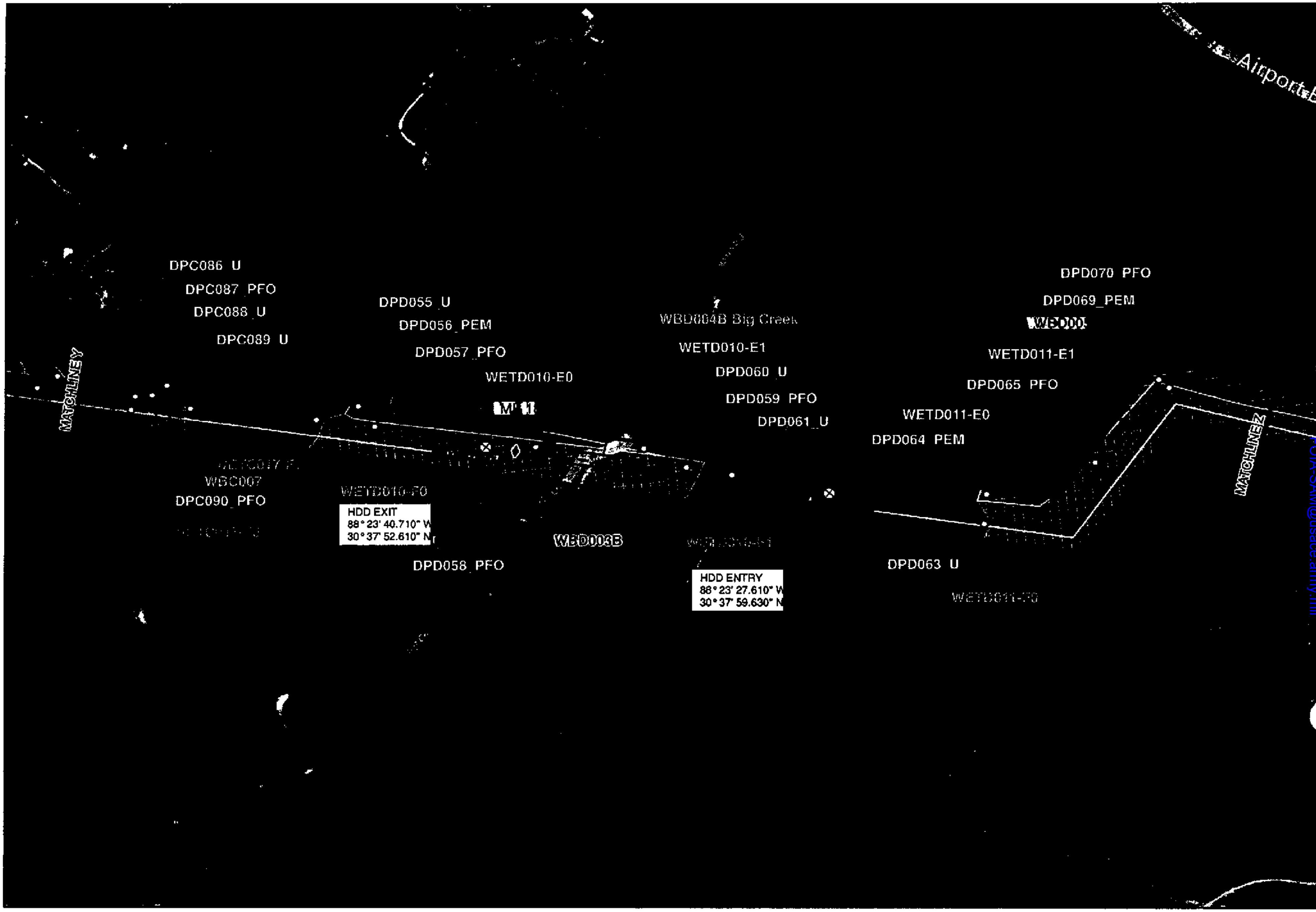
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JP
Approved By: Preliminary Draft
SWCA Project No: 22833
Data Produced: 6/20/2013
Revision Date:

0 300 600 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US



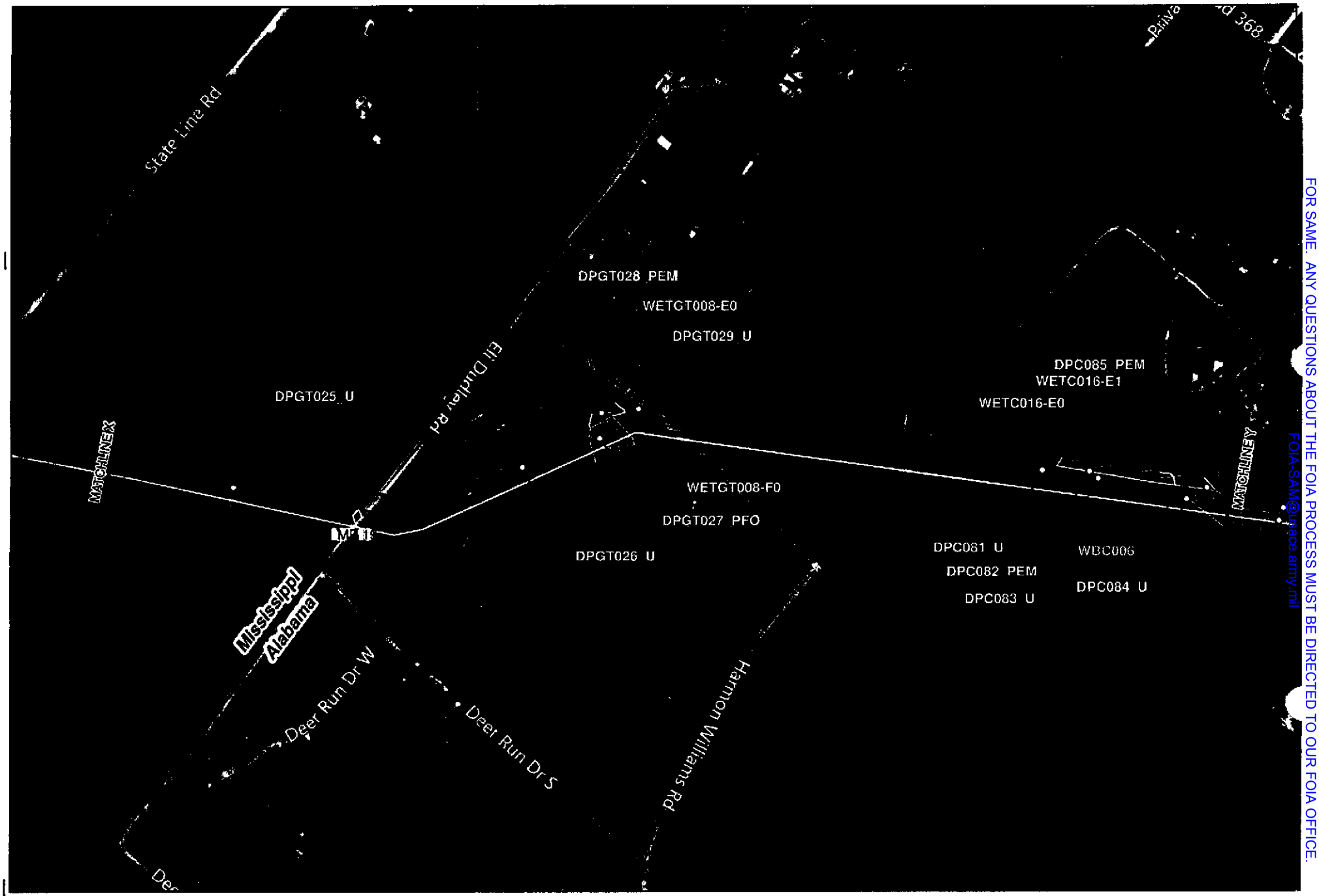
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 22 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JF
Approved By: Preliminary Draft
SWCA Project No: 2293
Date Produced: 8/20/2012
Revision Date:
0 250 500 Feet
Coordinate System: NAD 1983 UTM Zone 16N
Units: Foot US



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 23 of 47

PLANNED SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
441-MILE LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MISSISSIPPI / ALABAMA

Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Ex

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JP
Approved By: Preliminary Draft
SWCA Project No: 22933
Date Produced: 3/20/2012
Revision Date:
0 250 500 Feet
Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

Steve Jasper [illegible] 1/6/2012 MDM

Comment	Lat	Long
Mike Moxey Verification Point 1	N30° 41' 5.603"	W88° 18' 33.079"
Mike Moxey Verification Point 2	N30° 41' 6.761"	W88° 18' 31.352"
Mike Moxey Verification Point 3	N30° 46' 37.021"	W88° 13' 34.706"

185.57 Google
185x50 ≈ .224 Ac
SAM-2012-88[illegible]
WETC 18-FO

* Two field data pts / worksheet → .267

Field data (rectangle polygon assumed)
* shows about ≈ .224 ac impact

** Worksheets submitted by applicant show .267 acres impact.

Very good
M. Moxey

Moxey, Michael B SAM

From: Eric Munscher [emunscher@swca.com]
Sent: Tuesday, January 08, 2013 2:49 PM
To: Moxey, Michael B SAM
Cc: Tom Sankey
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Mr. Moxey,

I have contacted land and will have them try and gain us access to the following areas for verification.

WETC027-F0
WETC0018-F0
WETD 009-F3
WETD 009-F2

Once I hear back from them I will let you know. My plan is to fly out on Monday and flag the wetlands Monday and Tuesday and to have you meet us for verification on Wednesday the 16th.

I will get back to you as soon as I can.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)
Herpetologist / Ecologist
Certified Gopher Tortoise Agent
Principal Investigator of the NAFTRG
SWCA Environmental Consultants
7255 Langtry Suite, 100
Houston, TX 77040

"And I can only believe, from somewhere ıter of the brain, that a life of incomprehensible loneliness awai ı things were, but are never to be again." William Stolzenburg. Whe

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Tuesday, January 08, 2013 2:34 PM
To: Eric Munscher
Cc: Tom Sankey
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,

SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 15 of 47

PLAINS SOUTHCAP L.L.C.
PLAN VIEWS
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Milepost
HDD Entry/Exit
HDD Centerline
Centerline
Permanent
Additional Temporary
Intertidal
Perennial
Intermittent
Ephemeral
Pond
E2EM
PEM
PFO
PSS

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22832
Date Produced: 12/06/2012
Revision Date:
0 250 500 Feet
Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

WETLAND DETERMINATION DATA FORM - Atlantic and Gulf Coastal Plain Region

Project/Site: Pascagoula P.L. - AL, MS County: Mobile Sampling Date: May 28, 2012
Applicant/Owner: Plains Southcap LLC State: Alabama Sample Point: DPC097_PFO
Investigator(s): E. Munscher and K. Schneider Section, Township, Range: Sec. 20, T4SR3W
Landform (hillslope, terrace, etc.): Depression Local relief (concave, convex, none): Concave Slope (%): 00-05
Subregion (LRR or MLRA): South Atlantic and Gulf Slope Cash Crops, Forest, and Livestock Region (P) Lat: 30.68506 Long: -88.30884 Datum: UTM 16N N83 USFT
Soil Map Unit Name: Pamlico-Bibb complex, 0 to 1 percent slopes NWI Classification: None
Are climatic / hydrologic conditions on the site typical for this time of year? (Yes / No) Yes (if no, explain in Remarks.)
Are Vegetation NO, Soil NO, or Hydrology NO significantly disturbed? Are "Normal Circumstances" present? Yes X No
Are Vegetation NO, Soil NO, or Hydrology NO naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes X	No	**Is the Sampled Area within a Wetland?**	Yes X	No
Hydric Soil Present?	Yes X	No			
Wetland Hydrology Present?	Yes X	No			

Remarks:

This point was determined to be within a wetland due to the presence of all 3 wetland criteria.

HYDROLOGY

Wetland hydrology Indicators:

Primary Indicators (minimum of one is required; check all that apply)

- X Surface Water (A1)
- X High Water Table (A2)
- ___ Saturation (A3)
- X Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- ___ Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Inundation Visible on Aerial Imagery (B7)
- ___ Water-Stained Leaves (B9)
- ___ Aquatic Fauna (B13)
- ___ Marl Deposits (B15) (LRR U)
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres on Living Roots(C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent Iron Reduction in Tilled Soils (C6)
- ___ Thin Muck Surface (C7)
- ___ Other (Explain in Remarks)

Secondary Indicators (minimum of two required)

- ___ Surface Soil Cracks (B6)
- ___ Sparsely Vegetated Concave Surface (B8)
- X Drainage Patterns (B10)
- X Moss Trim Lines (B16)
- ___ Dry-Season Water Table (C2)
- ___ Crayfish Burrows
- ___ Saturation Visible on Aerial Imagery (C9)
- ___ Geomorphic Position (D2)
- ___ Shallow Aquitard (D3)
- ___ FAC-Neutral Test (D5)
- ___ Sphagnum moss (D8) (LRR T, U)

Field Observations:

Surface Water Present?	Yes X No	Depth (inches):	aput Dept
Water Table Present?	Yes X No	Depth (inches):	12
Saturation Present? (includes capillary fringe)	Yes No X	Depth (inches):	>20

Wetland Hydrology Present? Yes X No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

A positive indication of wetland hydrology was observed (at least one primary indicator).

A positive indication of wetland hydrology was observed (at least two secondary indicators).

VEGETATION (Five Strata) - Use scientific names of plants.

Sampling Point: DPC097_PFO

Tree Stratum (Plot size: 30 ft.)	Absolute % cover	Dominant Species?	Indicator Status
1. *Nyssa biflora* Black gum	30	Yes	OBL
2. *Acer rubrum* red maple	10	No	FAC
3. *Acer negundo* Box elder	5	No	FACW
4. *Quercus laurifolia* Swamp laurel oak	5	No	FACW
5. *Pinus elliottii* Slash pine	5	No	FACW
6.			
	55	= Total Cover	
50% of total cover: 27.5	20% of total cover: 11		

Sapling Stratum (Plot size: 30 ft.)			
1. *Nyssa biflora*	5	Yes	OBL
2. *Acer rubrum*	10	Yes	FAC
3. *Acer negundo*	10	Yes	FACW
4.			
5.			
6.			
	25	= Total Cover	
50% of total cover: 12.5	20% of total cover: 5		

Shrub Stratum (Plot size: 30 ft.)			
1. *None Observed*			
2.			
3.			
4.			
5.			
6.			
	0	= Total Cover	
50% of total cover: 0	20% of total cover: 0		

Herb Stratum (Plot size: 30 ft.)			
1. *Polygonum hydropiperoides* wild water pepper	5	Yes	OBL
2. *Woodwardia areolata* netted chain fern	5	Yes	OBL
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	10	= Total Cover	
50% of total cover: 5	20% of total cover: 2		

Woody Vine Stratum (Plot size: 30 ft.)			
1. *None Observed*			
2.			
3.			
4.			
5.			
	0	= Total Cover	
50% of total cover: 0	20% of total cover: 0		

Dominance Test worksheet:

Number of Dominant Species That Are OBL, FACW, or FAC: 6 (A)

Total Number of Dominant Species Across All Strata: 6 (B)

Percent of Dominant Species That Are OBL, FACW, or FAC: 100% (A/B)

Prevalence Index Worksheet:

Total % Cover of:		Multiply by:	
OBL species	45	x 1 =	45
FACW species	25	x 2 =	50
FAC species	20	x 3 =	60
FACU species	0	x 4 =	0
UPL species	0	x 5 =	0
Column Totals:	90 (A)		155 (B)

Prevalence Index = B/A = 1.72

Hydrophytic Vegetation Indicators:

___ 1 - Rapid Test for Hydrophytic Vegetation

X 2 - Dominance Test is >50%

X 3 - Prevalence Index is ≤ 3.0[1]

___ Problematic Hydrophytic Vegetation[1] (Explain)

[1]Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Definitions of Five Vegetation Strata:

Tree - Woody plants, excluding woody vines, approximately 20 ft (6m) or more in height and 3 in. (7.6 cm) or larger in diameter at breast height (DBH).

Sapling - Woody plants, excluding woody vines, approximately 20 ft (6 m) or more in height and less than 3 in. (7.6 cm) DBH.

Shrub - Woody plants, excluding woody vines, approximately 3 to 20 ft (1 to 6 m) in height.

Herb - All herbaceous (non-woody) plants, including herbaceous vines, regardless of size, and woody plants, except woody vines, less than approximately 3 ft (1 m) in height.

Woody vine - All woody vines, regardless of height.

Hydrophytic Vegetation Present? Yes X No ___

Remarks: (if observed, list morphological adaptations below).

A positive indication of hydrophytic vegetation was observed (>50% of dominant species indexed as OBL, FACW, or FAC).

A positive indication of hydrophytic vegetation was observed (Prevalence Index is ≤ 3.00).

SOIL

Sampling Point: DPC097_PFO

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix Color (moist)	Matrix %	Redox Features Color (moist)	Redox Features %	Type[1]	Loc[2]	Texture	Remarks
0-12	10YR 4/2	95	10YR 5/6	5	C	M	Sandy Clay	

[1]Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. [2]Location: PL=Pore Lining, M=Matrix.

Hydric Soils Indicators: (Applicable to all LRRs, unless otherwise noted.)

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Stratified Layers (A5)
- ___ Organic Bodies (A6) **(LRR P, T, U)**
- ___ 5 cm Mucky Mineral (A7) **(LRR P, T, U)**
- ___ Muck Presence (A8) **(LRR U)**
- ___ 1 cm Muck (A9) **(LRR P, T)**
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Coast Prairie Redox (A16) **(MLRA 150A)**
- ___ Sandy Mucky Mineral (S1) **(LRR O, S)**
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Dark Surface (S7) **(LRR P, S, T, U)**
- ___ Polyvalue Below Surface (S8) **(LRR S, T, U)**
- ___ Thin Dark Surface (S9) **(LRR S, T, U)**
- ___ Loamy Mucky Mineral (F1) **(LRR O)**
- ___ Loamy Gleyed Matrix (F2)
- X Depleted Matrix (F3)
- ___ Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)
- ___ Marl (F10) **(LRR U)**
- ___ Depleted Ochric (F11) **(MLRA 151)**
- ___ Iron-Manganese Masses (F12) **(LRR O, P, T)**
- ___ Umbric Surface (F13) (LRR P, T, U)
- ___ Delta Ochric (F17) **(MLRA 151)**
- ___ Reduced Vertic (F18) **(MLRA 150A, 150B)**
- ___ Piedmont Floodplain Soils (F19) **(MLRA 149A)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 149A, 153C, 153D)**

Indicators for Problematic Hydric Soils[3]:

- ___ 1 cm Muck (A9) **(LRR O)**
- ___ 2 cm Muck (A10) **(LRR S)**
- ___ Reduced Vertic (F18) **(outside MLRA 150A,B)**
- ___ Piedmont Floodplain Soils (F19) **(LRR P, S, T)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 153B)**
- ___ Red Parent Material (TF2)
- ___ Very Shallow Dark Surface (TF12)
- ___ Other (Explain in Remarks)

[3]Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

Type: ___

Depth (inches): ___

Hydric Soil Present? Yes X **No** ___

Remarks:

A positive indication of hydric soil was observed.

WETLAND DETERMINATION DATA FORM - Atlantic and Gulf Coastal Plain Region

Project/Site: Pascagoula P.L. - AL, MS County: Mobile Sampling Date: May 28, 2012
Applicant/Owner: Plains Southcap LLC State: Alabama Sample Point: DPC095_U
Investigator(s): E. Munscher and K. Schneider Section, Township, Range: Sec. 20, T4SR3W
Landform (hillslope, terrace, etc.): Hillslope Local relief (concave, convex, none): None Slope (%): 05-10
Subregion (LRR or MLRA): South Atlantic and Gulf Slope Cash Crops, Forest, and Livestock Region (P) Lat: 30.68482 Long: -88.30917 Datum: UTM 16N N83 USFT
Soil Map Unit Name: Troup Heidel complex, 8 to 12 percent slopes NWI Classification: PFO6F
Are climatic / hydrologic conditions on the site typical for this time of year? (Yes / No) Yes (if no, explain in Remarks.)
Are Vegetation NO, Soil NO, or Hydrology NO significantly disturbed? Are "Normal Circumstances" present? Yes X No
Are Vegetation NO, Soil NO, or Hydrology NO naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes X	No	**Is the Sampled Area within a Wetland?**	Yes No X
Hydric Soil Present?	Yes	No X		
Wetland Hydrology Present?	Yes	No X		

Remarks:

This point was determined not to be within a wetland due to the lack of hydric soils and wetland hydrology.

HYDROLOGY

Wetland hydrology Indicators:

Primary Indicators (minimum of one is required; check all that apply)

- ___ Surface Water (A1)
- ___ High Water Table (A2)
- ___ Saturation (A3)
- ___ Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- ___ Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Inundation Visible on Aerial Imagery (B7)
- ___ Water-Stained Leaves (B9)
- ___ Aquatic Fauna (B13)
- ___ Marl Deposits (B15) (LRR U)
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres on Living Roots(C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent Iron Reduction in Tilled Soils (C6)
- ___ Thin Muck Surface (C7)
- ___ Other (Explain in Remarks)

Secondary Indicators (minimum of two required)

- ___ Surface Soil Cracks (B6)
- ___ Sparsely Vegetated Concave Surface (B8)
- ___ Drainage Patterns (B10)
- ___ Moss Trim Lines (B16)
- ___ Dry-Season Water Table (C2)
- ___ Crayfish Burrows
- ___ Saturation Visible on Aerial Imagery (C9)
- ___ Geomorphic Position (D2)
- ___ Shallow Aquitard (D3)
- ___ FAC-Neutral Test (D5)
- ___ Sphagnum moss (D8) (LRR T, U)

Field Observations:

Surface Water Present?	Yes	No X	Depth (inches):	N/A
Water Table Present?	Yes	No X	Depth (inches):	>20
Saturation Present? (includes capillary fringe)	Yes	No X	Depth (inches):	>20

Wetland Hydrology Present? Yes No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

No positive indication of wetland hydrology was observed.

VEGETATION (Five Strata) - Use scientific names of plants. Sampling Point: DPC095_U

Tree Stratum (Plot size: 30 ft.)	Absolute % cover	Dominant Species?	Indicator Status
1. *Quercus Nigra* water oak	15	Yes	FAC
2. *Ilex opaca* American Holly	10	Yes	FAC
3. *Magnolia Grandiflora* Southern mag	5	No	FAC
4. *Fraxinus americana* white ash	10	Yes	FACU
5. *Cornus florida* dogwood	5	No	UPL
6. *Quercus laurifolia* Swamp laurel oak	5	No	FACW
	50	= Total Cover	
50% of total cover:	25	20% of total cover:	10

Sapling Stratum (Plot size: 30 ft.)			
1. *Quercus Nigra*	5	No	FAC
2. *Ilex opaca*	10	Yes	FAC
3. *Fraxinus americana*	10	Yes	FACU
4. *Quercus laurifolia*	10	Yes	FACW
5.			
6.			
	35	= Total Cover	
50% of total cover:	17.5	20% of total cover:	7

Shrub Stratum (Plot size: 30 ft.)			
1. *Ilex vomitoria*	15	Yes	FAC
2. *Symplocos tinctoria*	15	Yes	FAC
3.			
4.			
5.			
6.			
	30	= Total Cover	
50% of total cover:	15	20% of total cover:	6

Herb Stratum (Plot size: 30 ft.)			
1. *Pteridium Gleditsch*	15	Yes	FACU
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	15	= Total Cover	
50% of total cover:	7.5	20% of total cover:	3

Woody Vine Stratum (Plot size: 30 ft.)			
1. *None Observed*			
2.			
3.			
4.			
5.			
	0	= Total Cover	
50% of total cover:	0	20% of total cover:	0

Dominance Test worksheet:

Number of Dominant Species That Are OBL, FACW, or FAC: 6 (A)

Total Number of Dominant Species Across All Strata: 9 (B)

Percent of Dominant Species That Are OBL, FACW, or FAC: 67% (A/B)

Prevalence Index Worksheet:

Total % Cover of:		Multiply by:	
OBL species	0	x 1 =	0
FACW species	15	x 2 =	30
FAC species	75	x 3 =	225
FACU species	35	x 4 =	140
UPL species	5	x 5 =	25
Column Totals:	130 (A)		420 (B)

Prevalence Index = B/A = 3.23

Hydrophytic Vegetation Indicators:

____ 1 - Rapid Test for Hydrophytic Vegetation

__X__ 2 - Dominance Test is >50%

____ 3 - Prevalence Index is ≤ 3.0[1]

____ Problematic Hydrophytic Vegetation[1] (Explain)

[1]Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Definitions of Five Vegetation Strata:

Tree - Woody plants, excluding woody vines, approximately 20 ft (6m) or more in height and 3 in. (7.6 cm) or larger in diameter at breast height (DBH).

Sapling - Woody plants, excluding woody vines, approximately 20 ft (6 m) or more in height and less than 3 in. (7.6 cm) DBH.

Shrub - Woody plants, excluding woody vines, approximately 3 to 20 ft (1 to 6 *m*) in height.

Herb - All herbaceous (non-woody) plants, including herbaceous vines, regardless of size, and woody plants, except woody vines, less than approximately 3 ft (1 m) in height.

Woody vine - All woody vines, regardless of height.

Hydrophytic Vegetation Present? Yes __X__ No ____

Remarks: (if observed, list morphological adaptations below).

A positive indication of hydrophytic vegetation was observed (>50% of dominant species indexed as OBL, FACW, or FAC).

SOIL

Sampling Point: **DPC095_U**

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix Color (moist)	Matrix %	Redox Features Color (moist)	Redox Features %	Redox Features Type[1]	Redox Features Loc[2]	Texture	Remarks
0-20	10YR 6/3	100	None	—	—	—	Sandy Loam	

[1]Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. [2]Location: PL=Pore Lining, M=Matrix.

Hydric Soils Indicators: (Applicable to all LRRs, unless otherwise noted.)

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Stratified Layers (A5)
- ___ Organic Bodies (A6) **(LRR P, T, U)**
- ___ 5 cm Mucky Mineral (A7) **(LRR P, T, U)**
- ___ Muck Presence (A8) **(LRR U)**
- ___ 1 cm Muck (A9) **(LRR P, T)**
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Coast Prairie Redox (A16) **(MLRA 150A)**
- ___ Sandy Mucky Mineral (S1) **(LRR O, S)**
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Dark Surface (S7) **(LRR P, S, T, U)**
- ___ Polyvalue Below Surface (S8) **(LRR S, T, U)**
- ___ Thin Dark Surface (S9) **(LRR S, T, U)**
- ___ Loamy Mucky Mineral (F1) **(LRR O)**
- ___ Loamy Gleyed Matrix (F2)
- ___ Depleted Matrix (F3)
- ___ Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)
- ___ Marl (F10) **(LRR U)**
- ___ Depleted Ochric (F11) **(MLRA 151)**
- ___ Iron-Manganese Masses (F12) **(LRR O, P, T)**
- ___ Umbric Surface (F13) **(LRR P, T, U)**
- ___ Delta Ochric (F17) **(MLRA 151)**
- ___ Reduced Vertic (F18) **(MLRA 150A, 150B)**
- ___ Piedmont Floodplain Soils (F19) **(MLRA 149A)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 149A, 153C, 153D)**

Indicators for Problematic Hydric Soils[3]:

- ___ 1 cm Muck (A9) **(LRR O)**
- ___ 2 cm Muck (A10) **(LRR S)**
- ___ Reduced Vertic (F18) **(outside MLRA 150A,B)**
- ___ Piedmont Floodplain Soils (F19) **(LRR P, S, T)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 153B)**
- ___ Red Parent Material (TF2)
- ___ Very Shallow Dark Surface (TF12)
- ___ Other (Explain in Remarks)

[3]Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

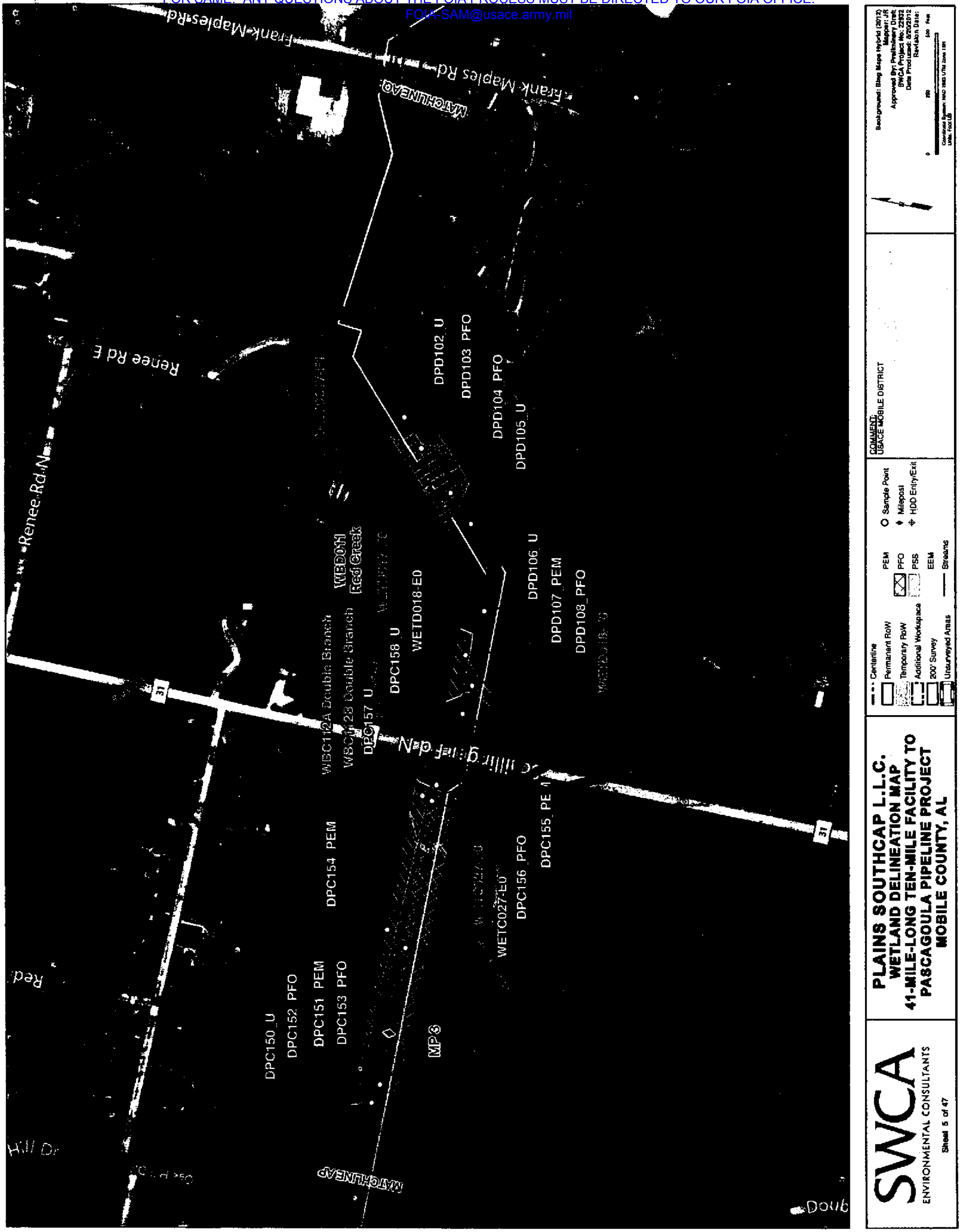
Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ **No** X

Remarks:

No positive indication of hydric soils was observed.


Frank-Maples-Rd
MATCHLINE A0
Renee Rd E
Renee Rd N
DPD102_U
DPD103_PFO
DPD104_PFO
DPD105_U
DPD106_U
DPD107_PEM
DPD108_PFO
WBD011
Red Creek
WETD018-E0
DPC158_U
DPC157_U
WBC112A Double Branch
WBC112B Double Branch
DPC154_PEM
DPC155_PE
DPC156_PFO
WETC027-E0
DPC150_U
DPC152_PFO
DPC151_PEM
DPC153_PFO
MP 3
Hill Dr
MATCHLINE A0
31
COMMENT:
USACE MOBILE DISTRICT
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
300' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 5 of 47

P. 5
WetC-027-PO

WETLAND DETERMINATION DATA FORM - Atlantic and Gulf Coastal Plain Region

Project/Site: Pascagoula P.L. - AL, MS County: Mobile Sampling Date: June 1, 2012
Applicant/Owner: Plains Southcap LLC State: Alabama Sample Point: DPC153_PFO
Investigator(s): E. Munscher and K. Schneider Section, Township, Range: Sec. 24, T3SR3W
Landform (hillslope, terrace, etc.): Depression Local relief (concave, convex, none): Concave Slope (%): 00-05
Subregion (LRR or MLRA): South Atlantic and Gulf Slope Cash Crops, Forest, and Livestock Region (P) Lat: 30.77693 Long: -88.22833 Datum: UTM 16N N83 USFT
Soil Map Unit Name: Troup Heidel complex, 8 to 12 percent slopes NWI Classification: PSS7/EM1A
Are climatic / hydrologic conditions on the site typical for this time of year? (Yes / No) Yes (if no, explain in Remarks.)
Are Vegetation NO, Soil NO, or Hydrology NO significantly disturbed? Are "Normal Circumstances" present? Yes X No
Are Vegetation NO, Soil NO, or Hydrology NO naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes X	No	**Is the Sampled Area within a Wetland?**	Yes X	No
Hydric Soil Present?	Yes X	No			
Wetland Hydrology Present?	Yes X	No			

Remarks:

This point was determined to be within a wetland due to the presence of all 3 wetland criteria.

HYDROLOGY

Wetland hydrology Indicators:

Primary Indicators (minimum of one is required; check all that apply)

- ___ Surface Water (A1)
- ___ High Water Table (A2)
- ___ Saturation (A3)
- ___ Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- ___ Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Inundation Visible on Aerial Imagery (B7)
- ___ Water-Stained Leaves (B9)
- ___ Aquatic Fauna (B13)
- ___ Marl Deposits (B15) **(LRR U)**
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres on Living Roots(C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent Iron Reduction in Tilled Soils (C6)
- ___ Thin Muck Surface (C7)
- ___ Other (Explain in Remarks)

Secondary Indicators (minimum of two required)

- ___ Surface Soil Cracks (B6)
- ___ Sparsely Vegetated Concave Surface (B8)
- ___ Drainage Patterns (B10)
- X Moss Trim Lines (B16)
- ___ Dry-Season Water Table (C2)
- ___ Crayfish Burrows
- ___ Saturation Visible on Aerial Imagery (C9)
- ___ Geomorphic Position (D2)
- ___ Shallow Aquitard (D3)
- X FAC-Neutral Test (D5)
- ___ Sphagnum moss (D8) **(LRR T, U)**

Field Observations:

Surface Water Present?	Yes	No X	Depth (inches):	N/A	
Water Table Present?	Yes	No X	Depth (inches):	>20	
Saturation Present? (includes capillary fringe)	Yes	No X	Depth (inches):	>20	**Wetland Hydrology Present?** Yes X No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

A positive indication of wetland hydrology was observed (at least two secondary indicators).

VEGETATION (Five Strata) - Use scientific names of plants.

Sampling Point: DPC153_PFO

	Absolute % cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: 30 ft.)			
1. *Magnolia virginiana* Sweetbay	20	Yes	FACW
2. *Acer rubrum* red maple	15	Yes	FAC
3. *Quercus lyrata* Overcup oak	5	No	OBL
4. *Liriodendron tulipifera* tulip poplar	5	No	FACU
5. *Quercus laurifolia* Swamp laurel (Diamond)		No	FACW
6.			
	45 = Total Cover		
50% of total cover: 22.5	20% of total cover: 9		
Sapling Stratum (Plot size: 30 ft.)			
1. *Acer rubrum*	15	Yes	FAC
2. *Quercus laurifolia*	10	Yes	FACW
3. *Persea palustris* Swamp red bay	2	No	FACW
4.			
5.			
6.			
	27 = Total Cover		
50% of total cover: 13.5	20% of total cover: 5.4		
Shrub Stratum (Plot size: 30 ft.)			
1. *Cliftonia monophylla* Black titi	15	Yes	OBL
2. *Ilex coriacea* Sweet gallberry FACW	15	Yes	FACW
3.			
4.			
5.			
6.			
	30 = Total Cover		
50% of total cover: 15	20% of total cover: 6		
Herb Stratum (Plot size: 30 ft.)			
1. *Woodwardia areolata* netted chain fern	5	Yes	OBL
2. *Osmunda regalis* royal fern	5	Yes	OBL
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	10 = Total Cover		
50% of total cover: 5	20% of total cover: 2		
Woody Vine Stratum (Plot size: 30 ft.)			
1. *Toxicodendron radicans*	10	Yes	FAC
2.	5		
3.	5		
4.			
5.			
	20 = Total Cover		
50% of total cover: 10	20% of total cover: 4		

Dominance Test worksheet:

Number of Dominant Species That Are OBL, FACW, or FAC: 9 (A)

Total Number of Dominant Species Across All Strata: 9 (B)

Percent of Dominant Species That Are OBL, FACW, or FAC: 100% (A/B)

Prevalence Index Worksheet:

Total % Cover of:		Multiply by:	
OBL species	30	x 1 =	30
FACW species	47	x 2 =	94
FAC species	40	x 3 =	120
FACU species	5	x 4 =	20
UPL species	0	x 5 =	0
Column Totals:	122 (A)		264 (B)

Prevalence Index = B/A = 2.16

Hydrophytic Vegetation Indicators:

- ___ 1 - Rapid Test for Hydrophytic Vegetation
- X 2 - Dominance Test is >50%
- X 3 - Prevalence Index is ≤ 3.0[1]
- ___ Problematic Hydrophytic Vegetation[1] (Explain)

[1]Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Definitions of Five Vegetation Strata:

Tree - Woody plants, excluding woody vines, approximately 20 ft (6m) or more in height and 3 in. (7.6 cm) or larger in diameter at breast height (DBH).

Sapling - Woody plants, excluding woody vines, approximately 20 ft (6 m) or more in height and less than 3 in. (7.6 cm) DBH.

Shrub - Woody plants, excluding woody vines, approximately 3 to 20 ft (1 to 6 m) in height.

Herb - All herbaceous (non-woody) plants, including herbaceous vines, regardless of size, and woody plants, except woody vines, less than approximately 3 ft (1 m) in height.

Woody vine - All woody vines, regardless of height.

Hydrophytic Vegetation Present? Yes X No ___

Remarks: (if observed, list morphological adaptations below).

A positive indication of hydrophytic vegetation was observed (>50% of dominant species indexed as OBL, FACW, or FAC).

A positive indication of hydrophytic vegetation was observed (Prevalence Index is ≤ 3.00).

SOIL

Sampling Point: DPC153_PFO

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type[1]	Loc[2]	Texture	Remarks
0-20	10YR 3/1	95	10YR 4/6	5	C	M	Sandy Clay	

[1]Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. [2]Location: PL=Pore Lining, M=Matrix.

Hydric Soils Indicators: (Applicable to all LRRs, unless otherwise noted.)

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Stratified Layers (A5)
- ___ Organic Bodies (A6) **(LRR P, T, U)**
- ___ 5 cm Mucky Mineral (A7) **(LRR P, T, U)**
- ___ Muck Presence (A8) **(LRR U)**
- ___ 1 cm Muck (A9) **(LRR P, T)**
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Coast Prairie Redox (A16) **(MLRA 150A)**
- ___ Sandy Mucky Mineral (S1) **(LRR O, S)**
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Dark Surface (S7) **(LRR P, S, T, U)**
- ___ Polyvalue Below Surface (S8) **(LRR S, T, U)**
- ___ Thin Dark Surface (S9) **(LRR S, T, U)**
- ___ Loamy Mucky Mineral (F1) **(LRR O)**
- ___ Loamy Gleyed Matrix (F2)
- X Depleted Matrix (F3)
- ___ Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)
- ___ Marl (F10) **(LRR U)**
- ___ Depleted Ochric (F11) **(MLRA 151)**
- ___ Iron-Manganese Masses (F12) **(LRR O, P, T)**
- ___ Umbric Surface (F13) **(LRR P, T, U)**
- ___ Delta Ochric (F17) **(MLRA 151)**
- ___ Reduced Vertic (F18) **(MLRA 150A, 150B)**
- ___ Piedmont Floodplain Soils (F19) **(MLRA 149A)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 149A, 153C, 153D)**

Indicators for Problematic Hydric Soils[3]:

- ___ 1 cm Muck (A9) **(LRR O)**
- ___ 2 cm Muck (A10) **(LRR S)**
- ___ Reduced Vertic (F18) **(outside MLRA 150A,B)**
- ___ Piedmont Floodplain Soils (F19) **(LRR P, S, T)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 153B)**
- ___ Red Parent Material (TF2)
- ___ Very Shallow Dark Surface (TF12)
- ___ Other (Explain in Remarks)

[3]Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes X **No** _____

Remarks:

A positive indication of hydric soil was observed.

WETLAND DETERMINATION DATA FORM - Atlantic and Gulf Coastal Plain Region

Project/Site: Pascagoula P.L. - AL, MS County: Mobile Sampling Date: June 1, 2012
Applicant/Owner: Plains Southcap LLC State: Alabama Sample Point: DPC154 PEM
Investigator(s): E. Munscher and K. Schneider Section, Township, Range: Sec. 24, T3SR3W
Landform (hillslope, terrace, etc.): Hillslope Local relief (concave, convex, none): Concave Slope (%): 00-05
Subregion (LRR or MLRA): South Atlantic and Gulf Slope Cash Crops, Forest, and Livestock Region (P) Lat: 30.77722 Long: -88.22814 Datum: UTM 16N N83 USFT
Soil Map Unit Name: Troup Heidel complex, 6 to 12 percent slopes NWI Classification: None
Are climatic / hydrologic conditions on the site typical for this time of year? (Yes / No) Yes (if no, explain in Remarks.)
Are Vegetation NO, Soil NO, or Hydrology NO significantly disturbed? Are "Normal Circumstances" present? Yes X No
Are Vegetation NO, Soil NO, or Hydrology NO naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes X	No	
Hydric Soil Present?	Yes X	No	**Is the Sampled Area within a Wetland?** Yes X No
Wetland Hydrology Present?	Yes X	No	

Remarks:

This point was determined to be within a wetland due to the presence of all 3 wetland criteria.

HYDROLOGY

Wetland hydrology Indicators:

Primary Indicators (minimum of one is required; check all that apply)

- ___ Surface Water (A1)
- ___ High Water Table (A2)
- X Saturation (A3)
- ___ Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- ___ Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Inundation Visible on Aerial Imagery (B7)
- ___ Water-Stained Leaves (B9)
- ___ Aquatic Fauna (B13)
- ___ Marl Deposits (B15) **(LRR U)**
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres on Living Roots(C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent Iron Reduction in Tilled Soils (C6)
- ___ Thin Muck Surface (C7)
- ___ Other (Explain in Remarks)

Secondary Indicators (minimum of two required)

- ___ Surface Soil Cracks (B6)
- ___ Sparsely Vegetated Concave Surface (B8)
- ___ Drainage Patterns (B10)
- ___ Moss Trim Lines (B16)
- ___ Dry-Season Water Table (C2)
- ___ Crayfish Burrows
- ___ Saturation Visible on Aerial Imagery (C9)
- ___ Geomorphic Position (D2)
- ___ Shallow Aquitard (D3)
- ___ FAC-Neutral Test (D5)
- X Sphagnum moss (D8) **(LRR T, U)**

Field Observations:

Surface Water Present?	Yes	No X	Depth (inches):	N/A
Water Table Present?	Yes	No X	Depth (inches):	>20
Saturation Present? (includes capillary fringe)	Yes X	No	Depth (inches):	0

Wetland Hydrology Present? Yes X No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

A positive indication of wetland hydrology was observed (at least one primary indicator).

VEGETATION (Five Strata) - Use scientific names of plants.

Sampling Point: DPC154_PEM

Tree Stratum (Plot size: 30 ft.)	Absolute % cover	Dominant Species?	Indicator Status
1. None Observed			
2.			
3.			
4.			
5.			
6.			
	0 = Total Cover		
50% of total cover: 0	20% of total cover: 0		
Sapling Stratum (Plot size: 30 ft.)			
1. None Observed			
2.			
3.			
4.			
5.			
6.			
	0 = Total Cover		
50% of total cover: 0	20% of total cover: 0		
Shrub Stratum (Plot size: 30 ft.)			
1. None Observed			
2.			
3.			
4.			
5.			
6.			
	0 = Total Cover		
50% of total cover: 0	20% of total cover: 0		
Herb Stratum (Plot size: 30 ft.)			
1. Woodwardia virginica	15	Yes	OBL
2. Lycopodiella alopecuroides	15	Yes	OBL
3. Rubus arvensis	15	Yes	FAC
4. Pluchea camphorata	20	Yes	FACW
5. Polygala lutea	10	No	FACW
6. Acer rubrum	5	No	FAC
7. Woodwardia areolata	5	No	OBL
8. Symplocos tinctoria	10	No	FAC
9. Lachnocaulon anceps	2	No	FACW
10.			
11.			
	97 = Total Cover		
50% of total cover: 48.5	20% of total cover: 19.4		
Woody Vine Stratum (Plot size: 30 ft.)			
1. Smilax walteri	50	Yes	OBL
2.			
3.			
4.			
5.			
	50 = Total Cover		
50% of total cover: 25	20% of total cover: 10		

Dominance Test worksheet:

Number of Dominant Species That Are OBL, FACW, or FAC: 5 (A)

Total Number of Dominant Species Across All Strata: 5 (B)

Percent of Dominant Species That Are OBL, FACW, or FAC: 100% (A/B)

Prevalence Index Worksheet:

Total % Cover of:		Multiply by:	
OBL species	85	x 1 =	85
FACW species	32	x 2 =	64
FAC species	30	x 3 =	90
FACU species	0	x 4 =	0
UPL species	0	x 5 =	0
Column Totals:	147 (A)		239 (B)

Prevalence Index = B/A = 1.63

Hydrophytic Vegetation Indicators:

___ 1 - Rapid Test for Hydrophytic Vegetation

X 2 - Dominance Test is >50%

X 3 - Prevalence Index is ≤ 3.0[1]

___ Problematic Hydrophytic Vegetation[1] (Explain)

[1]Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Definitions of Five Vegetation Strata:

Tree - Woody plants, excluding woody vines, approximately 20 ft (6m) or more in height and 3 in. (7.6 cm) or larger in diameter at breast height (DBH).

Sapling - Woody plants, excluding woody vines, approximately 20 ft (6 m) or more in height and less than 3 in. (7.6 cm) DBH.

Shrub - Woody plants, excluding woody vines, approximately 3 to 20 ft (1 to 6 m) in height.

Herb - All herbaceous (non-woody) plants, including herbaceous vines, regardless of size, and woody plants, except woody vines, less than approximately 3 ft (1 m) in height.

Woody vine - All woody vines, regardless of height.

Hydrophytic Vegetation Present? Yes X No ___

Remarks: (if observed, list morphological adaptations below).

A positive indication of hydrophytic vegetation was observed (>50% of dominant species indexed as OBL, FACW, or FAC).

A positive indication of hydrophytic vegetation was observed (Prevalence Index is ≤ 3.00).

SOIL

Sampling Point: **DPC154_PEM**

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix Color (moist)	Matrix %	Redox Features Color (moist)	Redox Features %	Redox Features Type[1]	Redox Features Loc[2]	Texture	Remarks
0-20	10YR 2/1	100	None	—	—	—	Muck	

[1]Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. [2]Location: PL=Pore Lining, M=Matrix.

Hydric Soils Indicators: (Applicable to all LRRs, unless otherwise noted.)

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Stratified Layers (A5)
- ___ Organic Bodies (A6) **(LRR P, T, U)**
- X 5 cm Mucky Mineral (A7) **(LRR P, T, U)**
- X Muck Presence (A8) **(LRR U)**
- ___ 1 cm Muck (A9) **(LRR P, T)**
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Coast Prairie Redox (A16) **(MLRA 150A)**
- ___ Sandy Mucky Mineral (S1) **(LRR O, S)**
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Dark Surface (S7) **(LRR P, S, T, U)**
- ___ Polyvalue Below Surface (S8) **(LRR S, T, U)**
- ___ Thin Dark Surface (S9) **(LRR S, T, U)**
- ___ Loamy Mucky Mineral (F1) **(LRR O)**
- ___ Loamy Gleyed Matrix (F2)
- ___ Depleted Matrix (F3)
- ___ Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)
- ___ Marl (F10) **(LRR U)**
- ___ Depleted Ochric (F11) **(MLRA 151)**
- ___ Iron-Manganese Masses (F12) **(LRR O, P, T)**
- ___ Umbric Surface (F13) **(LRR P, T, U)**
- ___ Delta Ochric (F17) **(MLRA 151)**
- ___ Reduced Vertic (F18) **(MLRA 150A, 150B)**
- ___ Piedmont Floodplain Soils (F19) **(MLRA 149A)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 149A, 153C, 153D)**

Indicators for Problematic Hydric Soils[3]:

- ___ 1 cm Muck (A9) **(LRR O)**
- ___ 2 cm Muck (A10) **(LRR S)**
- ___ Reduced Vertic (F18) **(outside MLRA 150A,B)**
- ___ Piedmont Floodplain Soils (F19) **(LRR P, S, T)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 153B)**
- ___ Red Parent Material (TF2)
- ___ Very Shallow Dark Surface (TF12)
- ___ Other (Explain in Remarks)

[3]Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes X No _____

Remarks:

A positive indication of hydric soil was observed.

WETLAND DETERMINATION DATA FORM - Atlantic and Gulf Coastal Plain Region

Project/Site: Pascagoula P.L. - AL, MS County: Mobile Sampling Date: June 1, 2012
Applicant/Owner: Plains Southcap LLC State: Alabama Sample Point: DPC150_U
Investigator(s): E. Munscher and K. Schneider Section, Township, Range: Sec. 24, T3SR3W
Landform (hillslope, terrace, etc.): Hillslope Local relief (concave, convex, none): None Slope (%): 10-15
Subregion (LRR or MLRA): South Atlantic and Gulf Slope Cash Crops, Forest, and Livestock Region (P) Lat: 30.77693 Long: -88.23039 Datum: UTM 16N N83 USFT
Soil Map Unit Name: Troup Heidel complex, 8 to 12 percent slopes NWI Classification: PSS7/EM1A
Are climatic / hydrologic conditions on the site typical for this time of year? (Yes / No) Yes (if no, explain in Remarks.)
Are Vegetation NO, Soil NO, or Hydrology NO significantly disturbed? Are "Normal Circumstances" present? Yes X No
Are Vegetation NO, Soil NO, or Hydrology NO naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes X	No	
Hydric Soil Present?	Yes	No X	Is the Sampled Area within a Wetland? Yes No X
Wetland Hydrology Present?	Yes	No X	

Remarks:

This point was determined not to be within a wetland due to the lack of hydric soils and wetland hydrology.

HYDROLOGY

Wetland hydrology Indicators:

Primary Indicators (minimum of one is required; check all that apply)

- ___ Surface Water (A1)
- ___ High Water Table (A2)
- ___ Saturation (A3)
- ___ Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- ___ Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Inundation Visible on Aerial Imagery (B7)
- ___ Water-Stained Leaves (B9)
- ___ Aquatic Fauna (B13)
- ___ Marl Deposits (B15) **(LRR U)**
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres on Living Roots(C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent Iron Reduction in Tilled Soils (C6)
- ___ Thin Muck Surface (C7)
- ___ Other (Explain in Remarks)

Secondary Indicators (minimum of two required)

- ___ Surface Soil Cracks (B6)
- ___ Sparsely Vegetated Concave Surface (B8)
- ___ Drainage Patterns (B10)
- ___ Moss Trim Lines (B16)
- ___ Dry-Season Water Table (C2)
- ___ Crayfish Burrows
- ___ Saturation Visible on Aerial Imagery (C9)
- ___ Geomorphic Position (D2)
- ___ Shallow Aquitard (D3)
- ___ FAC-Neutral Test (D5)
- ___ Sphagnum moss (D8) **(LRR T, U)**

Field Observations:

Surface Water Present?	Yes	No X	Depth (inches):	N/A
Water Table Present?	Yes	No X	Depth (inches):	>20
Saturation Present? (includes capillary fringe)	Yes	No X	Depth (inches):	>20

Wetland Hydrology Present? Yes No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

No positive indication of wetland hydrology was observed.

VEGETATION (Five Strata) - Use scientific names of plants.

Sampling Point: DPC150_U

	Absolute % cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: 30 ft.)			
1. *Pinus palustris*	20	Yes	FACU
2. *Magnolia grandiflora*	10	Yes	FAC
3. *Quercus falcata*	10	Yes	FACU
4. *Quercus laevis*	5	No	UPL
5. *Magnolia virginiana*	5	No	FACW
6.			
	50 = Total Cover		
50% of total cover: 25	20% of total cover: 10		
Sapling Stratum (Plot size: 30 ft.)			
1. *Pinus palustris*	5	Yes	FACU
2. *Quercus falcata*	5	Yes	FACU
3. *Magnolia virginiana*	5	Yes	FACW
4.			
5.			
6.			
	15 = Total Cover		
50% of total cover: 7.5	20% of total cover: 3		
Shrub Stratum (Plot size: 30 ft.)			
1. *Pinus palustris*	5	No	FACU
2. *Cyrilla racemiflora*	25	Yes	FACW
3. *Lyonia lucida*	15	Yes	FACW
4.			
5.			
6.			
	45 = Total Cover		
50% of total cover: 22.5	20% of total cover: 9		
Herb Stratum (Plot size: 30 ft.)			
1. *Lyonia lucida*	15	Yes	FACW
2. *Woodwardia virginica*	10	Yes	OBL
3. *Pteridium aquilinum*	5	No	FACU
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	30 = Total Cover		
50% of total cover: 15	20% of total cover: 6		
Woody Vine Stratum (Plot size: 30 ft.)			
1. *None Observed*			
2.			
3.			
4.			
5.			
	0 = Total Cover		
50% of total cover: 0	20% of total cover: 0		

Dominance Test worksheet:

Number of Dominant Species That Are OBL, FACW, or FAC: 6 (A)

Total Number of Dominant Species Across All Strata: 10 (B)

Percent of Dominant Species That Are OBL, FACW, or FAC: 60% (A/B)

Prevalence Index Worksheet:

Total % Cover of:		Multiply by:	
OBL species	10	x 1 =	10
FACW species	65	x 2 =	130
FAC species	10	x 3 =	30
FACU species	50	x 4 =	200
UPL species	5	x 5 =	25
Column Totals:	140 (A)		395 (B)

Prevalence Index = B/A = 2.82

Hydrophytic Vegetation Indicators:

- ___ 1 - Rapid Test for Hydrophytic Vegetation
- X 2 - Dominance Test is >50%
- X 3 - Prevalence Index is ≤ 3.0[1]
- ___ Problematic Hydrophytic Vegetation[1] (Explain)

[1]Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Definitions of Five Vegetation Strata:

Tree - Woody plants, excluding woody vines, approximately 20 ft (6m) or more in height and 3 in. (7.6 cm) or larger in diameter at breast height (DBH).

Sapling - Woody plants, excluding woody vines, approximately 20 ft (6 m) or more in height and less than 3 in. (7.6 cm) DBH.

Shrub - Woody plants, excluding woody vines, approximately 3 to 20 ft (1 to 6 m) in height.

Herb - All herbaceous (non-woody) plants, including herbaceous vines, regardless of size, and woody plants, except woody vines, less than approximately 3 ft (1 m) in height.

Woody vine - All woody vines, regardless of height.

Hydrophytic Vegetation Present? Yes X No ___

Remarks: (if observed, list morphological adaptations below).

A positive indication of hydrophytic vegetation was observed (>50% of dominant species indexed as OBL, FACW, or FAC).

A positive indication of hydrophytic vegetation was observed (Prevalence Index is ≤ 3.00).

SOIL

Sampling Point: DPC150_U

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type[1]	Loc[2]	Texture	Remarks
0-10	10YR 4/3	100	None	—	—	—	Sandy Loam	
10-20	10YR 2/2	100	None	—	—	—	Sandy Loam	

[1]Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. [2]Location: PL=Pore Lining, M=Matrix.

Hydric Soils Indicators: (Applicable to all LRRs, unless otherwise noted.)

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Stratified Layers (A5)
- ___ Organic Bodies (A6) **(LRR P, T, U)**
- ___ 5 cm Mucky Mineral (A7) **(LRR P, T, U)**
- ___ Muck Presence (A8) **(LRR U)**
- ___ 1 cm Muck (A9) **(LRR P, T)**
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Coast Prairie Redox (A16) **(MLRA 150A)**
- ___ Sandy Mucky Mineral (S1) **(LRR O, S)**
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Dark Surface (S7) **(LRR P, S, T, U)**
- ___ Polyvalue Below Surface (S8) **(LRR S, T, U)**
- ___ Thin Dark Surface (S9) **(LRR S, T, U)**
- ___ Loamy Mucky Mineral (F1) **(LRR O)**
- ___ Loamy Gleyed Matrix (F2)
- ___ Depleted Matrix (F3)
- ___ Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)
- ___ Marl (F10) **(LRR U)**
- ___ Depleted Ochric (F11) **(MLRA 151)**
- ___ Iron-Manganese Masses (F12) **(LRR O, P, T)**
- ___ Umbric Surface (F13) **(LRR P, T, U)**
- ___ Delta Ochric (F17) **(MLRA 151)**
- ___ Reduced Vertic (F18) **(MLRA 150A, 150B)**
- ___ Piedmont Floodplain Soils (F19) **(MLRA 149A)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 149A, 153C, 153D)**

Indicators for Problematic Hydric Soils[3]:

- ___ 1 cm Muck (A9) **(LRR O)**
- ___ 2 cm Muck (A10) **(LRR S)**
- ___ Reduced Vertic (F18) **(outside MLRA 150A,B)**
- ___ Piedmont Floodplain Soils (F19) **(LRR P, S, T)**
- ___ Anomalous Bright Loamy Soils (F20) **(MLRA 153B)**
- ___ Red Parent Material (TF2)
- ___ Very Shallow Dark Surface (TF12)
- ___ Other (Explain in Remarks)

[3]Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ **No** X

Remarks:

No positive indication of hydric soils was observed.

Moxey, Michael B SAM

To: Moxey, Michael B SAM
Subject: FW: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Tuesday, January 08, 2013 2:49 PM
To: Moxey, Michael B SAM
Cc: Tom Sankey
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Mr. Moxey,

I have contacted land and will have them try and gain us access to the following areas for verification.

WETC027-F0
WETC0018-F0
WETD 009-F3
WETD 009-F2

Once I hear back from them I will let you know. My plan is to fly out on Monday and flag the wetlands Monday and Tuesday and to have you meet us for verification on Wednesday the 16th.

I will get back to you as soon as I can.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)
Herpetologist / Ecologist
Certified Gopher Tortoise Agent
Principal Investigator of the NAFTRG
SWCA Environmental Consultants
7255 Langtry Suite, 100
Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Tuesday, January 08, 2013 2:34 PM
To: Eric Munscher
Cc: Tom Sankey
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED

Caveats: NONE

Eric,
I looked and am fine with your proposed alternative sites. My can arrange my schedule so that I can be available anytime the next two weeks.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Tuesday, January 08, 2013 2:08 PM
To: Moxey, Michael B SAM
Cc: Tom Sankey
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Mr. Moxey,

We appreciate your work to push this project permit along.

As for the verification location. I see no issues with WETC017-F0 or WETD009-F2 and F3. There is an issue with WETGT008-F0 in that it has been an access issue tract. Would WETC027-F0 off of Schillinger Road or WETC0018-F0 off of Novatan Road work better for you? If so I will contact our land agents to gain access to these properties. When would be a good time for this verification to take place? I can fly out to Mobile Monday the 14th and stay out there until Thursday the 17th. That would give me time to flag the wetlands in question and then meet with you to verify each one. Please let me know as soon as you can what days would work best for you so I can plan with land and flights.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)
Herpetologist / Ecologist
Certified Gopher Tortoise Agent
Principal Investigator of the NAFTRG
SWCA Environmental Consultants
7255 Langtry Suite, 100
Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Tuesday, January 08, 2013 1:45 PM
To: Jeremy Rabalais
Cc: Eric Munscher; Tom Sankey; Chuck Fontenot
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Good afternoon,
I have submitted completed the upload worksheets and submitted them to our computer folks to upload. I have completed the mitigation tables and impact tables which will be attached to the permit. I think the next priority should be a field verification of jd and the wetland delineations.

I recommend looking at a sub-sample of sites for the JD and delineation verification. I recommend the following adjacent polygons be flagged and GP points provided for the flags so that we verify the wetland delineation verifications (2 for each permit application). I can then follow-up with the preliminary JD and wetland delineation verification letters for each project.

Alabama (off Eli Dudley Road)
WET GT008-FO
WET CO17-FO

Mississippi (off Lily Orchard Road)
WETD 009-F3
WETD 009-F2

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

Moxey, Michael B SAM

From: Jeremy Rabalais [jrabalais@swca.com]
Sent: Thursday, January 03, 2013 3:04 PM
To: Moxey, Michael B SAM; Eric Munscher
Cc: Tom Sankey; Chuck Fontenot
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Mike,

Myself and Chuck Fontenot have been reviewing the isolated features discussed below, and believe that they were wrongly categorized under the waters type category. We would like to discuss our options with you before we make any changes just to be sure we are taking the correct steps. Please give us a call at your earliest convenience at 225-715-1181 (this is Chuck Fontenot's cell phone). We look forward to speaking with you and clearing this up.

Thanks for your time,

Jeremy Rabalais

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Thursday, January 03, 2013 10:26 AM
To: Moxey, Michael B SAM; Eric Munscher
Cc: Tom Sankey; Jeremy Rabalais
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
I am working on the Alabama component today. Let me know about the isolated wetlands concern. I will address the temporary wetland impacts that do not require mitigation in the conditions of the permit and attach the aquatic resource worksheet to the permit to identify and reference these areas.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Wednesday, January 02, 2013 3:59 PM
To: 'Eric Munscher'

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Friday, January 04, 2013 8:59 AM
To: Rumbley, Pauline B. Contractor; Moxey, Michael B SAM
Subject: FW: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)
Attachments: 01032013 SHP to USACE Mobile.zip

Classification: UNCLASSIFIED
Caveats: NONE

Pauline,
I have placed the Aquatic Resource upload worksheet, impact upload worksheet, and mitigation upload worksheet on the m-drive under Alabama portion of pipeline project SAM-2012-885-MBM. The attached shape files for both the Alabama and Mississippi (SAM-2012-1165-MBM) portions of the pipeline project.

Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Jeremy Rabalais [mailto:jrabalais@swca.com]
Sent: Thursday, January 03, 2013 4:28 PM
To: Moxey, Michael B SAM
Cc: Eric Munscher; Tom Sankey; Chuck Fontenot
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Mike,

Attached are the updated shapefiles and upload sheets. We removed the one pond, and categorized the other as a stream per our phone conversation earlier. I also reviewed the shapefiles and upload sheets for the Mississippi data, and did not find any discrepancies with the feature count. One possible answer is that the row count in excel starts with 1, while the count in ArcGIS starts with 0. If it is still a problem with the new data, please have your GIS tech give me a call (225-229-0862) and we can troubleshoot the issue.

Thanks again

Jeremy

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Thursday, January 03, 2013 10:26 AM
To: Moxey, Michael B SAM; Eric Munscher

Cc: Tom Sankey; Jeremy Rabalais
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
I am working on the Alabama component today. Let me know about the isolated wetlands concern. I will address the temporary wetland impacts that do not require mitigation in the conditions of the permit and attach the aquatic resource worksheet to the permit to identify and reference these areas.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Wednesday, January 02, 2013 3:59 PM
To: 'Eric Munscher'
Cc: Tom Sankey; Jeremy Rabalais
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Thanks for sending the updated information. The number of aquatic resource entries now matches the number of impact entries for both permits, and the number of entries for the mitigation worksheets equals the number of entries on the Corps mitigation worksheet. I spoke with one of our more experienced pipeline people and she stated she prefers to see the temporary impacts requiring a permit but no mitigation also listed, so that all the worksheets have the same number of entries. If this is an issue, I am thinking an alternative is that I identify these no mitigation required sites in the permit conditions for each nationwide permit.

After looking at the data, I noticed that the data sent in your below e-mail reflects impacts to 2 isolated aquatic resources in Alabama (both aquatic resource and impact worksheets). Please note that a JD determination that a wetland is isolated requires extensive documentation and coordination with EPA on these determinations. Just want to confirm before I start creating the justification packages to send to EPA.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Thursday, December 20, 2012 10:40 AM
To: Moxey, Michael B SAM
Cc: Tom Sankey; Jeremy Rabalais
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Mr. Moxey,

We have completed the afore listed items. We hope that these final editions will be able to help you close out this permit application. Please let us know if you have any questions or need anything else from us.

Have a great holiday and we look forward to hearing back from you.

Cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)
Herpetologist / Ecologist
Certified Gopher Tortoise Agent
Principal Investigator of the NAFTRG
SWCA Environmental Consultants
7255 Langtry Suite, 100
Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Thursday, December 20, 2012 8:28 AM
To: Eric Munscher; Tom Sankey; Jeremy Rabalais
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Thanks Eric,
That sounds real good. Should help with the QA/QC the data and allow these projects to move forward quickly.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Wednesday, December 19, 2012 2:32 PM
To: Moxey, Michael B SAM; Tom Sankey; Jeremy Rabalais
Subject: RE: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Mr. Moxey,

After reading your email, we want to talk about our understanding of what's needed.

Items 1 -3: You are requesting that any wetland or waterbody within our workspaces that are not being impacted (the waterbodies being HDD'd) be removed from the delineations' Aquatic Resource upload sheet. By doing this, we will have the same feature count as the Impacts upload sheet.

Item 4: We did not do a Mitigation upload sheet, as it was our understanding that the Mobile Corps Pipeline Data Worksheet was in lieu of a Mitigation Upload. This is not a problem, we can transfer the data from the Pipeline Data Worksheet into the Mitigation format, and transmit it.

Please let us know if these are the appropriate actions needed.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)
Herpetologist / Ecologist
Certified Gopher Tortoise Agent
Principal Investigator of the NAFTRG
SWCA Environmental Consultants
7255 Langtry Suite, 100
Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Wednesday, December 19, 2012 10:44 AM
To: Moxey, Michael B SAM; Tom Sankey; Eric Munscher; Jeremy Rabalais
Subject: Alabama Plains 41-mile pipeline, SAM-2012-0885-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Good morning everyone:
As an update sine our December 6, 2012 conference call. Since I can expect to have the Alabama agency clearances for the Alabama Plains 41-mile pipeline soonest, SAM-2012-0885-MBM, I am making an effort to complete this action first. I received the December 2012 CD with the shape files, waters upload worksheet, impacts worksheet, and COE template for mitigation.

After reviewing the information on the CD, I have the following follow-up comments our discussions:

1. It would seem that since our evaluation is based on aquatic resources with impacts from trenching and conversion that require a 404 permit, that all the Alabama mass upload worksheets (aquatic resources, impacts, and mitigation provided in October 30 e-mail) would have the same data entries.

2. Alabama Aquatic Resource Upload Worksheet: The December 2012 aquatic resource upload worksheet reflects isolated waters (POW shown as isolated). The worksheet is protected so I cannot edit any information. An Aquatic Resource Upload Worksheet will be provided that reflects only aquatic resources with impacts requiring a Corps permit (trenching and/or conversions) and not aquatic resources subject to directional drilling without 404 impacts. The copy provided is protected so I can correct this.

3. Alabama Impact Upload Worksheet: The December 2012 impact upload worksheet reflects isolated waters (ponds) and a different number of entries than the aquatic resource upload worksheet. The worksheet is protected so I cannot edit any information. An impact Upload Worksheet is needed that reflects only aquatic resources with impacts requiring a Corps permit (trenching and/or conversions) and not aquatic resources subject to directional drilling without a 404 regulated action. The copy provided is protected so I can correct this.

4. Alabama Mitigation Upload Worksheet: There are two mitigation worksheets, the mass upload worksheet and the Corps Regulatory mitigation worksheet. You provided the Corps Regulatory worksheet. I will need a mass upload mitigation worksheet (provided in October 30 e-mail) that reflects the same number of entries as the aquatic resource and impact mass upload worksheets, however they would reflect no mitigation/self mitigating for entries for temporary impacts to the PEM and stream crossings. Both the mitigation mass upload worksheet and also the Corps mitigation worksheet should reflect the same number of entries.

5. I will complete the NWP and JD mass upload worksheets.

6. The same information format will be required for the Mississippi permit.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Moxey, Michael B SAM

From: Eric Munscher [emunscher@swca.com]
Sent: Wednesday, January 02, 2013 10:00 AM
To: Moxey, Michael B SAM
Cc: Tom Sankey
Subject: FW: Plains Southcap - Tortoises
Attachments: plains southcap_usfws.PDF

Mr. Moxey,

I was not sure if I sent this email to you or not. This is confirmation from the USFWS concerning our gopher tortoise plans. Please see the attachment from David Felder.

Please let me know if you have any questions.

Thanks and cheers,

EM

From: David Felder [mailto:david_felder@fws.gov]
Sent: Friday, December 21, 2012 9:40 AM
To: Eric Munscher
Cc: Tom Sankey; Matthew Hinderliter; Bruce Porter
Subject: RE: Plains Southcap - Tortoises

Eric and Tom,

See attachment. Our color copier is down today, so I had to send a black and white version. Hard copy in the mail today.

Let me know if you have any questions.

Bruce and Matt, if you have any additional questions or recommendations for this project, please forward to Eric or Tom.

United States Department of the Interior

FISH AND WILDLIFE SERVICE

Mississippi Field Office
6578 Dogwood View Parkway, Suite A
Jackson, Mississippi 39213

December 21, 2012

Mr. Thomas Sankey
SWCA Environmental Consultants
7255 Langtry, Suite 100
Houston, Texas 77040

Dear Mr. Sankey:

The Fish and Wildlife Service (Service) has received your letter dated November 14, 2012 regarding the proposed Plains Southcap, LLC Ten-Mile Facility to Chevron Pascagoula Crude Oil Pipeline Project in Jackson County, Mississippi and Mobile County, Alabama. The proposed project will consist of the construction and placement of approximately 41 miles of 24-inch diameter crude oil pipeline from the Plains Southcap Ten-Mile Crude Oil Facility in Mobile County, Alabama to the Chevron Pascagoula Refinery in Jackson County, Mississippi. The Service has reviewed the information and offers the following comments in accordance with the Endangered Species Act (ESA) of 1973 (87 Stat. 884, as amended; 16 U.S.C. 1531 *et seq.*).

Your office performed threatened and endangered species reviews for all species potentially found within the action area, and conducted field surveys for all areas that contained potential habitat for such species. Your initial determination is that the proposed project would have either no effect on federally listed species because suitable habitat for these species was not present, or, if suitable habitat was present, avoidance measures such as horizontal directional drilling (HDD) would be used to avoid such habitat (i.e. drilling under the Escatwapa River).

In addition, approximately 277 gopher tortoise burrows (burrows) were found in or near the proposed pipeline project, comprising approximately 19 gopher tortoise colonies (colonies). Plains Southcap proposes to completely avoid potential impacts to gopher tortoises by use of HDD and silt screen fencing near burrows. Specifically, Plains Southcap proposes to use HDD under all colonies that are within the proposed pipeline right-of-way (ROW), and will install heavy reinforced silt fencing between construction activities and burrows near the proposed ROW. Also, for all tree clearing activities within colony areas, Plains Southcap will flag all burrows and hand clear trees and vegetation near burrows. Finally, certified gopher tortoise

biologists will monitor all such activities near colonies and inspect silt screen fencing during project construction.

Provided that the proposed project incorporates all avoidance and minimization measures outlined in your report, the Service has determined that the proposed Plains Southcap project is unlikely to result in take of federally listed threatened or endangered species. As an additional protective measure, we do however recommend that all abandoned burrows (that have not naturally collapsed) within the proposed pipeline ROW be scoped and excavated via backhoe before burrow collapse. Finally, please notify this office if federally listed species are encountered during construction activities, or if potential impacts to listed species are revealed that were not previously considered.

Although the bald eagle is no longer protected under the ESA, it continues to be protected under the Bald and Golden Eagle Protection Act (BGEPA). We concur with your recommendation to resurvey the proposed pipeline ROW during the 2013 bald eagle breeding season. If active nests are found near the proposed project, we recommend you follow the National Bald Eagle Management (NBEM) Guidelines in order to minimize potential project impacts to bald eagles. A copy of the NBEM Guidelines is available at http://www.fws.gov/migratorybirds/issues/BaldEagle/NationalBaldEagleManagementGuidelines.pdf.

The Service appreciates the opportunity to provide technical assistance on the Plains Southcap Ten-Mile Facility to Chevron Pascagoula Crude Oil Pipeline Project. If you have any questions, please contact David Felder of our office, telephone: (601) 321-1131.

Sincerely,

for Stephen M. Ricks
Field Supervisor
MS Field Office

Thanks again to everyone for their assistance regarding the review of this project.

David

David Felder

Fish and Wildlife Biologist

US Fish and Wildlife Service

6578 Dogwood View Parkway, Suite A

Jackson, MS 39213

david_felder@fws.gov

(601) 321-1131 office

(601) 720-6458 mobile

(601) 965-4340 fax

From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Wednesday, December 05, 2012 10:46 AM
To: David Felder
Cc: Tom Sankey
Subject: RE: Plains Southcap - Tortoises

David,

We appreciate your quick response to our request for reviewing the report. Here are some answers to your questions.

1. You use the term pods. Is the pod polygon the same as the colony definition (2 or more active/inactive burrows within 600 feet of each other)?

1.) Ray Ashton coined the term "Pod" in his book The Natural History and Management of the Gopher Tortoise (Gopherus polyphemus), 2008. The terms Pod and Colony basically mean the same thing. Ashton described a "Pod" as being a group of tortoises living and foraging in close proximity to one another. While he treated the term "Colony" as groups of "Pods" in connected tortoise habitat. I was lucky enough to take the last Florida gopher tortoise certification class taught by Mr. Ashton before he passed away. To be honest, I largely use the term "Pod" instead of "Colony" out of respect to Ray Ashton. In regards to this project, I believe either of the terms would suffice.

2. What's the minimum distance the HDD will be under an active burrow? Did you factor in a buffer distance from the mouth of the burrow since the actual tortoise chamber may be some distance away from the opening?

2.) Yes we did factor that in. We mapped burrow entrance angle to ROW as well as distance of each burrow entrance to the construction corridor. Bruce Porter originally determined that we should maintain a 25-foot buffer around all active burrows in order to protect the animals. This is based upon his experience that the maximum burrow lengths are ~25 feet. In turn, we have proposed to HDD in areas where there are active burrow entrances within 30 feet of the edge of the construction corridor. We believe that we have also provided you with cross-sections of the proposed HDDs, which show the horizontal setback of the HDD entry and exit points, as well as the depth that we will be drilling. Please let me know if these have not been included in the packet we sent to you. In addition, we are proposing to scope some of the burrows in questions, as discussed in Item 3 below.

3. You are only HDD's under active burrows. Does this mean you will collapse inactive/abandoned burrows? If so, will you scope just before collapse, excavate all burrows, etc? The State of MS generally requires inactive/abandoned burrows be scoped, then completely excavated with backhoe since they have found there can be a 5-10% error rate when scoping.

3.) At present, we are proposing to HDD under 11 "Pods" that include burrows of various conditions, but each one of the 11 Pods includes at least some active burrows, hence the need to HDD. I would agree that we should scope burrows that are within the construction corridor and the 30-foot buffer; however, I'm not so sure of the need to scope the burrows within the vicinity of the HDDs. Our client has no intention of collapsing burrows. To us the purpose of scoping, is to determine if the burrow extends into the construction ROW and/or verify that the burrows do not extend into the construction corridor. If the burrow does not extend into the construction ROW, the area will be conventionally trenched. Let's discuss this further. Tom and I will be calling you today to discuss.

4. For colonies where HDD will be used, what types of activities will occur above ground? Will there be land clearing by Plains Southcap? Will access roads be created through these areas, etc?

4.) Plains intends on using low pressure equipment and hand clearing in the HDD areas. A certified gopher tortoise agent will be on hand during these clearing activities and will flag all burrows to assure tortoise burrow safety. Plains Southcap, LLC will install reinforced silt fencing along GT Pod locations where HDDs are not occurring. Florida certified gopher tortoise agents will be present during the construction phase at all of the Pod locations. No new access roads will be built in these areas. Existing property roads will be used.

5. I also did a quick review of your determination of effects for the other species found in Jackson and Mobile Counties. Your effects determination looks accurate and I did not see any specific issues or concerns. There is one newly designated critical habitat unit for the dusky gopher frog near the project near Helena, MS, however, the pipeline appear to be just outside the boundaries.

5.) Thanks for the feedback.

Incidentally, Tom and I have developed the attached graphic that we believe illustrates all 7 possible scenarios regarding GT burrows along the project corridor. Let's discuss on our phone call.

Thanks,

Eric

Eric C. Munscher, M.S., ES3 (Scientist)

Herpetologist / Ecologist

Certified Gopher Tortoise Agent

Principal Investigator of the NAFTRG

SWCA Environmental Consultants

7255 Langtry Suite, 100

Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

From: David Felder [mailto:david_felder@fws.gov]
Sent: Friday, November 30, 2012 2:48 PM
To: Eric Munscher
Subject: Plains Southcap - Tortoises

Eric,

Please forward to Tom as well, I could not find his email.

I have reviewed the documents related to the Plains Southcap as well as started the coordination with Bruce Porter and Matt Hinderliter (the gopher tortoise species lead). We may eventually need to all get together on a conf call to discuss, but let's address a few more issues first.

A couple of initial questions/issue to clarify.

1. You use the term pods. Is the pod polygon the same as the colony definition (2 or more active/inactive burrows within 600 feet of each other)?

2. What's the minimum distance the HDD will be under an active burrow? Did you factor in a buffer distance from the mouth of the burrow since the actual tortoise chamber may be some distance away from the opening?

3. You are only HDD's under active burrows. Does this mean you will collapse inactive/abandoned burrows? If so, will you scope just before collapse, excavate all burrows, etc? The State of MS generally requires inactive/abandoned burrows be scoped, then completely excavated with backhoe since they have found there can be a 5-10% error rate when scoping.

4. For colonies where HDD will be used, what types of activities will occur above ground? Will there be land clearing by Plains Southcap? Will access roads be created through these areas, etc?

5. I also did a quick review of your determination of effects for the other species found in Jackson and Mobile Counties. Your effects determination looks accurate and I did not see any specific issues or concerns. There is one newly designated critical habitat unit for the dusky gopher frog near the project near Helena, MS, however, the pipeline appear to be just outside the boundaries.

Thanks

David

David Felder

Fish and Wildlife Biologist

US Fish and Wildlife Service

6578 Dogwood View Parkway, Suite A

Jackson, MS 39213

david_felder@fws.gov

(601) 321-1131 office

(601) 720-6458 mobile

(601) 965-4340 fax

Mike AL

SWCA
ENVIRONMENTAL CONSULTANTS

2136

DEC 10 2012

MEMORANDUM

To: Michael B. Moxey, U.S. Army Corps of Engineers, Mobile District

From: R. Thomas Sankey, PWS, CSE – SWCA Houston

Date: December 7, 2012

Re: Ten-Mile Facility to Chevron Pascagoula Crude Oil Pipeline Project
Projected Wetland Mitigation Costs
Mobile County, Alabama and Jackson County, Mississippi

The following memo details our response to the conference call on 12-06-12. All of the criteria listed below has either been attached in hard copy format or loaded on the accompanying flash drive. The items listed below are what was discussed to complete this permit application. All previous files that are not a part of this package should be ignored.

a.) Impact forms will recognize single and complete projects that require 404 or Section 10 permit. Directional drilling areas with no wetland or stream impacts will not be included in this list. ***Response:*** *The impact data sheet has been updated to include only those areas that require 404 or section 10 actions. All HDD sites with no impact areas have been removed. The impact worksheet could not be printed out due to being a protected document. The worksheet can be found on the accompanying flash drive.*

b.) Mitigation forms will correlate with the impact form. Directional drilling with no wetland impacts will not be included in this list. ***Response:*** *The mitigation form has been updated. The mitigation form is congruent with the impacts worksheet. All impacts to PSS and PFO wetlands are addressed.*

c.) The Aquatic Resource form will recognize waters of the U.S. in the federal permit area that have wetlands and streams impacts. Directional drilling area with no 404 or Section 10 impacts will be listed. ***Response:*** *The aquatic resources table includes all wetlands and waterbodies that were delineated across the entire project that are associated with the federal permit area.*

d.) JD form will recognize each waters of the U.S. with wetland or stream impacts, or Section 10 crossings. The list will not provide duplicate listing of the same water because of multiple crossings of the same larger wetland or stream system. ***Response:*** *As discussed during our conference call 12-06-12, this would be taken care of in house by the USACE.*

e.) Wetland delineation. You stated that Pauline has been provided shape files to minimize GPS data in files. We will reference this is the delineation verification

letter. We still need to identify 3 wetland sites that have been flagged and GPS points provided to confirm wetland delineation. ***Response:*** *Updated boundary points and data point GIS shapefiles can be found in the accompanying flash drive. We will select three easily accessed areas for verification shortly.*

f.) The location of the Section 10 water crossings have not changed. The information provided contains the correct sites and GPS locations. I will coordinate this with our Federal Navigation Section for approval. ***Response:*** *As discussed in our conference call the required cross sections for the two Section 10 crossings have already been supplied.*

g.) The SHPO and USFWS clearance letters are expected next week. ***Response:*** *We will send USFWS and SHPO clearance letters upon receipt.*

SWCA
ENVIRONMENTAL CONSULTANTS

2136

MEMORANDUM

ATTACHMENT 1
WETLAND IMPACT AREA MAPS

Path: C:\Users\rjrabalais\Desktop\My Projects\22932_Pascagoula_Pipeline\MAPS\mxd\Report Maps\PCN 3 12062012\PCN Vicinity map 12062012.mxd

PLAINS SOUTHCAP L.L.C.

VICINITY MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT

JACKSON COUNTY, MS
MOBILE COUNTY, AL

LEGEND

Project Area

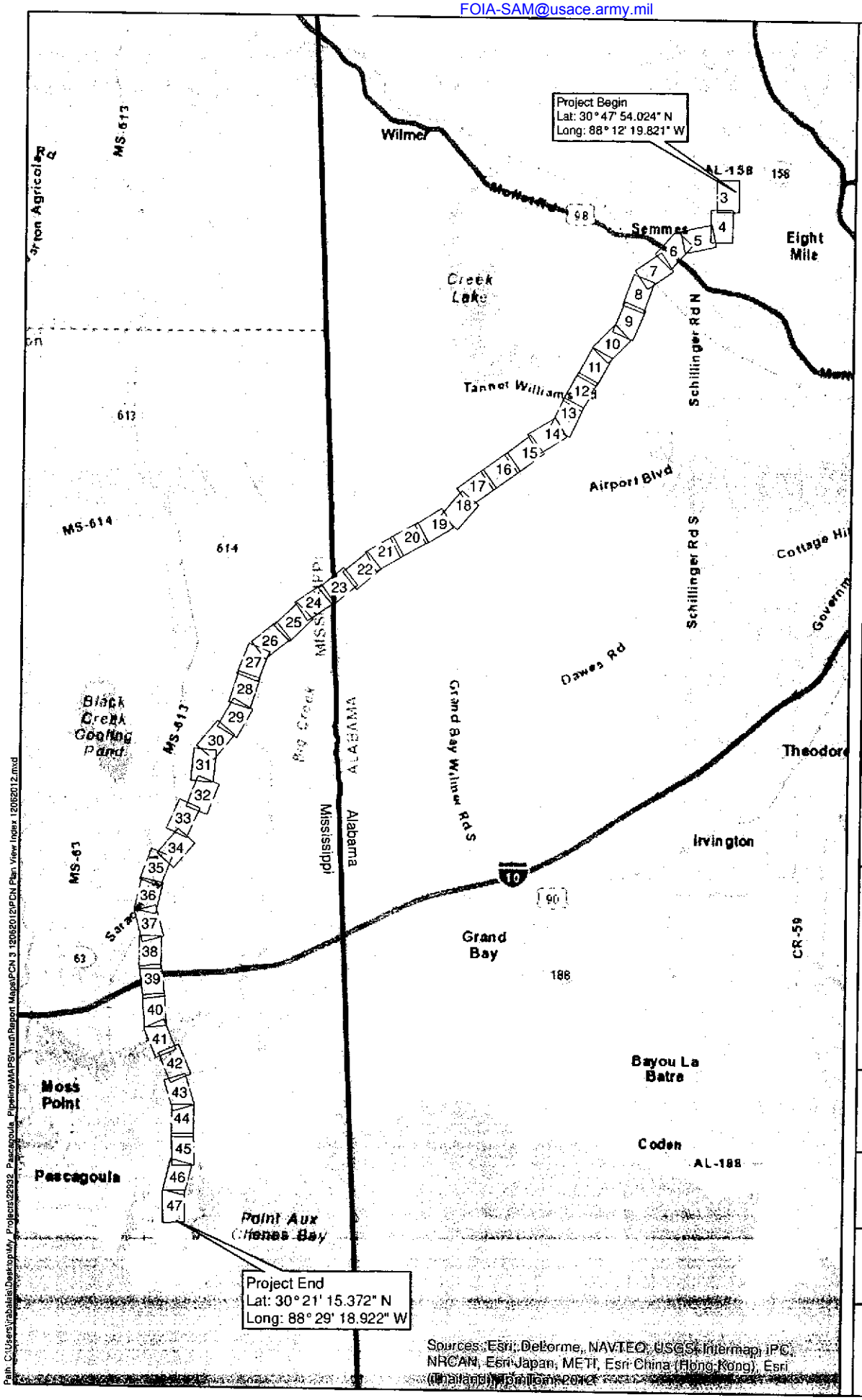
Background/SWCA Topo maps (ESRI Basemap)
Topographic Quad Names:
Report: JR
Approved By: EM
SWCA Project No: 22932
Date Produced: 12/07/2012
Revision Date:

North American Datum 1983
Transverse Mercator
Zone 16
U.S. Survey Foot

0 2 4 Miles

SWCA, Environmental Consultants
7322 Langley, Suite 100
Houston, Texas 77040
(713) 934-8000 phone
(713) 934-8001 fax
www.swca.com

SWCA
ENVIRONMENTAL CONSULTANTS



PLAINS SOUTHCAP L.L.C.

PLAN VIEW INDEX
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT

JACKSON COUNTY, MS
MOBILE COUNTY, AL

LEGEND

Plan View

SWCA ENVIRONMENTAL CONSULTANTS

Path: C:\Users\rabalais\Desktop\My Projects\22932_Pascagoula_Pipeline\MAPS\mxd\Report Maps\PCN 3 12062012\PCN Plan View Index 12062012.mxd

MEMORANDUM

ATTACHMENT 2
WETLAND MITIGATION WORKSHEET

NWP 12 Project No.	FGT Wetland/ Waterbody ID	Local Waterway	Jurisdictional Type (Wetland/Stream)	Wetland/ Stream Type	Latitude (dd NAD83)	Longitude (dd NAD83)	PFO Wetlands to revert to PFO (0.25:1)	PFO Wetlands converted to PSS (0.5:1)	PFO Wetlands converted to PEM	Total 0.25:1 Credits	Total 0.5:1 Credits	Total 1:1 Credits	Total Mitigation Credits	state
	WETC001-F0	Lower Big Creek	Wetland	PFO	30.639643	-88.381798	0.077009	0	0.175132	0.019252	0	0.175132	0.194385	AL
	WETC002-F0	Lower Big Creek	Wetland	PFO	30.640664	-88.379493	0.044776	0	0.069691	0.011194	0	0.069691	0.080885	AL
	WETC002-F1	Lower Big Creek	Wetland	PFO	30.640625	-88.379648	0.007398	0	0.029493	0.001849	0	0.029493	0.031343	AL
	WETC003-F0	Lower Big Creek	Wetland	PFO	30.643202	-88.374253	0.00067	0	0	0.000167	0	0	0.000167	AL
	WETC003-F1	Lower Big Creek	Wetland	PFO	30.643325	-88.374285	0.002232	0	0.055606	0.000558	0	0.055606	0.056164	AL
	WETC003-F2	Lower Big Creek	Wetland	PFO	30.643421	-88.374096	0	0	0.025146	0	0	0.025146	0.025146	AL
	WETC004-F0	Lower Big Creek	Wetland	PFO	30.645192	-88.3704	0	0	0.074719	0	0	0.074719	0.074719	AL
	WETC005-F0	Lower Big Creek	Wetland	PFO	30.645775	-88.369154	0	0	0.035464	0	0	0.035464	0.035464	AL
	WETC007-F0	Lower Big Creek	Wetland	PFO	30.647194	-88.366056	0.220836	0	0.19514	0.055209	0	0.19514	0.250349	AL
	WETC007-F1	Lower Big Creek	Wetland	PFO	30.647291	-88.365738	0.033542	0	0.010524	0.008386	0	0.010524	0.018909	AL
	WETC008-F0	Lower Big Creek	Wetland	PFO	30.648341	-88.363802	0.087021	0	0.327068	0.021755	0	0.327068	0.348823	AL
	WETC009-F0	Lower Big Creek	Wetland	PFO	30.648922	-88.362555	0.025005	0	0.045145	0.006251	0	0.045145	0.051396	AL
	WETC017-F0	Lower Big Creek	Wetland	PFO	30.629024	-88.398835	0.231184	0	0.305145	0.057796	0	0.305145	0.362941	AL
	WETC017-F1	Lower Big Creek	Wetland	PFO	30.629481	-88.398009	0.078018	0	0.131886	0.019504	0	0.131886	0.15139	AL
	WETC018-F0	Lower Big Creek	Wetland	PFO	30.684997	-88.308881	0.124294	0	0.143064	0.031074	0	0.143064	0.174138	AL
	WETC019-F0	Lower Big Creek	Wetland	PFO	30.687637	-88.305382	0.521282	0	0.793788	0.13032	0	0.793788	0.924109	AL
	WETC019-F1	Lower Big Creek	Wetland	PFO	30.690068	-88.303645	0.630417	0	0.978346	0.157604	0	0.978346	1.13595	AL
	WETC019-F2	Lower Big Creek	Wetland	PFO	30.691151	-88.302287	0.061671	0	0.04554	0.015418	0	0.04554	0.060958	AL
	WETC020B-F0	Lower Big Creek	Wetland	PFO	30.692282	-88.297174	0.001268	0	0.025002	0.000317	0	0.025002	0.025319	AL
	WETC021-F0	Upper Big Creek	Wetland	PFO	30.732676	-88.266663	0.25397	0	0.470879	0.063493	0	0.470879	0.534372	AL
	WETC021-F1	Upper Big Creek	Wetland	PFO	30.733973	-88.265033	0.170819	0	0.209425	0.042705	0	0.209425	0.252129	AL
	WETC021-F2	Upper Big Creek	Wetland	PFO	30.736527	-88.26199	1.120707	0	2.369759	0.280177	0	2.369759	2.649935	AL
	WETC022-F0	Upper Big Creek	Wetland	PFO	30.739801	-88.259596	0	0	0.078867	0	0	0.078867	0.078867	AL
	WETC022-F1	Upper Big Creek	Wetland	PFO	30.741075	-88.259065	0.375874	0	0.345916	0.093969	0	0.345916	0.439885	AL
	WETC022-F2	Upper Big Creek	Wetland	PFO	30.742567	-88.259184	0.093243	0	0.129385	0.023311	0	0.129385	0.152696	AL
	WETC022-S0	Upper Big Creek	Wetland	PSS	30.739814	-88.259674	0	0.143046	0	0	0.071523	0	0.071523	AL
	WETC022-S1	Upper Big Creek	Wetland	PSS	30.741335	-88.259191	0.061722	0.567587	0	0.015431	0.283794	0	0.299224	AL
	WETC025-F0	Chickasaw Creek	Wetland	PFO	30.771939	-88.237645	0	0	0.095886	0	0	0.095886	0.095886	AL
	WETC026-F0	Chickasaw Creek	Wetland	PFO	30.776143	-88.233465	0.228608	0	0.471467	0.057152	0	0.471467	0.528619	AL
	WETC027-F0	Chickasaw Creek	Wetland	PFO	30.7769	-88.22828	0.740247	0	1.513327	0.185062	0	1.513327	1.698388	AL
	WETC029-F0	Lower Big Creek	Wetland	PFO	30.679802	-88.317167	0.053875	0	0.067676	0.013469	0	0.067676	0.081145	AL
	WETD010-F0	Lower Big Creek	Wetland	PFO	30.631112	-88.394995	0.85987	0	0.894055	0.214968	0	0.894055	1.109022	AL
	WETD010-F1	Lower Big Creek	Wetland	PFO	30.632271	-88.392922	0.235458	0	0.331944	0.058864	0	0.331944	0.390809	AL
	WETD011-F0	Lower Big Creek	Wetland	PFO	30.634884	-88.388651	0.477271	0	0.933291	0.119318	0	0.933291	1.052609	AL
	WETD011-F1	Lower Big Creek	Wetland	PFO	30.636848	-88.387315	0.625958	0	1.142653	0.15649	0	1.142653	1.299142	AL
	WETD012A-F0	Upper Big Creek	Wetland	PFO	30.722777	-88.275275	0.002773	0	0	0.000693	0	0	0.000693	AL
	WETD012A-F1	Upper Big Creek	Wetland	PFO	30.722693	-88.275419	0.090789	0	0.084375	0.022697	0	0.084375	0.107072	AL
	WETD012A-F2	Upper Big Creek	Wetland	PFO	30.723003	-88.275313	0.004358	0	0.053499	0.001089	0	0.053499	0.054589	AL
	WETD012A-F3	Upper Big Creek	Wetland	PFO	30.723719	-88.274775	0.459676	0	0.557811	0.114919	0	0.557811	0.67273	AL
	WETD012B-F0	Upper Big Creek	Wetland	PFO	30.727321	-88.272523	0.676226	0	1.286844	0.169057	0	1.286844	1.4559	AL
	WETD013-F0	Upper Big Creek	Wetland	PFO	30.74899	-88.256396	1.451996	0	2.862025	0.362999	0	2.862025	3.225024	AL
	WETD013-F1	Upper Big Creek	Wetland	PFO	30.753288	-88.254549	0.160498	0	0.153059	0.040124	0	0.153059	0.193183	AL
	WETD013-F2	Upper Big Creek	Wetland	PFO	30.754252	-88.254079	0.291178	0	0.695888	0.072795	0	0.695888	0.768683	AL
	WETD013-F4	Upper Big Creek	Wetland	PFO	30.755122	-88.25373	0.050827	0	0.063664	0.012707	0	0.063664	0.07637	AL
	WETD014-F0	Upper Big Creek	Wetland	PFO	30.757717	-88.252521	0	0	0.168743	0	0	0.168743	0.168743	AL
	WETD015-F0	Chickasaw Creek	Wetland	PFO	30.783868	-88.210345	0.152517	0	0.502189	0.038129	0	0.502189	0.540318	AL
	WETD018-F0	Chickasaw Creek	Wetland	PFO	30.776798	-88.224696	0.036155	0	0.112037	0.009039	0	0.112037	0.121075	AL
	WETE001-F0	Lower Big Creek	Wetland	PFO	30.667366	-88.335929	0.15366	0	0.19447	0.038415	0	0.19447	0.232885	AL
	WETE002-F0	Lower Big Creek	Wetland	PFO	30.665137	-88.335911	0.067189	0	0.148682	0.016797	0	0.148682	0.16548	AL

WETE002-F4	Lower Big Creek	Wetland	PFO	30.663931	-88.335898	0.107958	0	0.451582	0.02699	0	0.451582	0.478572	AL
WETE002-F5	Lower Big Creek	Wetland	PFO	30.662869	-88.335932	0.068151	0	0.143938	0.017038	0	0.143938	0.160976	AL
WETE003-F1	Lower Big Creek	Wetland	PFO	30.660551	-88.338313	0.178512	0	0.360787	0.044628	0	0.360787	0.405415	AL
WETE004-F0	Lower Big Creek	Wetland	PFO	30.655679	-88.348479	0.02563	0	0.052225	0.006407	0	0.052225	0.058633	AL
WETE005-F0	Lower Big Creek	Wetland	PFO	30.655299	-88.349284	0.027208	0	0.06596	0.006802	0	0.06596	0.072762	AL
WETE006-F0	Lower Big Creek	Wetland	PFO	30.677576	-88.320745	0.290548	0	0.279348	0.072637	0	0.279348	0.351985	AL
WETE006-F1	Lower Big Creek	Wetland	PFO	30.678151	-88.319832	0.094147	0	0.108946	0.023537	0	0.108946	0.132482	AL
WETE007-F0	Lower Big Creek	Wetland	PFO	30.67536	-88.324302	0.220859	0	0.203386	0.055215	0	0.203386	0.258601	AL
WETE007-F1	Lower Big Creek	Wetland	PFO	30.675858	-88.323499	0.103494	0	0.097405	0.025874	0	0.097405	0.123279	AL
WETE008-F0	Lower Big Creek	Wetland	PFO	30.673648	-88.327194	0	0	0.01004	0	0	0.01004	0.01004	AL
WETE009-F0	Chickasaw Creek	Wetland	PFO	30.776802	-88.221778	0.091458	0	0.180053	0.022865	0	0.180053	0.202917	AL
WETE009-F1	Chickasaw Creek	Wetland	PFO	30.776798	-88.220932	0.236285	0	0.383187	0.059071	0	0.383187	0.442258	AL
WETGT001-F0	Lower Big Creek	Wetland	PFO	30.650392	-88.359536	0.047576	0	0.250813	0.011894	0	0.250813	0.262707	AL
WETGT001-F1	Lower Big Creek	Wetland	PFO	30.650659	-88.359067	0	0	0.058248	0	0	0.058248	0.058248	AL
WETGT002-F0	Lower Big Creek	Wetland	PFO	30.652932	-88.354202	0.029003	0	0.066808	0.007251	0	0.066808	0.074059	AL
WETGT003-F0	Lower Big Creek	Wetland	PFO	30.65391	-88.352158	0.050487	0	0.094658	0.012622	0	0.094658	0.10728	AL
WETGT007-F0	Lower Big Creek	Wetland	PFO	30.66956	-88.333484	0.05031	0	0.0093	0.012577	0	0.0093	0.021878	AL
WETGT008-F0	Lower Big Creek	Wetland	PFO	30.625219	-88.405534	0.089279	0	0.155501	0.02232	0	0.155501	0.177821	AL
GRAND TOTAL						12.752992	0.710633	22.3759	3.188251	0.355317	22.3759	25.919464	

SWCA
ENVIRONMENTAL CONSULTANTS

2136

MEMORANDUM

ATTACHMENT 3
AQUATIC RESOURCES WORKSHEET

		HGM_Code							Local_Waterway	
WBC001	R5	RIVERINE	AREA	0.002628	ACRE	RPW	30.640624	-88.379596	Lower Big Creek	PERENNIAL STREAM
WBC002	R5	RIVERINE	AREA	0.004222	ACRE	RPW	30.64333	-88.374196	Lower Big Creek	PERENNIAL STREAM
WBC003	R5	RIVERINE	AREA	0.024403	ACRE	RPW	30.647292	-88.365793	Wolf Branch	PERENNIAL STREAM
WBC006	R5	RIVERINE	AREA	0.005754	ACRE	RPW	30.628713	-88.39943	Lower Big Creek	PERENNIAL STREAM
WBC007	R5	RIVERINE	AREA	0.005283	ACRE	RPW	30.629394	-88.398181	Lower Big Creek	PERENNIAL STREAM
WBC008	R5	RIVERINE	AREA	0.022986	ACRE	RPW	30.68882	-88.304763	Lower Big Creek	PERENNIAL STREAM
WBC010A	R6	RIVERINE	AREA	0.043084	ACRE	NRPW	30.733458	-88.265592	Upper Big Creek	EPHEMERAL STREAM
WBC010B	R4	RIVERINE	AREA	0.015876	ACRE	RPW	30.691137	-88.302385	Lower Big Creek	INTERMITTENT STREAM
WBC011	R5	RIVERINE	AREA	0.035078	ACRE	RPW	30.740104	-88.259529	Upper Big Creek	PERENNIAL STREAM
WBC012	POW	DEPRESS	AREA	0.104763	ACRE	ISOLATE	30.76374	-88.244969	Chickasaw Creek	PERENNIAL POND
WBC112A	R5	RIVERINE	AREA	0.044981	ACRE	RPW	30.776907	-88.226959	Double Branch	PERENNIAL STREAM
WBD003B	POW	DEPRESS	AREA	0.042289	ACRE	ISOLATE	30.631695	-88.394076	Lower Big Creek	PERENNIAL POND
WBD004B	R5	RIVERINE	AREA	0.130004	ACRE	RPW	30.631961	-88.393524	Big Creek	PERENNIAL STREAM
WBD005	R4	RIVERINE	AREA	0.005538	ACRE	RPW	30.635923	-88.388521	Lower Big Creek	INTERMITTENT STREAM
WBD006	R5	RIVERINE	AREA	0.019378	ACRE	RPW	30.722927	-88.275246	Upper Big Creek	PERENNIAL STREAM
WBD007	R5	RIVERINE	AREA	0.066024	ACRE	RPW	30.724474	-88.274281	Hamilton Creek	PERENNIAL STREAM
WBD008	POW	DEPRESS	AREA	0.041643	ACRE	ISOLATE	30.753264	-88.254499	Upper Big Creek	PERENNIAL POND
WBD009A	R5	DEPRESS	AREA	0.018636	ACRE	RPW	30.753563	-88.254378	Upper Big Creek	PERENNIAL STREAM
WBD009C	R5	RIVERINE	AREA	0.0094	ACRE	RPW	30.755021	-88.253749	Upper Big Creek	PERENNIAL STREAM
WBD010	POW	DEPRESS	AREA	0.004851	ACRE	ISOLATE	30.759883	-88.251439	Upper Big Creek	PERENNIAL POND
WBD011	R5	RIVERINE	AREA	0.009817	ACRE	RPW	30.776807	-88.221516	Chickasaw Creek	PERENNIAL STREAM
WBE002	R5	RIVERINE	AREA	0.004602	ACRE	RPW	30.663047	-88.335927	Lower Big Creek	PERENNIAL STREAM
WBE005	R5	RIVERINE	AREA	0.011986	ACRE	RPW	30.678024	-88.320093	Lower Big Creek	PERENNIAL STREAM
WBG005	R4	RIVERINE	AREA	0.006166	ACRE	RPW	30.794917	-88.210341	Chickasaw Creek	INTERMITTENT STREAM
WBG009	POW	DEPRESS	AREA	0.007442	ACRE	ISOLATE	30.761008	-88.249889	Chickasaw Creek	PERENNIAL POND
WBG010	R4	RIVERINE	AREA	0.004736	ACRE	RPW	30.719949	-88.277182	Upper Big Creek	INTERMITTENT STREAM
WBGT001	R4	RIVERINE	AREA	0.015191	ACRE	RPW	30.650631	-88.359042	Lower Big Creek	INTERMITTENT STREAM
WBGT004	R5	RIVERINE	AREA	0.033945	ACRE	RPW	30.669564	-88.333613	Lower Big Creek	PERENNIAL STREAM
WBGT005	R6	RIVERINE	AREA	0.014838	ACRE	NRPW	30.672949	-88.328152	Pierce Creek	EPHEMERAL STREAM
WBGT006	R5	RIVERINE	AREA	0.016016	ACRE	RPW	30.673082	-88.327988	Pierce Creek	PERENNIAL STREAM
WETC001-E0	PEM	RIVERINE	AREA	0.001738	ACRE	NRPWW	30.639632	-88.382044	Lower Big Creek	Wetland
WETC001-F0	PFO	RIVERINE	AREA	0.252142	ACRE	NRPWW	30.639643	-88.381798	Lower Big Creek	Wetland
WETC002-F0	PFO	RIVERINE	AREA	0.114467	ACRE	RPWWD	30.640664	-88.379493	Lower Big Creek	Wetland
WETC002-F1	PFO	RIVERINE	AREA	0.036891	ACRE	RPWWD	30.640625	-88.379648	Lower Big Creek	Wetland
WETC003-E0	PEM	RIVERINE	AREA	0.057314	ACRE	RPWWD	30.643331	-88.374401	Lower Big Creek	Wetland
WETC003-E1	PEM	RIVERINE	AREA	0.007696	ACRE	RPWWD	30.643484	-88.37409	Lower Big Creek	Wetland
WETC003-F0	PFO	RIVERINE	AREA	0.00067	ACRE	RPWWD	30.643202	-88.374253	Lower Big Creek	Wetland
WETC003-F1	PFO	RIVERINE	AREA	0.057838	ACRE	RPWWD	30.643325	-88.374285	Lower Big Creek	Wetland
WETC003-F2	PFO	RIVERINE	AREA	0.025146	ACRE	RPWWD	30.643421	-88.374096	Lower Big Creek	Wetland
WETC004-E0	PEM	RIVERINE	AREA	0.007426	ACRE	NRPWW	30.645238	-88.370468	Lower Big Creek	Wetland
WETC004-F0	PFO	RIVERINE	AREA	0.074719	ACRE	NRPWW	30.645192	-88.3704	Lower Big Creek	Wetland
WETC005-E0	PEM	RIVERINE	AREA	0.014024	ACRE	NRPWW	30.645855	-88.369152	Lower Big Creek	Wetland
WETC005-F0	PFO	RIVERINE	AREA	0.035464	ACRE	NRPWW	30.645775	-88.369154	Lower Big Creek	Wetland
WETC007-E0	PEM	RIVERINE	AREA	0.004592	ACRE	RPWWD	30.647323	-88.366144	Lower Big Creek	Wetland
WETC007-F0	PFO	RIVERINE	AREA	0.415977	ACRE	RPWWD	30.647194	-88.366056	Lower Big Creek	Wetland
WETC007-F1	PFO	RIVERINE	AREA	0.044066	ACRE	RPWWD	30.647291	-88.365738	Lower Big Creek	Wetland
WETC008-E0	PEM	RIVERINE	AREA	0.063127	ACRE	NRPWW	30.648467	-88.363734	Lower Big Creek	Wetland
WETC008-F0	PFO	RIVERINE	AREA	0.414089	ACRE	NRPWW	30.648341	-88.363802	Lower Big Creek	Wetland
WETC009-E0	PEM	RIVERINE	AREA	0.002801	ACRE	NRPWW	30.648986	-88.362671	Lower Big Creek	Wetland
WETC009-F0	PFO	RIVERINE	AREA	0.07015	ACRE	NRPWW	30.648922	-88.362555	Lower Big Creek	Wetland
WETC010-E0	PEM	RIVERINE	AREA	0.080348	ACRE	NRPWW	30.649601	-88.361227	Lower Big Creek	Wetland
WETC017-F0	PFO	RIVERINE	AREA	0.536329	ACRE	RPWWD	30.629024	-88.398835	Lower Big Creek	Wetland
WETC017-F1	PFO	RIVERINE	AREA	0.209903	ACRE	RPWWD	30.629481	-88.398009	Lower Big Creek	Wetland
WETC018-F0	PFO	RIVERINE	AREA	0.267358	ACRE	NRPWW	30.684997	-88.308881	Lower Big Creek	Wetland
WETC019-E0	PEM	RIVERINE	AREA	0.255359	ACRE	RPWWD	30.687801	-88.305393	Lower Big Creek	Wetland
WETC019-E1	PEM	RIVERINE	AREA	0.340338	ACRE	RPWWD	30.689985	-88.303923	Lower Big Creek	Wetland
WETC019-E2	PEM	RIVERINE	AREA	0.032184	ACRE	RPWWD	30.691306	-88.302267	Lower Big Creek	Wetland
WETC019-F0	PFO	RIVERINE	AREA	1.31507	ACRE	RPWWD	30.687637	-88.305382	Lower Big Creek	Wetland
WETC019-F1	PFO	RIVERINE	AREA	1.608762	ACRE	RPWWD	30.690068	-88.303645	Lower Big Creek	Wetland
WETC019-F2	PFO	RIVERINE	AREA	0.107212	ACRE	RPWWD	30.691151	-88.302287	Lower Big Creek	Wetland
WETC020A-E0	PEM	SLOPE	AREA	0.023114	ACRE	NRPWW	30.692302	-88.297253	Lower Big Creek	Wetland
WETC020B-E1	PEM	DEPRESS	AREA	0.071196	ACRE	NRPWW	30.700187	-88.289855	Lower Big Creek	Wetland
WETC020B-F0	PFO	SLOPE	AREA	0.02627	ACRE	NRPWW	30.692282	-88.297174	Lower Big Creek	Wetland
WETC021-E1	PEM	RIVERINE	AREA	0.38585	ACRE	NRPWW	30.734652	-88.264206	Upper Big Creek	Wetland
WETC021-F0	PFO	RIVERINE	AREA	0.724849	ACRE	NRPWW	30.732676	-88.266663	Upper Big Creek	Wetland
WETC021-F1	PFO	RIVERINE	AREA	0.380244	ACRE	NRPWW	30.733973	-88.265033	Upper Big Creek	Wetland
WETC021-F2	PFO	RIVERINE	AREA	3.490466	ACRE	NRPWW	30.736527	-88.26199	Upper Big Creek	Wetland
WETC022-F0	PFO	RIVERINE	AREA	0.078867	ACRE	RPWWD	30.739801	-88.259596	Upper Big Creek	Wetland
WETC022-F1	PFO	RIVERINE	AREA	0.721791	ACRE	RPWWD	30.741075	-88.259065	Upper Big Creek	Wetland

WETC022-F2	PFO	RIVERINE	AREA	0.222628	ACRE	RPWWD	30.742567	-88.259184	Upper Big Creek	Wetland	
WETC022-S0	PSS	RIVERINE	AREA	0.143046	ACRE	RPWWD	30.739814	-88.259674	Upper Big Creek	Wetland	
WETC022-S1	PSS	RIVERINE	AREA	0.62931	ACRE	RPWWD	30.741335	-88.259191	Upper Big Creek	Wetland	
WETC024-E0	PEM	RIVERINE	AREA	1.136951	ACRE	NRPWW	30.769293	-88.23972	Chickasaw Creek	Wetland	
WETC025-F0	PFO	RIVERINE	AREA	0.095886	ACRE	NRPWW	30.771939	-88.237645	Chickasaw Creek	Wetland	
WETC026-F0	PFO	RIVERINE	AREA	0.700075	ACRE	NRPWW	30.776143	-88.233465	Chickasaw Creek	Wetland	
WETC027-F0	PFO	RIVERINE	AREA	2.253568	ACRE	RPWWD	30.7769	-88.22828	Chickasaw Creek	Wetland	
WETC029-E0	PEM	RIVERINE	AREA	0.042034	ACRE	NRPWW	30.679921	-88.317179	Lower Big Creek	Wetland	
WETC029-F0	PFO	RIVERINE	AREA	0.121551	ACRE	NRPWW	30.679802	-88.317167	Lower Big Creek	Wetland	
WETC031-E1	PEM	RIVERINE	AREA	0.034789	ACRE	RPWWD	30.650433	-88.359644	Lower Big Creek	Wetland	
WETC031-E3	PEM	RIVERINE	AREA	0.022483	ACRE	RPWWD	30.650666	-88.359152	Lower Big Creek	Wetland	
WETC032-E0	PEM	RIVERINE	AREA	0.017855	ACRE	NRPWW	30.653021	-88.354238	Lower Big Creek	Wetland	
WETC033-E0	PEM	RIVERINE	AREA	0.009027	ACRE	NRPWW	30.654017	-88.352172	Lower Big Creek	Wetland	
WETD010-E0	PEM	RIVERINE	AREA	0.25276	ACRE	RPWWD	30.631338	-88.394859	Lower Big Creek	Wetland	
WETD010-E1	PEM	RIVERINE	AREA	0.022645	ACRE	RPWWD	30.632273	-88.393147	Lower Big Creek	Wetland	
WETD010-F0	PFO	RIVERINE	AREA	1.753925	ACRE	RPWWD	30.631112	-88.394995	Lower Big Creek	Wetland	
WETD010-F1	PFO	RIVERINE	AREA	0.567402	ACRE	RPWWD	30.632271	-88.392922	Lower Big Creek	Wetland	
WETD011-E2	PEM	RIVERINE	AREA	0.195032	ACRE	RPWWD	30.636861	-88.387627	Lower Big Creek	Wetland	
WETD011-F0	PFO	RIVERINE	AREA	1.410562	ACRE	RPWWD	30.634884	-88.388651	Lower Big Creek	Wetland	
WETD011-F1	PFO	RIVERINE	AREA	1.768611	ACRE	RPWWD	30.636848	-88.387315	Lower Big Creek	Wetland	
WETD012A-E0	PEM	RIVERINE	AREA	0.054217	ACRE	RPWWD	30.722907	-88.275331	Upper Big Creek	Wetland	
WETD012A-E1	PEM	RIVERINE	AREA	0.001832	ACRE	RPWWD	30.722947	-88.275171	Upper Big Creek	Wetland	
WETD012A-E3	PEM	RIVERINE	AREA	0.006768	ACRE	RPWWD	30.724217	-88.274585	Upper Big Creek	Wetland	
WETD012A-E4	PEM	RIVERINE	AREA	0.000592	ACRE	RPWWD	30.724529	-88.274214	Upper Big Creek	Wetland	
WETD012A-E5	PEM	RIVERINE	AREA	0.56923	ACRE	RPWWD	30.724696	-88.274156	Upper Big Creek	Wetland	
WETD012A-F0	PFO	RIVERINE	AREA	0.002773	ACRE	RPWWD	30.722777	-88.275275	Upper Big Creek	Wetland	
WETD012A-F1	PFO	RIVERINE	AREA	0.175164	ACRE	RPWWD	30.722693	-88.275419	Upper Big Creek	Wetland	
WETD012A-F2	PFO	RIVERINE	AREA	0.057857	ACRE	RPWWD	30.723003	-88.275313	Upper Big Creek	Wetland	
WETD012A-F3	PFO	RIVERINE	AREA	1.017483	ACRE	RPWWD	30.723719	-88.274775	Upper Big Creek	Wetland	
WETD012B-F0	PFO	RIVERINE	AREA	1.96307	ACRE	RPWWN	30.727321	-88.272523	Upper Big Creek	Wetland	
WETD013-E0	PEM	RIVERINE	AREA	0.030492	ACRE	RPWWD	30.752964	-88.254545	Upper Big Creek	Wetland	
WETD013-E1	PEM	RIVERINE	AREA	0.004389	ACRE	RPWWD	30.754919	-88.253672	Upper Big Creek	Wetland	
WETD013-E2	PEM	RIVERINE	AREA	0.003509	ACRE	RPWWD	30.755091	-88.253599	Upper Big Creek	Wetland	
WETD013-F0	PFO	RIVERINE	AREA	4.31402	ACRE	RPWWN	30.74899	-88.256396	Upper Big Creek	Wetland	
WETD013-F1	PFO	RIVERINE	AREA	0.313557	ACRE	RPWWD	30.753288	-88.254549	Upper Big Creek	Wetland	
WETD013-F2	PFO	RIVERINE	AREA	0.987067	ACRE	RPWWD	30.754252	-88.254079	Upper Big Creek	Wetland	
WETD013-F4	PFO	RIVERINE	AREA	0.11449	ACRE	RPWWD	30.755122	-88.25373	Upper Big Creek	Wetland	
WETD014-F0	PFO	RIVERINE	AREA	0.168743	ACRE	RPWWD	30.757717	-88.252521	Upper Big Creek	Wetland	
WETD015-E0	PEM	RIVERINE	AREA	0.021362	ACRE	NRPWW	30.783939	-88.210248	Chickasaw Creek	Wetland	
WETD015-F0	PFO	RIVERINE	AREA	0.654706	ACRE	NRPWW	30.783868	-88.210345	Chickasaw Creek	Wetland	
WETD018-F0	PFO	RIVERINE	AREA	0.148192	ACRE	RPWWN	30.776798	-88.224696	Chickasaw Creek	Wetland	
WETE001-F0	PFO	RIVERINE	AREA	0.34813	ACRE	RPWW	30.667366	-88.335929	Lower Big Creek	Wetland	
WETE002-F0	PFO	RIVERINE	AREA	0.215872	ACRE	RPWW	30.665137	-88.335911	Lower Big Creek	Wetland	
WETE002-F4	PFO	RIVERINE	AREA	0.559541	ACRE	RPWW	30.663931	-88.335898	Lower Big Creek	Wetland	
WETE002-F5	PFO	RIVERINE	AREA	0.212089	ACRE	RPWW	30.662869	-88.335932	Lower Big Creek	Wetland	
WETE003-E0	PEM	RIVERINE	AREA	0.013038	ACRE	RPWW	30.660803	-88.338028	Lower Big Creek	Wetland	
WETE003-F1	PFO	RIVERINE	AREA	0.539299	ACRE	RPWW	30.660551	-88.338313	Lower Big Creek	Wetland	
WETE004-E0	PEM	RIVERINE	AREA	0.005009	ACRE	NRPWW	30.655737	-88.348586	Lower Big Creek	Wetland	
WETE004-F0	PFO	RIVERINE	AREA	0.077855	ACRE	NRPWW	30.655679	-88.348479	Lower Big Creek	Wetland	
WETE005-E0	PEM	RIVERINE	AREA	0.000476	ACRE	NRPWW	30.65543	-88.349239	Lower Big Creek	Wetland	
WETE005-F0	PFO	RIVERINE	AREA	0.093168	ACRE	NRPWW	30.655299	-88.349284	Lower Big Creek	Wetland	
WETE006-E0	PEM	RIVERINE	AREA	0.323679	ACRE	RPWWD	30.677653	-88.320824	Lower Big Creek	Wetland	
WETE006-E1	PEM	RIVERINE	AREA	0.117766	ACRE	RPWWD	30.678251	-88.31987	Lower Big Creek	Wetland	
WETE006-F0	PFO	RIVERINE	AREA	0.569895	ACRE	RPWWD	30.677576	-88.320745	Lower Big Creek	Wetland	
WETE006-F1	PFO	RIVERINE	AREA	0.203093	ACRE	RPWWD	30.678151	-88.319832	Lower Big Creek	Wetland	
WETE007-E0	PEM	DEPRESS	AREA	0.328927	ACRE	RPWWN	30.675604	-88.324089	Lower Big Creek	Wetland	
WETE007-F0	PFO	DEPRESS	AREA	0.424245	ACRE	RPWWN	30.67536	-88.324302	Lower Big Creek	Wetland	
WETE007-F1	PFO	DEPRESS	AREA	0.2009	ACRE	RPWWN	30.675858	-88.323499	Lower Big Creek	Wetland	
WETE008-E0	PEM	DEPRESS	AREA	0.01858	ACRE	RPWWN	30.673687	-88.327211	Lower Big Creek	Wetland	
WETE008-F0	PFO	DEPRESS	AREA	0.01004	ACRE	RPWWN	30.673648	-88.327194	Lower Big Creek	Wetland	
WETE009-F0	PFO	RIVERINE	AREA	0.27151	ACRE	RPWWD	30.776802	-88.221778	Chickasaw Creek	Wetland	
WETE009-F1	PFO	RIVERINE	AREA	0.619472	ACRE	RPWWD	30.776798	-88.220932	Chickasaw Creek	Wetland	
WETGT001-F0	PFO	RIVERINE	AREA	0.298389	ACRE	RPWWD	30.650392	-88.359536	Lower Big Creek	Wetland	
WETGT001-F1	PFO	RIVERINE	AREA	0.058248	ACRE	RPWWD	30.650659	-88.359067	Lower Big Creek	Wetland	
WETGT002-F0	PFO	RIVERINE	AREA	0.095811	ACRE	NRPWW	30.652932	-88.354202	Lower Big Creek	Wetland	
WETGT003-F0	PFO	RIVERINE	AREA	0.145145	ACRE	NRPWW	30.65391	-88.352158	Lower Big Creek	Wetland	
WETGT007-F0	PFO	RIVERINE	AREA	0.05961	ACRE	RPWWD	30.66956	-88.333484	Lower Big Creek	Wetland	
WETGT008-F0	PFO	RIVERINE	AREA	0.24478	ACRE	NRPWW	30.625219	-88.405534	Lower Big Creek	Wetland	

		HGM_Code							Local_Waterway	
WBA001	R4	RIVERINE	AREA	0.039236	ACRE	RPW	30.362182	-88.48339	Pt Aux Chenes Bay-Mississippi Sound	INTERMITTENT STREAM
WBA002	R5	RIVERINE	AREA	0.046252	ACRE	RPW	30.441719	-88.495206	Little Black Creek	PERENNIAL STREAM
WBA003	R6	RIVERINE	AREA	0.011978	ACRE	NRPW	30.453436	-88.496383	Black Creek-Escatawpa River	EPHEMERAL STREAM
WBA004	R5	RIVERINE	AREA	0.064011	ACRE	RPW	30.480699	-88.49896	Black Creek-Escatawpa River	PERENNIAL STREAM
WBA005	R5	RIVERINE	AREA	0.02999	ACRE	RPW	30.495628	-88.497727	Black Creek-Escatawpa River	PERENNIAL STREAM
WBA006	R5	RIVERINE	AREA	0.010762	ACRE	RPW	30.500403	-88.496309	Black Creek-Escatawpa River	PERENNIAL STREAM
WBA007	R5	RIVERINE	AREA	0.02544	ACRE	RPW	30.541568	-88.471532	Black Creek-Escatawpa River	PERENNIAL STREAM
WBB001	R5	RIVERINE	AREA	0.273699	ACRE	RPW	30.600429	-88.440052	Escatawpa River	PERENNIAL STREAM
WBB004	R4	RIVERINE	AREA	0.004877	ACRE	NRPW	30.578568	-88.452057	Rocky Creek-Escatawpa River	INTERMITTENT STREAM
WBB005	R4	RIVERINE	AREA	0.005997	ACRE	NRPW	30.578407	-88.452127	Rocky Creek-Escatawpa River	INTERMITTENT STREAM
WBB006	R4	RIVERINE	AREA	0.00335	ACRE	NRPW	30.578301	-88.452151	Rocky Creek-Escatawpa River	INTERMITTENT STREAM
WBB007	R5	RIVERINE	AREA	0.005919	ACRE	RPW	30.578181	-88.452197	Rocky Creek-Escatawpa River	PERENNIAL STREAM
WBC004	R6	RIVERINE	AREA	0.005642	ACRE	NRPW	30.502095	-88.495605	Black Creek-Escatawpa River	EPHEMERAL STREAM
WBC005	R5	RIVERINE	AREA	0.18916	ACRE	RPW	30.529825	-88.473622	Black Creek-Escatawpa River	PERENNIAL STREAM
WBC013	R4	RIVERINE	AREA	0.02845	ACRE	RPW	30.598849	-88.442347	Rocky Creek-Escatawpa River	INTERMITTENT STREAM
WBD001	R6	RIVERINE	AREA	0.008219	ACRE	NRPW	30.408922	-88.483665	Black Creek-Escatawpa River	EPHEMERAL STREAM
WBD002	R5	RIVERINE	AREA	0.273201	ACRE	RPW	30.417539	-88.482813	Black Creek-Escatawpa River	PERENNIAL STREAM
WBD003A	R4	RIVERINE	AREA	0.012823	ACRE	RPW	30.546504	-88.471538	Black Creek-Escatawpa River	INTERMITTENT STREAM
WBD004A	R4	RIVERINE	AREA	0.082912	ACRE	RPW	30.54828	-88.471461	Black Creek-Escatawpa River	INTERMITTENT STREAM
WBG003	POW	DEPRESS	AREA	0.012293	ACRE	ISOLATE	30.464351	-88.497379	Black Creek-Escatawpa River	PERENNIAL POND
WBG006	R5	RIVERINE	AREA	0.02441	ACRE	RPW	30.498222	-88.496989	Black Creek	PERENNIAL STREAM
WBG007	E2	RIVERINE	AREA	0.306914	ACRE	TNW	30.421556	-88.488021	Escatawpa River	PERENNIAL STREAM
WBG008	E2	RIVERINE	AREA	0.03972	ACRE	RPW	30.428796	-88.492387	Black Creek-Escatawpa River	PERENNIAL STREAM
WBG011	R5	RIVERINE	AREA	0.020695	ACRE	RPW	30.355996	-88.487114	Pt Aux Chenes Bay-Mississippi Sound	PERENNIAL STREAM
WBG012	R5	RIVERINE	AREA	0.02058	ACRE	RPW	30.355345	-88.488546	Pt Aux Chenes Bay-Mississippi Sound	PERENNIAL STREAM
WETA002-E0	PEM	MINSOILFLT	AREA	0.020132	ACRE	TNWW	30.355914	-88.483128	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA002-F0	PFO	MINSOILFLT	AREA	2.971802	ACRE	TNWW	30.35954	-88.483321	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA002-S0	PSS	MINSOILFLT	AREA	0.904027	ACRE	TNWW	30.356455	-88.483245	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-E0	PEM	MINSOILFLT	AREA	0.134436	ACRE	TNWW	30.369475	-88.48335	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-E1	PEM	MINSOILFLT	AREA	3.666266	ACRE	RPWWN	30.387883	-88.480184	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-F0	PFO	MINSOILFLT	AREA	3.973211	ACRE	TNWW	30.366186	-88.483325	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-F1	PFO	MINSOILFLT	AREA	0.027821	ACRE	TNWW	30.369468	-88.483355	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-F2	PFO	MINSOILFLT	AREA	2.61661	ACRE	TNWW	30.376162	-88.480005	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-F3	PFO	MINSOILFLT	AREA	2.995657	ACRE	RPWWN	30.381341	-88.480093	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-F4	PFO	MINSOILFLT	AREA	0.077068	ACRE	RPWWN	30.384325	-88.48026	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-F5	PFO	MINSOILFLT	AREA	2.025548	ACRE	RPWWN	30.38626	-88.480261	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-F6	PFO	MINSOILFLT	AREA	2.811363	ACRE	RPWWN	30.391311	-88.480315	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-F7	PFO	MINSOILFLT	AREA	1.896313	ACRE	RPWWN	30.397463	-88.480264	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA003-S0	PSS	MINSOILFLT	AREA	3.133356	ACRE	TNWW	30.3717	-88.481736	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA005-E0	PEM	MINSOILFLT	AREA	0.928868	ACRE	RPWWN	30.402456	-88.480487	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA005-F0	PFO	MINSOILFLT	AREA	0.816381	ACRE	RPWWN	30.399605	-88.480215	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA005-F1	PFO	MINSOILFLT	AREA	1.039646	ACRE	RPWWN	30.401163	-88.480189	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA005-F2	PFO	MINSOILFLT	AREA	0.869498	ACRE	RPWWN	30.402914	-88.48038	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA005-F3	PFO	MINSOILFLT	AREA	1.370994	ACRE	RPWWN	30.404657	-88.481776	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA006-E0	PEM	MINSOILFLT	AREA	0.000006	ACRE	RPWWN	30.405758	-88.482866	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA006-F0	PFO	MINSOILFLT	AREA	0.073732	ACRE	RPWWN	30.405726	-88.482742	Pt Aux Chenes Bay-Mississippi Sound	Wetland
WETA007-E0	PEM	ORGSOILFLT	AREA	0.480153	ACRE	RPWWN	30.431844	-88.49427	Black Creek-Escatawpa River	Wetland
WETA007-F0	PFO	MINSOILFLT	AREA	0.389619	ACRE	RPWWN	30.431225	-88.493924	Black Creek-Escatawpa River	Wetland
WETA008-E0	PEM	DEPRESS	AREA	0.24165	ACRE	NRPWW	30.43346	-88.494469	Black Creek-Escatawpa River	Wetland
WETA008-F0	PFO	DEPRESS	AREA	0.114998	ACRE	NRPWW	30.433225	-88.494449	Black Creek-Escatawpa River	Wetland
WETA009-E0	PEM	ORGSOILFLT	AREA	0.725599	ACRE	NRPWW	30.435953	-88.494658	Black Creek-Escatawpa River	Wetland
WETA010-E0	PEM	RIVERINE	AREA	1.049453	ACRE	RPWWD	30.440285	-88.495076	Black Creek-Escatawpa River	Wetland
WETA010-E1	PEM	RIVERINE	AREA	0.056191	ACRE	RPWWD	30.442042	-88.495287	Black Creek-Escatawpa River	Wetland
WETA010-F0	PFO	RIVERINE	AREA	0.037304	ACRE	RPWWN	30.439109	-88.49493	Black Creek-Escatawpa River	Wetland
WETA010-S0	PSS	RIVERINE	AREA	0.0499	ACRE	RPWWD	30.441587	-88.495169	Black Creek-Escatawpa River	Wetland
WETA010-S1	PSS	RIVERINE	AREA	0.359759	ACRE	RPWWD	30.442305	-88.49524	Black Creek-Escatawpa River	Wetland
WETA011-E0	PEM	DEPRESS	AREA	0.011453	ACRE	NRPWW	30.443978	-88.495433	Black Creek-Escatawpa River	Wetland
WETA011-F0	PFO	DEPRESS	AREA	0.183765	ACRE	NRPWW	30.444467	-88.49542	Black Creek-Escatawpa River	Wetland
WETA012-E0	PEM	RIVERINE	AREA	0.396934	ACRE	NRPWW	30.445744	-88.495528	Black Creek-Escatawpa River	Wetland
WETA013-E0	PEM	RIVERINE	AREA	0.392974	ACRE	NRPWW	30.447735	-88.495693	Black Creek-Escatawpa River	Wetland
WETA013-F0	PFO	RIVERINE	AREA	0.196485	ACRE	NRPWW	30.447669	-88.495692	Black Creek-Escatawpa River	Wetland
WETA015-E0	PEM	MINSOILFLT	AREA	0.216332	ACRE	NRPWW	30.457139	-88.496995	Black Creek-Escatawpa River	Wetland
WETA015-F0	PFO	MINSOILFLT	AREA	0.161557	ACRE	NRPWW	30.45683	-88.496877	Black Creek-Escatawpa River	Wetland
WETA016-E0	PEM	MINSOILFLT	AREA	0.362438	ACRE	NRPWW	30.459757	-88.497489	Black Creek-Escatawpa River	Wetland
WETA016-F0	PFO	MINSOILFLT	AREA	0.235135	ACRE	NRPWW	30.459863	-88.497403	Black Creek-Escatawpa River	Wetland
WETA017-E0	PEM	RIVERINE	AREA	0.095255	ACRE	NRPWW	30.46169	-88.497469	Black Creek-Escatawpa River	Wetland
WETA017-F0	PFO	RIVERINE	AREA	0.364629	ACRE	NRPWW	30.462052	-88.497486	Black Creek-Escatawpa River	Wetland
WETA018-E0	PEM	LACUSTRINF	AREA	0.250255	ACRE	NRPWW	30.464251	-88.497492	Black Creek-Escatawpa River	Wetland
WETA019-E0	PEM	RIVERINE	AREA	0.004676	ACRE	NRPWW	30.467774	-88.497582	Black Creek-Escatawpa River	Wetland

WETA019-F0	PFO	RIVERINE	AREA	1.436872	ACRE	NRPWW	30.469093	-88.49745	Black Creek-Escatawpa River	Wetland	
WETA020-E0	PEM	RIVERINE	AREA	0.079487	ACRE	NRPWW	30.473183	-88.497439	Black Creek-Escatawpa River	Wetland	
WETA020-F0	PFO	RIVERINE	AREA	0.499755	ACRE	NRPWW	30.472718	-88.497456	Black Creek-Escatawpa River	Wetland	
WETA021-F0	PFO	RIVERINE	AREA	0.369242	ACRE	RPWWD	30.481021	-88.499277	Black Creek-Escatawpa River	Wetland	
WETA022-E0	PEM	DEPRESS	AREA	0.176541	ACRE	NRPWW	30.490198	-88.49857	Black Creek-Escatawpa River	Wetland	
WETA022-E1	PEM	DEPRESS	AREA	0.80707	ACRE	NRPWW	30.491761	-88.498159	Black Creek-Escatawpa River	Wetland	
WETA022-F0	PFO	DEPRESS	AREA	2.250672	ACRE	NRPWW	30.48817	-88.49911	Black Creek-Escatawpa River	Wetland	
WETA022-F1	PFO	DEPRESS	AREA	0.511197	ACRE	NRPWW	30.490734	-88.498419	Black Creek-Escatawpa River	Wetland	
WETA022-S0	PSS	DEPRESS	AREA	0.154254	ACRE	NRPWW	30.48846	-88.499033	Black Creek-Escatawpa River	Wetland	
WETA023-F0	PFO	RIVERINE	AREA	0.272844	ACRE	RPWWD	30.494282	-88.498115	Black Creek-Escatawpa River	Wetland	
WETA023-F1	PFO	RIVERINE	AREA	0.517442	ACRE	RPWWD	30.495018	-88.497904	Black Creek-Escatawpa River	Wetland	
WETA024-F0	PFO	RIVERINE	AREA	0.101816	ACRE	RPWWD	30.497525	-88.49718	Black Creek-Escatawpa River	Wetland	
WETA024-F1	PFO	RIVERINE	AREA	0.225167	ACRE	RPWWD	30.49793	-88.497067	Black Creek-Escatawpa River	Wetland	
WETA024-F2	PFO	RIVERINE	AREA	0.234651	ACRE	RPWWD	30.498524	-88.4969	Black Creek-Escatawpa River	Wetland	
WETA024-F3	PFO	RIVERINE	AREA	0.025082	ACRE	RPWWD	30.498825	-88.496858	Black Creek-Escatawpa River	Wetland	
WETA025-F0	PFO	MINSOILFLT	AREA	3.372373	ACRE	NRPWW	30.533446	-88.471446	Black Creek-Escatawpa River	Wetland	
WETA026-F0	PFO	RIVERINE	AREA	2.482972	ACRE	RPWWD	30.539553	-88.471496	Black Creek-Escatawpa River	Wetland	
WETA026-F1	PFO	RIVERINE	AREA	0.222318	ACRE	RPWWD	30.541749	-88.471514	Black Creek-Escatawpa River	Wetland	
WETB003-E0	PEM	RIVERINE	AREA	0.282325	ACRE	NRPWW	30.582393	-88.450722	Rocky Creek-Escatawpa River	Wetland	
WETB003-F0	PFO	RIVERINE	AREA	1.07348	ACRE	NRPWW	30.582502	-88.45055	Rocky Creek-Escatawpa River	Wetland	
WETB004-F0	PFO	RIVERINE	AREA	1.265763	ACRE	RPWWD	30.576724	-88.452742	Rocky Creek-Escatawpa River	Wetland	
WETB004-F1	PFO	RIVERINE	AREA	0.049036	ACRE	RPWWD	30.578248	-88.452185	Rocky Creek-Escatawpa River	Wetland	
WETB004-F2	PFO	RIVERINE	AREA	0.03734	ACRE	RPWWD	30.578351	-88.452137	Rocky Creek-Escatawpa River	Wetland	
WETB004-F3	PFO	RIVERINE	AREA	0.06832	ACRE	NRPWW	30.578483	-88.452087	Rocky Creek-Escatawpa River	Wetland	
WETB004-F4	PFO	RIVERINE	AREA	0.086014	ACRE	NRPWW	30.57868	-88.452028	Rocky Creek-Escatawpa River	Wetland	
WETB005-E0	PEM	RIVERINE	AREA	0.007548	ACRE	NRPWW	30.57315	-88.454164	Rocky Creek-Escatawpa River	Wetland	
WETB005-S0	PSS	RIVERINE	AREA	0.400504	ACRE	NRPWW	30.573502	-88.453955	Rocky Creek-Escatawpa River	Wetland	
WETB006-F0	PFO	RIVERINE	AREA	0.179267	ACRE	NRPWW	30.571028	-88.454834	Rocky Creek-Escatawpa River	Wetland	
WETB007-E0	PEM	RIVERINE	AREA	0.019697	ACRE	NRPWW	30.570067	-88.455222	Rocky Creek-Escatawpa River	Wetland	
WETB007-S0	PSS	RIVERINE	AREA	0.8715	ACRE	NRPWW	30.569482	-88.454925	Rocky Creek-Escatawpa River	Wetland	
WETB008-E0	PEM	RIVERINE	AREA	0.302254	ACRE	RPWWN	30.602683	-88.436931	Rocky Creek-Escatawpa River	Wetland	
WETB008-F0	PFO	RIVERINE	AREA	4.442759	ACRE	RPWWD	30.603653	-88.435373	Rocky Creek-Escatawpa River	Wetland	
WETB009-E0	PEM	DEPRESS	AREA	0.025485	ACRE	NRPWW	30.614783	-88.422012	Lower Big Creek	Wetland	
WETB009-F0	PFO	DEPRESS	AREA	0.526511	ACRE	NRPWW	30.614325	-88.42225	Lower Big Creek	Wetland	
WETC011-S0	PSS	MINSOILFLT	AREA	0.000506	ACRE	NRPWW	30.502156	-88.495592	Black Creek-Escatawpa River	Wetland	
WETC011-S1	PSS	MINSOILFLT	AREA	5.699956	ACRE	NRPWW	30.505973	-88.493337	Black Creek-Escatawpa River	Wetland	
WETC011-S2	PSS	MINSOILFLT	AREA	1.289703	ACRE	NRPWW	30.50881	-88.48887	Black Creek-Escatawpa River	Wetland	
WETC012-E0	PEM	MINSOILFLT	AREA	1.899604	ACRE	NRPWW	30.517697	-88.482751	Black Creek-Escatawpa River	Wetland	
WETC012-S0	PSS	MINSOILFLT	AREA	4.113781	ACRE	NRPWW	30.516843	-88.48249	Black Creek-Escatawpa River	Wetland	
WETC013A-E0	PEM	DEPRESS	AREA	0.006201	ACRE	NRPWW	30.525149	-88.482924	Black Creek-Escatawpa River	Wetland	
WETC013A-F0	PFO	DEPRESS	AREA	0.123066	ACRE	NRPWW	30.525218	-88.482971	Black Creek-Escatawpa River	Wetland	
WETC013B-E1	PEM	MINSOILFLT	AREA	0.183708	ACRE	NRPWW	30.526788	-88.481729	Black Creek-Escatawpa River	Wetland	
WETC013B-S0	PSS	MINSOILFLT	AREA	1.934126	ACRE	NRPWW	30.527758	-88.48114	Black Creek-Escatawpa River	Wetland	
WETC014-E0	PEM	DEPRESS	AREA	0.044581	ACRE	NRPWW	30.529116	-88.478395	Black Creek-Escatawpa River	Wetland	
WETC015-E0	PEM	DEPRESS	AREA	0.104281	ACRE	RPWWD	30.529608	-88.474354	Black Creek-Escatawpa River	Wetland	
WETC015-E1	PEM	DEPRESS	AREA	0.103253	ACRE	RPWWD	30.529658	-88.473651	Black Creek-Escatawpa River	Wetland	
WETC015-F0	PFO	DEPRESS	AREA	0.136076	ACRE	RPWWD	30.529738	-88.473585	Black Creek-Escatawpa River	Wetland	
WETC015-F1	PFO	DEPRESS	AREA	0.410048	ACRE	RPWWD	30.529817	-88.474133	Black Creek-Escatawpa River	Wetland	
WETC028-E0	PEM	RIVERINE	AREA	0.106415	ACRE	NRPWW	30.588061	-88.448668	Rocky Creek-Escatawpa River	Wetland	
WETC028-F0	PFO	RIVERINE	AREA	0.336623	ACRE	NRPWW	30.587937	-88.448587	Rocky Creek-Escatawpa River	Wetland	
WETC030-E0	PEM	RIVERINE	AREA	1.483488	ACRE	RPWWD	30.5956	-88.445599	Rocky Creek-Escatawpa River	Wetland	
WETC030-E1	PEM	RIVERINE	AREA	0.006358	ACRE	RPWWD	30.598805	-88.442462	Rocky Creek-Escatawpa River	Wetland	
WETC030-E2	PEM	RIVERINE	AREA	0.08224	ACRE	RPWWD	30.599426	-88.441593	Rocky Creek-Escatawpa River	Wetland	
WETC030-F0	PFO	RIVERINE	AREA	3.624847	ACRE	RPWWD	30.594986	-88.445842	Rocky Creek-Escatawpa River	Wetland	
WETC030-F1	PFO	RIVERINE	AREA	0.01204	ACRE	RPWWD	30.598906	-88.442272	Rocky Creek-Escatawpa River	Wetland	
WETC030-F2	PFO	RIVERINE	AREA	0.857707	ACRE	RPWWD	30.599512	-88.441345	Rocky Creek-Escatawpa River	Wetland	
WETD001-E0	PEM	RIVERINE	AREA	0.001734	ACRE	NRPWW	30.409222	-88.483729	Black Creek-Escatawpa River	Wetland	
WETD001-F0	PFO	RIVERINE	AREA	0.07682	ACRE	NRPWW	30.409188	-88.483596	Black Creek-Escatawpa River	Wetland	
WETD003-F0	PFO	ORGSOILFLT	AREA	2.109928	ACRE	RPWWN	30.415524	-88.4828	Black Creek-Escatawpa River	Wetland	
WETD004-F0	PFO	ORGSOILFLT	AREA	3.874672	ACRE	TNWW	30.419177	-88.48561	Black Creek-Escatawpa River	Wetland	
WETD005-F0	PFO	RIVERINE	AREA	1.034792	ACRE	NRPWW	30.544245	-88.47154	Black Creek-Escatawpa River	Wetland	
WETD006-F0	PFO	RIVERINE	AREA	0.50567	ACRE	RPWWD	30.546173	-88.471564	Black Creek-Escatawpa River	Wetland	
WETD006-F1	PFO	RIVERINE	AREA	0.090098	ACRE	RPWWD	30.546525	-88.471622	Black Creek-Escatawpa River	Wetland	
WETD006-F2	PFO	RIVERINE	AREA	0.005804	ACRE	RPWWD	30.546699	-88.471424	Black Creek-Escatawpa River	Wetland	
WETD007-F0	PFO	MINSOILFLT	AREA	0.000093	ACRE	RPWWD	30.549764	-88.471767	Black Creek-Escatawpa River	Wetland	
WETD008-E0	PEM	MINSOILFLT	AREA	0.131962	ACRE	RPWWN	30.552386	-88.471209	Black Creek-Escatawpa River	Wetland	
WETD008-F0	PFO	MINSOILFLT	AREA	0.920156	ACRE	RPWWN	30.551834	-88.471281	Black Creek-Escatawpa River	Wetland	
WETD008-S0	PSS	MINSOILFLT	AREA	0.127466	ACRE	RPWWN	30.552008	-88.471431	Black Creek-Escatawpa River	Wetland	
WETD009-E0	PEM	MINSOILFLT	AREA	0.852893	ACRE	NRPWW	30.556217	-88.46759	Rocky Creek-Escatawpa River	Wetland	
WETD009-E1	PEM	MINSOILFLT	AREA	0.09838	ACRE	NRPWW	30.561872	-88.46224	Rocky Creek-Escatawpa River	Wetland	
WETD009-F0	PFO	MINSOILFLT	AREA	1.891344	ACRE	NRPWW	30.555128	-88.468466	Black Creek-Escatawpa River	Wetland	

WETD009-F1	PFO	MINSOILFLT	AREA	0.693853	ACRE	NRPWW	30.559647	-88.464199	Rocky Creek-Escatawpa River	Wetland	
WETD009-F2	PFO	MINSOILFLT	AREA	0.094534	ACRE	NRPWW	30.563393	-88.46065	Rocky Creek-Escatawpa River	Wetland	
WETD009-F3	PFO	MINSOILFLT	AREA	0.242171	ACRE	NRPWW	30.564215	-88.459867	Rocky Creek-Escatawpa River	Wetland	
WETD009-S0	PSS	MINSOILFLT	AREA	1.826189	ACRE	NRPWW	30.557914	-88.465834	Rocky Creek-Escatawpa River	Wetland	
WETD009-S1	PSS	MINSOILFLT	AREA	2.238561	ACRE	NRPWW	30.561906	-88.462055	Rocky Creek-Escatawpa River	Wetland	
WETD009-S2	PSS	MINSOILFLT	AREA	0.489641	ACRE	NRPWW	30.563761	-88.460295	Rocky Creek-Escatawpa River	Wetland	
WETG001-E0	E2EM	ORGSOILFLT	AREA	4.992487	ACRE	TNWW	30.425325	-88.490205	Black Creek-Escatawpa River	Wetland	
WETG002-E0	E2EM	ORGSOILFLT	AREA	1.513801	ACRE	RPWWD	30.429894	-88.493077	Black Creek-Escatawpa River	Wetland	
WETG005-E0	PEM	MINSOILFLT	AREA	0.062469	ACRE	RPWWD	30.355411	-88.488546	Pt Aux Chenes Bay-Mississippi Sound	Wetland	
WETG005-E1	PEM	MINSOILFLT	AREA	0.241702	ACRE	RPWWD	30.355136	-88.488547	Pt Aux Chenes Bay-Mississippi Sound	Wetland	
WETG005-E2	PEM	MINSOILFLT	AREA	0.039566	ACRE	RPWWD	30.354811	-88.488548	Pt Aux Chenes Bay-Mississippi Sound	Wetland	
WETG005-S0	PSS	MINSOILFLT	AREA	0.826683	ACRE	TNWW	30.355988	-88.484306	Pt Aux Chenes Bay-Mississippi Sound	Wetland	
WETG005-S1	PSS	MINSOILFLT	AREA	0.972171	ACRE	RPWWD	30.355993	-88.4862	Pt Aux Chenes Bay-Mississippi Sound	Wetland	
WETG005-S3	PSS	MINSOILFLT	AREA	1.218603	ACRE	RPWWD	30.35589	-88.488086	Pt Aux Chenes Bay-Mississippi Sound	Wetland	

AL

		HGM_Code							Local_Waterway	
WBC001	R5	RIVERINE	AREA	0.002628	ACRE	RPW	30.640624	-88.379596	Lower Big Creek	PERENNIAL STREAM
WBC002	R5	RIVERINE	AREA	0.004222	ACRE	RPW	30.64333	-88.374196	Lower Big Creek	PERENNIAL STREAM
WBC003	R5	RIVERINE	AREA	0.024409	ACRE	RPW	30.647292	-88.365793	Wolf Branch	PERENNIAL STREAM
WBC006	R5	RIVERINE	AREA	0.005754	ACRE	RPW	30.628713	-88.39943	Lower Big Creek	PERENNIAL STREAM
WBC007	R5	RIVERINE	AREA	0.005283	ACRE	RPW	30.629394	-88.398181	Lower Big Creek	PERENNIAL STREAM
WBC008	R5	RIVERINE	AREA	0.022986	ACRE	RPW	30.68882	-88.304763	Lower Big Creek	PERENNIAL STREAM
WBC010A	R6	RIVERINE	AREA	0.043084	ACRE	NRPW	30.733458	-88.265592	Upper Big Creek	EPHEMERAL STREAM
WBC010B	R4	RIVERINE	AREA	0.015876	ACRE	RPW	30.691137	-88.302385	Lower Big Creek	INTERMITTENT STREAM
WBC011	R5	RIVERINE	AREA	0.035078	ACRE	RPW	30.740104	-88.259529	Upper Big Creek	PERENNIAL STREAM
WBC012	POW	DEPRESS	AREA	0.104763	ACRE	ISOLATE	30.76374	-88.244969	Chickasaw Creek	PERENNIAL POND
WBC112A	R5	RIVERINE	AREA	0.044981	ACRE	RPW	30.776907	-88.226959	Double Branch	PERENNIAL STREAM
WBD003B	POW	DEPRESS	AREA	0.042289	ACRE	ISOLATE	30.631695	-88.394076	Lower Big Creek	PERENNIAL POND
WBD004B	R5	RIVERINE	AREA	0.130004	ACRE	RPW	30.631961	-88.393524	Big Creek	PERENNIAL STREAM
WBD005	R4	RIVERINE	AREA	0.005538	ACRE	RPW	30.635923	-88.388521	Lower Big Creek	INTERMITTENT STREAM
WBD006	R5	RIVERINE	AREA	0.019378	ACRE	RPW	30.722927	-88.275246	Upper Big Creek	PERENNIAL STREAM
WBD007	R5	RIVERINE	AREA	0.066024	ACRE	RPW	30.724474	-88.274281	Hamilton Creek	PERENNIAL STREAM
WBD008	POW	DEPRESS	AREA	0.041643	ACRE	ISOLATE	30.753264	-88.254499	Upper Big Creek	PERENNIAL POND
WBD009A	R5	DEPRESS	AREA	0.018636	ACRE	RPW	30.753563	-88.254378	Upper Big Creek	PERENNIAL STREAM
WBD009C	R5	RIVERINE	AREA	0.0094	ACRE	RPW	30.755021	-88.253749	Upper Big Creek	PERENNIAL STREAM
WBD010	POW	DEPRESS	AREA	0.004851	ACRE	ISOLATE	30.759883	-88.251439	Upper Big Creek	PERENNIAL POND
WBD011	R5	RIVERINE	AREA	0.009817	ACRE	RPW	30.776807	-88.221516	Chickasaw Creek	PERENNIAL STREAM
WBE002	R5	RIVERINE	AREA	0.004602	ACRE	RPW	30.663047	-88.335927	Lower Big Creek	PERENNIAL STREAM
WBE005	R5	RIVERINE	AREA	0.011986	ACRE	RPW	30.678024	-88.320093	Lower Big Creek	PERENNIAL STREAM
WBG005	R4	RIVERINE	AREA	0.006166	ACRE	RPW	30.794917	-88.210341	Chickasaw Creek	INTERMITTENT STREAM
WBG009	POW	DEPRESS	AREA	0.007442	ACRE	ISOLATE	30.761008	-88.249889	Chickasaw Creek	PERENNIAL POND
WBG010	R4	RIVERINE	AREA	0.004736	ACRE	RPW	30.719949	-88.277182	Upper Big Creek	INTERMITTENT STREAM
WBGT001	R4	RIVERINE	AREA	0.015191	ACRE	RPW	30.650631	-88.359042	Lower Big Creek	INTERMITTENT STREAM
WBGT004	R5	RIVERINE	AREA	0.033945	ACRE	RPW	30.669564	-88.333613	Lower Big Creek	PERENNIAL STREAM
WBGT005	R6	RIVERINE	AREA	0.014838	ACRE	NRPW	30.672949	-88.328152	Pierce Creek	EPHEMERAL STREAM
WBGT006	R5	RIVERINE	AREA	0.016016	ACRE	RPW	30.673082	-88.327988	Pierce Creek	PERENNIAL STREAM
WETC001-E0	PEM	RIVERINE	AREA	0.001738	ACRE	NRPWW	30.639632	-88.382044	Lower Big Creek	Wetland
WETC001-F0	PFO	RIVERINE	AREA	0.252142	ACRE	NRPWW	30.639643	-88.381798	Lower Big Creek	Wetland
WETC002-F0	PFO	RIVERINE	AREA	0.114467	ACRE	RPWWD	30.640664	-88.379493	Lower Big Creek	Wetland
WETC002-F1	PFO	RIVERINE	AREA	0.036891	ACRE	RPWWD	30.640625	-88.379648	Lower Big Creek	Wetland
WETC003-F0	PEM	RIVERINE	AREA	0.057314	ACRE	RPWWD	30.643331	-88.374401	Lower Big Creek	Wetland
WETC003-E1	PEM	RIVERINE	AREA	0.007696	ACRE	RPWWD	30.643484	-88.37409	Lower Big Creek	Wetland
WETC003-F0	PFO	RIVERINE	AREA	0.00067	ACRE	RPWWD	30.643202	-88.374253	Lower Big Creek	Wetland
WETC003-F1	PFO	RIVERINE	AREA	0.057838	ACRE	RPWWD	30.643325	-88.374285	Lower Big Creek	Wetland
WETC003-F2	PFO	RIVERINE	AREA	0.025146	ACRE	RPWWD	30.643421	-88.374096	Lower Big Creek	Wetland
WETC004-E0	PEM	RIVERINE	AREA	0.007426	ACRE	NRPWW	30.645238	-88.370468	Lower Big Creek	Wetland
WETC004-F0	PFO	RIVERINE	AREA	0.074719	ACRE	NRPWW	30.645192	-88.3704	Lower Big Creek	Wetland
WETC005-E0	PEM	RIVERINE	AREA	0.014024	ACRE	NRPWW	30.645855	-88.369152	Lower Big Creek	Wetland
WETC005-F0	PFO	RIVERINE	AREA	0.035464	ACRE	NRPWW	30.645775	-88.369154	Lower Big Creek	Wetland
WETC007-E0	PEM	RIVERINE	AREA	0.004592	ACRE	RPWWD	30.647323	-88.366144	Lower Big Creek	Wetland
WETC007-F0	PFO	RIVERINE	AREA	0.415977	ACRE	RPWWD	30.647194	-88.366056	Lower Big Creek	Wetland
WETC007-F1	PFO	RIVERINE	AREA	0.044066	ACRE	RPWWD	30.647291	-88.365738	Lower Big Creek	Wetland
WETC008-E0	PEM	RIVERINE	AREA	0.063127	ACRE	NRPWW	30.648467	-88.363734	Lower Big Creek	Wetland
WETC008-F0	PFO	RIVERINE	AREA	0.414089	ACRE	NRPWW	30.648341	-88.363802	Lower Big Creek	Wetland
WETC009-E0	PEM	RIVERINE	AREA	0.002801	ACRE	NRPWW	30.648986	-88.362671	Lower Big Creek	Wetland
WETC009-F0	PFO	RIVERINE	AREA	0.07015	ACRE	NRPWW	30.648922	-88.362555	Lower Big Creek	Wetland
WETC010-E0	PEM	RIVERINE	AREA	0.080348	ACRE	NRPWW	30.649601	-88.361227	Lower Big Creek	Wetland
WETC017-F0	PFO	RIVERINE	AREA	0.536329	ACRE	RPWWD	30.629024	-88.398835	Lower Big Creek	Wetland
WETC017-F1	PFO	RIVERINE	AREA	0.209903	ACRE	RPWWD	30.629481	-88.398009	Lower Big Creek	Wetland
WETC018-F0	PFO	RIVERINE	AREA	0.267358	ACRE	NRPWW	30.684997	-88.308881	Lower Big Creek	Wetland
WETC019-E0	PEM	RIVERINE	AREA	0.255359	ACRE	RPWWD	30.687801	-88.305393	Lower Big Creek	Wetland
WETC019-E1	PEM	RIVERINE	AREA	0.340338	ACRE	RPWWD	30.689985	-88.303923	Lower Big Creek	Wetland
WETC019-E2	PEM	RIVERINE	AREA	0.032184	ACRE	RPWWD	30.691306	-88.302267	Lower Big Creek	Wetland
WETC019-F0	PFO	RIVERINE	AREA	1.31507	ACRE	RPWWD	30.687637	-88.305382	Lower Big Creek	Wetland
WETC019-F1	PFO	RIVERINE	AREA	1.608762	ACRE	RPWWD	30.690068	-88.303645	Lower Big Creek	Wetland
WETC019-F2	PFO	RIVERINE	AREA	0.107212	ACRE	RPWWD	30.691151	-88.302287	Lower Big Creek	Wetland
WETC020A-E0	PEM	SLOPE	AREA	0.023114	ACRE	NRPWW	30.692302	-88.297253	Lower Big Creek	Wetland
WETC020B-F1	PEM	DEPRESS	AREA	0.071196	ACRE	NRPWW	30.700187	-88.289855	Lower Big Creek	Wetland
WETC020B-F0	PFO	SLOPE	AREA	0.02627	ACRE	NRPWW	30.692282	-88.297174	Lower Big Creek	Wetland
WETC021-E1	PEM	RIVERINE	AREA	0.38585	ACRE	NRPWW	30.734652	-88.264206	Upper Big Creek	Wetland
WETC021-F0	PFO	RIVERINE	AREA	0.724849	ACRE	NRPWW	30.732676	-88.266663	Upper Big Creek	Wetland
WETC021-F1	PFO	RIVERINE	AREA	0.380244	ACRE	NRPWW	30.733973	-88.265033	Upper Big Creek	Wetland
WETC021-F2	PFO	RIVERINE	AREA	3.490466	ACRE	NRPWW	30.736527	-88.26199	Upper Big Creek	Wetland
WETC022-F0	PFO	RIVERINE	AREA	0.078867	ACRE	RPWWD	30.739801	-88.259596	Upper Big Creek	Wetland
WETC022-F1	PFO	RIVERINE	AREA	0.721791	ACRE	RPWWD	30.741075	-88.259065	Upper Big Creek	Wetland
WETC022-F2	PFO	RIVERINE	AREA	0.222628	ACRE	RPWWD	30.742567	-88.259184	Upper Big Creek	Wetland
WETC022-S0	PSS	RIVERINE	AREA	0.143046	ACRE	RPWWD	30.739814	-88.259674	Upper Big Creek	Wetland
WETC022-S1	PSS	RIVERINE	AREA	0.62931	ACRE	RPWWD	30.741335	-88.259191	Upper Big Creek	Wetland

WETC024-E0	PEM	RIVERINE	AREA	1.136951	ACRE	NRPWW	30.769293	-88.23972	Chickasaw Creek	Wetland	
WETC025-F0	PFO	RIVERINE	AREA	0.095886	ACRE	NRPWW	30.771939	-88.237645	Chickasaw Creek	Wetland	
WETC026-F0	PFO	RIVERINE	AREA	0.700075	ACRE	NRPWW	30.776143	-88.233465	Chickasaw Creek	Wetland	
WETC027-F0	PFO	RIVERINE	AREA	2.253568	ACRE	RPWWD	30.7769	-88.22828	Chickasaw Creek	Wetland	
WETC029-E0	PEM	RIVERINE	AREA	0.042034	ACRE	NRPWW	30.679921	-88.317179	Lower Big Creek	Wetland	
WETC029-F0	PFO	RIVERINE	AREA	0.121551	ACRE	NRPWW	30.679802	-88.317167	Lower Big Creek	Wetland	
WETC031-E1	PEM	RIVERINE	AREA	0.034789	ACRE	RPWWD	30.650433	-88.359644	Lower Big Creek	Wetland	
WETC031-E3	PEM	RIVERINE	AREA	0.022483	ACRE	RPWWD	30.650666	-88.359152	Lower Big Creek	Wetland	
WETC032-E0	PEM	RIVERINE	AREA	0.017855	ACRE	NRPWW	30.653021	-88.354238	Lower Big Creek	Wetland	
WETC033-E0	PEM	RIVERINE	AREA	0.009027	ACRE	NRPWW	30.654017	-88.352172	Lower Big Creek	Wetland	
WETD010-E0	PEM	RIVERINE	AREA	0.25276	ACRE	RPWWD	30.631338	-88.394859	Lower Big Creek	Wetland	
WETD010-E1	PEM	RIVERINE	AREA	0.022645	ACRE	RPWWD	30.632273	-88.393147	Lower Big Creek	Wetland	
WETD010-F0	PFO	RIVERINE	AREA	1.753925	ACRE	RPWWD	30.631112	-88.394995	Lower Big Creek	Wetland	
WETD010-F1	PFO	RIVERINE	AREA	0.567402	ACRE	RPWWD	30.632271	-88.392922	Lower Big Creek	Wetland	
WETD011-E2	PEM	RIVERINE	AREA	0.195032	ACRE	RPWWD	30.636861	-88.387627	Lower Big Creek	Wetland	
WETD011-F0	PFO	RIVERINE	AREA	1.410562	ACRE	RPWWD	30.634884	-88.388651	Lower Big Creek	Wetland	
WETD011-F1	PFO	RIVERINE	AREA	1.768611	ACRE	RPWWD	30.636848	-88.387315	Lower Big Creek	Wetland	
WETD012A-E0	PEM	RIVERINE	AREA	0.054217	ACRE	RPWWD	30.722907	-88.275331	Upper Big Creek	Wetland	
WETD012A-E1	PEM	RIVERINE	AREA	0.001832	ACRE	RPWWD	30.722947	-88.275171	Upper Big Creek	Wetland	
WETD012A-E3	PEM	RIVERINE	AREA	0.006768	ACRE	RPWWD	30.724217	-88.274585	Upper Big Creek	Wetland	
WETD012A-E4	PEM	RIVERINE	AREA	0.000592	ACRE	RPWWD	30.724529	-88.274214	Upper Big Creek	Wetland	
WETD012A-E5	PEM	RIVERINE	AREA	0.56923	ACRE	RPWWD	30.724696	-88.274156	Upper Big Creek	Wetland	
WETD012A-F0	PFO	RIVERINE	AREA	0.002773	ACRE	RPWWD	30.722777	-88.275275	Upper Big Creek	Wetland	
WETD012A-F1	PFO	RIVERINE	AREA	0.175164	ACRE	RPWWD	30.722693	-88.275419	Upper Big Creek	Wetland	
WETD012A-F2	PFO	RIVERINE	AREA	0.057857	ACRE	RPWWD	30.723003	-88.275313	Upper Big Creek	Wetland	
WETD012A-F3	PFO	RIVERINE	AREA	1.017483	ACRE	RPWWD	30.723719	-88.274775	Upper Big Creek	Wetland	
WETD012B-F0	PFO	RIVERINE	AREA	1.96307	ACRE	RPWWN	30.727321	-88.272523	Upper Big Creek	Wetland	
WETD013-E0	PEM	RIVERINE	AREA	0.030492	ACRE	RPWWD	30.752964	-88.254545	Upper Big Creek	Wetland	
WETD013-E1	PEM	RIVERINE	AREA	0.004389	ACRE	RPWWD	30.754919	-88.253672	Upper Big Creek	Wetland	
WETD013-E2	PEM	RIVERINE	AREA	0.003509	ACRE	RPWWD	30.755091	-88.253599	Upper Big Creek	Wetland	
WETD013-F0	PFO	RIVERINE	AREA	4.31402	ACRE	RPWWN	30.74899	-88.256396	Upper Big Creek	Wetland	
WETD013-F1	PFO	RIVERINE	AREA	0.313557	ACRE	RPWWD	30.753288	-88.254549	Upper Big Creek	Wetland	
WETD013-F2	PFO	RIVERINE	AREA	0.987067	ACRE	RPWWD	30.754252	-88.254079	Upper Big Creek	Wetland	
WETD013-F4	PFO	RIVERINE	AREA	0.11449	ACRE	RPWWD	30.755122	-88.25373	Upper Big Creek	Wetland	
WETD014-F0	PFO	RIVERINE	AREA	0.168743	ACRE	RPWWD	30.757717	-88.252521	Upper Big Creek	Wetland	
WETD015-E0	PEM	RIVERINE	AREA	0.021362	ACRE	NRPWW	30.783939	-88.210248	Chickasaw Creek	Wetland	
WETD015-F0	PFO	RIVERINE	AREA	0.654706	ACRE	NRPWW	30.783868	-88.210345	Chickasaw Creek	Wetland	
WETD018-F0	PFO	RIVERINE	AREA	0.148192	ACRE	RPWWN	30.776798	-88.224696	Chickasaw Creek	Wetland	
WETE001-F0	PFO	RIVERINE	AREA	0.34813	ACRE	RPWW	30.667366	-88.335929	Lower Big Creek	Wetland	
WETE002-F0	PFO	RIVERINE	AREA	0.215872	ACRE	RPWW	30.665137	-88.335911	Lower Big Creek	Wetland	
WETE002-F4	PFO	RIVERINE	AREA	0.559541	ACRE	RPWW	30.663931	-88.335898	Lower Big Creek	Wetland	
WETE002-F5	PFO	RIVERINE	AREA	0.212089	ACRE	RPWW	30.662869	-88.335932	Lower Big Creek	Wetland	
WETE003-E0	PEM	RIVERINE	AREA	0.013038	ACRE	RPWW	30.660803	-88.338028	Lower Big Creek	Wetland	
WETE003-F1	PFO	RIVERINE	AREA	0.539299	ACRE	RPWW	30.660551	-88.338313	Lower Big Creek	Wetland	
WETE004-E0	PEM	RIVERINE	AREA	0.005009	ACRE	NRPWW	30.655737	-88.348586	Lower Big Creek	Wetland	
WETE004-F0	PFO	RIVERINE	AREA	0.077855	ACRE	NRPWW	30.655679	-88.348479	Lower Big Creek	Wetland	
WETE005-E0	PEM	RIVERINE	AREA	0.000476	ACRE	NRPWW	30.65543	-88.349239	Lower Big Creek	Wetland	
WETE005-F0	PFO	RIVERINE	AREA	0.093168	ACRE	NRPWW	30.655299	-88.349284	Lower Big Creek	Wetland	
WETE006-E0	PEM	RIVERINE	AREA	0.323679	ACRE	RPWWD	30.677653	-88.320824	Lower Big Creek	Wetland	
WETE006-E1	PEM	RIVERINE	AREA	0.117766	ACRE	RPWWD	30.678251	-88.31987	Lower Big Creek	Wetland	
WETE006-F0	PFO	RIVERINE	AREA	0.569895	ACRE	RPWWD	30.677576	-88.320745	Lower Big Creek	Wetland	
WETE006-F1	PFO	RIVERINE	AREA	0.203093	ACRE	RPWWD	30.678151	-88.319832	Lower Big Creek	Wetland	
WETE007-E0	PEM	DEPRESS	AREA	0.328927	ACRE	RPWWN	30.675604	-88.324089	Lower Big Creek	Wetland	
WETE007-F0	PFO	DEPRESS	AREA	0.424245	ACRE	RPWWN	30.67536	-88.324302	Lower Big Creek	Wetland	
WETE007-F1	PFO	DEPRESS	AREA	0.2009	ACRE	RPWWN	30.675858	-88.323499	Lower Big Creek	Wetland	
WETE008-E0	PEM	DEPRESS	AREA	0.01858	ACRE	RPWWN	30.673687	-88.327211	Lower Big Creek	Wetland	
WETE008-F0	PFO	DEPRESS	AREA	0.01004	ACRE	RPWWN	30.673648	-88.327194	Lower Big Creek	Wetland	
WETE009-F0	PFO	RIVERINE	AREA	0.27151	ACRE	RPWWD	30.776802	-88.221778	Chickasaw Creek	Wetland	
WETE009-F1	PFO	RIVERINE	AREA	0.619472	ACRE	RPWWD	30.776798	-88.220932	Chickasaw Creek	Wetland	
WETGT001-F0	PFO	RIVERINE	AREA	0.298389	ACRE	RPWWD	30.650392	-88.359536	Lower Big Creek	Wetland	
WETGT001-F1	PFO	RIVERINE	AREA	0.058248	ACRE	RPWWD	30.650659	-88.359067	Lower Big Creek	Wetland	
WETGT002-F0	PFO	RIVERINE	AREA	0.095811	ACRE	NRPWW	30.652932	-88.354202	Lower Big Creek	Wetland	
WETGT003-F0	PFO	RIVERINE	AREA	0.145145	ACRE	NRPWW	30.65391	-88.352158	Lower Big Creek	Wetland	
WETGT007-F0	PFO	RIVERINE	AREA	0.05961	ACRE	RPWWD	30.66956	-88.333484	Lower Big Creek	Wetland	
WETGT008-F0	PFO	RIVERINE	AREA	0.24478	ACRE	NRPWW	30.625219	-88.405534	Lower Big Creek	Wetland	

Waters Name	Activity	Resource Type	Permanent Loss?
WBC001	Work	River/Stream	No
WBC003	Work	River/Stream	No
WBC006	Work	River/Stream	No
WBC007	Work	River/Stream	No
WBC008	Work	River/Stream	No
WBC010A	Work	River/Stream	No
WBC010B	Work	River/Stream	No
WBC011	Work	River/Stream	No
WBC012	Work	Pond	No
WBC112A	Work	River/Stream	No
WBD005	Work	River/Stream	No
WBD006	Work	River/Stream	No
WBD007	Work	River/Stream	No
WBD008	Work	Pond	No
WBD009A	Work	River/Stream	No
WBD009C	Work	River/Stream	No
WBD011	Work	River/Stream	No
WBE002	Work	River/Stream	No
WBE005	Work	River/Stream	No
WBG005	Work	River/Stream	No
WBG010	Work	River/Stream	No
WBGT001	Work	River/Stream	No
WBGT004	Work	River/Stream	No
WETC001-E0	Work	Non-Tidal Wetland	No
WETC001-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC002-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC002-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC003-E0	Work	Non-Tidal Wetland	No
WETC003-E1	Work	Non-Tidal Wetland	No
WETC003-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC003-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC003-F2	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC004-E0	Work	Non-Tidal Wetland	No

Wolf Branch

Double Branch

Hamilton Creek

Red Creek

WETC004-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC005-E0	Work	Non-Tidal Wetland	No
WETC005-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC007-E0	Work	Non-Tidal Wetland	No
WETC007-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC007-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC008-E0	Work	Non-Tidal Wetland	No
WETC008-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC009-E0	Work	Non-Tidal Wetland	No
WETC009-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC010-E0	Work	Non-Tidal Wetland	No
WETC017-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC017-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC018-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC019-E0	Work	Non-Tidal Wetland	No
WETC019-E1	Work	Non-Tidal Wetland	No
WETC019-E2	Work	Non-Tidal Wetland	No
WETC019-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC019-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC019-F2	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC020A-E0	Work	Non-Tidal Wetland	No
WETC020B-E1	Work	Non-Tidal Wetland	No
WETC020B-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC021-E1	Work	Non-Tidal Wetland	No
WETC021-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC021-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC021-F2	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC022-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC022-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC022-F2	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC022-S0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC022-S1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC024-E0	Work	Non-Tidal Wetland	No
WETC025-F0	Conversion of waters type (fores	Non-Tidal Wetland	No

WETC026-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC027-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC029-E0	Work	Non-Tidal Wetland	No
WETC029-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETC031-E1	Work	Non-Tidal Wetland	No
WETC031-E3	Work	Non-Tidal Wetland	No
WETC032-E0	Work	Non-Tidal Wetland	No
WETC033-E0	Work	Non-Tidal Wetland	No
WETD010-E0	Work	Non-Tidal Wetland	No
WETD010-E1	Work	Non-Tidal Wetland	No
WETD010-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD010-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD011-E2	Work	Non-Tidal Wetland	No
WETD011-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD011-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD012A-E0	Work	Non-Tidal Wetland	No
WETD012A-E1	Work	Non-Tidal Wetland	No
WETD012A-E3	Work	Non-Tidal Wetland	No
WETD012A-E4	Work	Non-Tidal Wetland	No
WETD012A-E5	Work	Non-Tidal Wetland	No
WETD012A-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD012A-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD012A-F2	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD012A-F3	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD012B-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD013-E0	Work	Non-Tidal Wetland	No
WETD013-E1	Work	Non-Tidal Wetland	No
WETD013-E2	Work	Non-Tidal Wetland	No
WETD013-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD013-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD013-F2	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD013-F4	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD014-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD015-E0	Work	Non-Tidal Wetland	No

WETD015-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETD018-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE001-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE002-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE002-F4	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE002-F5	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE003-E0	Work	Non-Tidal Wetland	No
WETE003-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE004-E0	Work	Non-Tidal Wetland	No
WETE004-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE005-E0	Work	Non-Tidal Wetland	No
WETE005-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE006-E0	Work	Non-Tidal Wetland	No
WETE006-E1	Work	Non-Tidal Wetland	No
WETE006-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE006-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE007-E0	Work	Non-Tidal Wetland	No
WETE007-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE007-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE008-E0	Work	Non-Tidal Wetland	No
WETE008-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE009-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETE009-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETGT001-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETGT001-F1	Conversion of waters type (fores	Non-Tidal Wetland	No
WETGT002-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETGT003-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETGT007-F0	Conversion of waters type (fores	Non-Tidal Wetland	No
WETGT008-F0	Conversion of waters type (fores	Non-Tidal Wetland	No

[redacted]	Initially_Proposed_Area	Proposed_Area	Authorized_Area	Units_Area	Area_Type	Initially_Proposed_Linear	Proposed_Linear
Temporary	0.002628	0.002628	0	ACRE	Removal		
Temporary	0.024403	0.024403	0	ACRE	Removal		
Temporary	0.005754	0.005754	0	ACRE	Removal		
Temporary	0.005283	0.005283	0	ACRE	Removal		
Temporary	0.022986	0.022986	0	ACRE	Removal		
Temporary	0.043084	0.043084	0	ACRE	Removal		
Temporary	0.015876	0.015876	0	ACRE	Removal		
Temporary	0.035078	0.035078	0	ACRE	Removal		
Temporary	0.104763	0.104763	0	ACRE	Removal		
Temporary	0.044981	0.044981	0	ACRE	Removal		
Temporary	0.005538	0.005538	0	ACRE	Removal		
Temporary	0.019378	0.019378	0	ACRE	Removal		
Temporary	0.066024	0.066024	0	ACRE	Removal		
Temporary	0.041643	0.041643	0	ACRE	Removal		
Temporary	0.018636	0.018636	0	ACRE	Removal		
Temporary	0.0094	0.0094	0	ACRE	Removal		
Temporary	0.009817	0.009817	0	ACRE	Removal		
Temporary	0.004602	0.004602	0	ACRE	Removal		
Temporary	0.011986	0.011986	0	ACRE	Removal		
Temporary	0.006166	0.006166	0	ACRE	Removal		
Temporary	0.004736	0.004736	0	ACRE	Removal		
Temporary	0.015191	0.015191	0	ACRE	Removal		
Temporary	0.033945	0.033945	0	ACRE	Removal		
Temporary	0.001738	0.001738	0	ACRE	Removal		
Temporary	0.252142	0.252142	0	ACRE	Removal		
Temporary	0.114467	0.114467	0	ACRE	Removal		
Temporary	0.036891	0.036891	0	ACRE	Removal		
Temporary	0.057314	0.057314	0	ACRE	Removal		
Temporary	0.007696	0.007696	0	ACRE	Removal		
Temporary	0.00067	0.00067	0	ACRE	Removal		
Temporary	0.057838	0.057838	0	ACRE	Removal		
Temporary	0.025146	0.025146	0	ACRE	Removal		
Temporary	0.007426	0.007426	0	ACRE	Removal		

Temporary	0.074719	0.074719	0 ACRE	Removal
Temporary	0.014024	0.014024	0 ACRE	Removal
Temporary	0.035464	0.035464	0 ACRE	Removal
Temporary	0.004592	0.004592	0 ACRE	Removal
Temporary	0.415977	0.415977	0 ACRE	Removal
Temporary	0.044066	0.044066	0 ACRE	Removal
Temporary	0.063127	0.063127	0 ACRE	Removal
Temporary	0.414089	0.414089	0 ACRE	Removal
Temporary	0.002801	0.002801	0 ACRE	Removal
Temporary	0.07015	0.07015	0 ACRE	Removal
Temporary	0.080348	0.080348	0 ACRE	Removal
Temporary	0.536329	0.536329	0 ACRE	Removal
Temporary	0.209903	0.209903	0 ACRE	Removal
Temporary	0.267358	0.267358	0 ACRE	Removal
Temporary	0.255359	0.255359	0 ACRE	Removal
Temporary	0.340338	0.340338	0 ACRE	Removal
Temporary	0.032184	0.032184	0 ACRE	Removal
Temporary	1.31507	1.31507	0 ACRE	Removal
Temporary	1.608762	1.608762	0 ACRE	Removal
Temporary	0.107212	0.107212	0 ACRE	Removal
Temporary	0.023114	0.023114	0 ACRE	Removal
Temporary	0.071196	0.071196	0 ACRE	Removal
Temporary	0.02627	0.02627	0 ACRE	Removal
Temporary	0.38585	0.38585	0 ACRE	Removal
Temporary	0.724849	0.724849	0 ACRE	Removal
Temporary	0.380244	0.380244	0 ACRE	Removal
Temporary	3.490466	3.490466	0 ACRE	Removal
Temporary	0.078867	0.078867	0 ACRE	Removal
Temporary	0.721791	0.721791	0 ACRE	Removal
Temporary	0.222628	0.222628	0 ACRE	Removal
Temporary	0.143046	0.143046	0 ACRE	Removal
Temporary	0.62931	0.62931	0 ACRE	Removal
Temporary	1.136951	1.136951	0 ACRE	Removal
Temporary	0.095886	0.095886	0 ACRE	Removal

Temporary	0.700075	0.700075	0 ACRE	Removal
Temporary	2.253568	2.253568	0 ACRE	Removal
Temporary	0.042034	0.042034	0 ACRE	Removal
Temporary	0.121551	0.121551	0 ACRE	Removal
Temporary	0.034789	0.034789	0 ACRE	Removal
Temporary	0.022483	0.022483	0 ACRE	Removal
Temporary	0.017855	0.017855	0 ACRE	Removal
Temporary	0.009027	0.009027	0 ACRE	Removal
Temporary	0.25276	0.25276	0 ACRE	Removal
Temporary	0.022645	0.022645	0 ACRE	Removal
Temporary	1.753925	1.753925	0 ACRE	Removal
Temporary	0.567402	0.567402	0 ACRE	Removal
Temporary	0.195032	0.195032	0 ACRE	Removal
Temporary	1.410562	1.410562	0 ACRE	Removal
Temporary	1.768611	1.768611	0 ACRE	Removal
Temporary	0.054217	0.054217	0 ACRE	Removal
Temporary	0.001832	0.001832	0 ACRE	Removal
Temporary	0.006768	0.006768	0 ACRE	Removal
Temporary	0.000592	0.000592	0 ACRE	Removal
Temporary	0.56923	0.56923	0 ACRE	Removal
Temporary	0.002773	0.002773	0 ACRE	Removal
Temporary	0.175164	0.175164	0 ACRE	Removal
Temporary	0.057857	0.057857	0 ACRE	Removal
Temporary	1.017483	1.017483	0 ACRE	Removal
Temporary	1.96307	1.96307	0 ACRE	Removal
Temporary	0.030492	0.030492	0 ACRE	Removal
Temporary	0.004389	0.004389	0 ACRE	Removal
Temporary	0.003509	0.003509	0 ACRE	Removal
Temporary	4.31402	4.31402	0 ACRE	Removal
Temporary	0.313557	0.313557	0 ACRE	Removal
Temporary	0.987067	0.987067	0 ACRE	Removal
Temporary	0.11449	0.11449	0 ACRE	Removal
Temporary	0.168743	0.168743	0 ACRE	Removal
Temporary	0.021362	0.021362	0 ACRE	Removal

Temporary	0.654706	0.654706	0 ACRE	Removal
Temporary	0.148192	0.148192	0 ACRE	Removal
Temporary	0.34813	0.34813	0 ACRE	Removal
Temporary	0.215872	0.215872	0 ACRE	Removal
Temporary	0.559541	0.559541	0 ACRE	Removal
Temporary	0.212089	0.212089	0 ACRE	Removal
Temporary	0.013038	0.013038	0 ACRE	Removal
Temporary	0.539299	0.539299	0 ACRE	Removal
Temporary	0.005009	0.005009	0 ACRE	Removal
Temporary	0.077855	0.077855	0 ACRE	Removal
Temporary	0.000476	0.000476	0 ACRE	Removal
Temporary	0.093168	0.093168	0 ACRE	Removal
Temporary	0.323679	0.323679	0 ACRE	Removal
Temporary	0.117766	0.117766	0 ACRE	Removal
Temporary	0.569895	0.569895	0 ACRE	Removal
Temporary	0.203093	0.203093	0 ACRE	Removal
Temporary	0.328927	0.328927	0 ACRE	Removal
Temporary	0.424245	0.424245	0 ACRE	Removal
Temporary	0.2009	0.2009	0 ACRE	Removal
Temporary	0.01858	0.01858	0 ACRE	Removal
Temporary	0.01004	0.01004	0 ACRE	Removal
Temporary	0.27151	0.27151	0 ACRE	Removal
Temporary	0.619472	0.619472	0 ACRE	Removal
Temporary	0.298389	0.298389	0 ACRE	Removal
Temporary	0.058248	0.058248	0 ACRE	Removal
Temporary	0.095811	0.095811	0 ACRE	Removal
Temporary	0.145145	0.145145	0 ACRE	Removal
Temporary	0.05961	0.05961	0 ACRE	Removal
Temporary	0.24478	0.24478	0 ACRE	Removal

Authorized_Linear_Units_Linear	Debits	Notes
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		
AL		

AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL

AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL

AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL AL

R5
R5
R5
R5
R5
R6
R4
R5
POW
R5
R4
R5
R5
POW
R5
R5
R5
R5
R5
R4
R4
R4
R5
PEM
PFO
PFO
PFO
PEM
PEM
PFO
PFO
PFO
PEM

PFO
PEM
PFO
PEM
PFO
PFO
PEM
PFO
PEM
PFO
PEM
PFO
PFO
PFO
PEM
PEM
PEM
PFO
PFO
PFO
PEM
PEM
PFO
PEM
PFO
PFO
PFO
PFO
PFO
PFO
PSS
PSS
PEM
PFO

PFO
PFO
PEM
PFO
PEM
PEM
PEM
PEM
PEM
PFO
PFO
PEM
PFO
PFO
PEM
PEM
PEM
PEM
PEM
PFO
PFO
PFO
PFO
PFO
PEM
PEM
PEM
PFO
PFO
PFO
PFO
PFO
PEM

PFO
PFO
PFO
PFO
PFO
PFO
PEM
PFO
PEM
PFO
PEM
PFO
PEM
PEM
PFO
PFO
PEM
PFO
PFO
PEM
PFO
PFO
PFO
PFO
PFO
PFO
PFO
PFO

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Thursday, December 06, 2012 1:43 PM
To: 'Tom Sankey'; Eric Munscher; Jeremy Rabalais
Cc: Rumbley, Pauline B. Contractor
Subject: RE: Plains SouthCap Pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Tom, Eric, and Jeremy:
I just want to follow-up with a summary of our call this morning. The project will be authorized using NWP 12's.
1. To minimize confusion on editions of information, new Corp template mass download forms would be provided for:
a. Impact forms will recognize single and complete projects that require 404 or Section 10 permit. Directional drilling areas with no wetland or stream impacts will not be included in this list.
b. Mitigation forms will correlate with the impact form. Directional drilling with no wetland impacts will not be included in this list.
c. The Aquatic Resource form will recognize waters of the U.S. in the federal permit area that have wetlands and streams impacts. Directional drilling area with no 404 or Section 10 impacts will be listed.
d. JD form will recognize each waters of the U.S. with wetland or stream impacts, or Section 10 crossings. The list will not provide duplicate listing of the same water because of multiple crossings of the same larger wetland or stream system.
e. Wetland delineation. You stated that Pauline has been provided shape files to minimize GPS data in files. We will reference this is the delineation verification letter. We still need to identify 3 wetland sites that have been flagged and GPS points provided to confirm wetland delineation.
f. The location of the Section 10 water crossings have not changed. The information provided contains the correct sites and GPS locations. I will coordinate this with our Federal Navigation Section for approval.
g. The SHPO and USFWS clearance letters are expected next week.

Let me know if I missed something.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Wednesday, November 28, 2012 10:41 AM
To: Eric Munscher
Subject: RE: Plains SouthCap Pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Thanks for the quick response. I spoke with Jeremy this morning and he informed me that the information and field data we currently have has been updated and replaced. It is my understanding the corrected information will be provided to us in the near future.

Jeremy mentioned that the previous data reflected all wetlands and streams within the 200-foot corridor that your firm traditionally surveys for the applicant. I mentioned that our evaluation is limited to our federal permit areas, which are wetlands and streams in the 75-foot wide pipeline corridor that will subject to regulated impacts (ditching and clearing), and any actions requiring a Section 10 permit. Please note that directional drilling where there are no impacts to 404 wetlands or streams (complete avoidance) is a non-regulated activity. This is important the provided data and worksheets address only regulated actions in federal permit areas that requiring a permit by our program.

I look forward to receiving the most current information and data so that we may continue with our evaluation.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

Classification: UNCLASSIFIED
Caveats: NONE

AC

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Monday, December 03, 2012 3:09 PM
To: 'Tom Sankey'
Cc: Eric Munscher
Subject: RE: Plains SouthCap Pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Tom,
Thanks for the information, the name without the 41-mile descriptor or reference permit numbers threw me. Could you verify that each wetland ID entry is a single and complete linear project per the NWP program definition? Assuming they are, we now have the defined project requiring permits. It is only these 150 or so "single and complete" projects with impacts that would be reflected in the download worksheets to be provided. Could you provide this document and the other waters download worksheets where they reflect only the 150 or so projects with impacts that require permits. This should allow us to proceed forward with our evaluation.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Tom Sankey [mailto:tsankey@swca.com]
Sent: Monday, December 03, 2012 2:42 PM
To: Moxey, Michael B SAM
Cc: Eric Munscher
Subject: RE: Plains SouthCap Pipeline (UNCLASSIFIED)

Mike:

That is the mitigation memo and worksheet for the existing project we have been working on... Plains Southcap, LLC's Ten-Mile, Alabama Facility to Pascagoula Refinery project Action IDs SAM-2012-01165-MBM and SAM-2012-00885-MBM.

Thanks,
Tom

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]

Sent: Monday, December 03, 2012 2:06 PM
To: Moxey, Michael B SAM; Tom Sankey
Subject: RE: Plains SouthCap Pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
I received a bound document providing aerial images for a 10-mile pipeline from Mobile to Pascagoula, and a mitigation worksheet. Could you update me whether a PCN or permit application has been submitted to the Corps.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

SWCA
ENVIRONMENTAL CONSULTANTS

MEMORANDUM

To: Michael B. Moxey, U.S. Army Corps of Engineers, Mobile District

From: R. Thomas Sankey, PWS, CSE – SWCA Houston

Date: November 29, 2012

Re: Ten-Mile Facility to Chevron Pascagoula Crude Oil Pipeline Project
Projected Wetland Mitigation Costs
Mobile County, Alabama and Jackson County, Mississippi

The following memo details the results of our evaluation of expected wetland mitigation costs for Plains All American's Ten-Mile Facility to Pascagoula Crude Oil Pipeline (project). The project area begins at the Ten-Mile Crude Oil Facility in Mobile Alabama, located approximately 11 miles northwest of downtown Mobile, and extends southwest towards Pascagoula, Mississippi. The line ends at the Chevron Pascagoula refinery approximately one mile from the Gulf of Mexico.

Based on analysis of the impact areas in our field survey mapping (**Attachment 1**), as well as an assumed 50-foot-wide construction corridor and a 25-foot temporary corridor, the project would impact the following wetland types and acreages: estuarine emergent (6.51 ac); palustrine emergent (PEM) (20.7 ac); palustrine scrub-shrub (PSS) (27.4ac), and palustrine forested (PFO) (97.6 ac). Of these categories, only the PSS and PFO wetlands will likely require mitigation. These wetland types total approximately 125.0 acres of impacts.

In our recent pipeline permitting experience with the USACE, the Mobile District has required compensatory mitigation for permanent impacts only. Conversion of PFO and PSS wetlands to permanently maintained PEM wetlands would require a 1:0.25 to 1:1 replacement ratio based off of the distance from centerline of the proposed ROW see attached USACE compensation sheet (**Attachment 2**). Detailed wetland mitigation calculations as per Mobile District guidance are included in (**Attachment 3**).

We proposed purchasing approximately 64.2 credits of bottomland hardwood wetland and 10.5 credits of pine savannah along the proposed ROW through both states.

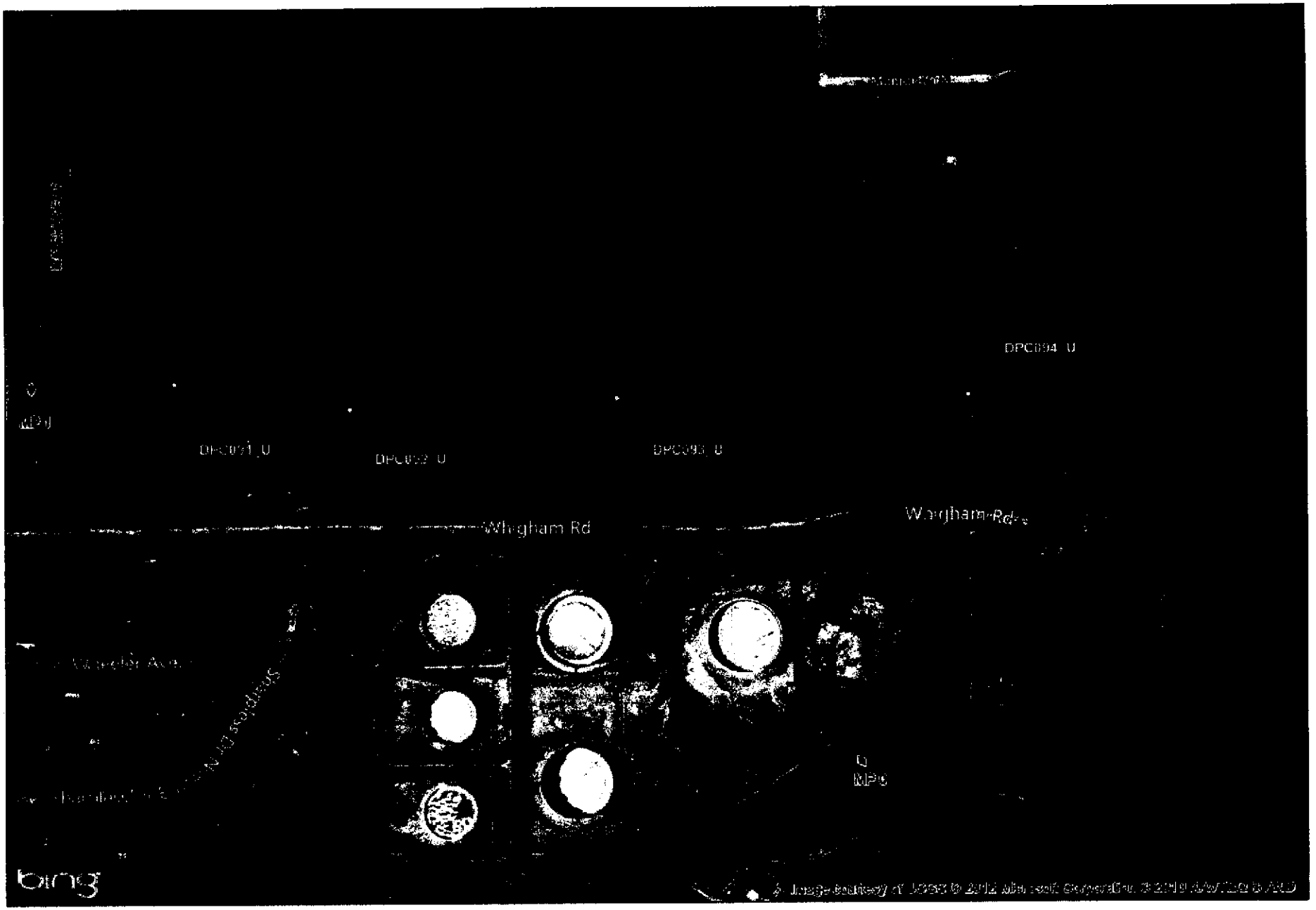
ATTACHMENT 1
Wetland Impact Area Maps

NWP 12 Project No.	FGT Wetland/ Waterbody ID	Local Waterway	Jurisdictional Type (Wetland/Stream)	Wetland/ Stream Type	Latitude (dd NAD83)	Longitude (dd NAD83)	PFO Wetlands to revert to PFO (0.25:1)	PFO Wetlands converted to PSS (0.5:1)	PFO Wetlands converted to PEM	Total 0.25:1 Credits	Total 0.5:1 Credits	Total 1:1 Credits	Total Mitigation Credits	state
0	WBC001	Lower Big Creek	STREAM	R5	30.640651	-88.379625	0	0	0	0	0	0	0	AL
0	WBC002	Lower Big Creek	STREAM	R5	30.643378	-88.374183	0	0	0	0	0	0	0	AL
0	WBC003	Wolf Branch	STREAM	R5	30.647379	-88.365877	0	0	0	0	0	0	0	AL
0	WBC006	Lower Big Creek	STREAM	R5	30.628735	-88.399393	0	0	0	0	0	0	0	AL
0	WBC007	Lower Big Creek	STREAM	R5	30.629391	-88.39816	0	0	0	0	0	0	0	AL
0	WBC008	Lower Big Creek	STREAM	R5	30.688826	-88.304762	0	0	0	0	0	0	0	AL
0	WBC009	Lower Big Creek	STREAM	R6	30.68892	-88.30505	0	0	0	0	0	0	0	AL
0	WBC010A	Upper Big Creek	STREAM	R6	30.73353	-88.265678	0	0	0	0	0	0	0	AL
0	WBC010B	Lower Big Creek	STREAM	R4	30.69158	-88.301973	0	0	0	0	0	0	0	AL
0	WBC011	Upper Big Creek	STREAM	R5	30.740001	-88.259513	0	0	0	0	0	0	0	AL
0	WBC012	Chickasaw Creek	POND	POW	30.763655	-88.24497	0	0	0	0	0	0	0	AL
0	WBC112A	Double Branch	STREAM	R5	30.776981	-88.226859	0	0	0	0	0	0	0	AL
0	WBC112B	Double Branch	STREAM	R5	30.777217	-88.226265	0	0	0	0	0	0	0	AL
0	WBD003B	Lower Big Creek	POND	POW	30.631695	-88.394076	0	0	0	0	0	0	0	AL
0	WBD004B	Big Creek	STREAM	R5	30.631923	-88.393515	0	0	0	0	0	0	0	AL
0	WBD005	Lower Big Creek	STREAM	R4	30.635896	-88.388556	0	0	0	0	0	0	0	AL
0	WBD006	Upper Big Creek	STREAM	R5	30.723109	-88.275295	0	0	0	0	0	0	0	AL
0	WBD007	Hamilton Creek	STREAM	R5	30.7244	-88.27433	0	0	0	0	0	0	0	AL
0	WBD008	Upper Big Creek	POND	POW	30.75326	-88.254497	0	0	0	0	0	0	0	AL
0	WBD009A	Upper Big Creek	STREAM	R5	30.753782	-88.254431	0	0	0	0	0	0	0	AL
0	WBD009B	Upper Big Creek	STREAM	R5	30.754468	-88.254234	0	0	0	0	0	0	0	AL
0	WBD009C	Upper Big Creek	STREAM	R5	30.755055	-88.253672	0	0	0	0	0	0	0	AL
0	WBD009D	Upper Big Creek	STREAM	R4	30.757013	-88.252598	0	0	0	0	0	0	0	AL
0	WBD010	Upper Big Creek	POND	POW	30.759935	-88.251594	0	0	0	0	0	0	0	AL
0	WBD011	Chickasaw Creek	STREAM	R5	30.776844	-88.221506	0	0	0	0	0	0	0	AL
0	WBE001A	Lower Big Creek	STREAM	R5	30.666152	-88.335546	0	0	0	0	0	0	0	AL
0	WBE001B	Lower Big Creek	STREAM	R5	30.666065	-88.335554	0	0	0	0	0	0	0	AL
0	WBE001C	Lower Big Creek	STREAM	R5	30.665841	-88.335607	0	0	0	0	0	0	0	AL
0	WBE002	Lower Big Creek	STREAM	R5	30.663041	-88.335882	0	0	0	0	0	0	0	AL
0	WBE005	Lower Big Creek	STREAM	R5	30.678059	-88.320084	0	0	0	0	0	0	0	AL
0	WBG005	Chickasaw Creek	STREAM	R4	30.794895	-88.210302	0	0	0	0	0	0	0	AL
0	WBG005	Chickasaw Creek	STREAM	R4	30.794895	-88.210302	0	0	0	0	0	0	0	AL
0	WBG009	Chickasaw Creek	POND	POW	30.760948	-88.249771	0	0	0	0	0	0	0	AL
0	WBG010	Upper Big Creek	STREAM	R4	30.719949	-88.277235	0	0	0	0	0	0	0	AL
0	WBGT001	Lower Big Creek	STREAM	R4	30.650564	-88.359404	0	0	0	0	0	0	0	AL
0	WBGT004	Lower Big Creek	STREAM	R5	30.669693	-88.333594	0	0	0	0	0	0	0	AL
0	WBGT005	Pierce Creek	STREAM	R6	30.672919	-88.328116	0	0	0	0	0	0	0	AL
0	WBGT006	Pierce Creek	STREAM	R5	30.673152	-88.328035	0	0	0	0	0	0	0	AL
0	WETC001-E0	Lower Big Creek	WETLAND	PEM	30.639812	-88.381936	0	0	0	0	0	0	0	AL
0	WETC001-F0	Lower Big Creek	WETLAND	PFO	30.639595	-88.38177	0.077009	0	0.175132	0.019252	0	0.175132	0.194384	AL
0	WETC002-E0	Lower Big Creek	WETLAND	PEM	30.640767	-88.379847	0	0	0	0	0	0	0	AL
0	WETC002-E1	Lower Big Creek	WETLAND	PEM	30.640811	-88.379725	0	0	0	0	0	0	0	AL
0	WETC002-F0	Lower Big Creek	WETLAND	PFO	30.640621	-88.379441	0.044776	0	0.069691	0.011194	0	0.069691	0.080885	AL
0	WETC002-F1	Lower Big Creek	WETLAND	PFO	30.640629	-88.37965	0.007398	0	0.029493	0.001849	0	0.029493	0.031342	AL
0	WETC003-E0	Lower Big Creek	WETLAND	PEM	30.643439	-88.374429	0	0	0	0	0	0	0	AL
0	WETC003-E1	Lower Big Creek	WETLAND	PEM	30.643563	-88.374103	0	0	0	0	0	0	0	AL
0	WETC003-F0	Lower Big Creek	WETLAND	PFO	30.643158	-88.37424	0.00067	0	0	0.000167	0	0	0	AL
0	WETC003-F1	Lower Big Creek	WETLAND	PFO	30.643308	-88.374281	0.002232	0	0.055606	0.000558	0	0.055606	0.056164	AL
0	WETC003-F2	Lower Big Creek	WETLAND	PFO	30.643421	-88.374096	0	0	0.025146	0	0	0.025146	0	AL

0	WETC004-E0	Lower Big Creek	WETLAND	PEM	30.645313	-88.370568	0	0	0	0	0	0	0 AL
0	WETC004-F0	Lower Big Creek	WETLAND	PFO	30.645109	-88.370329	0	0	0.074719	0	0	0.074719	0 AL
0	WETC005-E0	Lower Big Creek	WETLAND	PEM	30.645965	-88.369154	0	0	0	0	0	0	0 AL
0	WETC005-F0	Lower Big Creek	WETLAND	PFO	30.645742	-88.369158	0	0	0.035464	0	0	0.035464	0 AL
0	WETC006-E0	Lower Big Creek	WETLAND	PEM	30.646808	-88.367438	0	0	0	0	0	0	0 AL
0	WETC007-E0	Lower Big Creek	WETLAND	PEM	30.647411	-88.366185	0	0	0	0	0	0	0 AL
0	WETC007-E1	Lower Big Creek	WETLAND	PEM	30.647581	-88.366054	0	0	0	0	0	0	0 AL
0	WETC007-F0	Lower Big Creek	WETLAND	PFO	30.647122	-88.366107	0.119195	0	0.195139	0.029799	0	0.195139	0.224938 AL
0	WETC007-F1	Lower Big Creek	WETLAND	PFO	30.647286	-88.365724	0.014606	0	0.010523	0.003652	0	0.010523	0.014175 AL
0	WETC008-E0	Lower Big Creek	WETLAND	PEM	30.648484	-88.363962	0	0	0	0	0	0	0 AL
0	WETC008-F0	Lower Big Creek	WETLAND	PFO	30.648343	-88.363788	0.087021	0	0.327066	0.021755	0	0.327066	0.348822 AL
0	WETC009-E0	Lower Big Creek	WETLAND	PEM	30.649068	-88.362754	0	0	0	0	0	0	0 AL
0	WETC009-F0	Lower Big Creek	WETLAND	PFO	30.648888	-88.362503	0.025005	0	0.045145	0.006251	0	0.045145	0.051396 AL
0	WETC010-E0	Lower Big Creek	WETLAND	PEM	30.649732	-88.361268	0	0	0	0	0	0	0 AL
0	WETC016-E0	Lower Big Creek	WETLAND	PEM	30.628492	-88.400305	0	0	0	0	0	0	0 AL
0	WETC016-E1	Lower Big Creek	WETLAND	PEM	30.628914	-88.399515	0	0	0	0	0	0	0 AL
0	WETC017-F0	Lower Big Creek	WETLAND	PFO	30.629009	-88.398696	0.231183	0	0.305144	0.057796	0	0.305144	0.36294 AL
0	WETC017-F1	Lower Big Creek	WETLAND	PFO	30.629415	-88.397944	0.078018	0	0.131885	0.019504	0	0.131885	0.151389 AL
0	WETC018-E0	Lower Big Creek	WETLAND	PEM	30.685166	-88.309026	0	0	0	0	0	0	0 AL
0	WETC018-F0	Lower Big Creek	WETLAND	PFO	30.684938	-88.308831	0.124294	0	0.143063	0.031073	0	0.143063	0.174137 AL
0	WETC019-E0	Lower Big Creek	WETLAND	PEM	30.687829	-88.305532	0	0	0	0	0	0	0 AL
0	WETC019-E1	Lower Big Creek	WETLAND	PEM	30.690284	-88.303743	0	0	0	0	0	0	0 AL
0	WETC019-E2	Lower Big Creek	WETLAND	PEM	30.691331	-88.302265	0	0	0	0	0	0	0 AL
0	WETC019-F0	Lower Big Creek	WETLAND	PFO	30.687585	-88.305322	0.52128	0	0.793785	0.13032	0	0.793785	0.924105 AL
0	WETC019-F1	Lower Big Creek	WETLAND	PFO	30.689981	-88.303637	0.630414	0	0.978342	0.157604	0	0.978342	1.135945 AL
0	WETC019-F2	Lower Big Creek	WETLAND	PFO	30.691062	-88.302276	0.061671	0	0.04554	0.015418	0	0.04554	0.060958 AL
0	WETC020A-E0	Lower Big Creek	WETLAND	PEM	30.692306	-88.297295	0	0	0	0	0	0	0 AL
0	WETC020B-E1	Lower Big Creek	WETLAND	PEM	30.700355	-88.289889	0	0	0	0	0	0	0 AL
0	WETC020B-F0	Lower Big Creek	WETLAND	PFO	30.692282	-88.297174	0.001268	0	0.025002	0.000317	0	0.025002	0.025319 AL
0	WETC021-E0	Upper Big Creek	WETLAND	PEM	30.732862	-88.266833	0	0	0	0	0	0	0 AL
0	WETC021-E1	Upper Big Creek	WETLAND	PEM	30.736114	-88.262791	0	0	0	0	0	0	0 AL
0	WETC021-F0	Upper Big Creek	WETLAND	PFO	30.732632	-88.266637	0.253969	0	0.470877	0.063492	0	0.470877	0.534369 AL
0	WETC021-F1	Upper Big Creek	WETLAND	PFO	30.733924	-88.26501	0.141307	0	0.209424	0.035327	0	0.209424	0.244751 AL
0	WETC021-F2	Upper Big Creek	WETLAND	PFO	30.736393	-88.262045	0.911075	0	2.369749	0.227769	0	2.369749	2.597518 AL
0	WETC022-F0	Upper Big Creek	WETLAND	PFO	30.739797	-88.259569	0	0	0.078867	0	0	0.078867	0 AL
0	WETC022-F1	Upper Big Creek	WETLAND	PFO	30.740883	-88.259071	0.245498	0	0.345915	0.061375	0	0.345915	0.40729 AL
0	WETC022-F2	Upper Big Creek	WETLAND	PFO	30.742536	-88.259254	0.093243	0	0.129384	0.023311	0	0.129384	0.152695 AL
0	WETC022-S0	Upper Big Creek	WETLAND	PSS	30.73983	-88.259794	0	0.143046	0	0	0.071523	0	0 AL
0	WETC022-S1	Upper Big Creek	WETLAND	PSS	30.741389	-88.259248	0.061722	0.567585	0	0.015431	0.283792	0	0.299223 AL
0	WETC024-E0	Chickasaw Creek	WETLAND	PEM	30.769326	-88.239646	0	0	0	0	0	0	0 AL
0	WETC025-E0	Chickasaw Creek	WETLAND	PEM	30.771793	-88.237498	0	0	0	0	0	0	0 AL
0	WETC025-F0	Chickasaw Creek	WETLAND	PFO	30.772049	-88.237704	0	0	0.095885	0	0	0.095885	0 AL
0	WETC026-E0	Chickasaw Creek	WETLAND	PEM	30.776212	-88.233774	0	0	0	0	0	0	0 AL
0	WETC026-F0	Chickasaw Creek	WETLAND	PFO	30.776133	-88.233455	0.228607	0	0.471465	0.057152	0	0.471465	0.528617 AL
0	WETC027-E0	Chickasaw Creek	WETLAND	PEM	30.777143	-88.227931	0	0	0	0	0	0	0 AL
0	WETC027-F0	Chickasaw Creek	WETLAND	PFO	30.776874	-88.228398	0.74023	0	1.513329	0.185058	0	1.513329	1.698387 AL
0	WETC029-E0	Lower Big Creek	WETLAND	PEM	30.680046	-88.317181	0	0	0	0	0	0	0 AL
0	WETC029-F0	Lower Big Creek	WETLAND	PFO	30.679735	-88.317108	0.053874	0	0.067676	0.013469	0	0.067676	0.081145 AL
0	WETC031-E1	Lower Big Creek	WETLAND	PEM	30.650445	-88.359783	0	0	0	0	0	0	0 AL
0	WETC031-E2	Lower Big Creek	WETLAND	PEM	30.650438	-88.360046	0	0	0	0	0	0	0 AL
0	WETC031-E3	Lower Big Creek	WETLAND	PEM	30.650684	-88.359244	0	0	0	0	0	0	0 AL
0	WETC032-E0	Lower Big Creek	WETLAND	PEM	30.653086	-88.354388	0	0	0	0	0	0	0 AL
0	WETC033-E0	Lower Big Creek	WETLAND	PEM	30.654081	-88.352298	0	0	0	0	0	0	0 AL

0	WETD010-E0	Lower Big Creek	WETLAND	PEM	30.631308	-88.395026	0	0	0	0	0	0	0 AL
0	WETD010-E1	Lower Big Creek	WETLAND	PEM	30.632271	-88.393153	0	0	0	0	0	0	0 AL
0	WETD010-F0	Lower Big Creek	WETLAND	PFO	30.631008	-88.394994	0.573351	0	0.569313	0.143338	0	0.569313	0.71265 AL
0	WETD010-F1	Lower Big Creek	WETLAND	PFO	30.632109	-88.392937	0.235457	0	0.331943	0.058864	0	0.331943	0.390807 AL
0	WETD011-E0	Lower Big Creek	WETLAND	PEM	30.634424	-88.389233	0	0	0	0	0	0	0 AL
0	WETD011-E1	Lower Big Creek	WETLAND	PEM	30.635658	-88.388836	0	0	0	0	0	0	0 AL
0	WETD011-E2	Lower Big Creek	WETLAND	PEM	30.637052	-88.387411	0	0	0	0	0	0	0 AL
0	WETD011-F0	Lower Big Creek	WETLAND	PFO	30.634901	-88.388618	0.477269	0	0.933287	0.119317	0	0.933287	1.052605 AL
0	WETD011-F1	Lower Big Creek	WETLAND	PFO	30.636755	-88.387367	0.625956	0	1.142648	0.156489	0	1.142648	1.299137 AL
0	WETD012A-E0	Upper Big Creek	WETLAND	PEM	30.722908	-88.275335	0	0	0	0	0	0	0 AL
0	WETD012A-E1	Upper Big Creek	WETLAND	PEM	30.72293	-88.275084	0	0	0	0	0	0	0 AL
0	WETD012A-E2	Upper Big Creek	WETLAND	PEM	30.723253	-88.275426	0	0	0	0	0	0	0 AL
0	WETD012A-E3	Upper Big Creek	WETLAND	PEM	30.723732	-88.27507	0	0	0	0	0	0	0 AL
0	WETD012A-E4	Upper Big Creek	WETLAND	PEM	30.724489	-88.274165	0	0	0	0	0	0	0 AL
0	WETD012A-E5	Upper Big Creek	WETLAND	PEM	30.724638	-88.274326	0	0	0	0	0	0	0 AL
0	WETD012A-F0	Upper Big Creek	WETLAND	PFO	30.722625	-88.275257	0.002773	0	0	0.000693	0	0	0 AL
0	WETD012A-F1	Upper Big Creek	WETLAND	PFO	30.722523	-88.275453	0.090789	0	0.084375	0.022697	0	0.084375	0.107072 AL
0	WETD012A-F2	Upper Big Creek	WETLAND	PFO	30.723006	-88.275325	0.004358	0	0.053499	0.001089	0	0.053499	0.054588 AL
0	WETD012A-F3	Upper Big Creek	WETLAND	PFO	30.723723	-88.274718	0.33825	0	0.557806	0.084563	0	0.557806	0.642369 AL
0	WETD012B-E0	Upper Big Creek	WETLAND	PEM	30.726483	-88.273322	0	0	0	0	0	0	0 AL
0	WETD012B-E1	Upper Big Creek	WETLAND	PEM	30.7278	-88.272534	0	0	0	0	0	0	0 AL
0	WETD012B-F0	Upper Big Creek	WETLAND	PFO	30.727285	-88.272484	0.676223	0	1.286839	0.169056	0	1.286839	1.455894 AL
0	WETD013-E0	Upper Big Creek	WETLAND	PEM	30.749765	-88.255782	0	0	0	0	0	0	0 AL
0	WETD013-E1	Upper Big Creek	WETLAND	PEM	30.754876	-88.253589	0	0	0	0	0	0	0 AL
0	WETD013-E2	Upper Big Creek	WETLAND	PEM	30.755205	-88.253391	0	0	0	0	0	0	0 AL
0	WETD013-F0	Upper Big Creek	WETLAND	PFO	30.748971	-88.256467	1.45199	0	2.862013	0.362997	0	2.862013	3.225011 AL
0	WETD013-F1	Upper Big Creek	WETLAND	PFO	30.753382	-88.254607	0.160497	0	0.153058	0.040124	0	0.153058	0.193183 AL
0	WETD013-F2	Upper Big Creek	WETLAND	PFO	30.75427	-88.254123	0.291177	0	0.695885	0.072794	0	0.695885	0.76868 AL
0	WETD013-F3	Upper Big Creek	WETLAND	PFO	30.754467	-88.254248	0	0	0	0	0	0	0 AL
0	WETD013-F4	Upper Big Creek	WETLAND	PFO	30.755175	-88.253822	0.050827	0	0.063663	0.012707	0	0.063663	0.07637 AL
0	WETD014-E0	Upper Big Creek	WETLAND	PEM	30.757682	-88.252336	0	0	0	0	0	0	0 AL
0	WETD014-F0	Upper Big Creek	WETLAND	PFO	30.757697	-88.252502	0	0	0.168742	0	0	0.168742	0 AL
0	WETD015-E0	Chickasaw Creek	WETLAND	PEM	30.783799	-88.210156	0	0	0	0	0	0	0 AL
0	WETD015-E0	Chickasaw Creek	WETLAND	PEM	30.783799	-88.210156	0	0	0	0	0	0	0 AL
0	WETD015-F0	Chickasaw Creek	WETLAND	PFO	30.783947	-88.210388	0.152516	0	0.502187	0.038129	0	0.502187	0.540316 AL
0	WETD015-F0	Chickasaw Creek	WETLAND	PFO	30.783947	-88.210388	0	0	0.502187	0	0	0.502187	0.502187 AL
0	WETD016-E0	Chickasaw Creek	WETLAND	PEM	30.778756	-88.210106	0	0	0	0	0	0	0 AL
0	WETD016-E0	Chickasaw Creek	WETLAND	PEM	30.778756	-88.210106	0	0	0	0	0	0	0 AL
0	WETD018-E0	Chickasaw Creek	WETLAND	PEM	30.777002	-88.224506	0	0	0	0	0	0	0 AL
0	WETD018-F0	Chickasaw Creek	WETLAND	PFO	30.776752	-88.224728	0.036155	0	0.112036	0.009039	0	0.112036	0.121075 AL
0	WETE001-F0	Lower Big Creek	WETLAND	PFO	30.667256	-88.335965	0.15366	0	0.194469	0.038415	0	0.194469	0.232884 AL
0	WETE002-F0	Lower Big Creek	WETLAND	PFO	30.665511	-88.33575	0.067189	0	0.148682	0.016797	0	0.148682	0.165479 AL
0	WETE002-F1	Lower Big Creek	WETLAND	PFO	30.666069	-88.335548	0	0	0	0	0	0	0 AL
0	WETE002-F2	Lower Big Creek	WETLAND	PFO	30.665885	-88.335591	0	0	0	0	0	0	0 AL
0	WETE002-F3	Lower Big Creek	WETLAND	PFO	30.665006	-88.335558	0	0	0	0	0	0	0 AL
0	WETE002-F4	Lower Big Creek	WETLAND	PFO	30.663896	-88.335763	0.107958	0	0.45158	0.02699	0	0.45158	0.47857 AL
0	WETE002-F5	Lower Big Creek	WETLAND	PFO	30.66289	-88.335905	0.068151	0	0.143938	0.017038	0	0.143938	0.160976 AL
0	WETE003-E0	Lower Big Creek	WETLAND	PEM	30.660801	-88.338234	0	0	0	0	0	0	0 AL
0	WETE003-F0	Lower Big Creek	WETLAND	PFO	30.660972	-88.338152	0	0	0	0	0	0	0 AL
0	WETE003-F1	Lower Big Creek	WETLAND	PFO	30.660504	-88.338324	0.178512	0	0.360785	0.044628	0	0.360785	0.405413 AL
0	WETE004-E0	Lower Big Creek	WETLAND	PEM	30.655814	-88.348655	0	0	0	0	0	0	0 AL
0	WETE004-F0	Lower Big Creek	WETLAND	PFO	30.655631	-88.348412	0.025629	0	0.052225	0.006407	0	0.052225	0.058632 AL
0	WETE005-E0	Lower Big Creek	WETLAND	PEM	30.655516	-88.349305	0	0	0	0	0	0	0 AL

0	WETE005-F0	Lower Big Creek	WETLAND	PFO	30.655228	-88.349292	0.027208	0	0.06596	0.006802	0	0.06596	0.072762 AL
0	WETE006-E0	Lower Big Creek	WETLAND	PEM	30.677753	-88.320846	0	0	0	0	0	0	0 AL
0	WETE006-E1	Lower Big Creek	WETLAND	PEM	30.678346	-88.319874	0	0	0	0	0	0	0 AL
0	WETE006-F0	Lower Big Creek	WETLAND	PFO	30.677514	-88.32069	0.290547	0	0.279347	0.072637	0	0.279347	0.351983 AL
0	WETE006-F1	Lower Big Creek	WETLAND	PFO	30.678054	-88.319834	0.094147	0	0.069574	0.023537	0	0.069574	0.093111 AL
0	WETE007-E0	Lower Big Creek	WETLAND	PEM	30.675581	-88.324282	0	0	0	0	0	0	0 AL
0	WETE007-F0	Lower Big Creek	WETLAND	PFO	30.675345	-88.324171	0.220858	0	0.096304	0.055215	0	0.096304	0.151518 AL
0	WETE007-F1	Lower Big Creek	WETLAND	PFO	30.675848	-88.323378	0.103494	0	0.097405	0.025873	0	0.097405	0.123278 AL
0	WETE008-E0	Lower Big Creek	WETLAND	PEM	30.67378	-88.327278	0	0	0	0	0	0	0 AL
0	WETE008-F0	Lower Big Creek	WETLAND	PFO	30.673648	-88.327194	0	0	0.01004	0	0	0.01004	0 AL
0	WETE009-E0	Chickasaw Creek	WETLAND	PEM	30.777007	-88.221691	0	0	0	0	0	0	0 AL
0	WETE009-E1	Chickasaw Creek	WETLAND	PEM	30.777014	-88.220972	0	0	0	0	0	0	0 AL
0	WETE009-F0	Chickasaw Creek	WETLAND	PFO	30.776721	-88.22185	0.091457	0	0.180052	0.022864	0	0.180052	0.202916 AL
0	WETE009-F1	Chickasaw Creek	WETLAND	PFO	30.776724	-88.220898	0.236284	0	0.383185	0.059071	0	0.383185	0.442256 AL
0	WETGT001-F0	Lower Big Creek	WETLAND	PFO	30.650392	-88.359536	0.047576	0	0.250812	0.011894	0	0.250812	0.262706 AL
0	WETGT001-F1	Lower Big Creek	WETLAND	PFO	30.650659	-88.359067	0	0	0.058248	0	0	0.058248	0 AL
0	WETGT002-F0	Lower Big Creek	WETLAND	PFO	30.652879	-88.354163	0.029003	0	0.066808	0.007251	0	0.066808	0.074058 AL
0	WETGT003-F0	Lower Big Creek	WETLAND	PFO	30.653826	-88.352143	0.050487	0	0.094657	0.012622	0	0.094657	0.107279 AL
0	WETGT007-F0	Lower Big Creek	WETLAND	PFO	30.669523	-88.333462	0.035687	0	0.0093	0.008922	0	0.0093	0.018222 AL
0	WETGT008-E0	Lower Big Creek	WETLAND	PEM	30.625392	-88.405736	0	0	0	0	0	0	0 AL
0	WETGT008-F0	Lower Big Creek	WETLAND	PFO	30.625199	-88.405478	0.089279	0	0.155501	0.02232	0	0.155501	0.17782 AL
GRAND TOTAL							11.840279	0.710631	22.406809	2.960072	0.355315	22.406809	25.102701



SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 3 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Mileposts
Sample Point
Intermittent
Delineation Boundary

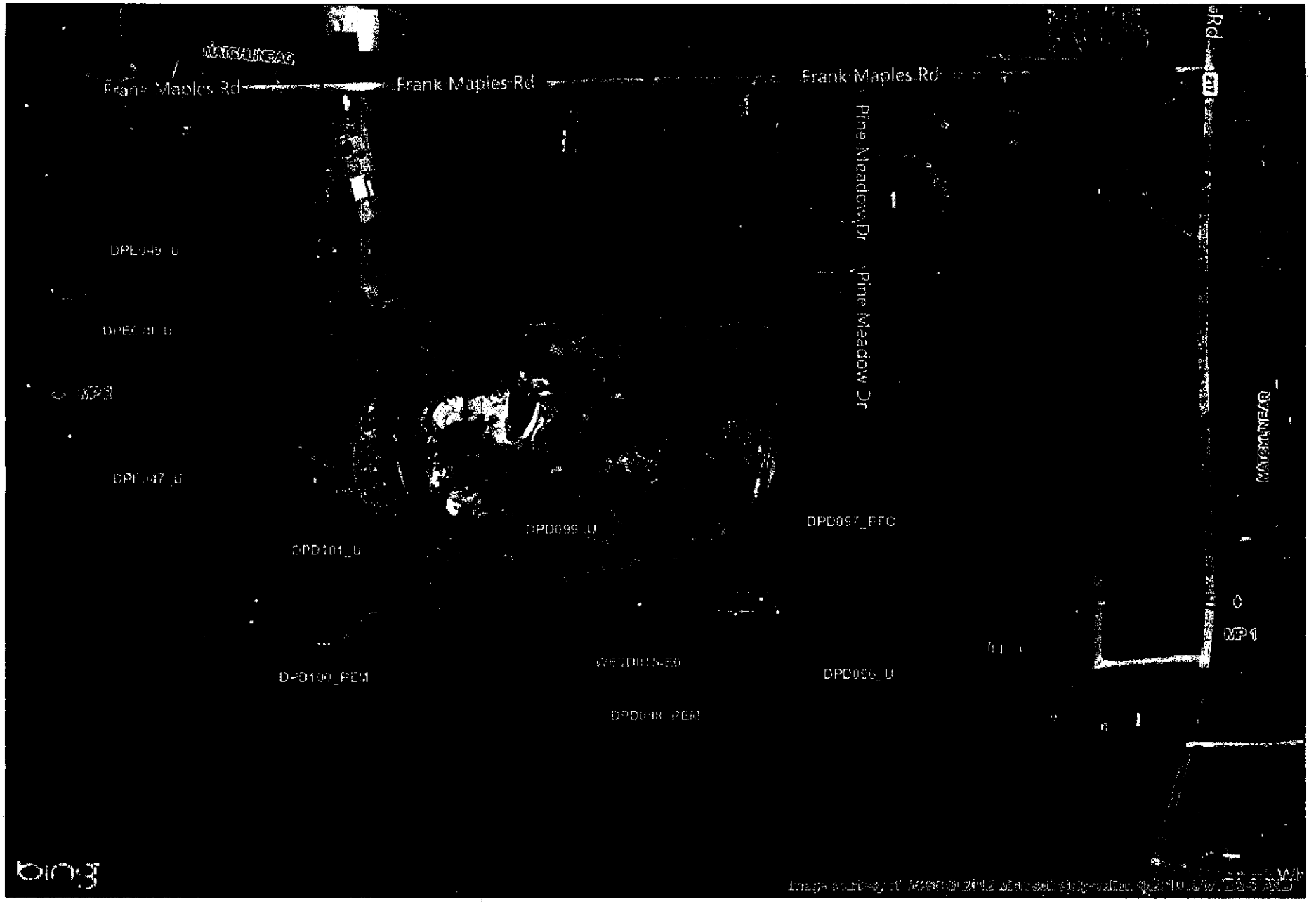
COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22672
Date Produced: 11/28/2012
Revision Date:

0 350 700 Feet

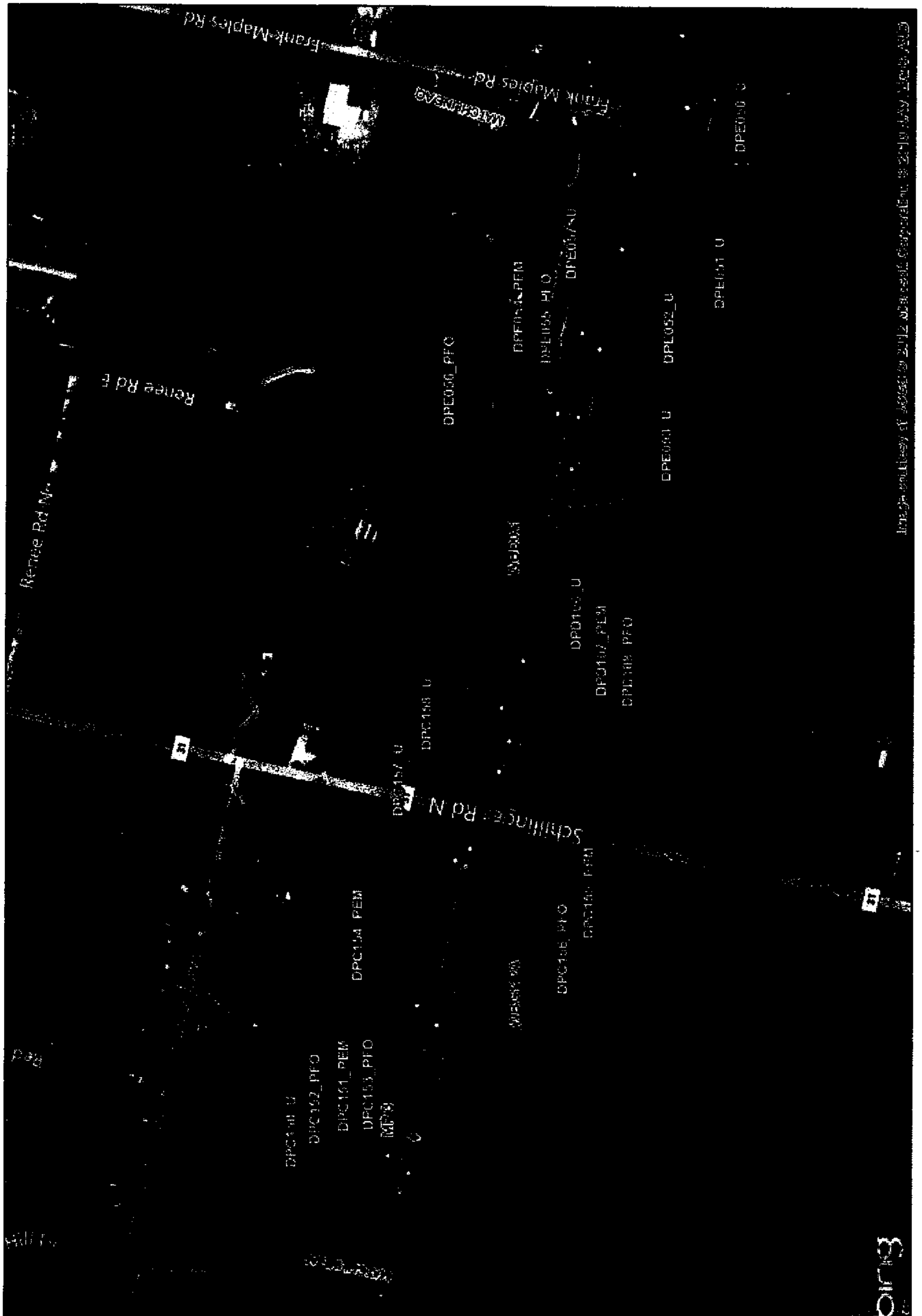
Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

Path: C:\Users\jrandolph\Desktop\My_Projects\22672_Pascagoula_Pipeline\MAPS\mxd\Report Maps\Delineation 3 11282012\Plan Views 11282012.mxd



SWCA ENVIRONMENTAL CONSULTANTS Sheet 4 of 47	**PLAINS SOUTHCAP L.L.C.** **WETLAND DELINEATION MAP** **41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT** **MOBILE COUNTY, AL**	Centerline Mileposts Sample Point PEM PFO Delineation Boundary	COMMENT: USACE MOBILE DISTRICT	Background: Bing Maps Hybrid (2012) Mapper: JR Approved By: Preliminary Draft SWCA Project No: 22503 Date Produced: 11/28/2012 Revision Date:

Path: C:\Users\jrosales\Desktop\My_Projects\22503_Pascagoula_PipelineMAPS\mxd\Report Maps\Delineation 3 11282012\Plan View 11282012.mxd



Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22832
Date Produced: 11/28/2012
Revision Date:

0 250 500 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Foot US

COMMENT:
USACE MOBILE DISTRICT

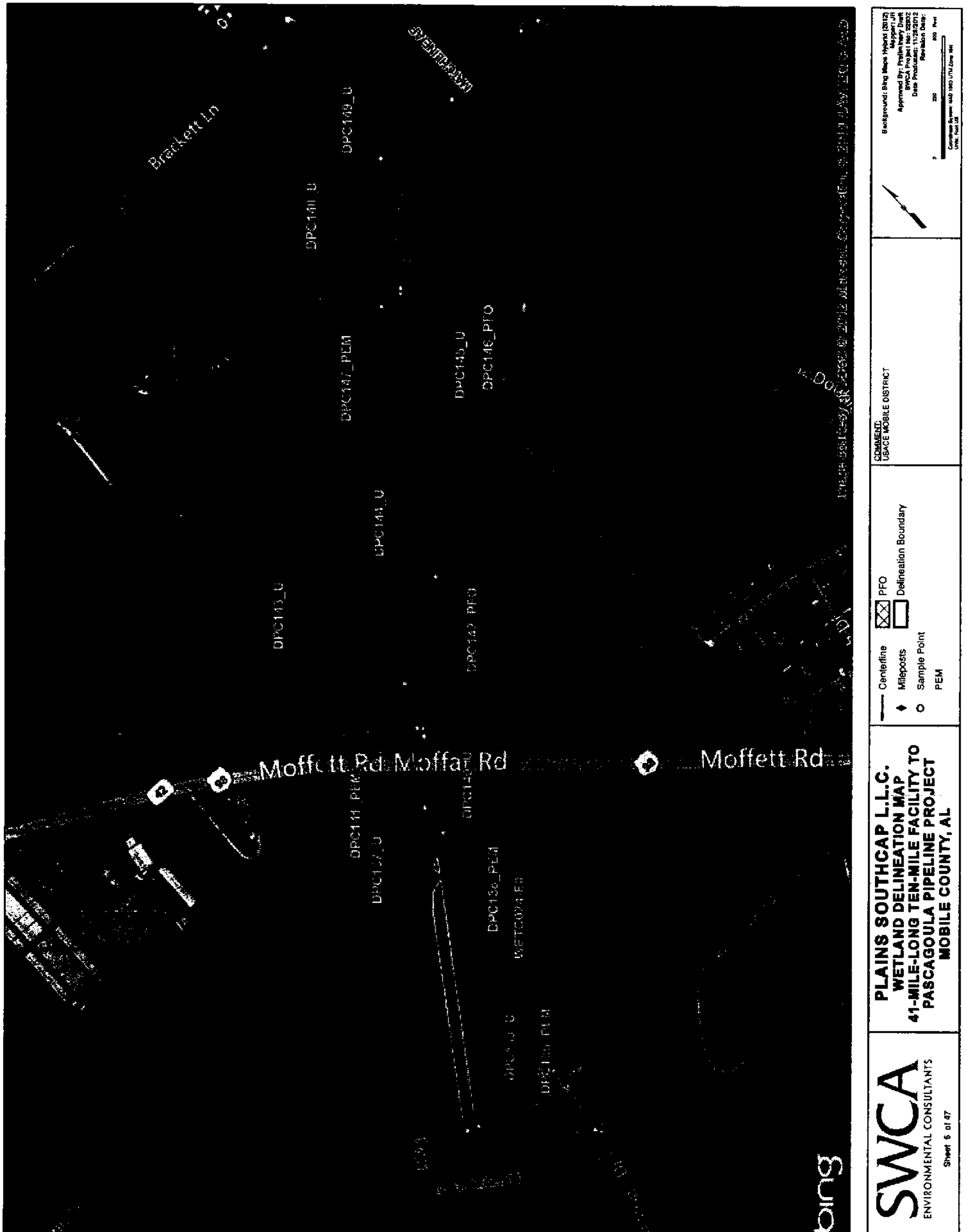
- Centerline
- Mileposts
- Sample Point
- Perennial
- PFO
- Delineation Boundary

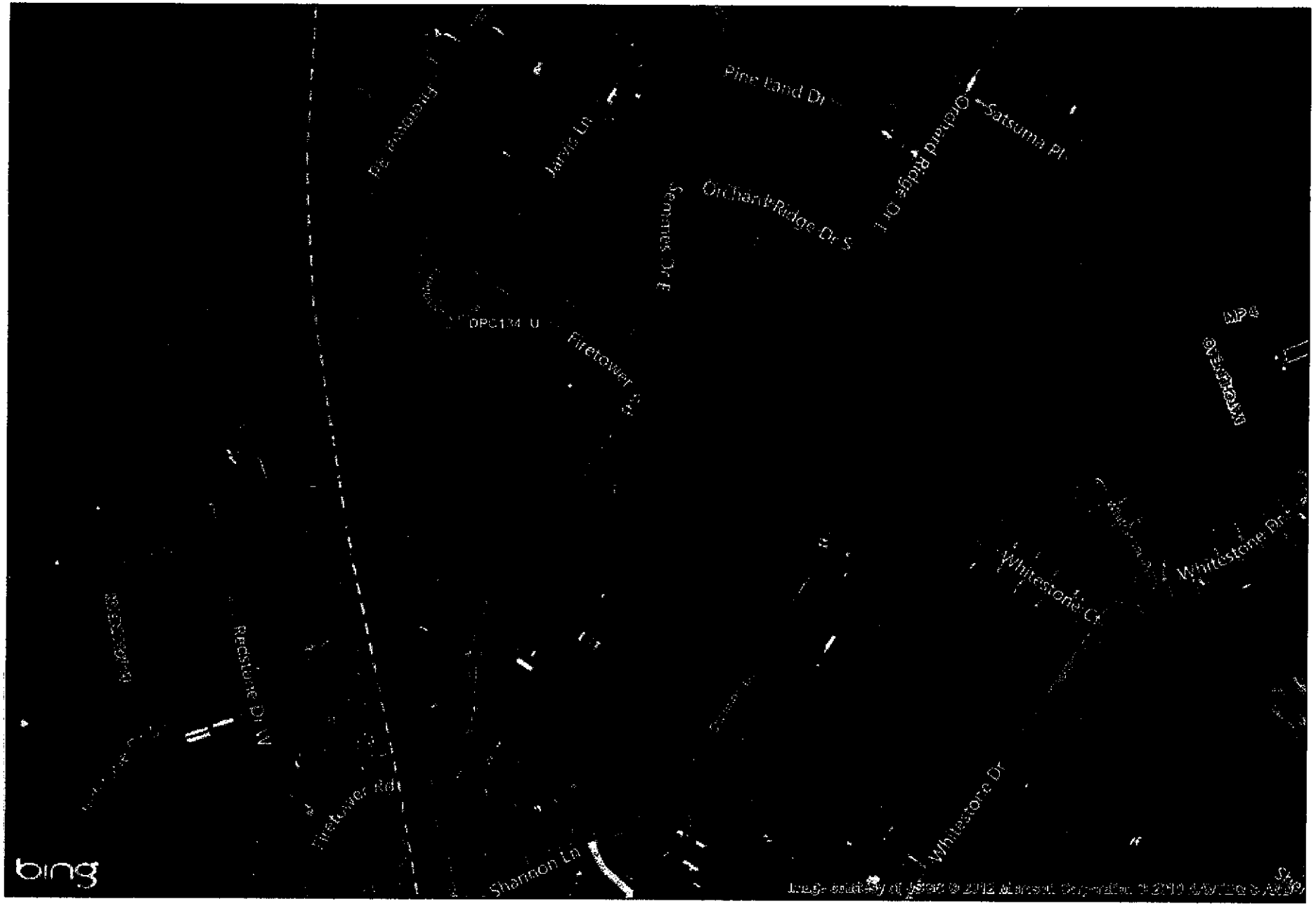
PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

SWCA
ENVIRONMENTAL CONSULTANTS

Sheet 5 of 47

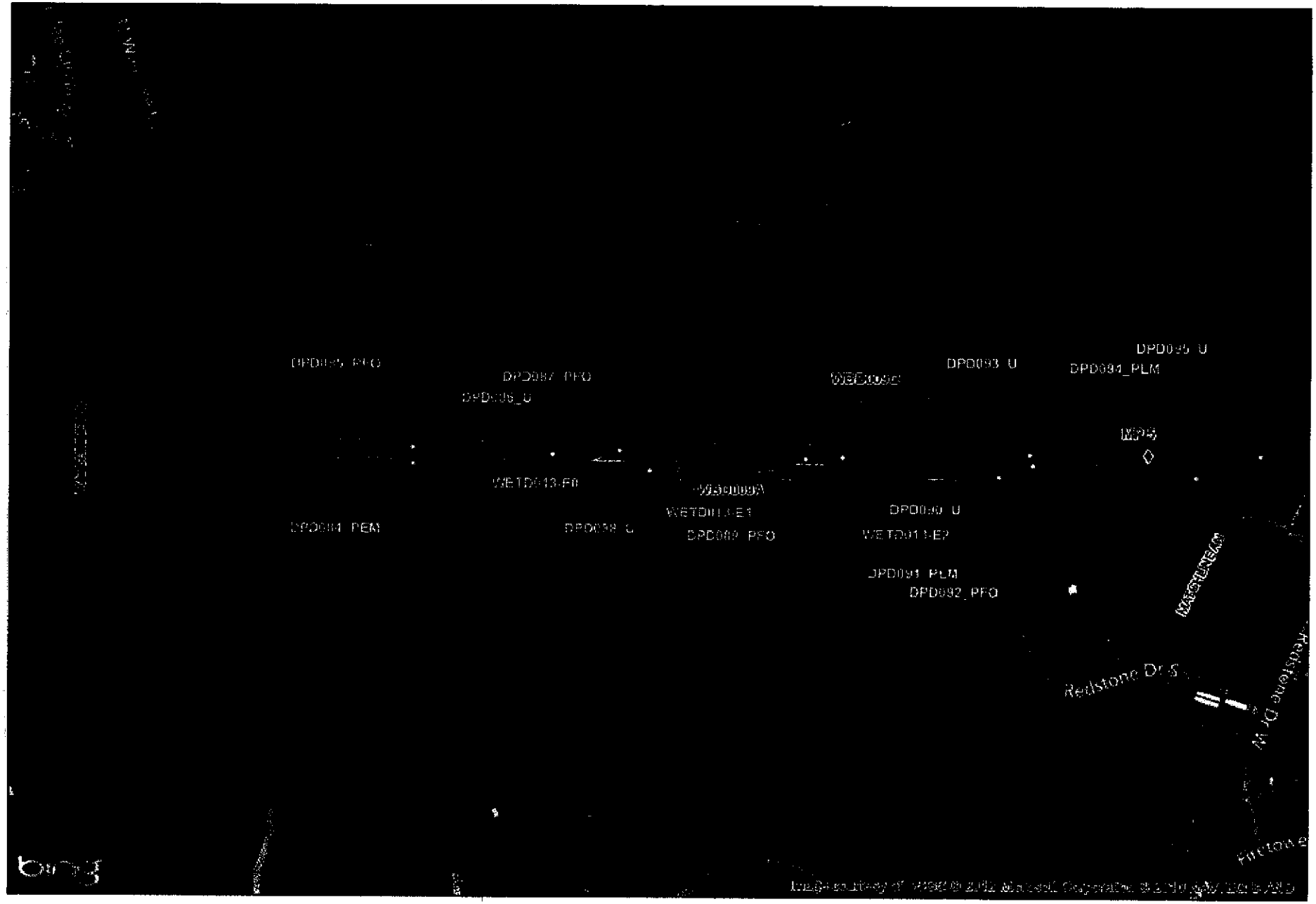
AS REQUIRED BY THE FREEDOM OF INFORMAITON ACT (FOIA) THIS FILE IS BEING MADE AVAILABLE ONLINE BECAUSE THE MOBILE DISTRICT FOIA OFFICE HAS RECEIVED MORE THAN THREE (3) REQUESTS FOR SAME. ANY QUESTIONS ABOUT THE FOIA PROCESS MUST BE DIRECTED TO OUR FOIA OFFICE. FOIA-SAM@usace.army.mil





SWCA ENVIRONMENTAL CONSULTANTS Sheet 7 of 47	**PLAINS SOUTHCAP L.L.C.** **WETLAND DELINEATION MAP** **41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT** **MOBILE COUNTY, AL**	Centerline Mileposts Sample Point Pond PEM Delineation Boundary	COMMENT: USACE MOBILE DISTRICT	Background: Bing Maps Hybrid (2013) Mapper: JR Approved By: Preliminary Draft SWCA Project No: 22932 Date Produced: 11/28/2012 Revision Date:

Path: C:\Users\jrobertson\Desktop\My_Projects\22932_Pascagoula_Pipeline\MAPS\mxd\Report Maps\Delineation 3 11282012\Plan Views 11282012.mxd



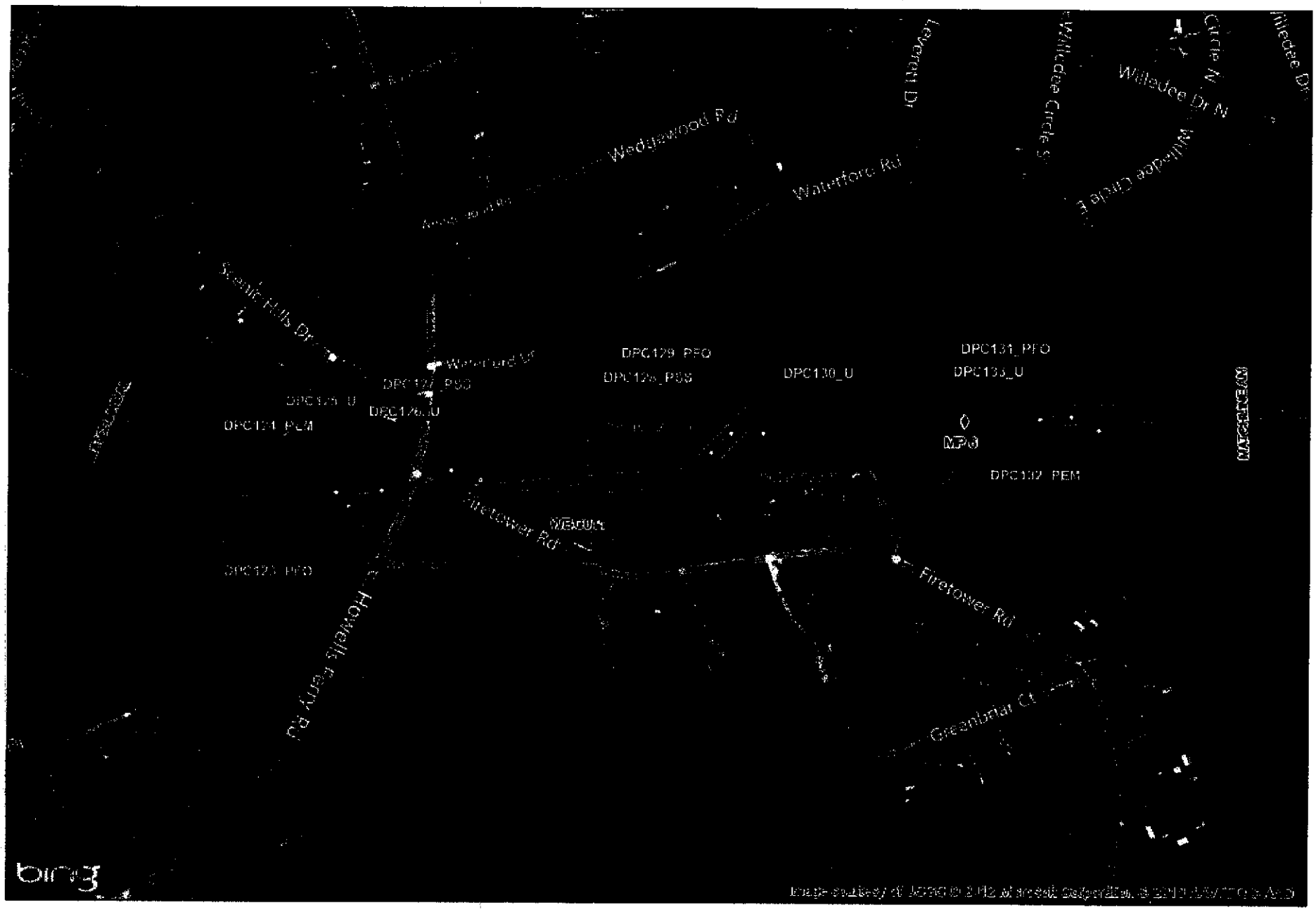
SWCA ENVIRONMENTAL CONSULTANTS Sheet 8 of 47	**PLAINS SOUTHCAP L.L.C.** **WETLAND DELINEATION MAP** **41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT** **MOBILE COUNTY, AL**	Centerline Mileposts Sample Point Perennial Pond PEM PFO Delineation Boundary	COMMENT: USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22832
Date Produced: 11/28/2012
Revision Date:

0 250 500 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Foot US

Path: C:\Users\jrobb\Desktop\My_Projects\22832_Pascagoula_Pipeline\MAPS\mxd\Report Maps\Delineation 3 11282012\Plan Views 11282012.mxd



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 9 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Mileposts
Sample Point
Perennial
PEM
PFO
PSS
Delineation Boundary

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22532
Date Produced: 11/29/2012
Revision Date:

0 250 500 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

Path: C:\Users\jrobbins\Desktop\My_Projects\22532_Pascagoula_Pipeline\MAPS\mxd\Report Maps\Delineation 3 11282012\2Plan Views 11282012.mxd

SWCA ENVIRONMENTAL CONSULTANTS

Sheet 10 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Mileposts
Sample Point
Ephemeral
PEM
PFO
Delineation Boundary

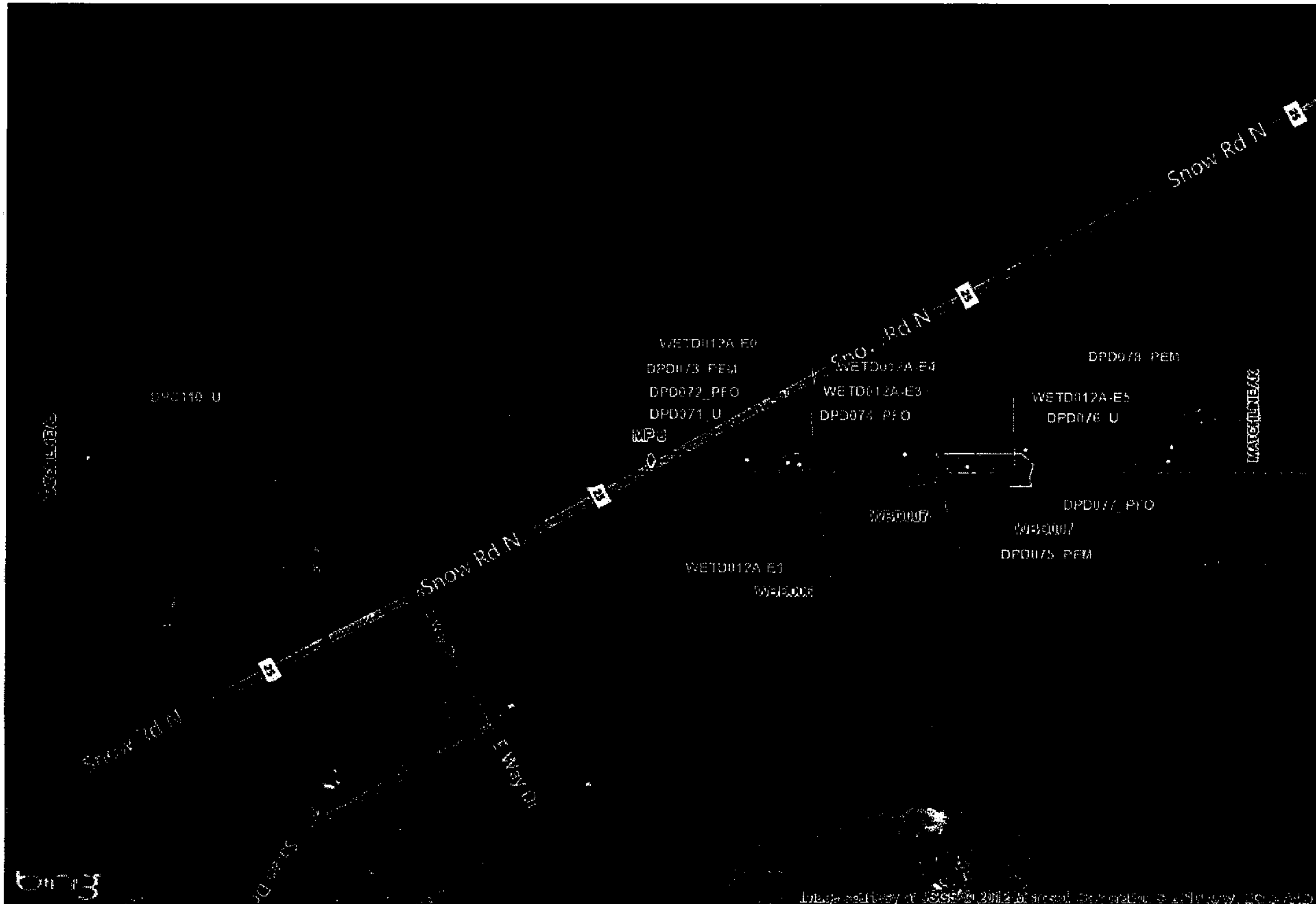
COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 11/28/2012
Revision Date:

0 250 500 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Foot US

Path: G:\projects\docs\Desktop\My_Projects\22932_Pascagoula_Pipeline\MAPS\ReportMaps\Delineation 3 11282012\Plan Views 11282012.mxd



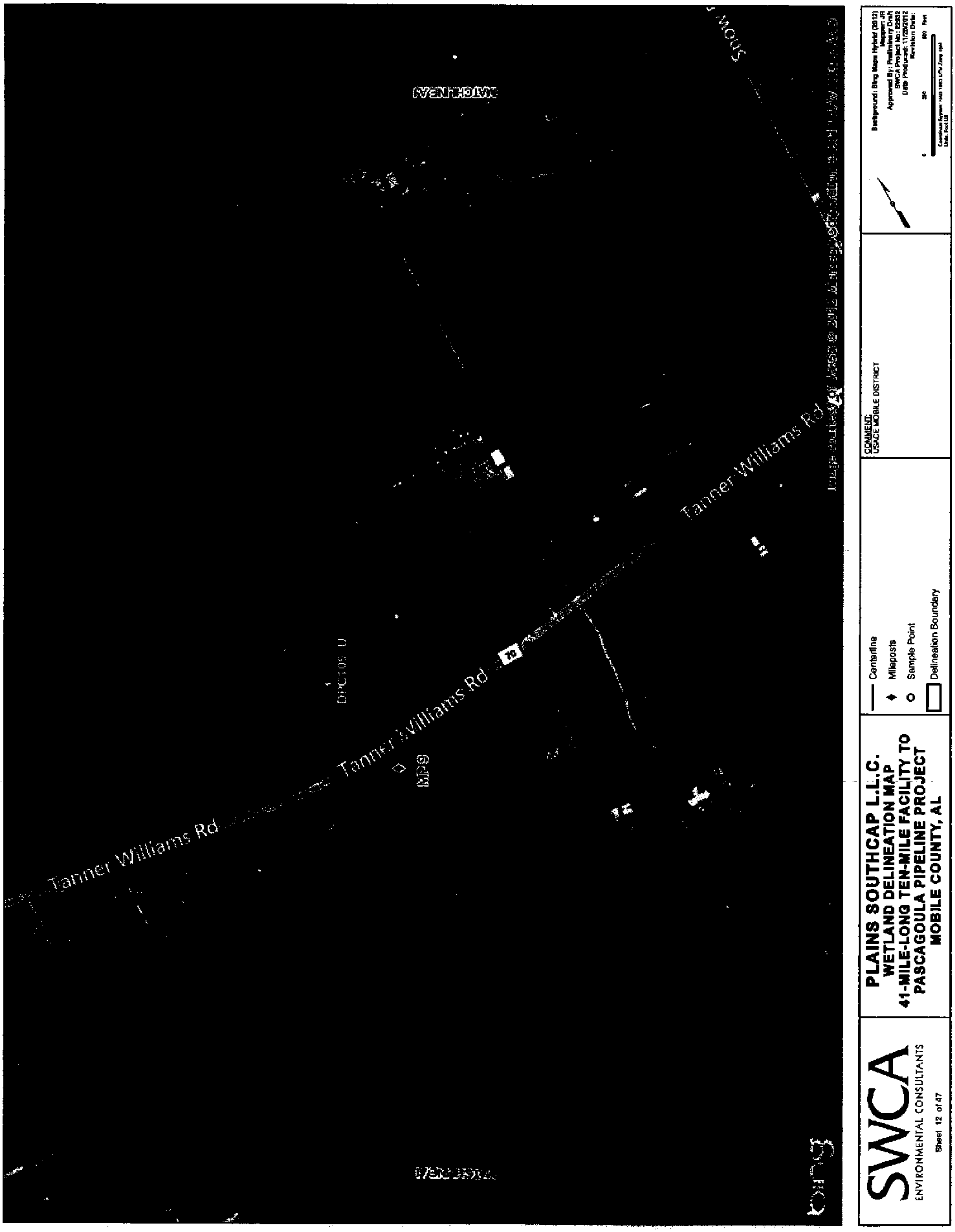
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 11 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Mileposts
Sample Point
Perennial
Intermittent
PEM
PFO
Delineation Boundary

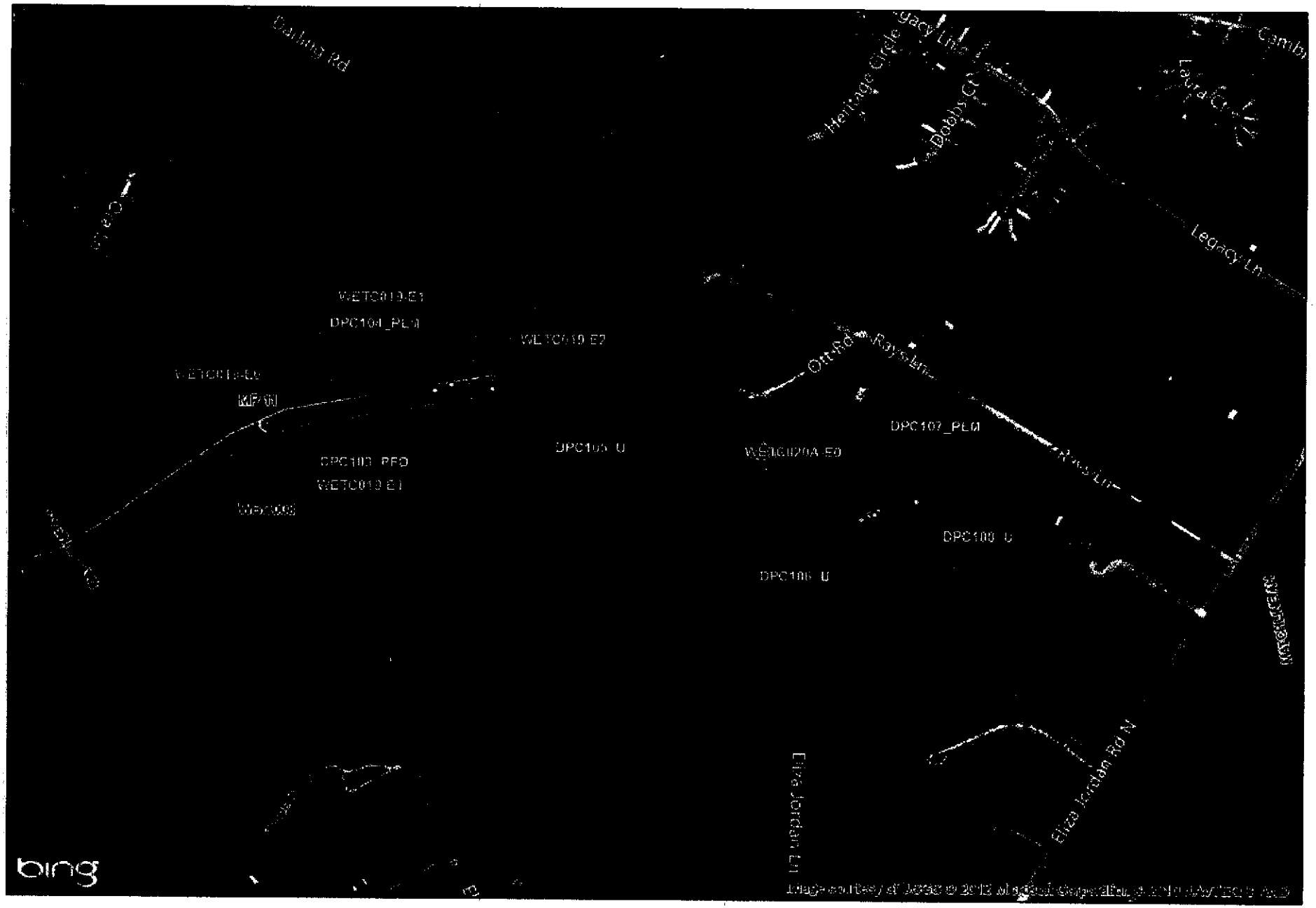
COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 11/28/2012
Revision Date:



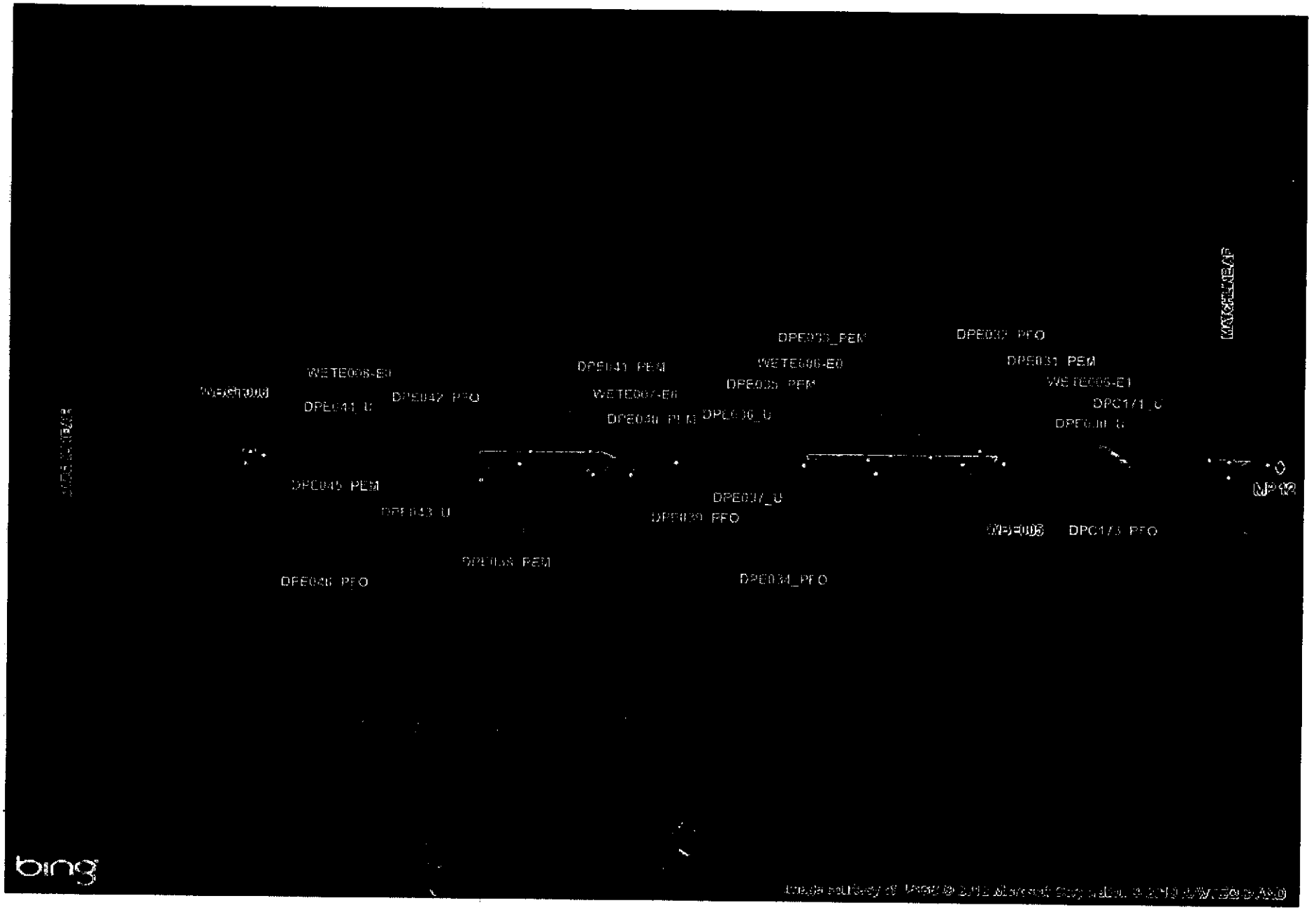
SWCA ENVIRONMENTAL CONSULTANTS Sheet 13 of 47	**PLAINS SOUTHCAP L.L.C.** **WETLAND DELINEATION MAP** **41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT** **MOBILE COUNTY, AL**	Centerline Delineation Boundary Mileposts Sample Point PEM	COMMENT: USACE MOBILE DISTRICT	Background: Bing Maps Hybrid (2012) Mapper: JR Approved By: Preliminary Draft SWCA Project No. 22692 Date Produced: 11/29/2012 Revision Date: 0 250 500 Feet Coordinate System: NAD 1983 UTM Zone 16N Units: Feet US

Path: C:\Users\jrouleau\Desktop\My_Projects\22692_Pascagoula_Pipeline\MAPS\mxds\Report Maps\Delineation 3 11282012\Plan Views 11282012.mxd



SWCA ENVIRONMENTAL CONSULTANTS Sheet 14 of 47	**PLAINS SOUTHCAP L.L.C.** **WETLAND DELINEATION MAP** **41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT** **MOBILE COUNTY, AL**	Centerline Mileposts Sample Point Perennial Intermittent PEM PFO Delineation Boundary	COMMENT: USACE MOBILE DISTRICT	Background: Bing Maps Hybrid (2012) Mapper: JR Approved By: Preliminary Draft SWCA Project No.: 22832 Date Produced: 11/28/2012 Revision Date: 0 250 500 Feet Coordinate System: NAD 1983 UTM Zone 16N Units: Feet US

Path: C:\Users\jrobb\Desktop\My_Projects\22832_Pascagoula_Pipeline\MXD\Report Maps\Delineation 3 11282012\Plan Views 11282012.mxd



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 16 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

- Centerline
- Mileposts
- Sample Point
- Perennial
- Ephemeral
- PEM
- PFO
- Delineation Boundary

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 11/28/2012
Revision Date:

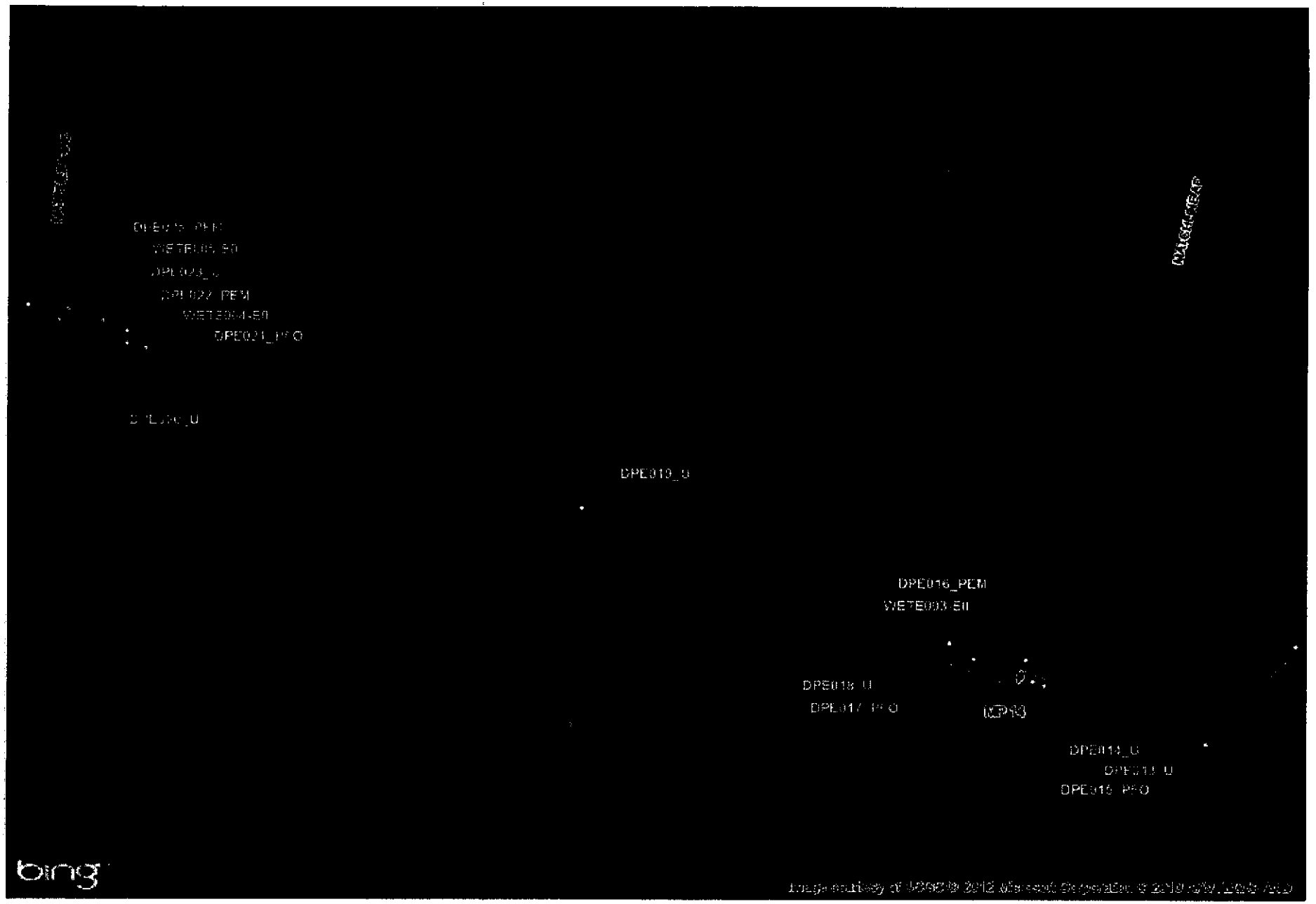
0 200 400 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Foot US

Path: C:\Users\rjones\Desktop\My_Projects\22932_Pascagoula_Pipeline\MXD\Report Maps\Delineation 3 11282012\Plan Views 11282012.mxd

SWCA ENVIRONMENTAL CONSULTANTS Sheet 17 of 47	**PLAINS SOUTHCAP L.L.C.** **WETLAND DELINEATION MAP** **41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT** **MOBILE COUNTY, AL**	Centerline; Mileposts; Sample Point; Perennial; PFO; Delineation Boundary	COMMENT: USACE MOBILE DISTRICT	Background: Bing Maps Hybrid (2012) Mapper: JR Approved By: Preliminary Draft SWCA Project No: 22932 Date Produced: 11/29/2012 Revision Date:

Path: C:\Users\rstokes\Desktop\My_Projects\22932_Pascagoula_Pipeline\MAPS\mxd\Report Maps\Delineation 3 11292012\Plan View 11292012.mxd



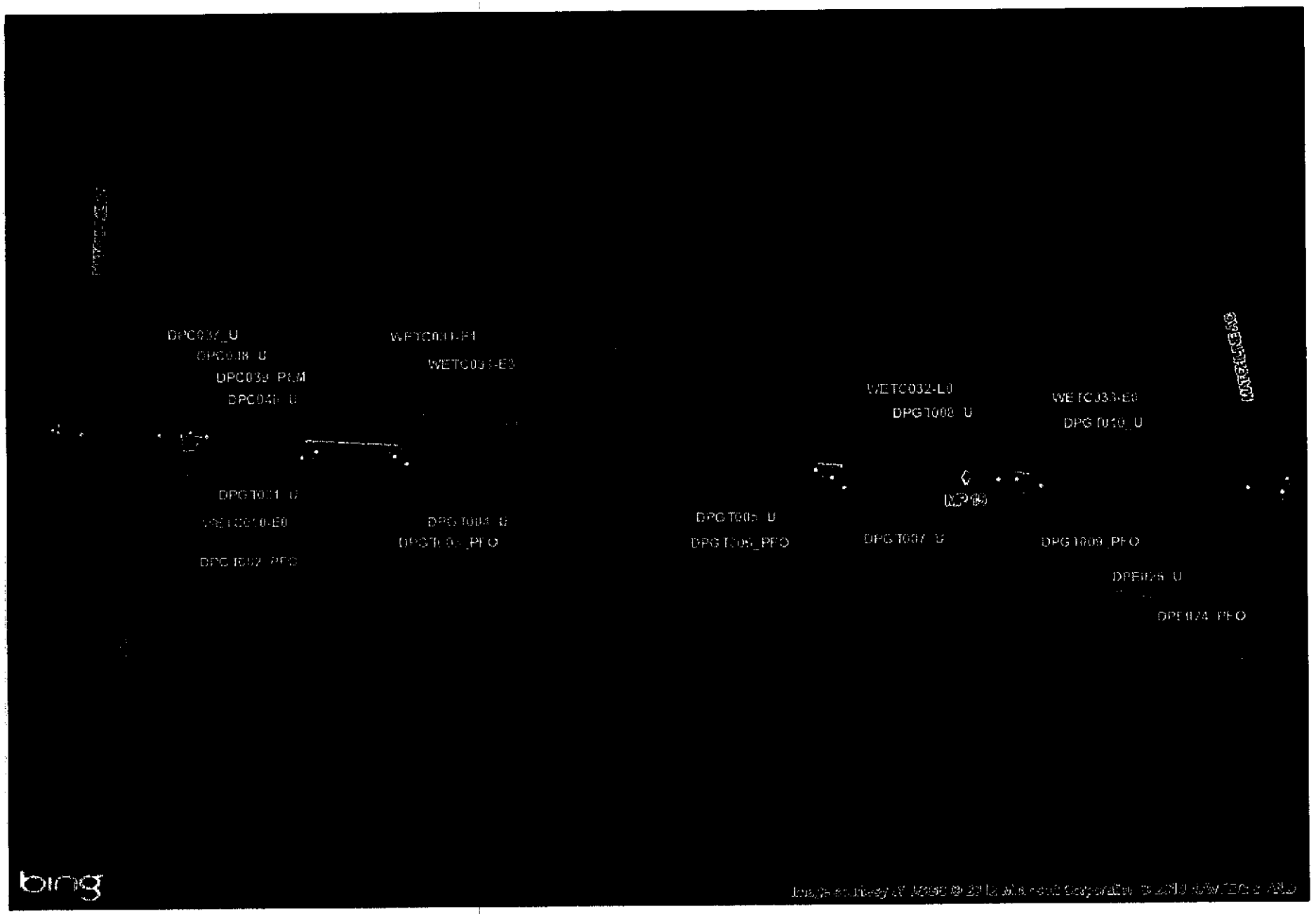
SWCA ENVIRONMENTAL CONSULTANTS Sheet 18 of 47	**PLAINS SOUTHCAP L.L.C.** **WETLAND DELINEATION MAP** **41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT** **MOBILE COUNTY, AL**	Centerline Mileposts Sample Point Perennial PEM PFO Delineation Boundary	COMMENT: USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 11/28/2012
Revision Date:

0 250 500 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

Path: C:\Users\jrdallis\Desktop\My_Projects\22932_Pascagoula_Pipeline\MAPS\mxd\Recon Maps\Delineation 3 11282012\Plan Views 11282012.mxd



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 19 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

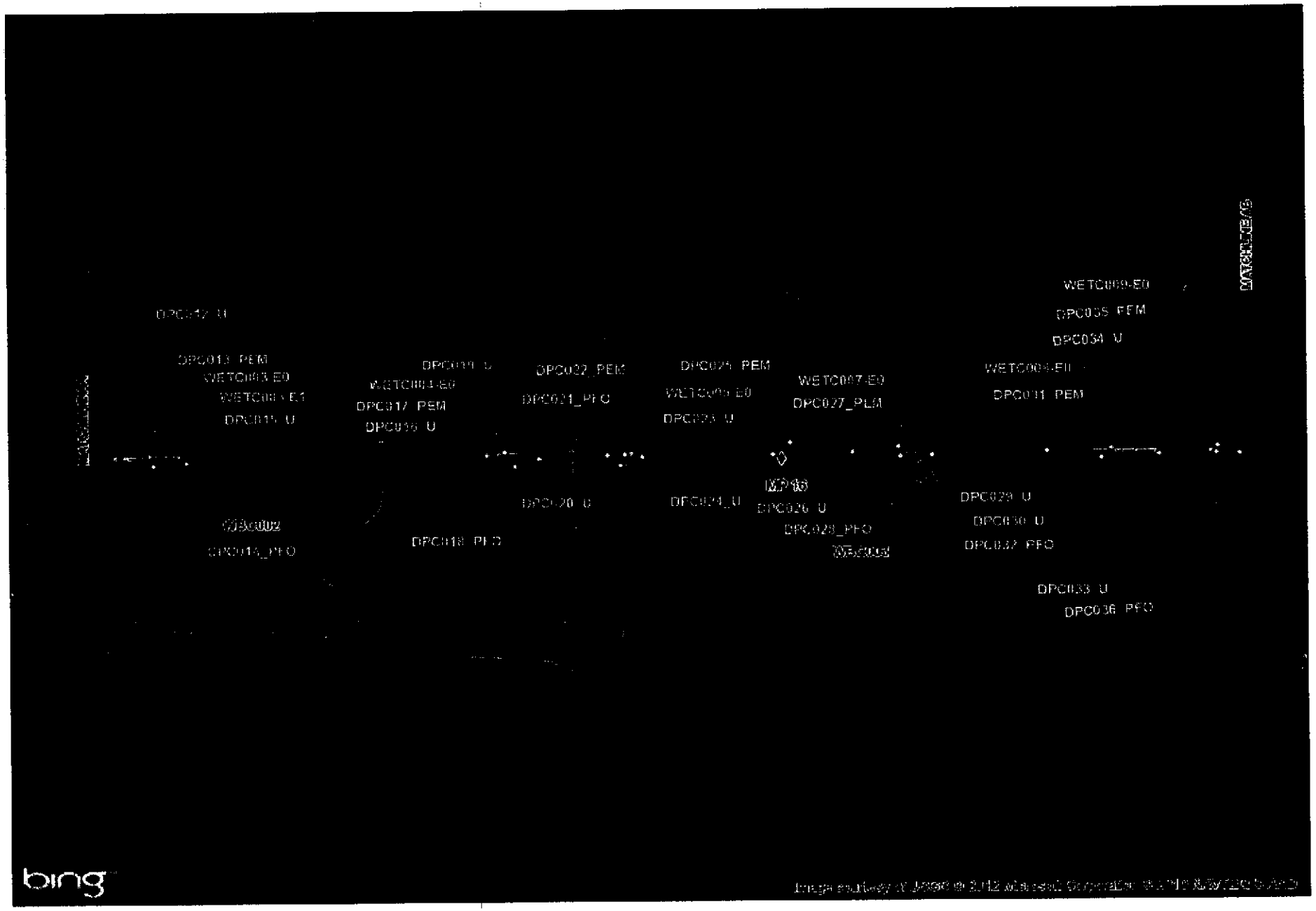
Centerline
Mileposts
Sample Point
Intermittent
PEM
PFO
Delineation Boundary

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2013)
Mapper: JR
Approved By: Preliminary Desk
SWCA Project No: 22932
Date Produced: 11/28/2012
Revision Date:

Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

Path: C:\Users\jrobbs\Desktop\My_Projects\22932_Pascagoula_Pipeline\MAPS\mxd\Report Maps\Delineation 3 11282012\Plan Views 11282012.mxd



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 20 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Mileposts
Sample Point
Perennial
PEM
PFO
Delineation Boundary

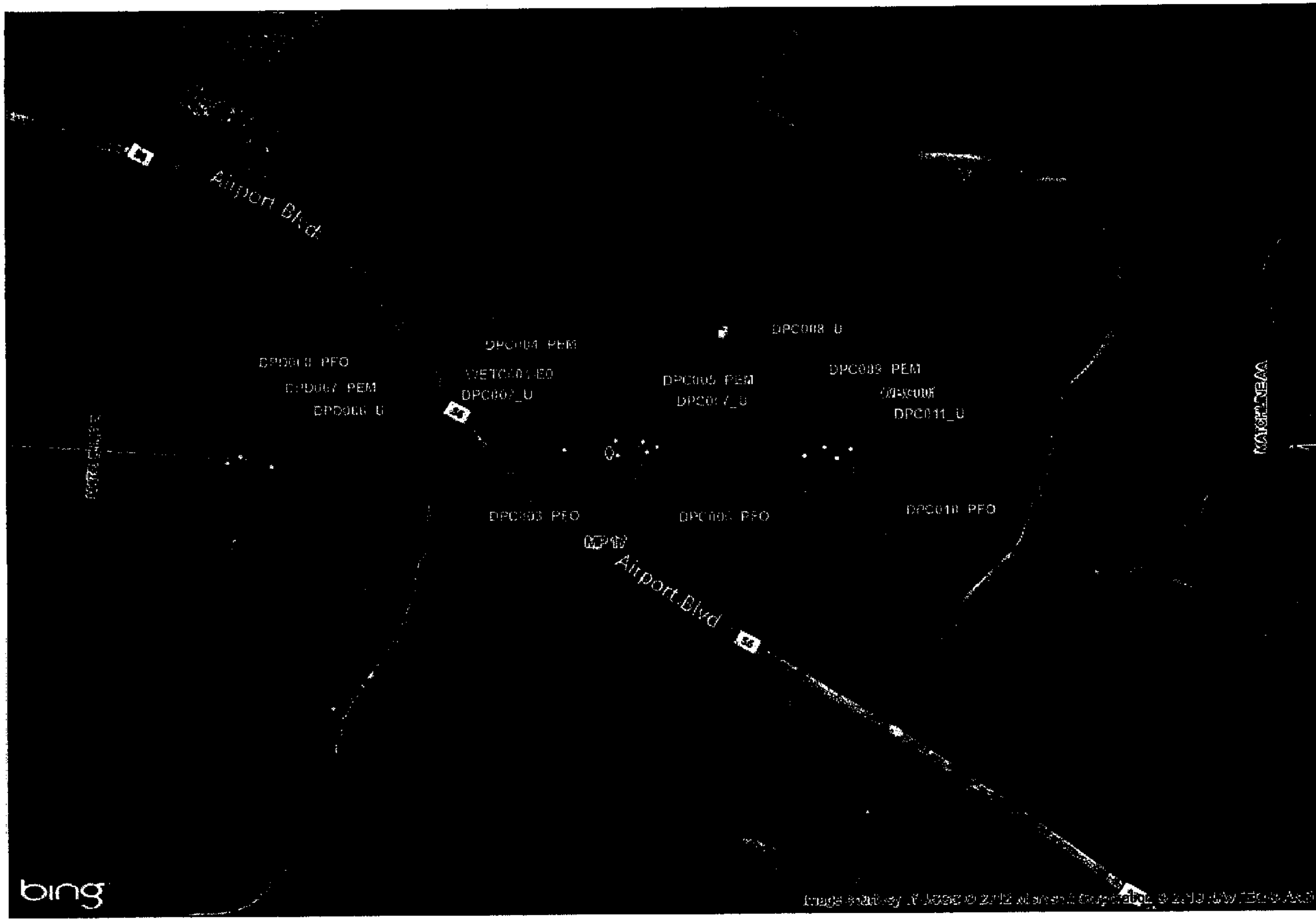
COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 32932
Date Produced: 11/28/2012
Revision Date:

0 350 700 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

Path: C:\Users\jrazdan\Desktop\My_Projects\32932_Pascagoula_Pipeline\MAPS\mxd\Report Maps\Delineation 3 11283112\Plan Views 11283012.mxd



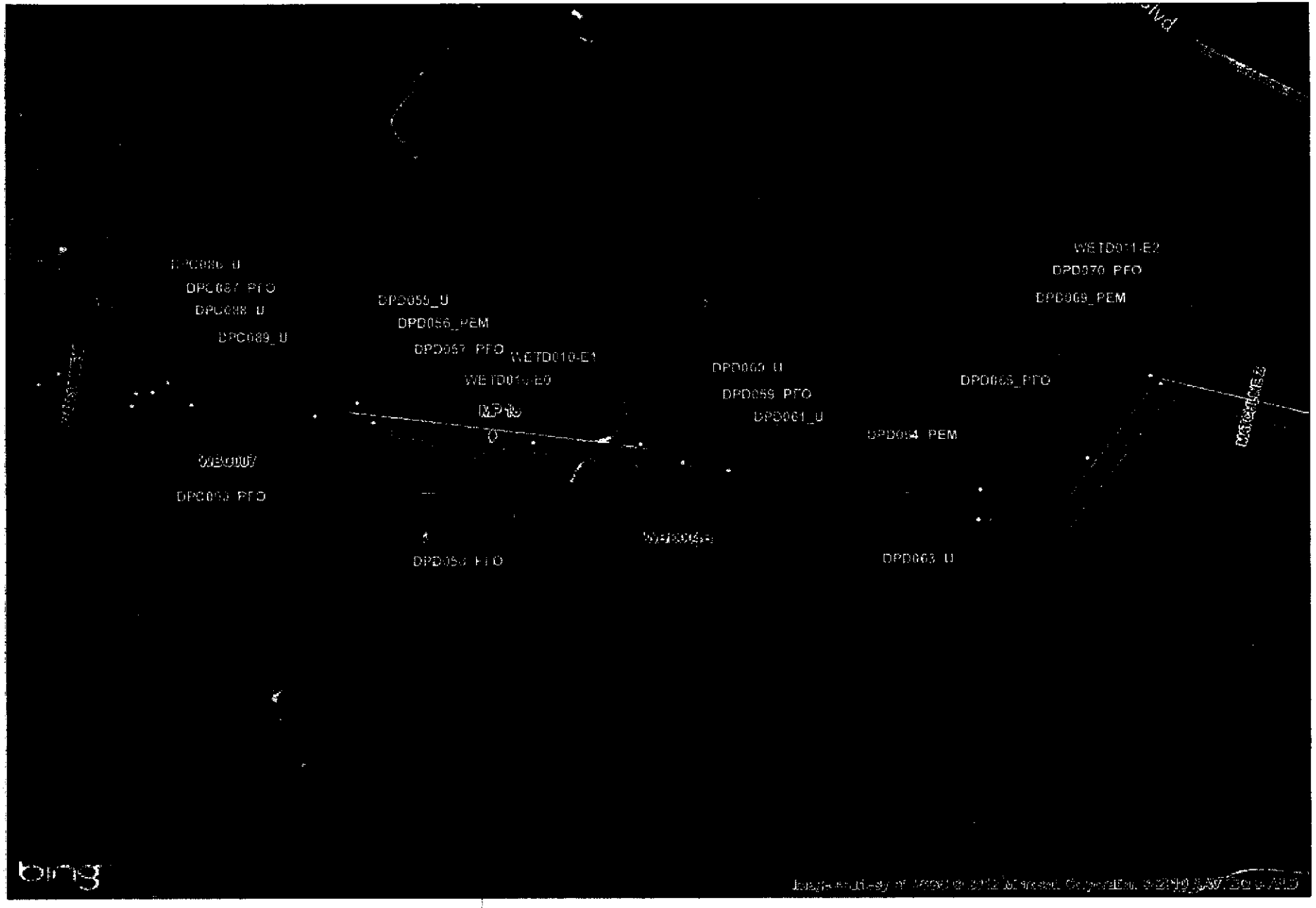
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 21 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Mileposts
Sample Point
Perennial
PEM
PFO
Delineation Boundary

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22532
Date Produced: 11/28/2012
Revision Date:



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 22 of 47

PLAINS SOUTHCAP L.L.C.
WETLAND DELINEATION MAP
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Mileposts
Sample Point
Perennial
Intermittent
Pond
PEM
PFO
Delineation Boundary

COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 11/28/2012
Revision Date:

Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

Path: C:\Users\rbolan\Dropbox\My_Projects\22932_Pascagoula_Pipeline\MAP Shared\Report Maps\Delineation 3 11282012\APlan Views 11282012.mxd

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Wednesday, November 28, 2012 10:41 AM
To: 'Eric Munscher'
Subject: RE: Plains SouthCap Pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Thanks for the quick response. I spoke with Jeremy this morning and he informed me that the information and field data we currently have has been updated and replaced. It is my understanding the corrected information will be provided to us in the near future.

Jeremy mentioned that the previous data reflected all wetlands and streams within the 200-foot corridor that your firm traditionally surveys for the applicant. I mentioned that our evaluation is limited to our federal permit areas, which are wetlands and streams in the 75-foot wide pipeline corridor that will subject to regulated impacts (ditching and clearing), and any actions requiring a Section 10 permit. Please note that directional drilling where there are no impacts to 404 wetlands or streams (complete avoidance) is a non-regulated activity. This is important the provided data and worksheets address only regulated actions in federal permit areas that requiring a permit by our program.

I look forward to receiving the most current information and data so that we may continue with our evaluation.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Wednesday, November 28, 2012 8:42 AM
To: Moxey, Michael B SAM
Subject: RE: Plains SouthCap Pipeline (UNCLASSIFIED)

Mike,

I will be in a class all week but will get with my GIS guy who has all of the data to figure this out. His name is Jeremy Rabalais. He has worked on all of the mapping and acreages for impacts and mitigation. We will figure this out as soon as possible.

Thanks,

EM

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Tuesday, November 27, 2012 3:28 PM
To: Moxey, Michael B SAM; Eric Munscher
Subject: RE: Plains SouthCap Pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
I have been reviewing the JD paperwork to get a grasp of the number of entries needed. I have the following questions.
A. Overall
1. There are 262 wetlands and 52 streams, and 7 ponds. Should there be 321 water uploads instead of 311 for the JD?

A. Streams.
1. The overall project summary states there are 7 ponds and 52 streams (6 ephemeral, 13 intermittent, and 33 perennial).
2. Based on the waters upload sheet provided with the JD template, 14 of the streams are named: Little Black Creek, Black Creek - Escatawpa, Escatawpa, Rocky Creek-Escatawpa, Upper Big Creek, Wolf Branch, Double Branch, Big Creek, Hamilton Creek, Red Creek, Chickasaw Creek, Black Creek, Pierce Creek, Pt. Aux Chenes - Mississippi Sound.
3. Based on the waters upload sheet, 7 of the waters of the U.S. are isolated? The impact worksheet only showed 5 ponds being directional bored under. I assume the other two ponds are also being directional bored to allow for the use of a preliminary JD form?
4. The impact worksheet reflects 106 stream crossings and 5 ponds being directional boring actions. Are the same streams being crossed multiple times?

B. Wetlands

1. In the overall project summary, there are 262 wetland areas (109 PEM, 22 PSS, 129 PFO, 2 EEM). Based on the number of actions on the impact worksheet, are we to assume a wetland area the same as a single water of the U.S.? If it is a single water of the U.S., then should the JD form reflect 262 water uploads for the wetlands, and 321 total entries (including 52 streams and 5 ponds)?
2. The impact worksheet reflects 568 actions occurring in streams, ponds, and wetlands. These actions include including directional boring under 105 streams (Double Branch correctly listed as a wetland on the first page?), 5 ponds, and 38 wetlands. The worksheet reflects 288 wetland conversions, and undefined "work" being performed in an additional 132 wetland areas. I assume the other 2 ponds need to be added to the worksheet? Based on these numbers, you would be directionally boring under the same streams at multiple locations, and crossing the same wetland areas numerous times?
3. Do we have wetland delineations for all the impacted (conversion and "work") wetland areas not being directionally bored (approximately 420 of them based on this worksheet)

Any help would be greatly appreciated. Please let me know if I should be sending these e-mails to someone else. I do not have Mr. Sankey's e-mail.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Tuesday, November 27, 2012 10:35 AM
To: Eric Munscher
Cc: Moxey, Michael B SAM
Subject: Plains SouthCap Pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
I have been reviewing the information provided to clarify the next steps forward for this 41-mile pipeline project. Based on my review, the following summarizes what I believe is still needed to issue the 2 permits (Alabama: SAM-2012-885-MBM, and Mississippi:SAM-2012-1165-MBM). There was a lot of information so please let me know if any of this information is already provided and I may have missed it.

1.Need to develop the wetland delineation verification letter that will be good for both projects. Need to visit 3 easily accessible sites to verify flagged wetland/upland line.

2.Need to develop preliminary JD verification documents. Need to verify Waters of U.S. worksheet contains all single waters of U.S. (but not same water multiple times).

3. Need mitigation worksheet, identifying all impacts for each "single water of the U.S" that will be each separate nationwide permits for each "single and complete project".

4. Check to see if Mississippi SHPO letter was obtained.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Friday, November 02, 2012 9:45 AM
To: Moxey, Michael B SAM
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Mr. Moxey,

Attached you will find the Aquatic Resource and Impact tables for the Pascagoula project broken down by state. The mitigation table and plan will follow shortly. Please let us know if you have any questions. Copies of these tables have already been sent to Pauline.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)
Herpetologist / Ecologist
Certified Gopher Tortoise Agent
Principal Investigator of the CFFTRG
SWCA Environmental Consultants
7255 Langtry Suite, 100
Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Wednesday, October 24, 2012 11:00 AM
To: Moxey, Michael B SAM; Eric Munscher
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
I have also attached the data forms we use when downloading large numbers of waters of U.S. into our database. I remember seeing datasheets on the CD's you provided, however I am not sure if these were the ones provided?

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Wednesday, October 24, 2012 10:55 AM
To: 'Eric Munscher'
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Attached are our spreadsheets we use for pipeline projects. You will note along the first column that we issue multiple nationwide 12 permits in our letter, based on single and complete project definition, and that we use the pipeline conversions ratios for mitigation in the right columns. I have attached the pipeline mitigation ratio worksheet also.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Wednesday, October 24, 2012 9:13 AM
To: Moxey, Michael B SAM
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Mr. Moxey,

Can you send me the mitigation spredsheets for wetland impacts.

Thanks and cheers,

EM

Eric C. Munscher, M.S.
Ecologist / Herpetologist
7255 Langtry, Suite 100
Houston, Texas 77040
Phone: 717-676-8497

Sound Science. Creative Solutions. (r)
www.swca.com <http://www.swca.com/>
<http://www.swca.com/>

From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Mon 8/27/2012 7:40 AM
To: Eric Munscher
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Using the definition in the Nationwide permits for "Single and Complete Project", long pipeline projects can usually be authorized by multiple nationwide permits (using one permit number). If any single component exceeds the 0.5 acre thresh hold and must go IP, then the whole project will go IP. Attached is the worksheet we attach to the permit if we can use multiple nationwide permits.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Monday, August 27, 2012 9:22 AM
To: Moxey, Michael B SAM
Subject: Spread sheet for U.S. Waterbodys

Mr. Moxey,

During our July meeting concerning the Plains Southcap, LLC Pascagoula pipeline project you had mentioned that we need to use a spread sheet that describes waterbody information throughout the entire project line. Could you please send me this table so I can include it in our permit applications.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)

Herpetologist / Ecologist

Certified Gopher Tortoise Agent

Principal Investigator of the CFFTRG

SWCA Environmental Consultants

7255 Langtry Suite, 100

Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

cid:3401782132_144728300

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED

Alabama Aquatic Resource

Waters_Name	Cowardin_Code	HGM_Code	Meas_Type	Amount	Units	Waters_Type	Latitude	Longitude	Local_Waterway
WBG005	R4	RIVERINE	AREA	0.016445	ACRE	RPW	-88.210302	30.794895	Chickasaw Creek
WETD015-F0	PFO	RIVERINE	AREA	0.89531	ACRE	NRPWW	-88.210388	30.783947	Chickasaw Creek
WETD015-E0	PEM	RIVERINE	AREA	0.489713	ACRE	NRPWW	-88.210156	30.783799	Chickasaw Creek
WETD016-E0	PEM	RIVERINE	AREA	0.091577	ACRE	NRPWW	-88.210106	30.778756	Chickasaw Creek
WBC112B	R5	RIVERINE	AREA	0.012339	ACRE	RPW	-88.226265	30.777217	Double Branch
WETC027-E0	PEM	RIVERINE	AREA	1.466567	ACRE	RPWWD	-88.227931	30.777143	Chickasaw Creek
WETE009-E1	PEM	RIVERINE	AREA	0.487565	ACRE	RPWWD	-88.220972	30.777014	Chickasaw Creek
WETE009-E0	PEM	RIVERINE	AREA	0.259083	ACRE	RPWWD	-88.221691	30.777007	Chickasaw Creek
WETD018-E0	PEM	RIVERINE	AREA	0.462034	ACRE	RPWWN	-88.224506	30.777002	Chickasaw Creek
WBC112A	R5	RIVERINE	AREA	0.144441	ACRE	RPW	-88.226859	30.776981	Double Branch
WETC027-F0	PFO	RIVERINE	AREA	4.585798	ACRE	RPWWD	-88.228398	30.776874	Chickasaw Creek
WBD011	R5	RIVERINE	AREA	0.025604	ACRE	RPW	-88.221506	30.776844	Chickasaw Creek
WETD018-F0	PFO	RIVERINE	AREA	0.21714	ACRE	RPWWN	-88.224728	30.776752	Chickasaw Creek
WETE009-F1	PFO	RIVERINE	AREA	1.155349	ACRE	RPWWD	-88.220898	30.776724	Chickasaw Creek
WETE009-F0	PFO	RIVERINE	AREA	0.509074	ACRE	RPWWD	-88.22185	30.776721	Chickasaw Creek
WETC026-E0	PEM	RIVERINE	AREA	0.397334	ACRE	NRPWW	-88.233774	30.776212	Chickasaw Creek
WETC026-F0	PFO	RIVERINE	AREA	1.536409	ACRE	NRPWW	-88.233455	30.776133	Chickasaw Creek
WETC025-F0	PFO	RIVERINE	AREA	0.305326	ACRE	NRPWW	-88.237704	30.772049	Chickasaw Creek
WETC025-E0	PEM	RIVERINE	AREA	0.107317	ACRE	NRPWW	-88.237498	30.771793	Chickasaw Creek
WETC024-E0	PEM	RIVERINE	AREA	4.914225	ACRE	NRPWW	-88.239646	30.769326	Chickasaw Creek
WBC012	POW	DEPRESS	AREA	0.291451	ACRE	ISOLATE	-88.24497	30.763655	Chickasaw Creek
WBG009	POW	DEPRESS	AREA	0.315826	ACRE	ISOLATE	-88.249771	30.760948	Chickasaw Creek
WBD010	POW	DEPRESS	AREA	0.198141	ACRE	ISOLATE	-88.251594	30.759935	Upper Big Creek
WETD014-F0	PFO	RIVERINE	AREA	0.298206	ACRE	RPWWD	-88.252502	30.757697	Upper Big Creek
WETD014-E0	PEM	RIVERINE	AREA	1.034138	ACRE	RPWWD	-88.252336	30.757682	Upper Big Creek
WBD009D	R4	RIVERINE	AREA	0.007416	ACRE	RPW	-88.252598	30.757013	Upper Big Creek
WETD013-E2	PEM	RIVERINE	AREA	0.088152	ACRE	RPWWD	-88.253391	30.755205	Upper Big Creek
WETD013-F4	PFO	RIVERINE	AREA	0.271188	ACRE	RPWWD	-88.253822	30.755175	Upper Big Creek
WBD009C	R5	RIVERINE	AREA	0.02993	ACRE	RPW	-88.253672	30.755055	Upper Big Creek
WETD013-E1	PEM	RIVERINE	AREA	0.121235	ACRE	RPWWD	-88.253589	30.754876	Upper Big Creek
WBD009B	R5	RIVERINE	AREA	0.017824	ACRE	RPW	-88.254234	30.754468	Upper Big Creek
WETD013-F3	PFO	RIVERINE	AREA	0.038259	ACRE	RPWWD	-88.254248	30.754467	Upper Big Creek
WETD013-F2	PFO	RIVERINE	AREA	1.519709	ACRE	RPWWD	-88.254123	30.75427	Upper Big Creek
WBD009A	R5	DEPRESS	AREA	0.051053	ACRE	RPW	-88.254431	30.753782	Upper Big Creek
WETD013-F1	PFO	RIVERINE	AREA	0.684939	ACRE	RPWWD	-88.254607	30.753382	Upper Big Creek
WBD008	POW	DEPRESS	AREA	0.043001	ACRE	ISOLATE	-88.254497	30.75326	Upper Big Creek
WETD013-E0	PEM	RIVERINE	AREA	4.144953	ACRE	RPWWD	-88.255782	30.749765	Upper Big Creek
WETD013-F0	PFO	RIVERINE	AREA	7.978578	ACRE	RPWWN	-88.256467	30.748971	Upper Big Creek
WETC022-F2	PFO	RIVERINE	AREA	0.534549	ACRE	RPWWD	-88.259254	30.742536	Upper Big Creek
WETC022-S1	PSS	RIVERINE	AREA	2.135624	ACRE	RPWWD	-88.259248	30.741389	Upper Big Creek
WETC022-F1	PFO	RIVERINE	AREA	1.433292	ACRE	RPWWD	-88.259071	30.740883	Upper Big Creek
WBC011	R5	RIVERINE	AREA	0.190621	ACRE	RPW	-88.259513	30.740001	Upper Big Creek
WETC022-S0	PSS	RIVERINE	AREA	0.55064	ACRE	RPWWD	-88.259794	30.73983	Upper Big Creek
WETC022-F0	PFO	RIVERINE	AREA	0.126471	ACRE	RPWWD	-88.259569	30.739797	Upper Big Creek
WETC021-F2	PFO	RIVERINE	AREA	6.179398	ACRE	NRPWW	-88.262045	30.736393	Upper Big Creek
WETC021-E1	PEM	RIVERINE	AREA	4.215762	ACRE	NRPWW	-88.262791	30.736114	Upper Big Creek
WETC021-F1	PFO	RIVERINE	AREA	0.770529	ACRE	NRPWW	-88.26501	30.733924	Upper Big Creek
WBC010A	R6	RIVERINE	AREA	0.068935	ACRE	NRPW	-88.265678	30.73353	Upper Big Creek
WETC021-E0	PEM	RIVERINE	AREA	0.443472	ACRE	NRPWW	-88.266833	30.732862	Upper Big Creek
WETC021-F0	PFO	RIVERINE	AREA	1.464876	ACRE	NRPWW	-88.266637	30.732632	Upper Big Creek
WETD012B-E1	PEM	RIVERINE	AREA	0.910758	ACRE	RPWWN	-88.272534	30.7278	Upper Big Creek
WETD012B-F0	PFO	RIVERINE	AREA	3.884941	ACRE	RPWWN	-88.272484	30.727285	Upper Big Creek
WETD012B-E0	PEM	RIVERINE	AREA	0.214836	ACRE	RPWWN	-88.273322	30.726483	Upper Big Creek
WETD012A-E5	PEM	RIVERINE	AREA	1.107156	ACRE	RPWWD	-88.274326	30.724638	Upper Big Creek
WETD012A-E4	PEM	RIVERINE	AREA	0.001448	ACRE	RPWWD	-88.274165	30.724489	Upper Big Creek
WBD007	R5	RIVERINE	AREA	0.138855	ACRE	RPW	-88.27433	30.7244	Hamilton Creek
WETD012A-E3	PEM	RIVERINE	AREA	0.505144	ACRE	RPWWD	-88.27507	30.723732	Upper Big Creek
WETD012A-F3	PFO	RIVERINE	AREA	1.752277	ACRE	RPWWD	-88.274718	30.723723	Upper Big Creek
WETD012A-E2	PEM	RIVERINE	AREA	0.171493	ACRE	RPWWD	-88.275426	30.723253	Upper Big Creek
WBD006	R5	RIVERINE	AREA	0.086427	ACRE	RPW	-88.275295	30.723109	Upper Big Creek
WETD012A-F2	PFO	RIVERINE	AREA	0.067504	ACRE	RPWWD	-88.275325	30.723006	Upper Big Creek
WETD012A-E1	PEM	RIVERINE	AREA	0.04465	ACRE	RPWWD	-88.275084	30.72293	Upper Big Creek
WETD012A-E0	PEM	RIVERINE	AREA	0.055602	ACRE	RPWWD	-88.275335	30.722908	Upper Big Creek
WETD012A-F0	PFO	RIVERINE	AREA	0.216571	ACRE	RPWWD	-88.275257	30.722625	Upper Big Creek
WETD012A-F1	PFO	RIVERINE	AREA	0.299958	ACRE	RPWWD	-88.275453	30.722523	Upper Big Creek

WBG010	R4	RIVERINE	AREA	0.013918	ACRE	RPW	-88.277235	30.719949	Upper Big Creek
WETC020B-E1	PEM	DEPRESS	AREA	0.719485	ACRE	NRPWW	-88.289889	30.700355	Lower Big Creek
WETC020A-E0	PEM	SLOPE	AREA	0.050603	ACRE	NRPWW	-88.297295	30.692306	Lower Big Creek
WETC020B-F0	PFO	SLOPE	AREA	0.02627	ACRE	NRPWW	-88.297174	30.692282	Lower Big Creek
WBC010B	R4	RIVERINE	AREA	0.077734	ACRE	RPW	-88.301973	30.69158	Lower Big Creek
WETC019-E2	PEM	RIVERINE	AREA	0.044259	ACRE	RPWWD	-88.302265	30.691331	Lower Big Creek
WETC019-F2	PFO	RIVERINE	AREA	0.245906	ACRE	RPWWD	-88.302276	30.691062	Lower Big Creek
WETC019-E1	PEM	RIVERINE	AREA	2.424474	ACRE	RPWWD	-88.303743	30.690284	Lower Big Creek
WETC019-F1	PFO	RIVERINE	AREA	2.87068	ACRE	RPWWD	-88.303637	30.689981	Lower Big Creek
WBC009	R6	RIVERINE	AREA	0.008356	ACRE	NRPW	-88.30505	30.68892	Lower Big Creek
WBC008	R5	RIVERINE	AREA	0.05965	ACRE	RPW	-88.304762	30.688826	Lower Big Creek
WETC019-E0	PEM	RIVERINE	AREA	1.87554	ACRE	RPWWD	-88.305532	30.687829	Lower Big Creek
WETC019-F0	PFO	RIVERINE	AREA	2.346845	ACRE	RPWWD	-88.305322	30.687585	Lower Big Creek
WETC018-E0	PEM	RIVERINE	AREA	0.354998	ACRE	NRPWW	-88.309026	30.685166	Lower Big Creek
WETC018-F0	PFO	RIVERINE	AREA	0.572533	ACRE	NRPWW	-88.308831	30.684938	Lower Big Creek
WETC029-E0	PEM	RIVERINE	AREA	0.258927	ACRE	NRPWW	-88.317181	30.680046	Lower Big Creek
WETC029-F0	PFO	RIVERINE	AREA	0.257321	ACRE	NRPWW	-88.317108	30.679735	Lower Big Creek
WETE0D6-E1	PEM	RIVERINE	AREA	0.374573	ACRE	RPWWD	-88.319874	30.678346	Lower Big Creek
WBE005	R5	RIVERINE	AREA	0.036978	ACRE	RPW	-88.320084	30.678059	Lower Big Creek
WETE006-F1	PFO	RIVERINE	AREA	0.40448	ACRE	RPWWD	-88.319834	30.678054	Lower Big Creek
WETE006-E0	PEM	RIVERINE	AREA	1.167228	ACRE	RPWWD	-88.320846	30.677753	Lower Big Creek
WETE006-F0	PFO	RIVERINE	AREA	1.202172	ACRE	RPWWD	-88.32069	30.677514	Lower Big Creek
WETE007-F1	PFO	DEPRESS	AREA	0.405061	ACRE	RPWWN	-88.323378	30.675848	Lower Big Creek
WETE007-E0	PEM	DEPRESS	AREA	1.034732	ACRE	RPWWN	-88.324282	30.675581	Lower Big Creek
WETE007-F0	PFO	DEPRESS	AREA	0.93299	ACRE	RPWWN	-88.324171	30.675345	Lower Big Creek
WETE008-E0	PEM	DEPRESS	AREA	0.122569	ACRE	RPWWN	-88.327278	30.67378	Lower Big Creek
WETE008-F0	PFO	DEPRESS	AREA	0.01004	ACRE	RPWWN	-88.327194	30.673648	Lower Big Creek
WBGT006	R5	RIVERINE	AREA	0.081182	ACRE	RPW	-88.328035	30.673152	Pierce Creek
WBGT005	R6	RIVERINE	AREA	0.043246	ACRE	NRPW	-88.328116	30.672919	Pierce Creek
WBGT004	R5	RIVERINE	AREA	0.059167	ACRE	RPW	-88.333594	30.669693	Lower Big Creek
WETGT007-F0	PFO	RIVERINE	AREA	0.118194	ACRE	RPWWD	-88.333462	30.669523	Lower Big Creek
WETE001-F0	PFO	RIVERINE	AREA	0.877684	ACRE	RPWW	-88.335965	30.667256	Lower Big Creek
WBE001A	R5	RIVERINE	AREA	0.001177	ACRE	RPW	-88.335546	30.666152	Lower Big Creek
WETE002-F1	PFO	RIVERINE	AREA	0.000462	ACRE	RPWW	-88.335548	30.666069	Lower Big Creek
WBE001B	R5	RIVERINE	AREA	0.002127	ACRE	RPW	-88.335554	30.666065	Lower Big Creek
WETE002-F2	PFO	RIVERINE	AREA	0.04343	ACRE	RPWW	-88.335591	30.665885	Lower Big Creek
WBE001C	R5	RIVERINE	AREA	0.017465	ACRE	RPW	-88.335607	30.665841	Lower Big Creek
WETE002-F0	PFO	RIVERINE	AREA	0.862431	ACRE	RPWW	-88.33575	30.665511	Lower Big Creek
WETE002-F3	PFO	RIVERINE	AREA	0.00825	ACRE	RPWW	-88.335558	30.665006	Lower Big Creek
WETE002-F4	PFO	RIVERINE	AREA	1.666358	ACRE	RPWW	-88.335763	30.663896	Lower Big Creek
WBE002	R5	RIVERINE	AREA	0.01072	ACRE	RPW	-88.335882	30.663041	Lower Big Creek
WETE002-F5	PFO	RIVERINE	AREA	0.443737	ACRE	RPWW	-88.335905	30.66289	Lower Big Creek
WETE003-F0	PFO	RIVERINE	AREA	0.106484	ACRE	RPWW	-88.338152	30.660972	Lower Big Creek
WETE003-E0	PEM	RIVERINE	AREA	0.4263	ACRE	RPWW	-88.338234	30.660801	Lower Big Creek
WETE003-F1	PFO	RIVERINE	AREA	0.71403	ACRE	RPWW	-88.338324	30.660504	Lower Big Creek
WETE004-E0	PEM	RIVERINE	AREA	0.100464	ACRE	NRPWW	-88.348655	30.655814	Lower Big Creek
WETE004-F0	PFO	RIVERINE	AREA	0.129546	ACRE	NRPWW	-88.348412	30.655631	Lower Big Creek
WETE005-E0	PEM	RIVERINE	AREA	0.080519	ACRE	NRPWW	-88.349305	30.655516	Lower Big Creek
WETE005-F0	PFO	RIVERINE	AREA	0.143605	ACRE	NRPWW	-88.349292	30.655228	Lower Big Creek
WETC033-E0	PEM	RIVERINE	AREA	0.182373	ACRE	NRPWW	-88.352298	30.654081	Lower Big Creek
WETGT003-F0	PFO	RIVERINE	AREA	0.273425	ACRE	NRPWW	-88.352143	30.653826	Lower Big Creek
WETC032-E0	PEM	RIVERINE	AREA	0.292564	ACRE	NRPWW	-88.354388	30.653086	Lower Big Creek
WETGT002-F0	PFO	RIVERINE	AREA	0.15239	ACRE	NRPWW	-88.354163	30.652879	Lower Big Creek
WETC031-E3	PEM	RIVERINE	AREA	0.127605	ACRE	RPWWD	-88.359244	30.650684	Lower Big Creek
WETGT001-F1	PFO	RIVERINE	AREA	0.058248	ACRE	RPWWD	-88.359067	30.650659	Lower Big Creek
WBGT001	R4	RIVERINE	AREA	0.042462	ACRE	RPW	-88.359404	30.650564	Lower Big Creek
WETC031-E1	PEM	RIVERINE	AREA	0.293918	ACRE	RPWWD	-88.359783	30.650445	Lower Big Creek
WETC031-E2	PEM	RIVERINE	AREA	0.067991	ACRE	RPWWD	-88.360046	30.650438	Lower Big Creek
WETGT001-F0	PFO	RIVERINE	AREA	0.298388	ACRE	RPWWD	-88.359536	30.650392	Lower Big Creek
WETC010-E0	PEM	RIVERINE	AREA	0.281293	ACRE	NRPWW	-88.361268	30.649732	Lower Big Creek
WETC009-E0	PEM	RIVERINE	AREA	0.078543	ACRE	NRPWW	-88.362754	30.649068	Lower Big Creek
WETC009-F0	PFO	RIVERINE	AREA	0.107255	ACRE	NRPWW	-88.362503	30.648888	Lower Big Creek
WETC008-E0	PEM	RIVERINE	AREA	0.818637	ACRE	NRPWW	-88.363962	30.648484	Lower Big Creek
WETC008-F0	PFO	RIVERINE	AREA	0.427921	ACRE	NRPWW	-88.363788	30.648343	Lower Big Creek
WETC007-E1	PEM	RIVERINE	AREA	0.004867	ACRE	RPWWD	-88.366054	30.647581	Lower Big Creek
WETC007-E0	PEM	RIVERINE	AREA	0.221863	ACRE	RPWWD	-88.366185	30.647411	Lower Big Creek

WBC003	R5	RIVERINE	AREA	0.03992	ACRE	RPW	-88.365877	30.647379	Wolf Branch
WETC007-F1	PFO	RIVERINE	AREA	0.051916	ACRE	RPWWD	-88.365724	30.647286	Lower Big Creek
WETC007-F0	PFO	RIVERINE	AREA	0.619515	ACRE	RPWWD	-88.366107	30.647122	Lower Big Creek
WETC006-E0	PEM	RIVERINE	AREA	0.056394	ACRE	NRPWW	-88.367438	30.646808	Lower Big Creek
WETC005-E0	PEM	RIVERINE	AREA	0.076672	ACRE	NRPWW	-88.369154	30.645965	Lower Big Creek
WETC005-F0	PFO	RIVERINE	AREA	0.052799	ACRE	NRPWW	-88.369158	30.645742	Lower Big Creek
WETC004-E0	PEM	RIVERINE	AREA	0.15022	ACRE	NRPWW	-88.370568	30.645313	Lower Big Creek
WETC004-F0	PFO	RIVERINE	AREA	0.197123	ACRE	NRPWW	-88.370329	30.645109	Lower Big Creek
WETC003-E1	PEM	RIVERINE	AREA	0.040246	ACRE	RPWWD	-88.374103	30.643563	Lower Big Creek
WETC003-E0	PEM	RIVERINE	AREA	0.419841	ACRE	RPWWD	-88.374429	30.643439	Lower Big Creek
WETC003-F2	PFO	RIVERINE	AREA	0.025146	ACRE	RPWWD	-88.374096	30.643421	Lower Big Creek
WBC002	R5	RIVERINE	AREA	0.00904	ACRE	RPW	-88.374183	30.643378	Lower Big Creek
WETC003-F1	PFO	RIVERINE	AREA	0.063158	ACRE	RPWWD	-88.374281	30.643308	Lower Big Creek
WETC003-F0	PFO	RIVERINE	AREA	0.002593	ACRE	RPWWD	-88.37424	30.643158	Lower Big Creek
WETC002-E1	PEM	RIVERINE	AREA	0.051942	ACRE	RPWWD	-88.379725	30.640811	Lower Big Creek
WETC002-E0	PEM	RIVERINE	AREA	0.058544	ACRE	RPWWD	-88.379847	30.640767	Lower Big Creek
WBC001	R5	RIVERINE	AREA	0.00735	ACRE	RPW	-88.379625	30.640651	Lower Big Creek
WETC002-F1	PFO	RIVERINE	AREA	0.051337	ACRE	RPWWD	-88.37965	30.640629	Lower Big Creek
WETC002-F0	PFO	RIVERINE	AREA	0.210768	ACRE	RPWWD	-88.379441	30.640621	Lower Big Creek
WETC001-E0	PEM	RIVERINE	AREA	0.256998	ACRE	NRPWW	-88.381936	30.639812	Lower Big Creek
WETC001-F0	PFO	RIVERINE	AREA	0.389776	ACRE	NRPWW	-88.38177	30.639595	Lower Big Creek
WETD011-E2	PEM	RIVERINE	AREA	2.217786	ACRE	RPWWD	-88.387411	30.637052	Lower Big Creek
WETD011-F1	PFO	RIVERINE	AREA	3.169255	ACRE	RPWWD	-88.387367	30.636755	Lower Big Creek
WBD005	R4	RIVERINE	AREA	0.014662	ACRE	RPW	-88.388556	30.635896	Lower Big Creek
WETD011-E1	PEM	RIVERINE	AREA	0.025497	ACRE	RPWWD	-88.388836	30.635658	Lower Big Creek
WETD011-F0	PFO	RIVERINE	AREA	3.376433	ACRE	RPWWD	-88.388618	30.634901	Lower Big Creek
WETD011-E0	PEM	RIVERINE	AREA	0.267921	ACRE	RPWWD	-88.389233	30.634424	Lower Big Creek
WETD010-E1	PEM	RIVERINE	AREA	0.024054	ACRE	RPWWD	-88.393153	30.632271	Lower Big Creek
WETD010-F1	PFO	RIVERINE	AREA	1.492907	ACRE	RPWWD	-88.392937	30.632109	Lower Big Creek
WBD004B	R5	RIVERINE	AREA	0.248155	ACRE	RPW	-88.393515	30.631923	Big Creek
WBD003B	POW	DEPRESS	AREA	0.042289	ACRE	ISOLATE	-88.394076	30.631695	Lower Big Creek
WETD010-E0	PEM	RIVERINE	AREA	1.097842	ACRE	RPWWD	-88.395026	30.631308	Lower Big Creek
WETD010-F0	PFO	RIVERINE	AREA	3.356579	ACRE	RPWWD	-88.394994	30.631008	Lower Big Creek
WETC017-F1	PFO	RIVERINE	AREA	0.410182	ACRE	RPWWD	-88.397944	30.629415	Lower Big Creek
WBC007	R5	RIVERINE	AREA	0.01461	ACRE	RPW	-88.39816	30.629391	Lower Big Creek
WETC017-F0	PFO	RIVERINE	AREA	1.048957	ACRE	RPWWD	-88.398696	30.629009	Lower Big Creek
WETC016-E1	PEM	RIVERINE	AREA	0.177762	ACRE	RPWWD	-88.399515	30.628914	Lower Big Creek
WBC006	R5	RIVERINE	AREA	0.016304	ACRE	RPW	-88.399393	30.628735	Lower Big Creek
WETC016-E0	PEM	RIVERINE	AREA	0.496547	ACRE	RPWWD	-88.400305	30.628492	Lower Big Creek
WETGT008-E0	PEM	RIVERINE	AREA	0.160186	ACRE	NRPWW	-88.405736	30.625392	Lower Big Creek
WETGT008-F0	PFO	RIVERINE	AREA	0.483707	ACRE	NRPWW	-88.405478	30.625199	Lower Big Creek

Alabama Impacts

[redacted]	Name	Activity	Resource Type	Permanent Loss
WBC001		Other (directional boring, crossin	River/Stream	No
WBC002		Other (directional boring, crossin	River/Stream	No
[redacted]	Wolf Branch	Other (directional boring, crossin	River/Stream	No
[redacted]	Wolf Branch	Work	River/Stream	No
WBC006		Other (directional boring, crossin	River/Stream	No
WBC007		Other (directional boring, crossin	River/Stream	No
WBC008		Other (directional boring, crossin	River/Stream	No
[redacted]		Other (directional boring, crossin	River/Stream	No
		Work	River/Stream	No
WBC010B		Other (directional boring, crossin	River/Stream	No
WBC011		Other (directional boring, crossin	River/Stream	No
WBC012		Work	Pond	No
WBC112A	Double Branch	Other (directional boring, crossin	River/Stream	No
WBD003B		Other (directional boring, crossin	Pond	No
WBD004B	Big Creek	Other (directional boring, crossin	River/Stream	No
WBD005		Other (directional boring, crossin	River/Stream	No
WBD006		Other (directional boring, crossin	River/Stream	No
[redacted]	Hamilton Creek	Other (directional boring, crossin	River/Stream	No
[redacted]	Hamilton Creek	Work	River/Stream	No
		Other (directional boring, crossin	Pond	No
		Work	Pond	No
WBD009A		Other (directional boring, crossin	River/Stream	No
WBD009C		Other (directional boring, crossin	River/Stream	No
WBD010		Other (directional boring, crossin	Pond	No
WBD011	Red Creek	Other (directional boring, crossin	River/Stream	No
WBE002		Other (directional boring, crossin	River/Stream	No
WBE005		Other (directional boring, crossin	River/Stream	No
WBG005		Other (directional boring, crossin	River/Stream	No
WBG009		Other (directional boring, crossin	Pond	No
WBG010		Other (directional boring, crossin	River/Stream	No
WBGT001		Other (directional boring, crossin	River/Stream	No
[redacted]		Other (directional boring, crossin	River/Stream	No
		Work	River/Stream	No
WBGT005		Other (directional boring, crossin	River/Stream	No
WBGT006	Pierce Creek	Other (directional boring, crossin	River/Stream	No
WETC001-E0		Work	Non-Tidal Wetland	No

WETC001-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC002-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC002-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC003-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC003-E1	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC003-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
[redacted]	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC003-F2	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC004-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC004-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC005-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC005-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC007-E0	Work	Non-Tidal Wetland	No
WETC007-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC007-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC008-E0	Work	Non-Tidal Wetland	No
WETC008-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC009-E0	Work	Non-Tidal Wetland	No
WETC009-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC010-E0	Work	Non-Tidal Wetland	No
WETC017-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC017-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC018-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC019-E0	Work	Non-Tidal Wetland	No
WETC019-E1	Work	Non-Tidal Wetland	No
WETC019-E2	Work	Non-Tidal Wetland	No
WETC019-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC019-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC019-F2	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC020A-E0	Work	Non-Tidal Wetland	No
WETC020B-E1	Work	Non-Tidal Wetland	No
WETC020B-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC021-E1	Work	Non-Tidal Wetland	No
WETC021-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC021-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC021-F2	Conversion of waters type (forest	Non-Tidal Wetland	No

WETC022-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC022-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC022-F2	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC022-S0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC022-S1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC024-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC025-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC026-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC027-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC029-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
[redacted]	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC031-E1	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC031-E3	Work	Non-Tidal Wetland	No
WETC032-E0	Work	Non-Tidal Wetland	No
WETC033-E0	Work	Non-Tidal Wetland	No
[redacted]	Work	Non-Tidal Wetland	No
WETD010-E1	Other (directional boring, crossin	Non-Tidal Wetland	No
[redacted]	Work	Non-Tidal Wetland	No
WETD011-E2	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD011-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD011-F1	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD012A-E0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD012A-E1	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD012A-E3	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD012A-E4	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD012A-E5	Work	Non-Tidal Wetland	No
WETD012A-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD012A-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD012A-F2	Work	Non-Tidal Wetland	No
WETD012A-F3	Work	Non-Tidal Wetland	No
WETD012B-F0	Work	Non-Tidal Wetland	No
WETD013-E0	Work	Non-Tidal Wetland	No

WETD013-E1	Work	Non-Tidal Wetland	No
WETD013-E2	Work	Non-Tidal Wetland	No
WETD013-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD013-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD013-F2	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD013-F4	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD014-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD015-E0	Work	Non-Tidal Wetland	No
WETD015-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD018-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE001-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE002-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE002-F4	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE002-F5	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE003-E0	Work	Non-Tidal Wetland	No
WETE003-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE004-E0	Work	Non-Tidal Wetland	No
WETE004-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE005-E0	Work	Non-Tidal Wetland	No
WETE005-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE006-E0	Work	Non-Tidal Wetland	No
[redacted]	Other (directional boring, crossin	Non-Tidal Wetland	No
WETE006-F0	Work	Non-Tidal Wetland	No
[redacted]	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Other (directional boring, crossin	Non-Tidal Wetland	No
	Other (directional boring, crossin	Non-Tidal Wetland	No
WETE007-F1	Work	Non-Tidal Wetland	No
WETE008-E0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE008-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETE009-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE009-F1	Other (directional boring, crossin	Non-Tidal Wetland	No
WETGT001-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETGT001-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No

WETGT002-F0	Conversion of waters type (forest Non-Tidal Wetland	No
WETGT003-F0	Conversion of waters type (forest Non-Tidal Wetland	No
WETGT007-F0	Conversion of waters type (forest Non-Tidal Wetland	No
WETGT008-F0	Conversion of waters type (forest Non-Tidal Wetland	No

[redacted]	Initially_Proposed_Area	Proposed_Area	Authorized_Area	Units_Area	Area_Type	[redacted]
Temporary	0.002628	0.002628	0	ACRE	Removal	
Temporary	0.004221	0.004221	0	ACRE	Removal	
Temporary	0.014155	0.014155	0	ACRE	Removal	
Temporary	0.010248	0.010248	0	ACRE	Removal	
Temporary	0.005754	0.005754	0	ACRE	Removal	
Temporary	0.005283	0.005283	0	ACRE	Removal	
Temporary	0.022986	0.022986	0	ACRE	Removal	
Temporary	0.02585	0.02585	0	ACRE	Removal	
Temporary	0.017234	0.017234	0	ACRE	Removal	
Temporary	0.015876	0.015876	0	ACRE	Removal	
Temporary	0.035077	0.035077	0	ACRE	Removal	
Temporary	0.104762	0.104762	0	ACRE	Removal	
Temporary	0.044981	0.044981	0	ACRE	Removal	
Temporary	0.042289	0.042289	0	ACRE	Removal	
Temporary	0.130004	0.130004	0	ACRE	Removal	
Temporary	0.005538	0.005538	0	ACRE	Removal	
Temporary	0.019378	0.019378	0	ACRE	Removal	
Temporary	0.057533	0.057533	0	ACRE	Removal	
Temporary	0.008491	0.008491	0	ACRE	Removal	
Temporary	0.001158	0.001158	0	ACRE	Removal	
Temporary	0.040485	0.040485	0	ACRE	Removal	
Temporary	0.018636	0.018636	0	ACRE	Removal	
Temporary	0.0094	0.0094	0	ACRE	Removal	
Temporary	0.004851	0.004851	0	ACRE	Removal	
Temporary	0.009817	0.009817	0	ACRE	Removal	
Temporary	0.004602	0.004602	0	ACRE	Removal	
Temporary	0.011986	0.011986	0	ACRE	Removal	
Temporary	0.006166	0.006166	0	ACRE	Removal	
Temporary	0.007442	0.007442	0	ACRE	Removal	
Temporary	0.004736	0.004736	0	ACRE	Removal	
Temporary	0.015191	0.015191	0	ACRE	Removal	
Temporary	0.033025	0.033025	0	ACRE	Removal	
Temporary	0.00092	0.00092	0	ACRE	Removal	
Temporary	0.014837	0.014837	0	ACRE	Removal	
Temporary	0.016016	0.016016	0	ACRE	Removal	
Temporary	0.001738	0.001738	0	ACRE	Removal	

Temporary	0.252141	0.252141	0 ACRE	Removal
Temporary	0.114467	0.114467	0 ACRE	Removal
Temporary	0.036891	0.036891	0 ACRE	Removal
Temporary	0.057314	0.057314	0 ACRE	Removal
Temporary	0.007696	0.007696	0 ACRE	Removal
Temporary	0.00067	0.00067	0 ACRE	Removal
Temporary	0.002232	0.002232	0 ACRE	Removal
Temporary	0.055606	0.055606	0 ACRE	Removal
Temporary	0.025146	0.025146	0 ACRE	Removal
Temporary	0.007426	0.007426	0 ACRE	Removal
Temporary	0.074719	0.074719	0 ACRE	Removal
Temporary	0.014024	0.014024	0 ACRE	Removal
Temporary	0.035464	0.035464	0 ACRE	Removal
Temporary	0.004592	0.004592	0 ACRE	Removal
Temporary	0.415975	0.415975	0 ACRE	Removal
Temporary	0.044065	0.044065	0 ACRE	Removal
Temporary	0.063127	0.063127	0 ACRE	Removal
Temporary	0.414087	0.414087	0 ACRE	Removal
Temporary	0.002801	0.002801	0 ACRE	Removal
Temporary	0.070149	0.070149	0 ACRE	Removal
Temporary	0.080348	0.080348	0 ACRE	Removal
Temporary	0.536327	0.536327	0 ACRE	Removal
Temporary	0.209903	0.209903	0 ACRE	Removal
Temporary	0.267357	0.267357	0 ACRE	Removal
Temporary	0.255358	0.255358	0 ACRE	Removal
Temporary	0.340337	0.340337	0 ACRE	Removal
Temporary	0.032184	0.032184	0 ACRE	Removal
Temporary	1.315065	1.315065	0 ACRE	Removal
Temporary	1.608756	1.608756	0 ACRE	Removal
Temporary	0.107211	0.107211	0 ACRE	Removal
Temporary	0.023114	0.023114	0 ACRE	Removal
Temporary	0.071196	0.071196	0 ACRE	Removal
Temporary	0.02627	0.02627	0 ACRE	Removal
Temporary	0.385849	0.385849	0 ACRE	Removal
Temporary	0.724846	0.724846	0 ACRE	Removal
Temporary	0.380242	0.380242	0 ACRE	Removal
Temporary	3.490452	3.490452	0 ACRE	Removal

Temporary	0.078867	0.078867	0 ACRE	Removal
Temporary	0.721788	0.721788	0 ACRE	Removal
Temporary	0.222627	0.222627	0 ACRE	Removal
Temporary	0.143046	0.143046	0 ACRE	Removal
Temporary	0.629307	0.629307	0 ACRE	Removal
Temporary	1.136946	1.136946	0 ACRE	Removal
Temporary	0.095885	0.095885	0 ACRE	Removal
Temporary	0.700072	0.700072	0 ACRE	Removal
Temporary	2.253559	2.253559	0 ACRE	Removal
Temporary	0.042034	0.042034	0 ACRE	Removal
Temporary	0.053874	0.053874	0 ACRE	Removal
Temporary	0.067676	0.067676	0 ACRE	Removal
Temporary	0.034788	0.034788	0 ACRE	Removal
Temporary	0.022483	0.022483	0 ACRE	Removal
Temporary	0.017855	0.017855	0 ACRE	Removal
Temporary	0.009027	0.009027	0 ACRE	Removal
Temporary	0.109968	0.109968	0 ACRE	Removal
Temporary	0.142792	0.142792	0 ACRE	Removal
Temporary	0.022645	0.022645	0 ACRE	Removal
Temporary	1.429179	1.429179	0 ACRE	Removal
Temporary	0.324739	0.324739	0 ACRE	Removal
Temporary	0.235457	0.235457	0 ACRE	Removal
Temporary	0.331943	0.331943	0 ACRE	Removal
Temporary	0.195032	0.195032	0 ACRE	Removal
Temporary	1.410556	1.410556	0 ACRE	Removal
Temporary	1.768604	1.768604	0 ACRE	Removal
Temporary	0.054217	0.054217	0 ACRE	Removal
Temporary	0.001832	0.001832	0 ACRE	Removal
Temporary	0.006768	0.006768	0 ACRE	Removal
Temporary	0.000592	0.000592	0 ACRE	Removal
Temporary	0.569227	0.569227	0 ACRE	Removal
Temporary	0.002773	0.002773	0 ACRE	Removal
Temporary	0.175164	0.175164	0 ACRE	Removal
Temporary	0.057857	0.057857	0 ACRE	Removal
Temporary	1.017479	1.017479	0 ACRE	Removal
Temporary	1.963062	1.963062	0 ACRE	Removal
Temporary	0.030492	0.030492	0 ACRE	Removal

Temporary	0.004389	0.004389	0 ACRE	Removal
Temporary	0.003509	0.003509	0 ACRE	Removal
Temporary	4.314003	4.314003	0 ACRE	Removal
Temporary	0.313556	0.313556	0 ACRE	Removal
Temporary	0.987063	0.987063	0 ACRE	Removal
Temporary	0.11449	0.11449	0 ACRE	Removal
Temporary	0.168742	0.168742	0 ACRE	Removal
Temporary	0.021362	0.021362	0 ACRE	Removal
Temporary	0.654703	0.654703	0 ACRE	Removal
Temporary	0.148191	0.148191	0 ACRE	Removal
Temporary	0.348129	0.348129	0 ACRE	Removal
Temporary	0.215871	0.215871	0 ACRE	Removal
Temporary	0.559539	0.559539	0 ACRE	Removal
Temporary	0.212089	0.212089	0 ACRE	Removal
Temporary	0.013038	0.013038	0 ACRE	Removal
Temporary	0.539297	0.539297	0 ACRE	Removal
Temporary	0.005009	0.005009	0 ACRE	Removal
Temporary	0.077854	0.077854	0 ACRE	Removal
Temporary	0.000476	0.000476	0 ACRE	Removal
Temporary	0.093167	0.093167	0 ACRE	Removal
Temporary	0.323678	0.323678	0 ACRE	Removal
Temporary	0.045428	0.045428	0 ACRE	Removal
Temporary	0.072337	0.072337	0 ACRE	Removal
Temporary	0.569893	0.569893	0 ACRE	Removal
Temporary	0.163721	0.163721	0 ACRE	Removal
Temporary	0.039371	0.039371	0 ACRE	Removal
Temporary	0.079904	0.079904	0 ACRE	Removal
Temporary	0.249022	0.249022	0 ACRE	Removal
Temporary	0.317162	0.317162	0 ACRE	Removal
Temporary	0.107081	0.107081	0 ACRE	Removal
Temporary	0.200899	0.200899	0 ACRE	Removal
Temporary	0.01858	0.01858	0 ACRE	Removal
Temporary	0.01004	0.01004	0 ACRE	Removal
Temporary	0.271509	0.271509	0 ACRE	Removal
Temporary	0.61947	0.61947	0 ACRE	Removal
Temporary	0.298388	0.298388	0 ACRE	Removal
Temporary	0.058248	0.058248	0 ACRE	Removal

Temporary	0.095811	0.095811	0 ACRE	Removal	
Temporary	0.145144	0.145144	0 ACRE	Removal	
Temporary	0.05961	0.05961	0 ACRE	Removal	
Temporary	0.244779	0.244779	0 ACRE	Removal	

STATE OF ALABAMA
ALABAMA HISTORICAL COMMISSION
468 SOUTH PERRY STREET
MONTGOMERY, ALABAMA 36130-0900

FRANK W. WHITE
EXECUTIVE DIRECTOR

TEL: 334-242-3184
FAX: 334-240-3477

November 14, 2012

Todd L. Butler
SWCA Consultants
7255 Langtry, Suite 100
Houston, Texas 77040

Re: AHC 13-0133
COE SAM-2012-00085-MBM
Cultural Resource Assessment
10-Mile Facility
Pascagoula 41-mile Pipeline
Mobile County, Alabama

Dear Mr. Butler:

Upon review of the cultural resource assessment submitted by your office, we have determined that project activities will have no adverse effect on cultural resources eligible for or listed on the National Register of Historic Places. Therefore, we concur with the proposed project activities. However, should artifacts or archaeological features be encountered during project activities, work shall cease and our office shall be consulted immediately.

We appreciate your efforts on this project. Should you have any questions, please contact Greg Rhinehart at (334) 230-2662. Please have the AHC tracking number referenced above available and include it with any correspondence.

Truly yours,

Elizabeth Ann Brown

Elizabeth Ann Brown
Deputy State Historic Preservation Officer

EAB/RJG/GCR/gcr

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Wednesday, November 14, 2012 7:54 AM
To: 'Eric Munscher'
Cc: Bruce_Porter@fws.gov
Subject: RE: HDD sites for Pascagoula (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Thanks for sending this information explaining how you will be direction boring to avoid all of the gopher tortoise pods. It is my understanding that you will be directionally boring under gopher tortoise pods, which are located in uplands and outside the Corps 404 federal permit area, to address coordination and Section 10 consultation requirements with the U.S. Fish and Wildlife Service. State concurrence letters would be required on our 404 evaluation if any "single and complete project" per the definition in the nationwide permit guidance exceeds 0.5 acre of wetland loss and we have to use a standard individual permit (IP) instead of a nationwide permit. I am not aware of any state concurrence letters that would be required for the gopher tortoise component.

Thanks,
Mike Moxey
USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Thursday, November 08, 2012 12:26 PM
To: Moxey, Michael B SAM
Subject: HDD sites for Pascagoula
Importance: High

Mike,

Attached are all of the new HDD sites for avoiding all of the located gopher tortoise pods. Please let us know if you have any questions.

I also wanted to ask you about the state concurrence letters. Who would you like us to send the T/E reports to at the state agencies? Names and addresses would help immensely.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)

Herpetologist / Ecologist

Certified Gopher Tortoise Agent

Principal Investigator of the CFFTRG

SWCA Environmental Consultants

7255 Langtry Suite, 100

Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

Classification: UNCLASSIFIED
Caveats: NONE

Moxey, Michael B SAM

From: Eric Munscher [emunscher@swca.com]
Sent: Friday, November 02, 2012 9:45 AM
To: Moxey, Michael B SAM
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)
Attachments: Aquatic Resources AL 10-30-2012.xlsx; Aquatic Resources MS 10-30-2012.xlsx; Impacts AL 10-30-2012.xlsx; Impacts MS 10-30-2012.xlsx

Mr. Moxey,

Attached you will find the Aquatic Resource and Impact tables for the Pascagoula project broken down by state. The mitigation table and plan will follow shortly. Please let us know if you have any questions. Copies of these tables have already been sent to Pauline.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)
Herpetologist / Ecologist
Certified Gopher Tortoise Agent
Principal Investigator of the CFFTRG
SWCA Environmental Consultants
7255 Langtry Suite, 100
Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Wednesday, October 24, 2012 11:00 AM
To: Moxey, Michael B SAM; Eric Munscher
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
I have also attached the data forms we use when downloading large numbers of waters of U.S. into our database. I remember seeing datasheets on the CD's you provided, however I am not sure if these were the ones provided?

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771

Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Wednesday, October 24, 2012 10:55 AM
To: 'Eric Munscher'
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Attached are our spreadsheets we use for pipeline projects. You will note along the first column that we issue multiple nationwide 12 permits in our letter, based on single and complete project definition, and that we use the pipeline conversions ratios for mitigation in the right columns. I have attached the pipeline mitigation ratio worksheet also.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Wednesday, October 24, 2012 9:13 AM
To: Moxey, Michael B SAM
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Mr. Moxey,

Can you send me the mitigation spredsheets for wetland impacts.

Thanks and cheers,

EM

Eric C. Munscher, M.S.
Ecologist / Herpetologist
7255 Langtry, Suite 100

Houston, Texas 77040
Phone: 717-676-8497

Sound Science. Creative Solutions. (r)
www.swca.com <http://www.swca.com/>
<http://www.swca.com/>

From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Mon 8/27/2012 7:40 AM
To: Eric Munscher
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Using the definition in the Nationwide permits for "Single and Complete Project", long pipeline projects can usually be authorized by multiple nationwide permits (using one permit number). If any single component exceeds the 0.5 acre thresh hold and must go IP, then the whole project will go IP. Attached is the worksheet we attach to the permit if we can use multiple nationwide permits.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Monday, August 27, 2012 9:22 AM
To: Moxey, Michael B SAM
Subject: Spread sheet for U.S. Waterbodys

Mr. Moxey,

During our July meeting concerning the Plains Southcap, LLC Pascagoula pipeline project you had mentioned that we need to use a spread sheet that describes waterbody information throughout the entire project line. Could you please send me this table so I can include it in our permit applications.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)

Herpetologist / Ecologist

Certified Gopher Tortoise Agent

Principal Investigator of the CFFTRG

SWCA Environmental Consultants

7255 Langtry Suite, 100

Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

cid:3401782132_144728300

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Waters Name	Name	Activity	Resource Type	Perennial
WBC001		Other (directional boring, crossin	River/Stream	No
WBC002		Other (directional boring, crossin	River/Stream	No
[redacted]	Wolf Branch	Other (directional boring, crossin	River/Stream	No
	Wolf Branch	Work	River/Stream	No
WBC006		Other (directional boring, crossin	River/Stream	No
WBC007		Other (directional boring, crossin	River/Stream	No
WBC008		Other (directional boring, crossin	River/Stream	No
[redacted]		Other (directional boring, crossin	River/Stream	No
		Work	River/Stream	No
WBC010B		Other (directional boring, crossin	River/Stream	No
WBC011		Other (directional boring, crossin	River/Stream	No
WBC012		Work	Pond	No
WBC112A	Double Branch	Other (directional boring, crossin	River/Stream	No
WBD003B		Other (directional boring, crossin	Pond	No
WBD004B	Big Creek	Other (directional boring, crossin	River/Stream	No
WBD005		Other (directional boring, crossin	River/Stream	No
WBD006		Other (directional boring, crossin	River/Stream	No
[redacted]	Hamilton Creek	Other (directional boring, crossin	River/Stream	No
	Hamilton Creek	Work	River/Stream	No
		Other (directional boring, crossin	Pond	No
		Work	Pond	No
WBD009A		Other (directional boring, crossin	River/Stream	No
WBD009C		Other (directional boring, crossin	River/Stream	No
WBD010		Other (directional boring, crossin	Pond	No
WBD011	Red Creek	Other (directional boring, crossin	River/Stream	No
WBE002		Other (directional boring, crossin	River/Stream	No
WBE005		Other (directional boring, crossin	River/Stream	No
WBG005		Other (directional boring, crossin	River/Stream	No
WBG009		Other (directional boring, crossin	Pond	No
WBG010		Other (directional boring, crossin	River/Stream	No
WBGT001		Other (directional boring, crossin	River/Stream	No
[redacted]		Other (directional boring, crossin	River/Stream	No
		Work	River/Stream	No
WBGT005		Other (directional boring, crossin	River/Stream	No
WBGT006	Pierce Creek	Other (directional boring, crossin	River/Stream	No
WETC001-E0		Work	Non-Tidal Wetland	No

WETC001-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC002-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC002-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC003-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC003-E1	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC003-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
[redacted]	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC003-F2	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC004-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC004-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC005-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC005-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC007-E0	Work	Non-Tidal Wetland	No
WETC007-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC007-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC008-E0	Work	Non-Tidal Wetland	No
WETC008-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC009-E0	Work	Non-Tidal Wetland	No
WETC009-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC010-E0	Work	Non-Tidal Wetland	No
WETC017-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC017-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC018-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC019-E0	Work	Non-Tidal Wetland	No
WETC019-E1	Work	Non-Tidal Wetland	No
WETC019-E2	Work	Non-Tidal Wetland	No
WETC019-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC019-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC019-F2	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC020A-E0	Work	Non-Tidal Wetland	No
WETC020B-E1	Work	Non-Tidal Wetland	No
WETC020B-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC021-E1	Work	Non-Tidal Wetland	No
WETC021-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC021-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC021-F2	Conversion of waters type (forest	Non-Tidal Wetland	No

WETC022-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC022-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC022-F2	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC022-S0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC022-S1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC024-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC025-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC026-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC027-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC029-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
[redacted]	Conversion of waters type (forest	Non-Tidal Wetland	No
WETC031-E1	Other (directional boring, crossin	Non-Tidal Wetland	No
WETC031-E3	Work	Non-Tidal Wetland	No
WETC032-E0	Work	Non-Tidal Wetland	No
WETC033-E0	Work	Non-Tidal Wetland	No
[redacted]	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD010-E1	Work	Non-Tidal Wetland	No
[redacted]	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD011-E2	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD011-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD011-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD012A-E0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD012A-E1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD012A-E3	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD012A-E4	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD012A-E5	Other (directional boring, crossin	Non-Tidal Wetland	No
WETD012A-F0	Work	Non-Tidal Wetland	No
WETD012A-F1	Work	Non-Tidal Wetland	No
WETD012A-F2	Work	Non-Tidal Wetland	No
WETD012A-F3	Work	Non-Tidal Wetland	No
WETD012B-F0	Work	Non-Tidal Wetland	No
WETD013-E0	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Work	Non-Tidal Wetland	No

WETD013-E1	Work	Non-Tidal Wetland	No
WETD013-E2	Work	Non-Tidal Wetland	No
WETD013-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD013-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD013-F2	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD013-F4	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD014-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD015-E0	Work	Non-Tidal Wetland	No
WETD015-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETD018-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE001-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE002-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE002-F4	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE002-F5	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE003-E0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE003-F1	Work	Non-Tidal Wetland	No
WETE004-E0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE004-F0	Work	Non-Tidal Wetland	No
WETE005-E0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE005-F0	Work	Non-Tidal Wetland	No
WETE006-E0	Conversion of waters type (forest	Non-Tidal Wetland	No
[redacted]	Work	Non-Tidal Wetland	No
WETE006-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
[redacted]	Work	Non-Tidal Wetland	No
WETE007-F1	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE008-E0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETE008-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETE009-F0	Other (directional boring, crossin	Non-Tidal Wetland	No
WETE009-F1	Work	Non-Tidal Wetland	No
WETGT001-F0	Conversion of waters type (forest	Non-Tidal Wetland	No
WETGT001-F1	Other (directional boring, crossin	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Other (directional boring, crossin	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Other (directional boring, crossin	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No
	Conversion of waters type (forest	Non-Tidal Wetland	No

WETGT002-F0	Conversion of waters type (forest Non-Tidal Wetland	No
WETGT003-F0	Conversion of waters type (forest Non-Tidal Wetland	No
WETGT007-F0	Conversion of waters type (forest Non-Tidal Wetland	No
WETGT008-F0	Conversion of waters type (forest Non-Tidal Wetland	No

Impact_Duration	Initially_Proposed_Area	Proposed_Area	Authorized_Area	Units_Area	Area_Type	Initially_Proposed_Linear	Proposed_Linear
Temporary	0.002628	0.002628	0	ACRE	Removal		
Temporary	0.004221	0.004221	0	ACRE	Removal		
Temporary	0.014155	0.014155	0	ACRE	Removal		
Temporary	0.010248	0.010248	0	ACRE	Removal		
Temporary	0.005754	0.005754	0	ACRE	Removal		
Temporary	0.005283	0.005283	0	ACRE	Removal		
Temporary	0.022986	0.022986	0	ACRE	Removal		
Temporary	0.02585	0.02585	0	ACRE	Removal		
Temporary	0.017234	0.017234	0	ACRE	Removal		
Temporary	0.015876	0.015876	0	ACRE	Removal		
Temporary	0.035077	0.035077	0	ACRE	Removal		
Temporary	0.104762	0.104762	0	ACRE	Removal		
Temporary	0.044981	0.044981	0	ACRE	Removal		
Temporary	0.042289	0.042289	0	ACRE	Removal		
Temporary	0.130004	0.130004	0	ACRE	Removal		
Temporary	0.005538	0.005538	0	ACRE	Removal		
Temporary	0.019378	0.019378	0	ACRE	Removal		
Temporary	0.057533	0.057533	0	ACRE	Removal		
Temporary	0.008491	0.008491	0	ACRE	Removal		
Temporary	0.001158	0.001158	0	ACRE	Removal		
Temporary	0.040485	0.040485	0	ACRE	Removal		
Temporary	0.018636	0.018636	0	ACRE	Removal		
Temporary	0.0094	0.0094	0	ACRE	Removal		
Temporary	0.004851	0.004851	0	ACRE	Removal		
Temporary	0.009817	0.009817	0	ACRE	Removal		
Temporary	0.004602	0.004602	0	ACRE	Removal		
Temporary	0.011986	0.011986	0	ACRE	Removal		
Temporary	0.006166	0.006166	0	ACRE	Removal		
Temporary	0.007442	0.007442	0	ACRE	Removal		
Temporary	0.004736	0.004736	0	ACRE	Removal		
Temporary	0.015191	0.015191	0	ACRE	Removal		
Temporary	0.033025	0.033025	0	ACRE	Removal		
Temporary	0.00092	0.00092	0	ACRE	Removal		
Temporary	0.014837	0.014837	0	ACRE	Removal		
Temporary	0.016016	0.016016	0	ACRE	Removal		
Temporary	0.001738	0.001738	0	ACRE	Removal		

Temporary	0.252141	0.252141	0 ACRE	Removal
Temporary	0.114467	0.114467	0 ACRE	Removal
Temporary	0.036891	0.036891	0 ACRE	Removal
Temporary	0.057314	0.057314	0 ACRE	Removal
Temporary	0.007696	0.007696	0 ACRE	Removal
Temporary	0.00067	0.00067	0 ACRE	Removal
Temporary	0.002232	0.002232	0 ACRE	Removal
Temporary	0.055606	0.055606	0 ACRE	Removal
Temporary	0.025146	0.025146	0 ACRE	Removal
Temporary	0.007426	0.007426	0 ACRE	Removal
Temporary	0.074719	0.074719	0 ACRE	Removal
Temporary	0.014024	0.014024	0 ACRE	Removal
Temporary	0.035464	0.035464	0 ACRE	Removal
Temporary	0.004592	0.004592	0 ACRE	Removal
Temporary	0.415975	0.415975	0 ACRE	Removal
Temporary	0.044065	0.044065	0 ACRE	Removal
Temporary	0.063127	0.063127	0 ACRE	Removal
Temporary	0.414087	0.414087	0 ACRE	Removal
Temporary	0.002801	0.002801	0 ACRE	Removal
Temporary	0.070149	0.070149	0 ACRE	Removal
Temporary	0.080348	0.080348	0 ACRE	Removal
Temporary	0.536327	0.536327	0 ACRE	Removal
Temporary	0.209903	0.209903	0 ACRE	Removal
Temporary	0.267357	0.267357	0 ACRE	Removal
Temporary	0.255358	0.255358	0 ACRE	Removal
Temporary	0.340337	0.340337	0 ACRE	Removal
Temporary	0.032184	0.032184	0 ACRE	Removal
Temporary	1.315065	1.315065	0 ACRE	Removal
Temporary	1.608756	1.608756	0 ACRE	Removal
Temporary	0.107211	0.107211	0 ACRE	Removal
Temporary	0.023114	0.023114	0 ACRE	Removal
Temporary	0.071196	0.071196	0 ACRE	Removal
Temporary	0.02627	0.02627	0 ACRE	Removal
Temporary	0.385849	0.385849	0 ACRE	Removal
Temporary	0.724846	0.724846	0 ACRE	Removal
Temporary	0.380242	0.380242	0 ACRE	Removal
Temporary	3.490452	3.490452	0 ACRE	Removal

Temporary	0.078867	0.078867	0 ACRE	Removal
Temporary	0.721788	0.721788	0 ACRE	Removal
Temporary	0.222627	0.222627	0 ACRE	Removal
Temporary	0.143046	0.143046	0 ACRE	Removal
Temporary	0.629307	0.629307	0 ACRE	Removal
Temporary	1.136946	1.136946	0 ACRE	Removal
Temporary	0.095885	0.095885	0 ACRE	Removal
Temporary	0.700072	0.700072	0 ACRE	Removal
Temporary	2.253559	2.253559	0 ACRE	Removal
Temporary	0.042034	0.042034	0 ACRE	Removal
Temporary	0.053874	0.053874	0 ACRE	Removal
Temporary	0.067676	0.067676	0 ACRE	Removal
Temporary	0.034788	0.034788	0 ACRE	Removal
Temporary	0.022483	0.022483	0 ACRE	Removal
Temporary	0.017855	0.017855	0 ACRE	Removal
Temporary	0.009027	0.009027	0 ACRE	Removal
Temporary	0.109968	0.109968	0 ACRE	Removal
Temporary	0.142792	0.142792	0 ACRE	Removal
Temporary	0.022645	0.022645	0 ACRE	Removal
Temporary	1.429179	1.429179	0 ACRE	Removal
Temporary	0.324739	0.324739	0 ACRE	Removal
Temporary	0.235457	0.235457	0 ACRE	Removal
Temporary	0.331943	0.331943	0 ACRE	Removal
Temporary	0.195032	0.195032	0 ACRE	Removal
Temporary	1.410556	1.410556	0 ACRE	Removal
Temporary	1.768604	1.768604	0 ACRE	Removal
Temporary	0.054217	0.054217	0 ACRE	Removal
Temporary	0.001832	0.001832	0 ACRE	Removal
Temporary	0.006768	0.006768	0 ACRE	Removal
Temporary	0.000592	0.000592	0 ACRE	Removal
Temporary	0.569227	0.569227	0 ACRE	Removal
Temporary	0.002773	0.002773	0 ACRE	Removal
Temporary	0.175164	0.175164	0 ACRE	Removal
Temporary	0.057857	0.057857	0 ACRE	Removal
Temporary	1.017479	1.017479	0 ACRE	Removal
Temporary	1.963062	1.963062	0 ACRE	Removal
Temporary	0.030492	0.030492	0 ACRE	Removal

Temporary	0.004389	0.004389	0 ACRE	Removal
Temporary	0.003509	0.003509	0 ACRE	Removal
Temporary	4.314003	4.314003	0 ACRE	Removal
Temporary	0.313556	0.313556	0 ACRE	Removal
Temporary	0.987063	0.987063	0 ACRE	Removal
Temporary	0.11449	0.11449	0 ACRE	Removal
Temporary	0.168742	0.168742	0 ACRE	Removal
Temporary	0.021362	0.021362	0 ACRE	Removal
Temporary	0.654703	0.654703	0 ACRE	Removal
Temporary	0.148191	0.148191	0 ACRE	Removal
Temporary	0.348129	0.348129	0 ACRE	Removal
Temporary	0.215871	0.215871	0 ACRE	Removal
Temporary	0.559539	0.559539	0 ACRE	Removal
Temporary	0.212089	0.212089	0 ACRE	Removal
Temporary	0.013038	0.013038	0 ACRE	Removal
Temporary	0.539297	0.539297	0 ACRE	Removal
Temporary	0.005009	0.005009	0 ACRE	Removal
Temporary	0.077854	0.077854	0 ACRE	Removal
Temporary	0.000476	0.000476	0 ACRE	Removal
Temporary	0.093167	0.093167	0 ACRE	Removal
Temporary	0.323678	0.323678	0 ACRE	Removal
Temporary	0.045428	0.045428	0 ACRE	Removal
Temporary	0.072337	0.072337	0 ACRE	Removal
Temporary	0.569893	0.569893	0 ACRE	Removal
Temporary	0.163721	0.163721	0 ACRE	Removal
Temporary	0.039371	0.039371	0 ACRE	Removal
Temporary	0.079904	0.079904	0 ACRE	Removal
Temporary	0.249022	0.249022	0 ACRE	Removal
Temporary	0.317162	0.317162	0 ACRE	Removal
Temporary	0.107081	0.107081	0 ACRE	Removal
Temporary	0.200899	0.200899	0 ACRE	Removal
Temporary	0.01858	0.01858	0 ACRE	Removal
Temporary	0.01004	0.01004	0 ACRE	Removal
Temporary	0.271509	0.271509	0 ACRE	Removal
Temporary	0.61947	0.61947	0 ACRE	Removal
Temporary	0.298388	0.298388	0 ACRE	Removal
Temporary	0.058248	0.058248	0 ACRE	Removal

Temporary		0.095811	0.095811	0 ACRE	Removal
Temporary		0.145144	0.145144	0 ACRE	Removal
Temporary		0.05961	0.05961	0 ACRE	Removal
Temporary		0.244779	0.244779	0 ACRE	Removal

Authorized_Linear_Units_Linear | Debits | Notes

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Friday, October 26, 2012 10:20 AM
To: 'Tom Sankey'
Subject: RE: Action IDs SAM-2012-01165-MBM and SAM-2012-00885-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Thanks for providing the letter authorizing you to serve as the applicant's representative. It appears the project issues regarding gopher tortoises is being resolved. It would be helpful if you could provide a table of contents for the CD's provided to help us evaluate and confirm all the information required to have a complete PCN is provided. Once I can confirm the wetland delineation information is provided (location maps, GPS coordinates, worksheets) I will work with you for identifying locations to visit to verify the delineations (once identified, the wetland lines should be flagged).

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Tom Sankey [mailto:tsankey@swca.com]
Sent: Thursday, October 25, 2012 5:24 PM
To: Moxey, Michael B SAM
Subject: Action IDs SAM-2012-01165-MBM and SAM-2012-00885-MBM

Mike:

Here is a letter from Plains formally authorizing me as their designated agent on the subject Action IDs. We dropped the original of this letter in today's mail.

We are sending you a response to your letters of September 19, 2012 by close of business tomorrow.

Thanks,
Tom

-----Original Message-----
From: ricoh@swca.com [mailto:ricoh@swca.com]
Sent: Thursday, October 25, 2012 2:24 PM
To: Eric Munscher; Tom Sankey

Subject: Message from "RNP0026731DD45F"

This E-mail was sent from "RNP0026731DD45F" (Aficio MP C5501A).

Scan Date: 10.25.2012 15:24:20 (-0400)
Queries to: ricoh@swca.com

Classification: UNCLASSIFIED
Caveats: NONE

Moxey, Michael B SAM

From: Tom Sankey [tsankey@swca.com]
Sent: Friday, October 26, 2012 4:34 PM
To: Moxey, Michael B SAM
Cc: DGore@paalp.com; SRLee@paalp.com
Subject: RE: Plains 41-mile pipeline, SAM-2012-00885-MBM, (UNCLASSIFIED) ALABAMA PORTION
Attachments: 10242012 SHP to USACE Mobile.zip.zip.zip

Mike:

As you, Eric Munscher and I discussed yesterday, this email provides our response to your September 19, 2012 letter regarding the subject Action ID for Plains Southcap, LLC's Pipeline Project in Mobile County, AL. It is our understanding that, based on this response, you will keep this Action ID open and active, for now. We, in turn, will be feeding you with the requested information as it becomes available.

Each of your requests a. through h. is listed below, followed by our response:

a. Please provide a permit application with the original signature by the applicant, or a signed letter from the applicant authorizing you to serve as their authorized agent. Please provide a hard copy of the permit application materials for the portion of the project located in Alabama. You do not have to provide the wetland delineation documents that have already been provided electronically.

We sent you on October 25, 2012, via email, a signed letter on Plains All America Pipeline letterhead authorizing us as their agent. The hard copy of that letter was mailed to you, as well. With regards to hard copies of the permit application materials, we will deliver those materials to you next week.

b. Please identify if the Federal Energy Regulatory Commission is associated as the lead federal agency for your project.

This is not a FERC project.

c. Please provide the GPS points for the boundaries of the wetlands and stream polygons within the project footprint, and data points for the sampling points reflected on each of the wetlands impact maps.

The GIS shapefile with all data points and wetland boundary points is attached to this email.

d. Please provide a scope of work as to how you will cross each of the wetland and waterbody crossings (i.e., horizontal directional drilling, or trench and backfill, etc.). If open-trenching methods would be utilized for any stream or waterbody crossings, then a survey of pre-construction contours should be submitted for each affected crossing.

Table 2 on pages 8-14 of the Wetland Delineation Report (Attachment B of the PCN) shows wetlands that will be avoided by horizontal directional drill (HDD). All other crossings will be by conventional trenching

methods. Table 4 on page 16 of the Wetland Delineation Report (Attachment B of the PCN) shows waterbodies that will be avoided by HDD. All other waterbody crossings will be by conventional trenching methods. Willbros Engineers, the consulting engineer for this project, completed a topographic survey of the proposed centerline. We will forward that to you upon receipt from our client. This will provide you with pre-construction contours in the vicinity of jurisdictional areas.

e. Please provide details regarding how the applicant will mitigate for the loss of wetland functions as a result of the project in Alabama.

We are crunching the numbers using your mitigation worksheet and will forward that to you, as soon as we have completed our analysis.

f. Please provide an assessment of threatened and endangered species in wetlands and streams (federal permit area) within the project area (coordinate with the U.S. Fish and Wildlife Service and the Alabama Department of Conservation and Natural Resources, and provide concurrence letters if any present).

We supplied you threatened and endangered species information in Attachment D of the PCN. Alabama Natural Diversity Database (NDD) data lists were attached as well as a NDD data map showing known occurrences. The only federally listed or candidate species issues we came up with in the Alabama portion of the project were gopher tortoises, which we are in the process of totally avoiding. Willbros Engineers is in the process of designing HDDs to totally avoid all active gopher tortoise burrows within 30 feet of the proposed construction corridor. We have been in informal consultation with the USFWS and will obtain concurrence letters from the USFWS and the ADCNR, as requested.

g. Please provide information relating to cultural resource locations within the wetlands or streams (federal permit area) along your proposed project (coordinate with Alabama Department of Archives and History, and provide concurrence letter).

We submitted the archaeological report as Attachment E of the PCN and will submit to the Alabama State Historical Preservation Office for concurrence, as requested.

h. I will be sending you copies of the electronic spreadsheets for documenting the waters of the U.S., wetlands impacts, and wetland mitigation spreadsheets for the wetlands and streams impacts in Alabama.

Wetland and water impacts are identified throughout the PCN and Wetland Delineation Report within the CDs that we submitted to you. Nevertheless, we will re-organize the data as you requested using the electronic spreadsheets that you provided, and forward to you.

We appreciate your assistance with this project and will forward these items to you as soon as possible.

Regards,
Tom

R. Thomas Sankey, PWS, CSE

Senior Project Manager / Senior Ecologist
SWCA Environmental Consultants
7255 Langtry, Suite 100
Houston, Texas 77040

713-934-9900 (office)
713-252-9291 (mobile)
713-934-9906 (fax)

-----Original Message-----
From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Tuesday, October 23, 2012 10:42 AM
To: Moxey, Michael B SAM; Tom Sankey
Subject: RE: Plains 41-mile pipeline, SAM-2012-00885-MBM, SAM-2012-01165-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
We provided you a letter dated September 19, 2012, stating your application was incomplete. In our letter we identified items that were needed to consider your application complete, including a permit application with original signatures by the applicant and the agent. We requested the information within 30 days otherwise we would close your file for administrative purposes until the information could be provided. We have not received any response to our letter. Please provide the requested information by October 26, 2012, otherwise we will close the file for administrative purposes, and will reopen the project once received.

Thanks,
Michael Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Thursday, September 20, 2012 12:06 PM
To: Moxey, Michael B SAM; 'tsankey@swca.com'
Cc: Bruce_Porter@fws.gov

Subject: RE: Plains 41-mile pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
It is my understanding that your pipeline project has avoided most of the gopher tortoise issues except for a 6. So that we can determine how to evaluate the six burrows in relation to our federal permit area, could you provide site plans that show the location of the burrows in relation to the location of waters of the U.S. in the corridor in this vicinity.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Monday, September 17, 2012 4:27 PM
To: Moxey, Michael B SAM; 'tsankey@swca.com'
Subject: RE: Plains 41-mile pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
You can also provide an original signed letter from the applicant designating your company as a duly authorized agent, similar to what I on the standard permit application.

Thanks,
Mike Moxey
USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your

responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Monday, September 17, 2012 3:36 PM
To: 'tsankey@swca.com'
Subject: Plains 41-mile pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
Thanks you for submitting the CD's with the electronic version of your permit application. So that we may evaluate your project, please provide hard copies of the permit application that contains the original signatures.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

PLAINS
ALL AMERICAN
PIPELINE, L.P.

Moxey
PD-I-S

October 8, 2012

Michael B. Moxey
Biologist, Inland Team Leader
Regulatory Division
U.S. Army Corps of Engineers – Mobile District
109 St. Joseph Street
Mobile, AL 36628-0001

Re: Pascagoula Pipeline Project
Pre-Construction Notice (MS and AL)
Action IDs SAM-2012-01165-MBM (MS) and SAM-2012-000885-MBM (AL)

Dear Mr. Moxey:

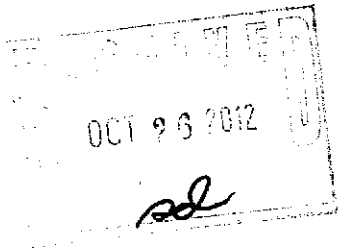
By this letter, Plains All American Pipeline, L.P. (Plains) provides notification that Mr. R. Thomas Sankey of SWCA Environmental Consultants (SWCA) will be functioning as Plains' authorized agent in the permitting of the referenced project. I would also appreciate being copied on all correspondence between SWCA and the USACE concerning this matter.

If you have any questions or concerns about this letter or any other matter related to the referenced project, please feel free to contact me at (713) 646-4419.

Best Regards,

Wm. Dean Gore, Jr., P.E.
Director, Environmental Project Development

Cc: Tom Sankey, SWCA - Houston
Chuck Fontenot, SWCA - Houston
Steve Lee, Plains - Houston



PLAINS ALL AMERICAN PIPELINE, L.P.

October 8, 2012

Michael B. Moxey
Biologist, Inland Team Leader
Regulatory Division
U.S. Army Corps of Engineers – Mobile District
109 St. Joseph Street
Mobile, AL 36628-0001

Re: Pascagoula Pipeline Project
Pre-Construction Notice (MS and AL)
Action IDs SAM-2012-01165-MBM (MS) and SAM-2012-000885-MBM (AL)

Dear Mr. Moxey:

By this letter, Plains All American Pipeline, L.P. (Plains) provides notification that Mr. R. Thomas Sankey of SWCA Environmental Consultants (SWCA) will be functioning as Plains' authorized agent in the permitting of the referenced project. I would also appreciate being copied on all correspondence between SWCA and the USACE concerning this matter.

If you have any questions or concerns about this letter or any other matter related to the referenced project, please feel free to contact me at (713) 646-4419.

Best Regards,

Wm. Dean Gore, Jr., P.E.
Director, Environmental Project Development

Cc: Tom Sankey, SWCA - Houston
Chuck Fontenot, SWCA - Houston
Steve Lee, Plains - Houston

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Wednesday, October 24, 2012 11:00 AM
To: Moxey, Michael B SAM; 'Eric Munscher'
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)
Attachments: Aquatic Resources.xlsx; Impacts.xlsx; Mitigation.xlsx; NWP.XLSX; Old_JD.XLSX

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
I have also attached the data forms we use when downloading large numbers of waters of U.S. into our database. I remember seeing datasheets on the CD's you provided, however I am not sure if these were the ones provided?

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Wednesday, October 24, 2012 10:55 AM
To: 'Eric Munscher'
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Attached are our spreadsheets we use for pipeline projects. You will note along the first column that we issue multiple nationwide 12 permits in our letter, based on single and complete project definition, and that we use the pipeline conversions ratios for mitigation in the right columns. I have attached the pipeline mitigation ratio worksheet also.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771

Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Wednesday, October 24, 2012 9:13 AM
To: Moxey, Michael B SAM
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Mr. Moxey,

Can you send me the mitigation spredsheets for wetland impacts.

Thanks and cheers,

EM

Eric C. Munscher, M.S.
Ecologist / Herpetologist
7255 Langtry, Suite 100
Houston, Texas 77040
Phone: 717-676-8497

Sound Science. Creative Solutions. ®
www.swca.com <http://www.swca.com/>
<http://www.swca.com/>

From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Mon 8/27/2012 7:40 AM
To: Eric Munscher
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Using the definition in the Nationwide permits for "Single and Complete Project", long pipeline projects can usually be authorized by multiple nationwide permits (using one permit number). If any single component exceeds the 0.5 acre thresh hold and must go IP, then the whole project will go IP. Attached is the worksheet we attach to the permit if we can use multiple nationwide permits.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South

109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Monday, August 27, 2012 9:22 AM
To: Moxey, Michael B SAM
Subject: Spread sheet for U.S. Waterbodys

Mr. Moxey,

During our July meeting concerning the Plains Southcap, LLC Pascagoula pipeline project you had mentioned that we need to use a spread sheet that describes waterbody information throughout the entire project line. Could you please send me this table so I can include it in our permit applications.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)

Herpetologist / Ecologist

Certified Gopher Tortoise Agent

Principal Investigator of the CFFTRG

SWCA Environmental Consultants

7255 Langtry Suite, 100

Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

cid:3401782132_144728300

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Wednesday, October 24, 2012 10:55 AM
To: 'Eric Munscher'
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)
Attachments: Corps Pipeline data worksheet.xlsx; 2008 Pipeline Corridor Mitigation.pdf

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Attached are our spreadsheets we use for pipeline projects. You will note along the first column that we issue multiple nationwide 12 permits in our letter, based on single and complete project definition, and that we use the pipeline conversions ratios for mitigation in the right columns. I have attached the pipeline mitigation ratio worksheet also.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Wednesday, October 24, 2012 9:13 AM
To: Moxey, Michael B SAM
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Mr. Moxey,

Can you send me the mitigation spredsheets for wetland impacts.

Thanks and cheers,

EM

Eric C. Munscher, M.S.
Ecologist / Herpetologist
7255 Langtry, Suite 100
Houston, Texas 77040
Phone: 717-676-8497

Sound Science. Creative Solutions. ®
www.swca.com <http://www.swca.com/>

<http://www.swca.com/>

From: Moxey, Michael B SAM [mailto:michael.b.moxey@usace.army.mil]
Sent: Mon 8/27/2012 7:40 AM
To: Eric Munscher
Subject: RE: Spread sheet for U.S. Waterbodies (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Eric,
Using the definition in the Nationwide permits for "Single and Complete Project", long pipeline projects can usually be authorized by multiple nationwide permits (using one permit number). If any single component exceeds the 0.5 acre thresh hold and must go IP, then the whole project will go IP. Attached is the worksheet we attach to the permit if we can use multiple nationwide permits.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Eric Munscher [mailto:emunscher@swca.com]
Sent: Monday, August 27, 2012 9:22 AM
To: Moxey, Michael B SAM
Subject: Spread sheet for U.S. Waterbodys

Mr. Moxey,

During our July meeting concerning the Plains Southcap, LLC Pascagoula pipeline project you had mentioned that we need to use a spread sheet that describes waterbody information throughout the entire project line. Could you please send me this table so I can include it in our permit applications.

Thanks and cheers,

EM

Eric C. Munscher, M.S., ES3 (Scientist)

Herpetologist / Ecologist

Certified Gopher Tortoise Agent

Principal Investigator of the CFFTRG

SWCA Environmental Consultants

7255 Langtry Suite, 100

Houston, TX 77040

"And I can only believe, from somewhere deeper than any logic center of the brain, that a life of incomprehensible loneliness awaits a world where the wild things were, but are never to be again." William Stolzenburg. Where the Wild Things Were.

cid:3401782132_144728300

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Table 1

NWP 12 Project No.	FGT Wetland/ Waterbody ID	Local Waterway	Jurisdictional Type (Wetland/ Stream)	Wetland/ Stream Type	Latitude (dd NAD83)	Longitude (dd NAD83)	PFO Wetlands to revert to PFO (0.25:1)	PFO Wetlands converted to PSS (0.5:1)	PFO Wetlands converted to PEM (1:1)	Total 0.25:1 Credits	Total 0.5:1 Credits	Total 1:1 Credits	Total Mitigation Credits
1	W1AMO016	Simmons Branch	Wetland	PFO/PEM	30.6249	-88.3603	0.19	n/a	n/a	0.05	n/a	n/a	0.05
1	S1AMO009	UT to Simmons Branch	Stream	RPW	30.6325	-88.3617	n/a	n/a	n/a	n/a	n/a	n/a	n/a
NPR	W1AMO015	n/a	Wetland	PFO/PEM	30.6217	-88.3603	Isolated wetland - Not jurisdictional						
2	W1AMO014	UT to Miller Creek	Wetland	PEM	30.6168	-88.3589	No Forested Impacts						
2	W1AMO013	UT to Miller Creek	Wetland	PFO/PEM	30.6143	-88.3582	0.24	0.03	0.07	0.06	0.02	0.07	0.15
2	S1AMO008	Miller Creek	Stream	RPW	30.6056	-88.3564	n/a	n/a	n/a	n/a	n/a	n/a	n/a
2	S1AMO007	Miller Creek	Stream	RPW	30.6054	-88.3563	n/a	n/a	n/a	n/a	n/a	n/a	n/a
NPR	W1AMO012	n/a	Wetland	PFO	30.5946	-88.3565	Wetland avoided - No impacts						
NPR	W1AMO011	Copeland Island Branch	Wetland	PFO	30.5854	-88.3561	Wetland avoided by use of HDD						
3	W1AMO010	UT to Bay Branch	Wetland	PFO/PEM	30.5794	-88.3563	0.52	0.07	0.14	0.13	0.04	0.14	0.31
3	W1AMO009	UT to Bay Branch	Wetland	PFO/PEM	30.5720	-88.3571	0.29	0.04	0.08	0.07	0.02	0.08	0.17
3	W1AMO007	UT to Bay Branch	Wetland	PFO	30.5614	-88.3570	0.04	0.00	0.01	0.01	0.00	0.01	0.02
NPR	S1AMO006	n/a	n/a	n/a	30.5646	-88.3573	Man made ditch - Not jurisdictional						
NPR	W1AMO008	UT to Bay Branch	Wetland	PFO/PEM	30.5611	-88.3574	Wetland avoided - No impacts						
4	W1AMO004	UT to Bell Branch	Wetland	PEM	30.5528	-88.3546	No Forested Impacts						
4	S1AMO004	UT to Bell Branch	Stream	RPW	30.5533	-88.3547	n/a	n/a	n/a	n/a	n/a	n/a	n/a
4	W1AMO003	Bell Branch	Wetland	PFO/PEM	30.5427	-88.3533	0.43	0.06	0.12	0.11	0.03	0.12	0.26
4	S1AMO003	Bell Branch	Stream	RPW	30.5427	-88.3533	n/a	n/a	n/a	n/a	n/a	n/a	n/a
4	W1AMO002	UT to Bell Branch	Wetland	PFO	30.5397	-88.3528	0.04	0.00	0.01	0.01	0.00	0.01	0.02
5	W1AMO001	Jackson Creek	Wetland	PFO/PEM	30.5334	-88.3517	1.17	0.17	0.33	0.29	0.09	0.33	0.71
5	S1AMO002	Jackson Creek	Stream	RPW	30.5334	-88.3517	n/a	n/a	n/a	n/a	n/a	n/a	n/a
5	S1AMO001	Jackson Creek	Stream	RPW	30.5334	-88.3517	n/a	n/a	n/a	n/a	n/a	n/a	n/a
NPR	W1AMO006	UT to Jackson Creek	Wetland	PFO/PEM	30.5213	-88.3495	Wetland avoided by use of HDD						
NPR	W1AMO005	UT to Jackson Creek	Wetland	PFO/PEM	30.5195	-88.3493	Wetland avoided by use of HDD						
NPR	S1AMO005	UT to Jackson Creek	Stream	RPW	30.5195	-88.3493	Wetland avoided by use of HDD						
Grand Total							2.9	0.4	0.8	0.7	0.2	0.8	**1.7**

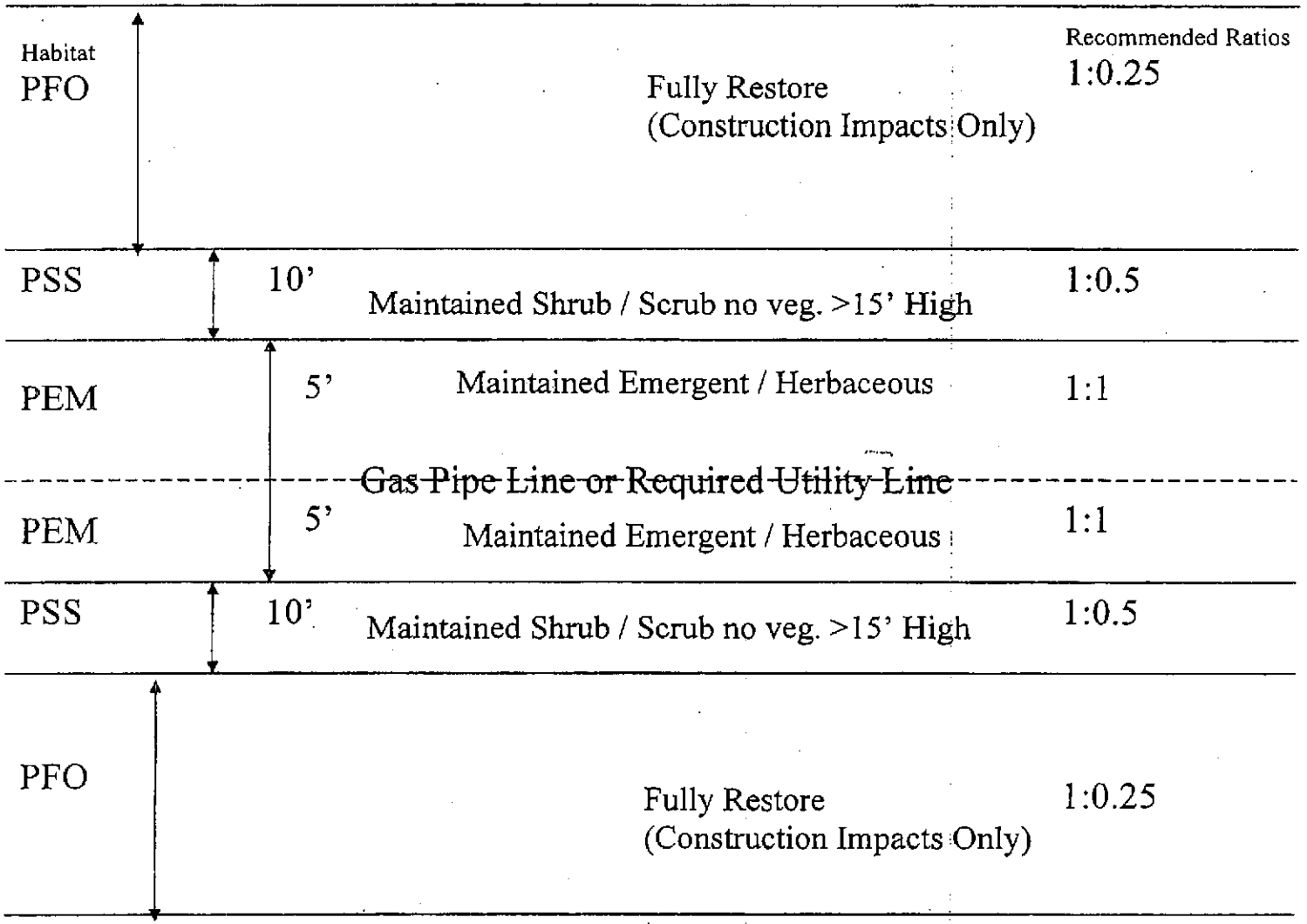
PFO - Palustine Forested Wetlands *PEM - Palustrine Emergent Wetlands*

NPR - No permit required *n/a - not applicable*

Table 1

RPW - relatively permanent water *UT - unnamed tributary*

Converted Wetland Habitat ROW for Typical Linear Project
w/ Typical Recommendation for Compensation due to Vegetation Conversion



Note:
Palustrine forested (PFO)
Palustrine Shrub / Scrub
Palustrine Emergent / Herbaceous (PEM)

Note: Assuming original habitat was a Palustrine forested corridor.

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Tuesday, October 23, 2012 10:42 AM
To: Moxey, Michael B SAM; tsankey@swca.com
Subject: RE: Plains 41-mile pipeline, SAM-2012-00885-MBM, SAM-2012-01165-MBM (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
We provided you a letter dated September 19, 2012, stating your application was incomplete. In our letter we identified items that were needed to consider your application complete, including a permit application with original signatures by the applicant and the agent. We requested the information within 30 days otherwise we would close your file for administrative purposes until the information could be provided. We have not received any response to our letter. Please provide the requested information by October 26, 2012, otherwise we will close the file for administrative purposes, and will reopen the project once received.

Thanks,
Michael Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Thursday, September 20, 2012 12:06 PM
To: Moxey, Michael B SAM; 'tsankey@swca.com'
Cc: Bruce_Porter@fws.gov
Subject: RE: Plains 41-mile pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
It is my understanding that your pipeline project has avoided most of the gopher tortoise issues except for a 6. So that we can determine how to evaluate the six burrows in relation to our federal permit area, could you provide site plans that show the location of the burrows in relation to the location of waters of the U.S. in the corridor in this vicinity.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Monday, September 17, 2012 4:27 PM
To: Moxey, Michael B SAM; 'tsankey@swca.com'
Subject: RE: Plains 41-mile pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
You can also provide an original signed letter from the applicant designating your company as a duly authorized agent, similar to what I on the standard permit application.

Thanks,
Mike Moxey
USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Monday, September 17, 2012 3:36 PM
To: 'tsankey@swca.com'
Subject: Plains 41-mile pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
Thanks you for submitting the CD's with the electronic version of your permit application. So that we may evaluate your project, please provide hard copies of the permit application that contains the original signatures.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Thursday, September 20, 2012 12:06 PM
To: Moxey, Michael B SAM; tsankey@swca.com
Cc: Bruce_Porter@fws.gov
Subject: RE: Plains 41-mile pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
It is my understanding that your pipeline project has avoided most of the gopher tortoise issues except for a 6. So that we can determine how to evaluate the six burrows in relation to our federal permit area, could you provide site plans that show the location of the burrows in relation to the location of waters of the U.S. in the corridor in this vicinity.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Monday, September 17, 2012 4:27 PM
To: Moxey, Michael B SAM; 'tsankey@swca.com'
Subject: RE: Plains 41-mile pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
You can also provide an original signed letter from the applicant designating your company as a duly authorized agent, similar to what I on the standard permit application.

Thanks,
Mike Moxey
USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Monday, September 17, 2012 3:36 PM
To: 'tsankey@swca.com'
Subject: Plains 41-mile pipeline (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Mr. Sankey,
Thanks you for submitting the CD's with the electronic version of your permit application. So that we may evaluate your project, please provide hard copies of the permit application that contains the original signatures.

Thanks,
Mike Moxey

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Classification: UNCLASSIFIED
Caveats: NONE

Moxey, Michael B SAM

From: Moxey, Michael B SAM
Sent: Thursday, September 20, 2012 1:52 PM
To: Bruce_Porter@fws.gov; 'tsankey@swca.com'
Subject: FW: Pipeline projects and ESA (UNCLASSIFIED)
Attachments: Pipelines and ESA.pdf

Classification: UNCLASSIFIED
Caveats: NONE

Attached are the Corps guidelines for addressing ESA/Section 7 limits for pipeline projects.

Thanks,
Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

-----Original Message-----
From: Moxey, Michael B SAM
Sent: Thursday, September 20, 2012 1:16 PM
To: 'Bunkley, Bill'; Crosson, S. Brad SAM; 'Moxey, Michael B SAM'; 'Riley, Anthony W SAM'; Turney, Leslie E; Villarreal, Rudolph C SAM; Zettle, Sheri M SAM
Subject: FW: Pipeline projects and ESA (UNCLASSIFIED)

Classification: UNCLASSIFIED
Caveats: NONE

Team,
Low and behold, I found the following guidance regarding expanding our federal permit area in regards to ESA in my REG II A manual. Seems like some significant criteria must be met before we should ever do this.

Mike

USACE, Regulatory Division
Team Leader, Inland South
109 St. Joseph Street
Mobile, Alabama 36602
(251) 694-3771
Fax: (251) 690-2660

For additional information about our Regulatory Program, please visit our web site at www.sam.usace.army.mil/RD/reg <http://www.sam.usace.army.mil/RD/reg> , and please take a

DEPARTMENT OF THE ARMY
U.S. Army Corps of Engineers
WASHINGTON, D.C. 20314-1000

27 NOV 1991

REPLY TO
ATTENTION OF:

Office of the Chief Counsel/Regulatory Branch

Honorable John Turner
Director
U.S. Fish and Wildlife Service
Department of the Interior
Washington, DC 20240

Dear Mr. Turner:

I am writing this letter to respond to Richard Smith's June 12, 1991, letter regarding the U.S. Army Corps of Engineers Galveston District's extension of General Permit (GP) 14114(02). To begin with, I would like to assure you that the Galveston District's issuance and use of GP 14114(02) is in no way an effort to evade its responsibilities under the Endangered Species Act (ESA). The Galveston District, and the Corps as a whole, are committed to acting in full compliance with the ESA, and to exercising proper sensitivity regarding the effects that Corps actions may have on threatened or endangered species.

In his letter Mr. Smith stated that in past applications of GP 14114 to linear projects (such as pipelines or electric transmission lines), the Galveston District limited its ESA review to the permit area relevant to Corps regulation under section 10 of the Rivers and Harbors Act of 1899 (RHA) and/or section 404 of the Clean Water Act (CWA). Mr. Smith contends that this limited assessment improperly fails to consider the indirect effects of a project, because it does not take into account the portion of the project outside the permit area. Mr. Smith posits that, in the context of a linear project, section 7 of the ESA forbids the Corps to issue a permit until the Corps has assessed the potential effects on endangered or threatened species of the entire linear project.

The Corps does not fully agree with Mr. Smith's interpretation of section 7. Section 7 requires Federal agencies to "insure that any action authorized, funded, or carried out by such agency . . . is not likely to jeopardize . . . any endangered or threatened species . . . ," or to adversely affect critical habitat (16 U.S.C.A. § 1536, emphasis added). This requires the Corps to consider the ESA effects of "any action authorized" (that is, any activity permitted) by the Corps. In the typical linear project requiring a Corps permit, a power company will apply for an RHA section 10 river crossing permit to facilitate the construction of a transmission line. In this context, the action authorized by the Corps, if the Corps issues such a permit, is the power line's crossing of the river. Thus,

Enclosure

the Corps usually would confine its ESA review to the permit area surrounding the river crossing. This permit area includes the jurisdictional reach of the Corps RHA authority (i.e., the area extending up to the ordinary high water mark of the river) and any uplands affected by the river crossing that are within a reasonable distance from the river. Within this permit area, in accordance with National Wildlife Federation v. Coleman, 529 F.2d 359 (5th Cir. 1976) (potential private development stemming from the completion of a 5.7 mile road section and interchange was considered an indirect effect that must be considered in ESA review of Federal project), the Corps considers the direct, indirect and cumulative effects of the river crossing on threatened or endangered species.

In three situations, however, the Corps will assess ESA effects beyond the immediate permit area. In the first situation, in accordance with Riverside Irrigation District v. Andrews, 758 F.2d 508 (10th Cir. 1985), (Corps considered indirect or secondary physical effects of a dam on critical habitat of the whooping crane many miles downstream from the permit area), the Corps will look outside the permit area for ESA effects that have a causal physical link to the activity authorized by the Corps pursuant to the RHA and/or the CWA. In doing so the Corps recognizes that there is a difference between: 1) the Corps de facto legal control over a project which cannot be built "but for" a Corps permit, and 2) the Corps legal responsibility to consider indirect and cumulative physical effects of the actions we permit. That is, when the Corps only has de facto legal or "but for" control over a linear project, the Corps typically will confine its ESA review to the permit area. Conversely, when the activity authorized by the Corps has a physical effect on threatened or endangered species outside the permit area, the Corps will look outside the permit area to evaluate those effects.

This distinction has been recognized in cases such as Winnebago Tribe of Nebraska v. Ray, 621 F.2d 269 (8th Cir.), cert. denied, 449 U.S. 836 (1980), and Save the Bay, Inc. v. United States Corps of Engineers, 610 F.2d 322, (5th Cir.), cert. denied, 449 U.S. 900 (1980). Although Winnebago and Save the Bay involved the application of the National Environmental Policy Act, the Corps believes that this analysis has validity in the context of the ESA with regard to linear projects.

As stated above, typically the Corps will not broaden its review to encompass ESA effects that are the product of the Corps de facto legal control over a linear project. The Corps does not believe that such "but for" control justifies the Corps broadening its jurisdiction to include indirect non-physical effects. By limiting its ESA review to the activity which the Corps permits, and to direct, indirect, and cumulative physical effects resulting from that authorized activity, the Corps can

pragmatically balance Federal interests in protecting the environment with the Corps mission of operating a manageable regulatory program. Although it might seem to be a noble undertaking for the Corps to expand its ESA review to include the entire length of a linear project, the Corps lacks the resources programmatically to conduct such far-reaching examinations. Furthermore, we believe that such extensive regulation would overstep the limits of the Corps regulatory authority.

The second situation in which the Corps will expand its ESA review beyond the permit area is when the FWS or an interested party informs the Corps that a linear project will affect critical habitat outside the permit area, and the Corps, through its control over the placement of a river crossing, can reasonably steer the route of the linear project around the critical habitat. That is, if the Corps can encourage or require the proponent of a linear project to utilize a practicable alternative location for the proposed river crossing site, and thereby lead an applicant to reroute its linear project to avoid the adverse effects on the critical habitat, then the Corps will do so when such a practicable alternative river crossing site is reasonably available.

It should be explicitly clear that by adopting this approach the Corps is not acknowledging any additional legal obligation under the ESA. The Corps is voluntarily taking this action solely in the interests of environmental protection. Furthermore, the Corps, by adopting this approach, is not obligating itself to identify critical habitat outside a permit area. Consequently, before the Corps will investigate whether this approach should be employed for a specific linear project, the FWS or an interested party must provide the Corps with credible information that an area of critical habitat is sufficiently near a river crossing site that it could practicably be protected by this approach. Moreover, it will be totally at the Corps discretion whether to pursue this approach based on such credible information.

In the third situation the Corps may actually enlarge the scope of its ESA review to include an entire linear project. This situation arises when, for instance, a linear project requires the Corps to issue such a significant number of permits, or permits authorizing such a large portion of the project's length, that by granting the permits the Corps essentially would be authorizing the entire project or segments thereof.

When none of these three situations are present, the Corps will confine its ESA review to the permit area. To contend that the Corps should examine the entire length of a linear project for adverse effects to threatened or endangered species, even when the Corps only means of preventing such effects would be to deny the permit, one must rely on the "but for" test. One would

have to reason that, since the linear project could not be constructed "but for" a Corps permit, then an indirect effect of the Corps permit is the possible destruction of critical habitat. Although this test may have validity in certain contexts, it lacks such validity with regard to linear projects. Drawn to its extreme, under this approach, the Corps would be required to take legal responsibility for all environmental effects along a 1000 mile pipeline even if the Corps had actual regulatory responsibility only for one river crossing permit. Not only would such a review cause the Corps to overstep the reasonable limits of its regulatory authority, but it simply would not be practicable.

Despite this, the Corps can help ensure that threatened and endangered species are better protected by assisting the FWS in exercising its authority under section 9 of the ESA. The Corps Regulatory Branch is currently considering guidance concerning ESA reviews to instruct our field offices to include in both individual permits and in general permits for linear projects a special condition requiring applicants to supply the FWS with information concerning the intended route of the linear project. This will apprise the FWS of all linear projects that involve Corps permits. In those cases in which the Corps restricts its review to the permit area alone, the FWS would be free to exercise its authority under section 9 of the ESA to protect critical habitat and prevent takings of threatened and endangered species. As I am sure you are fully aware, the FWS, under Palila v. Hawaii Department of Land and Natural Resources, 639 F.2d 495 (9th Cir. 1981) (degradation of critical habitat alone can be considered a taking), potentially could cause a linear project to be redirected around critical habitat.

We believe that our approach to defining the area of consideration for endangered species impacts is consistent with the ESA, and with the Corps policy on scope of analysis incorporated in the Corps 1988 National Environmental Policy Act (NEPA) compliance regulations. If you wish to discuss this matter further, I would be pleased to meet with you.

Sincerely,

for Arthur E. Williams
Major General, U.S. Army
Director of Civil Works

DEPARTMENT OF THE ARMY
U.S. ARMY ENGINEER DISTRICT, MOBILE
CORPS OF ENGINEERS
P.O. BOX 2288
MOBILE, ALABAMA 36628-0001

REPLY TO
ATTENTION OF:

September 19, 2012

Inland Branch
Regulatory Division

SUBJECT: Department of the Army Application Number SAM-2012-000885-MBM, Plains Southcap L.L.C. Pipeline, Mobile County, Alabama.

Plains Southcap L.L.C.
Attention: Mr. Thomas Sankey
7255 Longtry, Suite 100
Houston, Texas 77040

Dear Mr. Sankey:

Please reference your application for a Department of the Army (DA) permit received in this office September 13, 2012, to install a 41-mile crude oil pipeline from the Plains Ten-Mile Crude Oil Facility in Mobile County, Alabama, to Pascagoula, Mississippi. This project has been divided into two actions, one for the pipeline located in Alabama, and the portion of the pipeline located in Mississippi. This permit action is evaluating the pipeline that is located in Alabama. Your application has been assigned file number SAM-2012-00885-MBM, which should be referred to in all future correspondence with this office.

Following an initial review of the application, it appears that there will be no permanent filling activities involving "waters of the U.S." in Alabama. If this is correct, your project may qualify for a Nationwide Permit 12 verification for Utility Line Activities. To further evaluate your proposed project, this office requests the following information:

a. Please provide a permit application with original signature by the applicant, or a signed letter from the applicant authorizing you to serve as their authorized agent. Please provide a hard copy of the permit application materials for the portion of the project located in Alabama. You do not have to provide the wetland delineation documents that have already been provided electronically.

b. Please identify if the Federal Energy Regulatory Commission is associated as the lead federal agency for your project. If they are, please provide a copy of the Final FERC EA and a copy of the FERC Ordering Issuing Certificate is required.

c. Please provide the GPS points for the boundaries of the wetlands and stream polygons within the project footprint, and data points for the sampling points reflected on each of the wetlands impact maps in Alabama.

d. Please provide a scope of work as to how you will cross each of the wetland and waterbody crossings (i.e. horizontal directional drilling, or trench and backfill, etc.). If open-trenching methods would be utilized for any stream or waterbody crossings, then a survey of pre-construction contours should be submitted for each affected crossing.

e. Please provide details regarding how the applicant will mitigate for the loss of wetland functions as a result of this project in Alabama. The attached mitigation worksheet and ratio guidance for pipeline projects is also being sent to you electronically and the worksheet should be filled-out and returned. Also attached is the guidance regarding required mitigation for pipeline projects.

f. Please provide an assessment of threatened and endangered species in the wetlands and streams (federal permit area) within the project area (coordinate with U.S. Fish and Wildlife Service and the Alabama Department of Conservation and Natural Resources, and provide concurrence letters if any present).

g. Please provide information relating to any cultural resource locations within the wetlands or streams (federal permit area) along your proposed project (coordinate with Alabama Department of Archives and History, and provide concurrence letter).

h. I will be sending you copies of the electronic spreadsheets for documenting the waters of the U.S., wetland impacts, and wetland mitigation spreadsheets for the wetlands and streams impacts in Alabama.

As your application is considered incomplete, further evaluation of your request is being held in abeyance pending receipt of this additional information. If the required information has not been received by **October 19, 2012**, the file will be closed. Closure of your file at such time will not preclude you from re-opening the file at a later date should you wish to do so.

We appreciate your cooperation with the Corps of Engineers' Regulatory Program. Please contact me at (251) 694-3771 should you have any questions. For additional information about permitting and our Regulatory Program, visit our web site at www.sam.usace.army.mil/RD/reg, and please take a moment to complete our customer satisfaction survey while you're there. Your responses are appreciated and will allow us to improve our services.

Sincerely,

Michael B. Moxey
Team Leader, Inland Branch
Regulatory Division

9/20/2012

MM MOXEY/3771/ajr

RD-I-S

FILE

DEPARTMENT OF THE ARMY
U.S. ARMY ENGINEER DISTRICT, MOBILE
CORPS OF ENGINEERS
P.O. BOX 2288
MOBILE, ALABAMA 36628-0001

REPLY TO
ATTENTION OF

September 19, 2012

Inland Branch South
Regulatory Division

SWCA Environmental Consultants
Attention: Mr. Thomas Sankey
7255 Longtry, Suite 100
Houston, Texas 77040

Dear Mr. Sankey:

We are in receipt of your application for Department of the Army (DA) authorization for Nationwide Permit 12, for Pipeline Project. Project is located in Mobile County, Alabama.

This request has been assigned project file number **SAM-2012-00885-MBM,** which should be referred to in all future correspondence with this office. The request is also identified as **Plains Southcap, LLC.**

I will be reviewing this project and can be reached by telephone at (251) 694-3771, or by e-mail at michael.b.moxey@usace.army.mil or by mail to U. S. Army Engineer District, Attention: CESAM-RD-I-S, Leslie E. Turney, P.O. Box 2288, Mobile, Alabama, 36628-0001. I will let you know if additional information is needed before we can complete your request..

Please take a moment to visit our website and complete our customer satisfaction survey. Our website is **http://www.sam.usace.army.mil/RD/reg/**

Sincerely,

Michael B. Moxey
Team Leader, Inland Branch
Regulatory Division

ASSIGN TO PM: ✓ Mike Moxey ___ Rudy Villarreal ___ Damon Young ___ Leslie Turney ___ Brad Crosson ___ Sheri Zettle

NWP - Orange

ABG Co AL
Already has preapp permit #. SAM-2012-00885-MBM need folder

PROJECT NAME: Plains Southcap LLC - AL

WATERWAY: Upper Big Creek

3. NATIONWIDE PERMIT:

NWP 1 - Aids to Navigation.
NWP 2 - Structures in Artificial Canals
NWP 3 - Maintenance — PCN*
NWP 4 - Fish and Wildlife Harvesting, Enhancement, and Attraction Devices and Activities
NWP 5 - Scientific Measurement Devices — CR
NWP 6 - Survey Activities — CR
NWP 7 - Outfall Structures and Associated Intake Structures — PCN
NWP 8 - Oil and Gas Structures on the Outer Continental Shelf — PCN + CR
NWP 9 - Structures in Fleeting and Anchorage Areas
NWP 10 - Mooring Buoys
NWP 11 - Temporary Recreational Structures.
NWP 12 - Utility Line Activities — PCN + CR (circled)
~~NWP 13 - Bank Stabilization — PCN* + CR~~
NWP 14 - Linear Transportation Projects. PCN + CR
NWP 15 - U.S. Coast Guard Approved Bridges
NWP 16 - Return Water From Upland Contained Disposal Areas
NWP 17 - Hydropower Projects — PCN
NWP 18 - Minor Discharges — PCN
NWP 19 - Minor Dredging
NWP 20 - Oil Spill Cleanup
NWP 21 - Surface Coal Mining Activities — PCN + CR
NWP 22 - Removal of Vessels — PCN + CR
NWP 23 - Approved Categorical Exclusions — PCN
NWP 24 - Indian Tribe or State Administered Section 404 Program
NWP 25 - Structural Discharges
NWP 27 - Aquatic Habitat Restoration, Establishment, & Enhancement Activities — PCN + CR
NWP 28 - Modifications of Existing Marinas
NWP 29 - Residential Developments — PCN + CR
NWP 30 - Moist Soil Management for Wildlife CR
NWP 31 - Maintenance of Existing Flood Control Facilities — PCN + CR
NWP 32 - Completed Enforcement Actions — CR
NWP 33 - Temporary Construction, Access, and Dewatering — PCN + CR
NWP 34 - Cranberry Production Activities — PCN
NWP 35 - Maintenance Dredging of Existing Basins
NWP 36 - Boat Ramps — PCN* + CR.
NWP 37 - Emergency Watershed Protection and Rehabilitation — PCN + CR
NWP 38 - Cleanup of Hazardous and Toxic Waste - PCN
NWP 39 - Commercial and Institutional Developments — PCN + CR
NWP 40 - Agricultural Activities — PCN + CR
NWP 41 - Reshaping Existing Drainage Ditches - - PCN
NWP 42 - Recreational Facilities -PCN + CR
NWP 43 - Stormwater Management Facilities — PCN* + CR
NWP 44 - Mining Activities — PCN + CR
NWP 45 - Repair of Uplands Damaged by Discrete Events — PCN
NWP 46 - Discharges in Ditches — PCN
NWP 47 - Pipeline Safety Program Designated Time Sensitive Inspections and Repairs.
NWP 48 - Commercial Shellfish Aquaculture Activities — PCN
NWP 49 - Coal Remining Activities — PCN* + CR
NWP 50 - Underground Coal Mining — PCN + CR

CR - ALL areas-Cultural Resource clearance required.
PCN* - See NWP Permit for special PCN conditions.

4. NATURE OF ACTIVITY: Section 10 ______ Section 404 ✓ Section 10/404 ____

5. PROJECT PURPOSE: Use will be Residential, Commercial, Municipal, or Governmental

Date received by RD 9/13/2012

TL to AA: By MBM on 9/18/2012

[illegible] By ______ on ______

SWCA®
ENVIRONMENTAL CONSULTANTS
Sound Science. Creative Solutions.

Houston Office
7255 Langtry, Suite 100
Houston, Texas 77040
Tel 713.934.9900 Fax 713.934.9906
www.swca.com

SAM-2012-885-MM
Plains Southeast LLC

September 12, 2012

Michael B. Moxey
U. S. Army Corp of Engineers, Mobile District
CESAM-RD
109 St. Joseph Street
P.O. Box 2288
Mobile, AL 36628-0001

Re: Plains 41-Mile Ten-Mile to Pascagoula Pipeline Project

Mr. Moxey:

Enclosed within this package are three DVD-Rs that include all of the information in regards to the permit application for the Pascagoula 41-Mile Ten Mile to Pascagoula Pipeline Project. DVD-R #1 includes the PCN permit documents for the Alabama portion of the project and one for the Mississippi portion of the project, DVD-R #2 includes separate attachments of the overall permit application (including the Wetland Delineation Report, Threatened and Endangered Species Report, map books, and data sheets, and DVD-R #3 includes a comprehensive photographic log of the wetland Delineation. Our client would like to receive approval for this project by the end of the year.

If you have questions or require additional information regarding this matter, please contact me at 713-934-9900 or tsankey@swca.com.

Sincerely,
SWCA ENVIRONMENTAL CONSUTLANTS

R. Thomas Sankey, PWS, CSE
Senior Project Manager/Senior Ecologist
Houston Natural Resources

SEP 17

SWCA®
ENVIRONMENTAL CONSULTANTS
Sound Science. Creative Solutions.

Houston Office
7255 Langtry, Suite 100
Houston, TX 77040
Tel 713.934.9900 Fax 713.934.9906
www.swca.com

September 12, 2012

Michael B. Moxey
U. S. Army Corp of Engineers, Mobile District
CESAM-RD
109 St. Joseph Street
P.O. Box 2288
Mobile, AL 36628-0001

Re: Plains 41-Mile Ten-Mile to Pascagoula Pipeline Project
Alabama Portion

Mr. Moxey:

Plains Southcap, LLC, (Plains) requested that SWCA Environmental Consultants (SWCA) complete a wetland and waters delineation, a threatened and endangered species evaluation, a cultural resources survey, and a Pre-construction Notification (PCN) for a proposed 41-mile 24-inch diameter crude oil pipeline. The project area begins at the Plains Ten-Mile Crude Oil Facility in Mobile County, Alabama, located approximately 11 miles northwest of downtown Mobile, and extends southwest towards Pascagoula, Mississippi. The line terminates at the Chevron Pascagoula Refinery approximately one mile from the Gulf of Mexico (project area).

This PCN addresses the Alabama portion (18.63 miles) of this 41-mile pipeline project. A separate PCN document will be submitted for the remaining 22.37 miles of the pipeline project that occurs within Jackson County, Mississippi.

Please find attached to this letter the Nationwide Permit 12 Pre-construction Notification, maps and schematics, plan and profile exhibits for horizontal directional drills under Section 10 waters, Preliminary Jurisdictional Determination Form, Wetland Delineation Report, Threatened and Endangered Species Report, and Cultural Resources Report for your review. A mitigation plan will be submitted to you within 21 calendar days of the date of this letter.

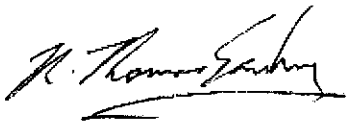
SWCA, as authorized agent for Plains, is requesting a preliminary jurisdictional determination for all potential waters of the United States in the project area, as well as NWP 12 authorization for construction of this project.

SWCA®
ENVIRONMENTAL CONSULTANTS
Sound Science. Creative Solutions.

Houston Office
7255 Langtry, Suite 100
Houston, TX 77040
Tel 713.934.9900 Fax 713.934.9906
www.swca.com

If you have questions or require additional information regarding this matter, please contact me at 713-934-9900 or tsankey@swca.com.

Sincerely,
SWCA ENVIRONMENTAL CONSUTLANTS



R. Thomas Sankey, PWS, CSE
Senior Project Manager/Senior Ecologist
Houston Natural Resources

Attachments: Pre-construction Notification

PRE-CONSTRUCTION NOTIFICATION
PLAINS 41-MILE TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
JACKSON COUNTY, MISSISSIPPI AND MOBILE COUNTY, ALABAMA
(ALABAMA PORTION 18.63 MILES)
September 12, 2012

The following paragraphs contain information relative to Items 1 through 7 as required under General Condition 31 (b) of Nationwide Permit (NWP) 12 (Utility Line Activities), NWP Regional Conditions dated May 12, 2007.

(1) Prospective Permittee Contact Information

Permittee:
Plains Southcap, LLC
333 Clay Street, Suite 1600
Houston, TX 7702
(303) 605-1931
Contact: Steve Lee
SRlee@paalp.com

Agent:
SWCA Environmental Consultants
7255 Langtry, Suite 100
Houston, Texas 77040
(713) 934-9900
Contact: Tom Sankey
tsankey@swca.com

(2) Proposed Project Location

Plains Southcap, LLC (Plains) requested that SWCA Environmental Consultants (SWCA) complete a wetland and waters delineation for a proposed 41-mile 24-inch diameter crude oil pipeline project. The project area begins at the Plains Ten-Mile Crude Oil Facility in Mobile County, Alabama, located approximately 11 miles northwest of downtown Mobile, and extends southwest towards Pascagoula, Mississippi. The line ends at the Chevron Pascagoula Refinery approximately one mile from the Gulf of Mexico (project area). The project area is shown in **Attachment A.**

(3) Proposed Project Description

Construction of the proposed project is slated to begin in March 2013 and end before September 2013. No fill material will be placed within waters or wetlands for more than three months.

The proposed project will consist of the construction and placement of approximately 41 miles of 24-inch diameter pipeline. Construction of the pipeline will be within a 75-foot-wide right-of-way (ROW) and will consist of clearing vegetation, excavating a trench, laying the pipe, replacing the soil, adjusting the topography to match pre-construction contours, and re-establishing vegetation. A permanent 50-foot-wide easement will be maintained and mowed on a regular basis. Please refer to **Attachment A** for an illustration of the ROW showing both temporary and permanent easements within the project area. Cross-sectional illustrations for open-cut techniques and site-specific plan and profile exhibits for horizontal directional drills (HDD) under Rivers and Harbor Act, Section 10 waters are also included in **Attachment A**.

Project Purpose

The proposed project will be constructed to transport petroleum liquids from the Plains Ten-Mile storage facility in north Mobile County, Alabama to the Chevron Pascagoula Refinery, in southeastern Jackson County, Mississippi.

Conversions

SWCA identified and delineated a total of 262 wetlands within the project area. Of those 262 wetlands, 121 were delineated within the Alabama portion of the project. The project plans do not include permanently raising the elevation of any wetland areas or placing impervious materials in wetland areas. All wetlands and other waters in the project area will be restored to pre-construction contours. The proposed project will have no permanent impacts on wetlands, except for the permanent conversion of palustrine scrub/shrub (PSS) and palustrine forested (PFO) wetlands to palustrine emergent (PEM) wetlands immediately adjacent to existing pipeline and power line corridors.

Plains will use HDDs to avoid and minimize areas of impacts wherever practical. Other areas along the line have had the pipeline footprint reduced or "necked down" in order to minimize disturbances and impacts to gopher tortoise (*Gopherus polyphemus*) pod locations as well as wetland complexes.

Plains' ROW through these wetlands follows an existing power line corridor, minimizing further fragmentation. Given these considerations, Plains finds the use of HDDs at these locations impracticable, but has completely avoided impacts to all other PSS/PFO wetlands along the project route.

Open-cutting certain wetlands will cause the displacement of woody vegetation which will be permanently maintained (mowed) within the 50-foot-wide permanent easement. The area outside of the permanent easement will be allowed to revegetate naturally, causing only a temporary conversion of these areas from PSS and PFO wetlands to PEM wetlands.

Table 1 provides the total crossing lengths and total acreages for each type of wetland community within the project area's 200-foot-wide survey corridor, 50-foot permanent easement, and 25-foot temporary construction easement within the 18.63 miles of proposed line in Mobile County, Alabama.

Table 1. Wetland Summary Table (Alabama Portion)

Type	Crossing Length at Centerline (feet)	Total Acreages			
		200-Foot Survey Corridor	Within Temporary Easement	Within Permanent Easement	Horizontal Directional Drill Area
PEM Wetlands	1,587.50	36.957	0.212	2.403	1.137
PSS Wetlands	511.79	2.686	0.062	0.711	0.00
PFO Wetlands	21,085.39	66.604	11.239	21.487	0.956
Totals:	**23,184.69**	**106.247**	**11.513**	**24.601**	**2.093**

SWCA identified and delineated a total of 27 streams and 5 other waterbodies within the Alabama portion of the project area. There are no Section 10 water crossings within the Alabama portion of this project.

SWCA identified a total of five other waterbodies within the Alabama portion of the project area, most of which were man-made ponds. **Table 2** below provides the crossing lengths and total acreages for each type of stream and other waterbodies within the project area's 200-foot-wide survey corridor and construction corridor.

Table 2. Waterbody Summary Table (Alabama Portion)

Type	Crossing Length at Centerline (feet)	Total Acreages		
		200-Foot Survey Corridor	Within Temporary Easement	Within Permanent Easement
Ephemeral Streams	20.58	0.121	0.018	0.022
Intermittent Streams	53.86	0.173	0.013	0.035
Perennial Streams	246.01	1.230	0.146	0.199
Other Waterbodies	163.23	0.891	0.002	0.145
Totals:	**483.68**	**2.414**	**0.179**	**0.401**

(4) Delineation of Special Aquatic Sites and Other Waters of the U.S.

SWCA conducted a wetland delineation of the areas that will be impacted by the project. SWCA conducted this delineation in accordance with the methods described in the 1987 *USACE Wetland Delineation Manual* (Manual) (USACE 1987) and the *Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Atlantic and Gulf Coastal Plain Region* (Supplement) (USACE 2010). The results of this delineation are documented in the attached wetland delineation report (**Attachment B**). The attached maps depict all potential waters of the U.S., including wetlands and Section 10 waters located within the temporary and permanent easements crossed by the project.

SWCA has included a preliminary jurisdictional form and aquatics resources and impacts tables in **Attachment C**.

(5) Description of Avoidance, Minimization, and Compensation

Avoidance and Minimization

Plains proposes to construct all activities using currently acceptable and preferable construction methods and best management practices (BMPs) such as silt fencing, matting, and hay bales. These will be in place prior to commencement of construction and will be designed to avoid/minimize soil erosion and sedimentation into adjacent wetlands and waterbodies.

All construction activities will take place in accordance with all NWP General Conditions, including the requirements related to aquatic life movements, soil erosion and sediment controls, proper maintenance, endangered species, historic properties and water quality.

Plains has designed the footprint of the construction corridor to be as small as possible, while still serving the project needs in order to minimize impacts to waters of the U.S. After construction, all temporarily impacted waterbodies and wetlands will be restored to pre-construction conditions/contours.

In addition to these minimization measures, Plains will avoid several wetland and stream features that were originally within the construction footprint by implementing HDDs and alterations to the construction footprint to the maximum extent practical. There are no listed Section 10 water crossings within the Alabama area of this project. In addition to the PFO and PSS wetlands, numerous gopher tortoise pods will be avoided by HDDs.

Mitigation and Compensation

Emergent wetlands will be restored to pre-construction contours and allowed to naturally re-vegetate, causing a temporary impact only. Mitigation is not proposed for temporary impacts to emergent wetlands. Plains proposes to mitigate for permanent conversion of PSS and PFO wetlands that will be open-cut and will be permanently converted into PEM wetlands. A Mitigation Plan that describes the proposed compensation for these conversions will be sent within 21 calendar days from the date of this document.

(6) Threatened and Endangered Species Review

SWCA conducted a threatened and endangered species assessment for the proposed project in order to facilitate compliance with the Endangered Species Act of 1973, as amended. The Alabama Nature Heritage Program's NDD data (2011) lists a total of 16 federally threatened or endangered species that have the potential to occur in Mobile County, Alabama. The Alabama and Mississippi USFWS NDD (2011) lists one candidate species as well as one delisted species that has the potential to occur in both counties. Additionally the Alabama NDD (2011) lists one important state listed species. The attached Threatened and Endangered Species Report summarizes the habitat requirements, the potential for occurrence, and possible effects on these species. All currently listed candidate, threatened, or endangered species that are assigned the occurrence categories "known to occur" or "may occur" and which may be affected, are discussed in detail in Sections 3.4.1 through 3.4.13 of the attached Threatened and Endangered Species Report (**Attachment D**).

SWCA determined that six protected species may occur within the project area, including the bald eagle (*Haliaeetus leucocephalus*), the yellow-blotched map turtle (*Graptemys flavimaculata*), the eastern indigo snake (*Drymarchon corais couperi*), the black pine snake (*Pituophis melanoleucus lodingi*), the Gulf sturgeon (*Acipenser oxyrinchus desotoi*), and the iron color shiner (*Notropis chaybacus*). SWCA also determined that the gopher tortoise (*Gopherus polyphemus*) is likely to occur in the project area. Of these species, the bald eagle and the gopher tortoise are the most likely to occur in the project area and are discussed below.

SWCA biologists conducted a helicopter survey of the project area to identify the location of bald eagle nests near the Escatawpa River. According to the National Bald Eagle Management Guidelines published by the USFWS, oil and gas construction projects should be constructed no closer than 660 feet (0.125-mile) from bald eagle nests. No bald eagle nests were located within the Alabama portion of this project. It is SWCA's opinion that the proposed project may affect, but is likely to not adversely affect bald eagles. A second helicopter survey will be conducted in late December 2012 or early January 2013 to verify the project will not adversely affect this species.

SWCA Certified Gopher Tortoise Agent Eric Munscher (Permit # GTA-09-00286A) surveyed the entire 41-mile project route for the presence/absence of gopher tortoises. Mr. Munscher documented 254 burrows along the proposed route. Of the 254 burrows, 145 burrows are located within the 200' project corridor. Of the burrows located within the 200' survey corridor 109 were considered active.

A total of 174 burrows were documented within the Alabama portion of the project. Of the 174 burrows identified in Alabama, 74 were considered active. Due to Plains ability to narrow the ROW, the majority of these burrows have been avoided. Only five active burrows occur within the Alabama portion of the construction ROW.

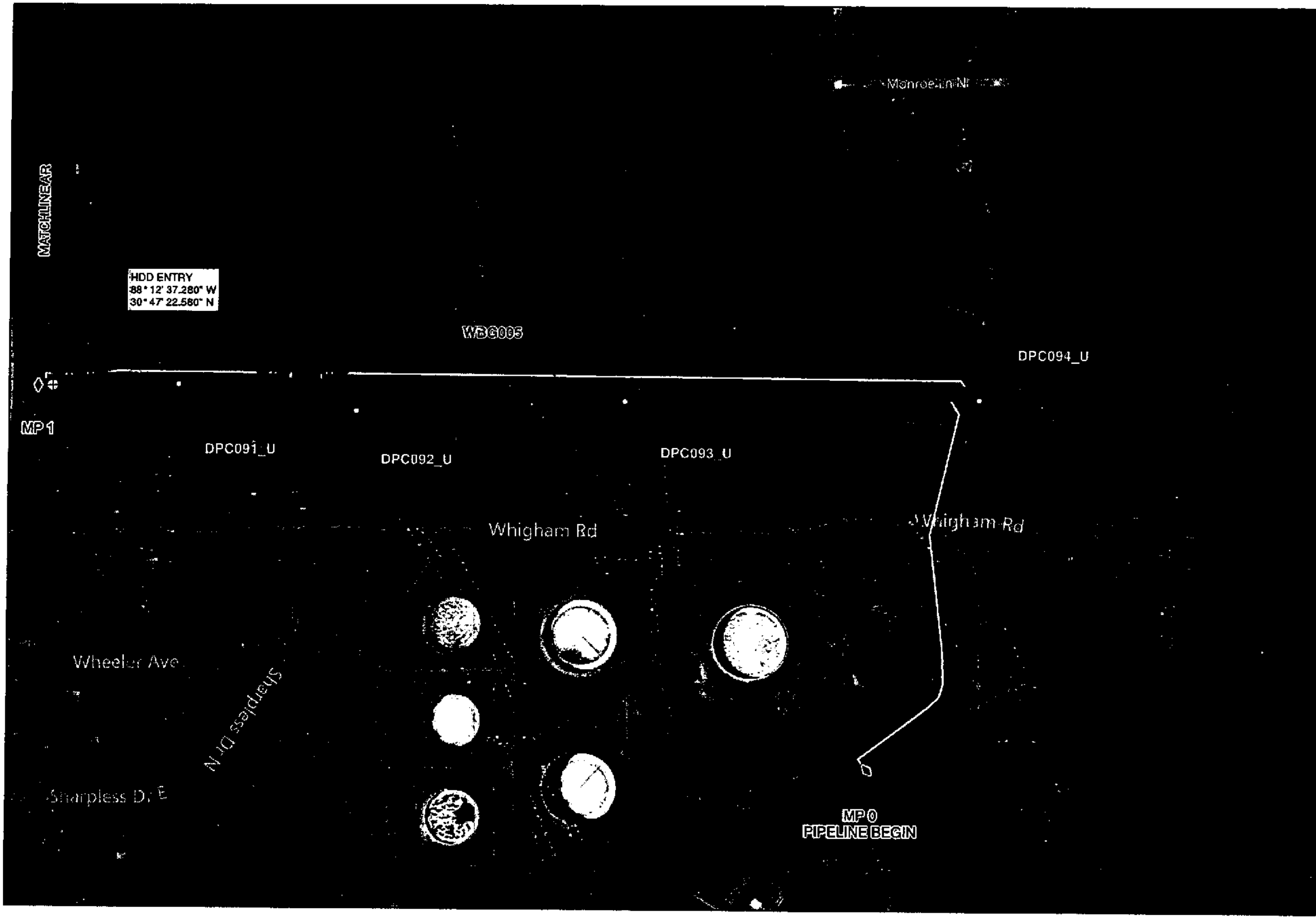
Please refer to the Threatened and Endangered Species Report in **Attachment D** for the results of the threatened and endangered species assessment, as well as recommended mitigation measures.

(7) Cultural and Historical Resources Review

SWCA conducted a cultural resources survey for the project area. The results of this survey are provided in the attached Cultural Resources Report (**Attachment E**).

Attachment A

PCN Maps, Figures and Drawings



SWCA ENVIRONMENTAL CONSULTANTS

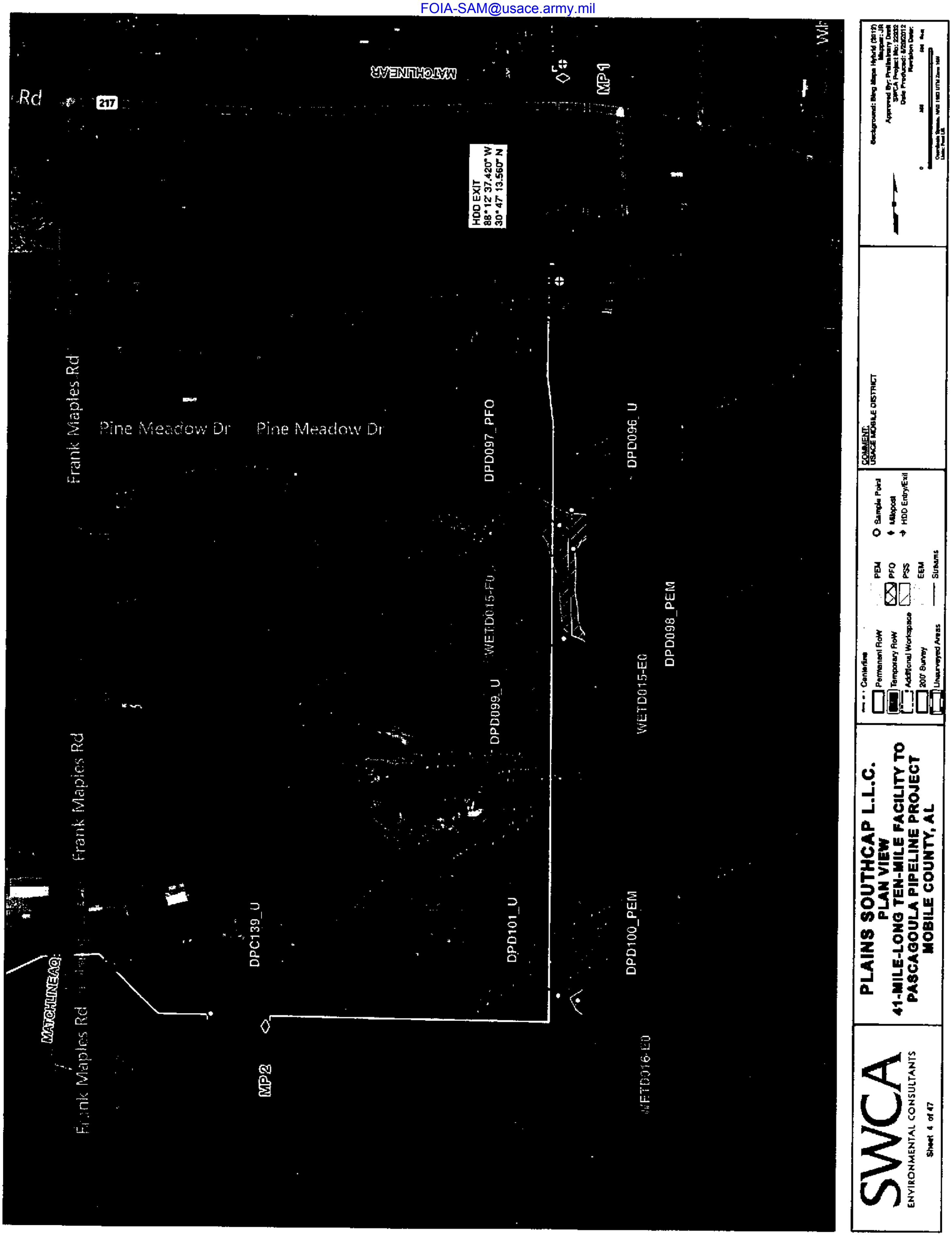
Sheet 3 of 47

PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

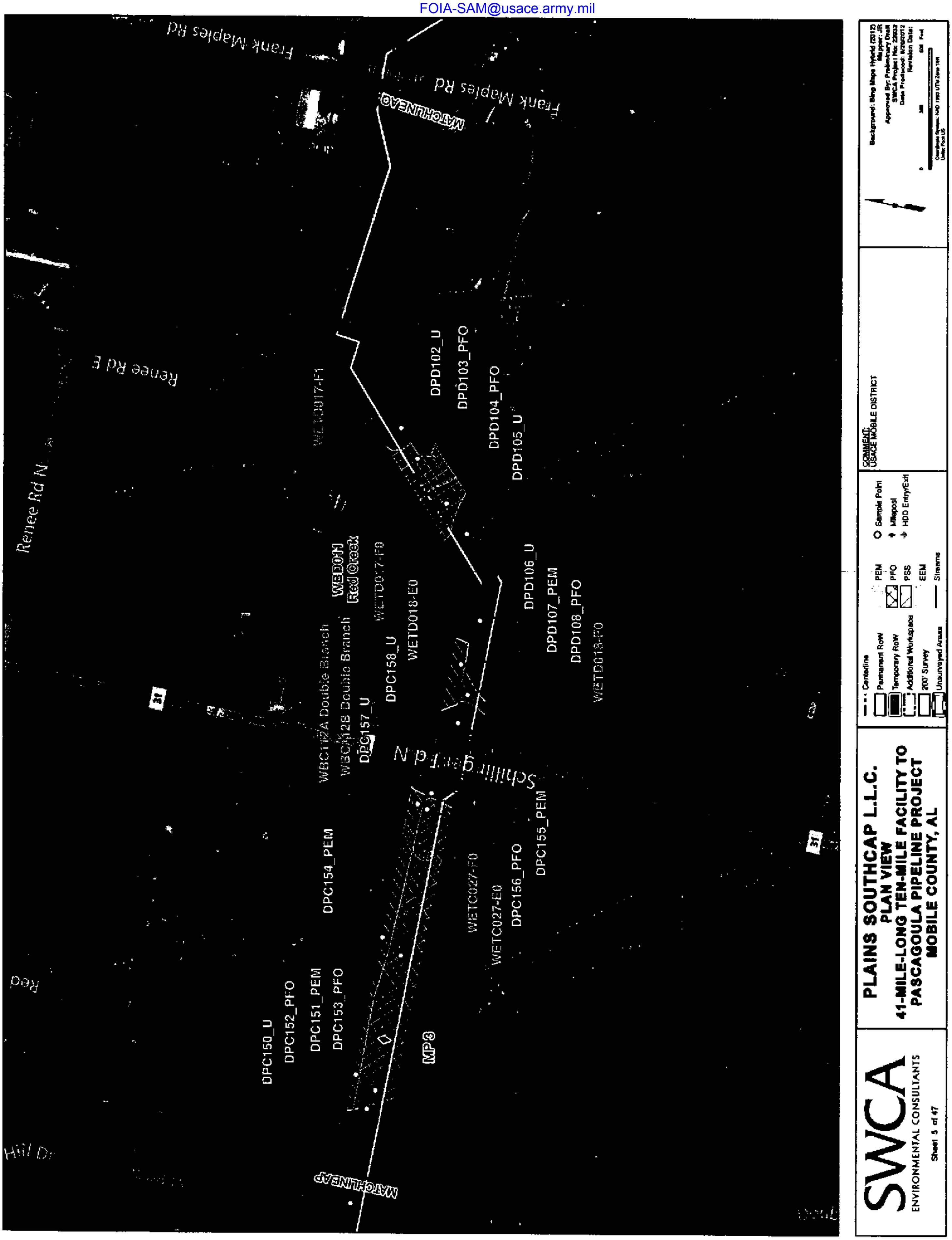
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit

COMMENT:
USACE MOBILE DISTRICT

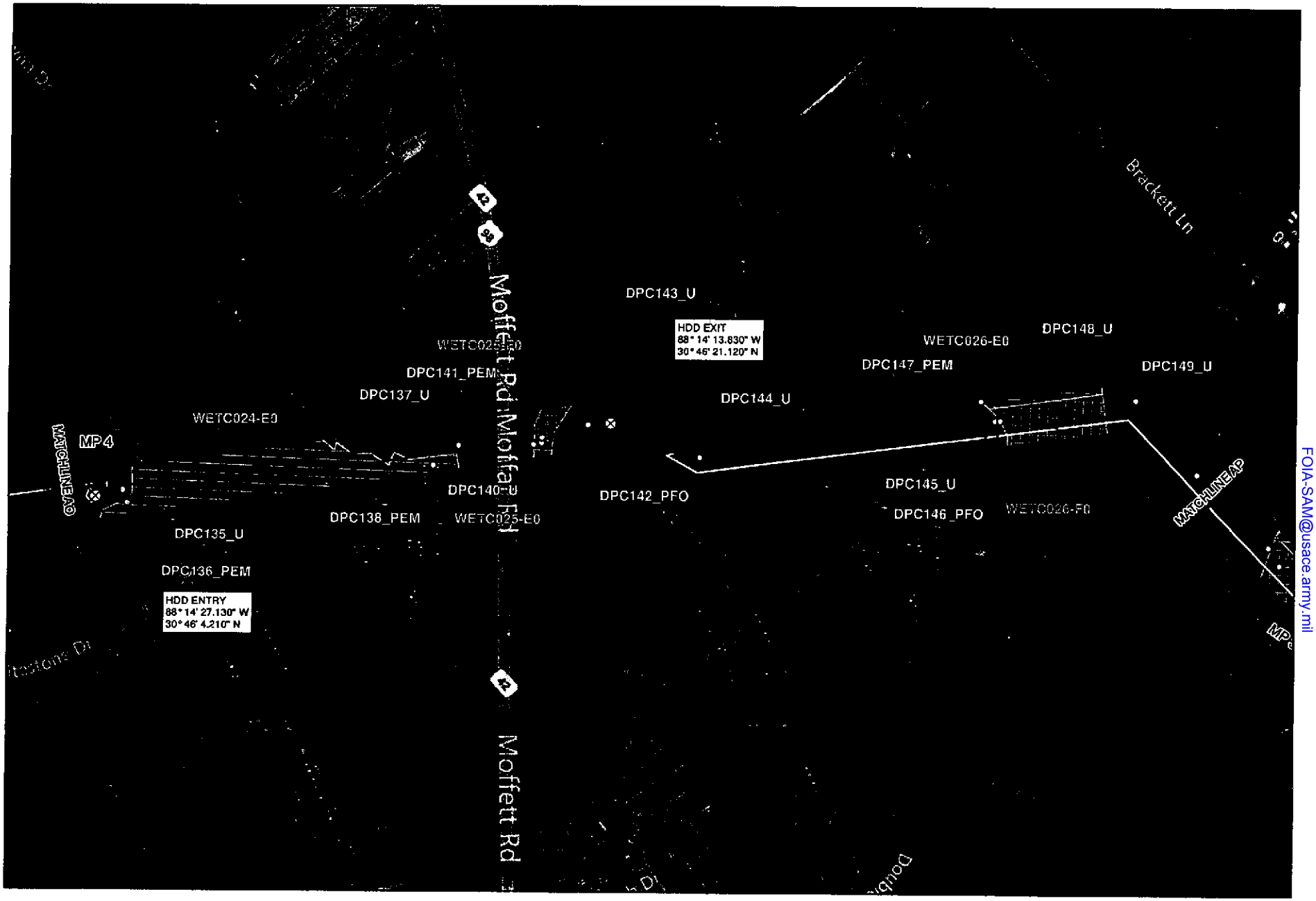
Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22933
Date Produced: 8/20/2012
Revision Date:


MATCHLINE AR
MP1
217
Rd
HDD EXIT
88° 12' 37.420" W
30° 47' 13.560" N
Frank Maples Rd
Pine Meadow Dr
Pine Meadow Dr
DPD097_PFO
DPD096_U
WETD015-FO
DPD098_PEM
DPD099_U
WETD015-EO
Frank Maples Rd
DPC139_U
DPD101_U
DPD100_PEM
MATCHLINE AQ
Frank Maples Rd
MP2
WETD016-EO
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 4 of 47
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
2007 Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Surfaces
Sample Point
Milepost
HDD Entry/Exit
COMMENT:
USACE MOBILE DISTRICT

AS REQUIRED BY THE FREEDOM OF INFORMAITON ACT (FOIA) THIS FILE IS BEING MADE AVAILABLE ONLINE BECAUSE THE MOBILE DISTRICT FOIA OFFICE HAS RECEIVED MORE THAN THREE (3) REQUESTS FOR SAME. ANY QUESTIONS ABOUT THE FOIA PROCESS MUST BE DIRECTED TO OUR FOIA OFFICE. FOIA-SAM@usace.army.mil



Frank Maples Rd
Frank Maples Rd
MATCHLINE A0
Renee Rd E
Renee Rd N
WETD017-F1
DPD102_U
DPD103_PFO
DPD104_PFO
DPD105_U
WBD011 Red Creek
WETD017-F0
WETD018-E0
DPD106_U
DPD107_PEM
DPD108_PFO
WETD018-F0
WBC112A Double Branch
WBC112B Double Branch
DPC157_U
DPC158_U
Schillinger Rd N
31
DPC154_PEM
WETC027-F0
WETC027-E0
DPC156_PFO
DPC155_PEM
Red
DPC150_U
DPC152_PFO
DPC151_PEM
DPC153_PFO
MP 3
Hill Dr
MATCHLINE
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
COMMENT: USACE MOBILE DISTRICT
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 5 of 47



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 6 of 47

PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

- Centerline
- Permanent RoW
- Temporary RoW
- Additional Workspace
- 200' Survey
- Unsurveyed Areas
- PEM
- PFO
- PSS
- EEM
- Streams
- Sample Point
- Milepost
- HDD Entry/Exit

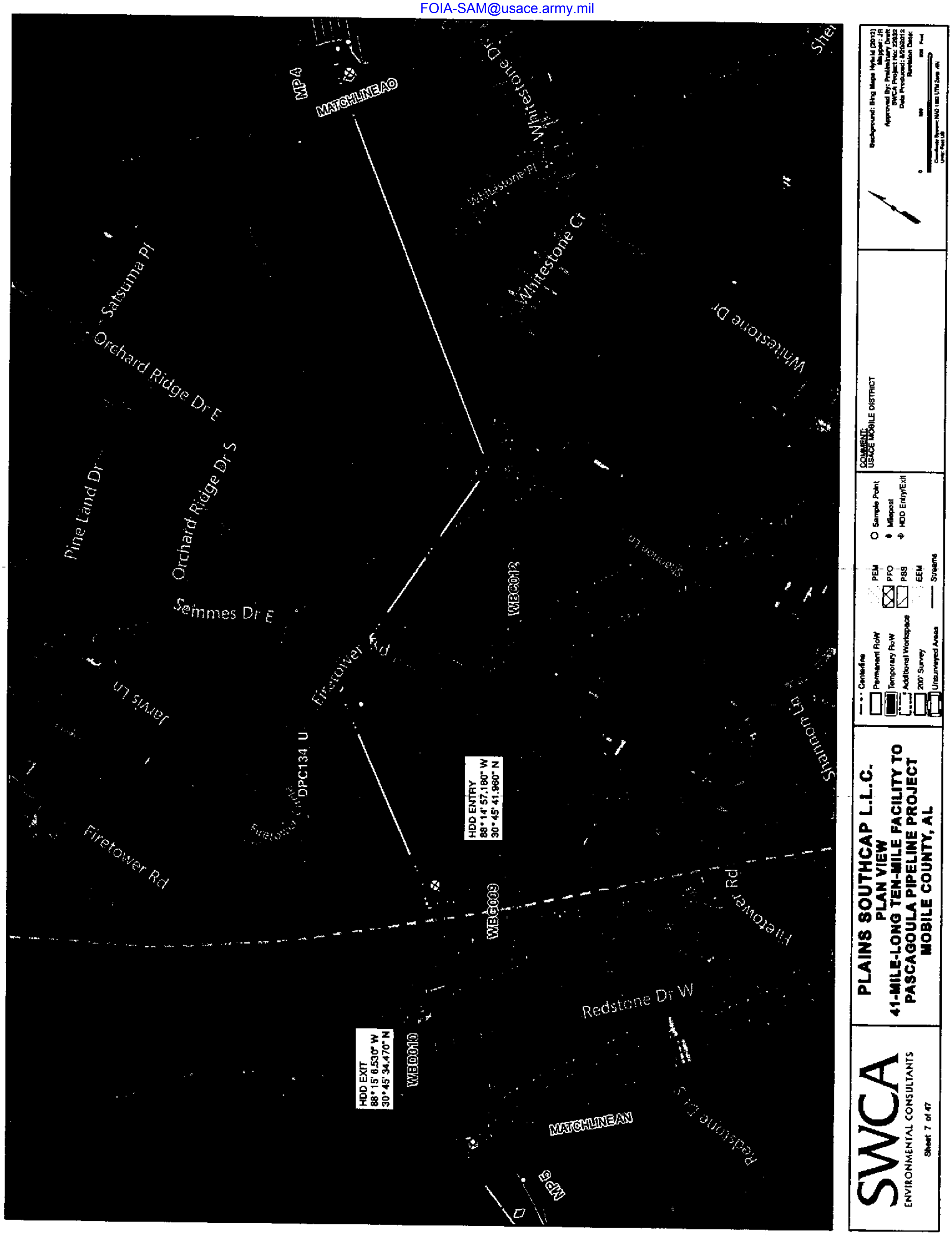
COMMENT:
USACE MOBILE DISTRICT

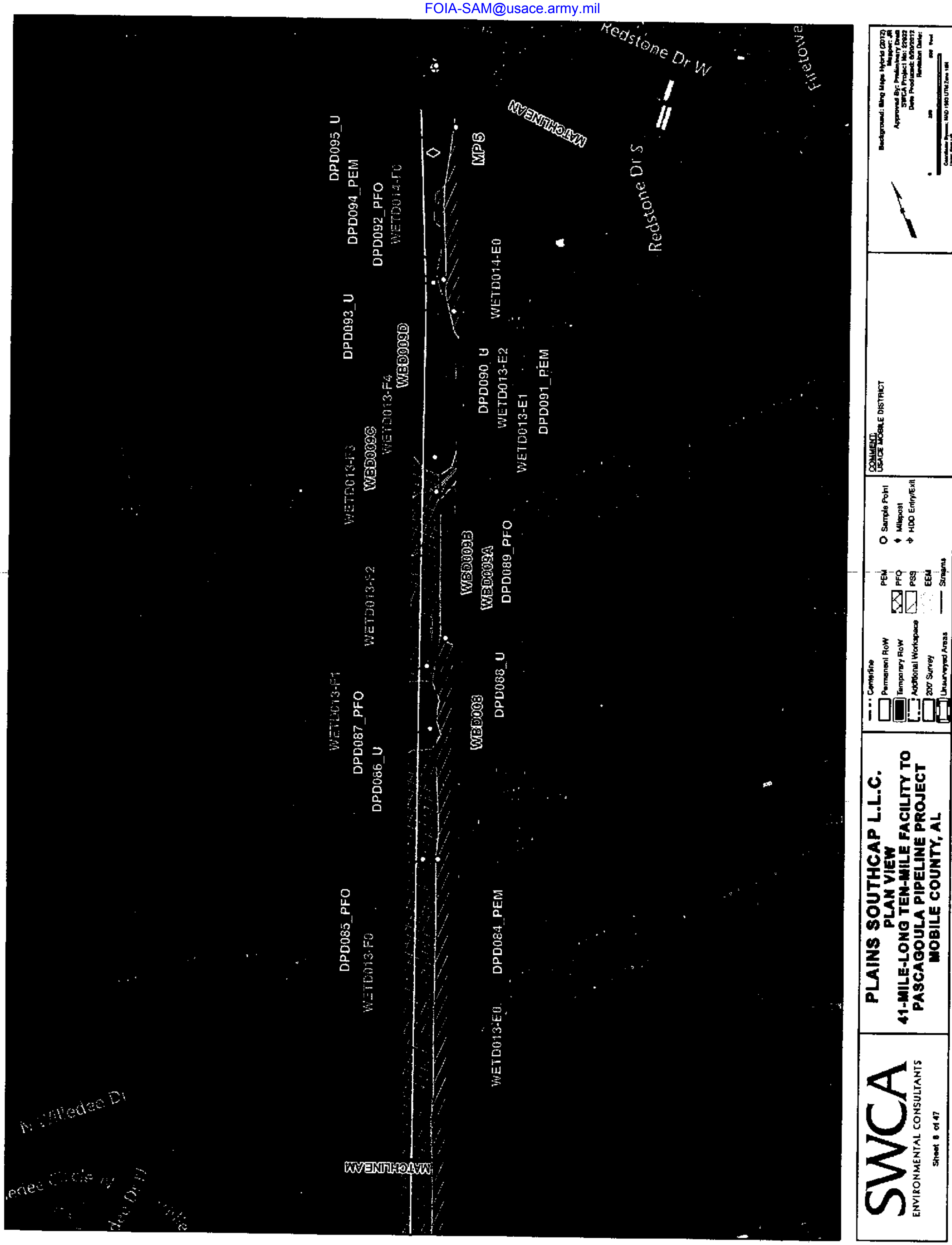
Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 20032
Date Produced: 8/20/2012
Revision Date:

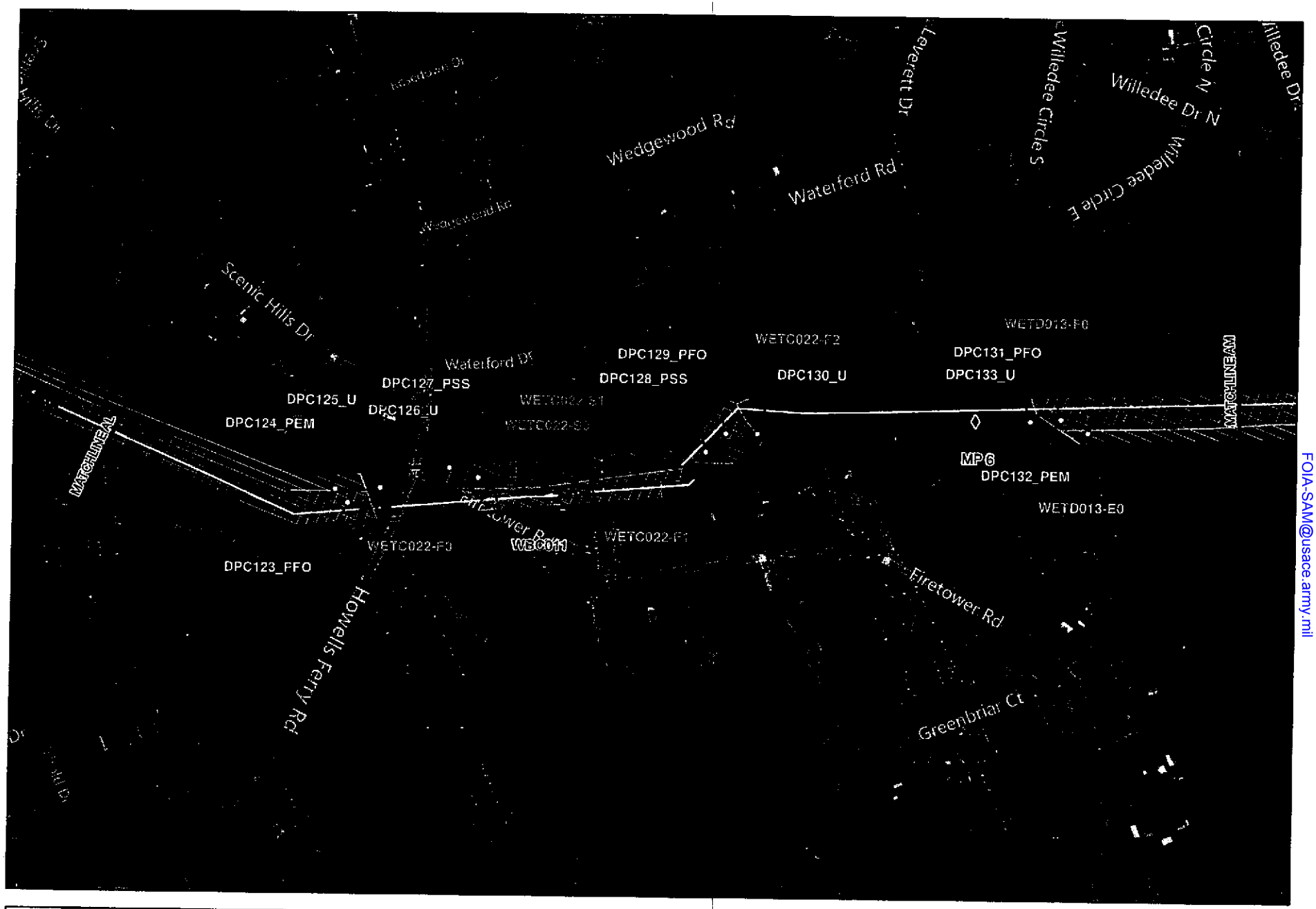
0 500 1,000 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Foot US

Path: C:\Users\jrosales\Desktop\My_Projects\20032_Pascagoula_Pipeline\MAPS\mxd\Report Maps\POM\FOA Plan Views.mxd


MP4
MATCHLINE AO
Whitestone Dr
Whitestone Pl
Whitestone Ct
Satsuma Pl
Orchard Ridge Dr E
Orchard Ridge Dr S
Pine Land Dr
Semmes Dr E
Firetower Rd
Jarvis Ln
DPC134
WBC012
Shannon Ln
HDD ENTRY
88° 14' 57.180" W
30° 45' 41.960" N
WBC009
Redstone Dr W
HDD EXIT
88° 15' 6.530" W
30° 45' 34.470" N
WBD010
MATCHLINE AN
MP5
Redstone Dr
COMMENT:
USACE MOBILE DISTRICT
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 7 of 47


Redstone Dr W
Redstone Dr S
MATCHLINE AN
MATCHLINE AM
MP 5
DPD095_U
DPD094_PEM
DPD092_PFO
WETD014-F0
WETD014-E0
DPD093_U
WBD009D
WETD013-F4
WBD009C
WETD013-F3
DPD090_U
WETD013-E2
WETD013-E1
DPD091_PEM
WETD013-F2
WBD009B
WBD009A
DPD089_PFO
WETD013-F1
DPD087_PFO
DPD086_U
WBD008
DPD088_U
DPD085_PFO
WETD013-F0
DPD084_PEM
WETD013-E0
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 8 of 47
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
20' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
COMMENT:
USACE MOBILE DISTRICT



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 9 of 47

PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit

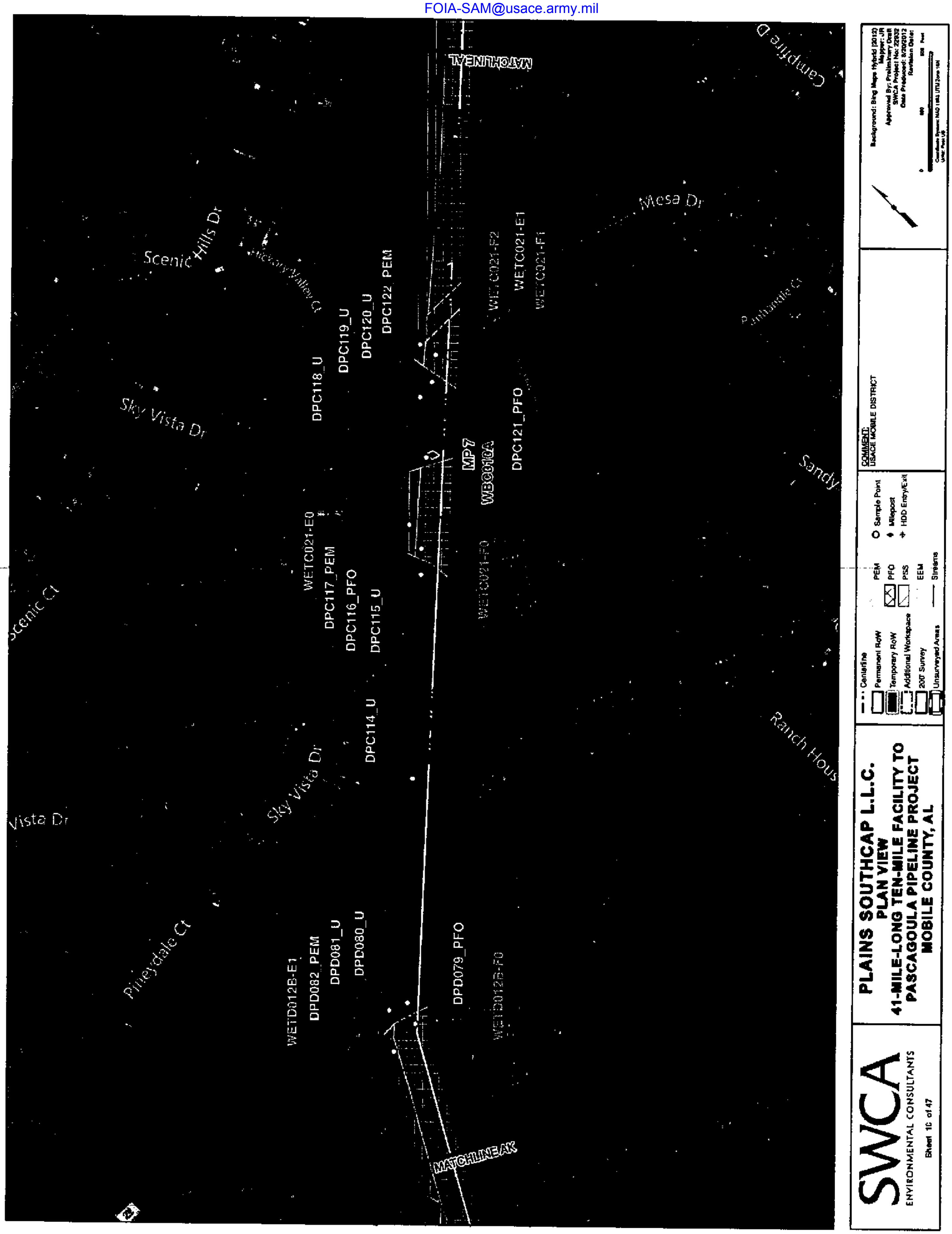
COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 8/20/2012
Revision Date:

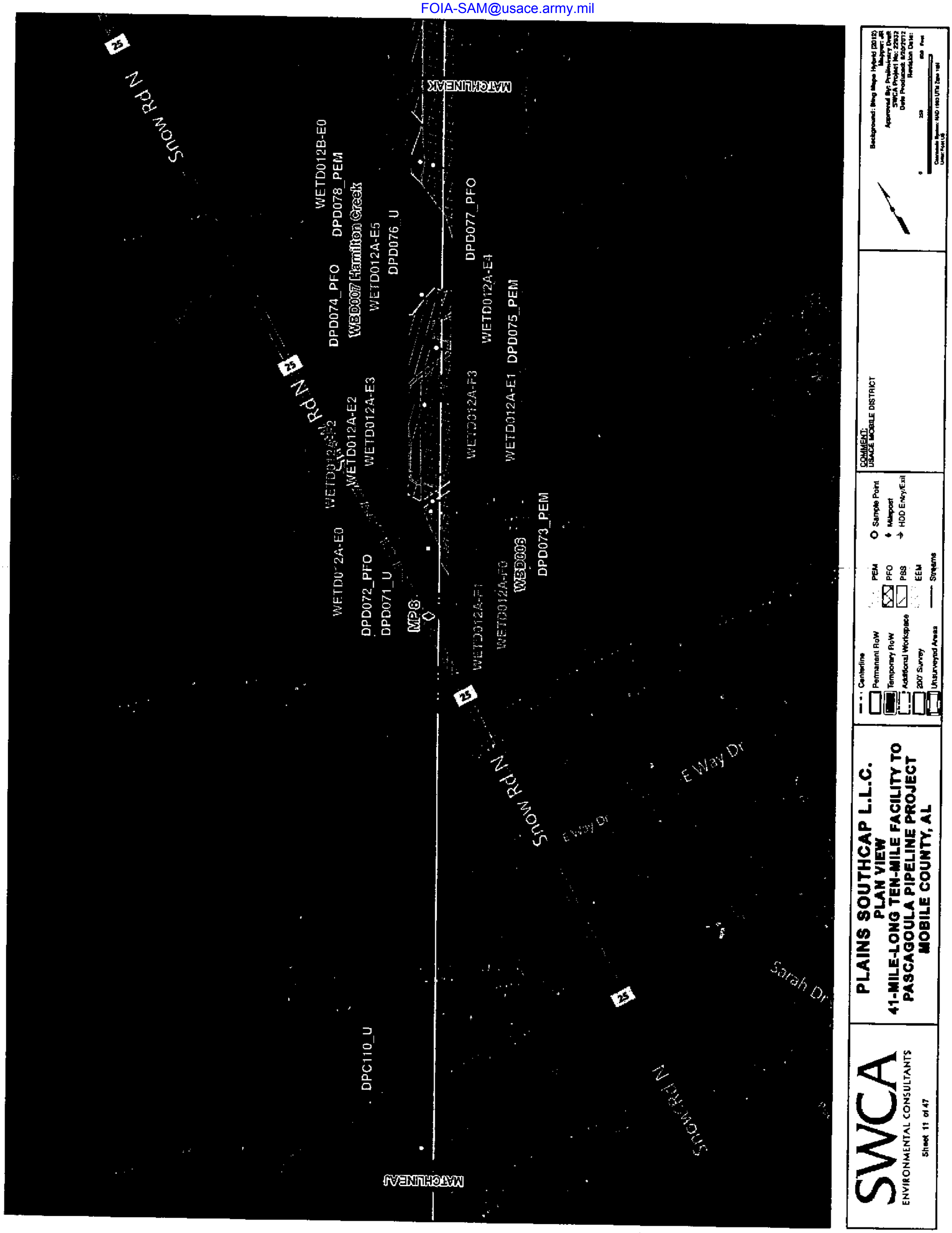
Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

Path: C:\Users\jrstahl\Desktop\My_Projects\22932_Pascagoula_Pipeline\MAP\Smart\Report Maps\PCMAP04 Plan Views.mxd

AS REQUIRED BY THE FREEDOM OF INFORMAITON ACT (FOIA) THIS FILE IS BEING MADE AVAILABLE ONLINE BECAUSE THE MOBILE DISTRICT FOIA OFFICE HAS RECEIVED MORE THAN THREE (3) REQUESTS FOR SAME. ANY QUESTIONS ABOUT THE FOIA PROCESS MUST BE DIRECTED TO OUR FOIA OFFICE.
FOIA-SAM@usace.army.mil



MATCHLINE AL
Campfire D
Mesa Dr
Scenic Hills Dr
DPC118_U
DPC119_U
DPC120_U
DPC122_PEM
WETC021-F2
WETC021-E1
WETC021-F1
Sky Vista Dr
MP7
WBC010A
DPC121_PFO
Sandy
WETC021-E0
DPC117_PEM
DPC116_PFO
DPC115_U
WETC021-F0
Scenic Ct
DPC114_U
Sky Vista Dr
Ranch Hous
Vista Dr
Pineydale Ct
WETD012B-E1
DPD082_PEM
DPD081_U
DPD080_U
DPD079_PFO
WETD012B-F0
MATCHLINE AK
COMMENT:
USACE MOBILE DISTRICT
Sample Point
Milepost
HDD Entry/Exit
PEM
PFO
PSS
EEM
Streams
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS


Snow Rd N
WETD012B-E0
DPD078_PEM
DPD074_PFO
WBD007 Hamilton Creek
WETD012A-E5
DPD076_U
DPD077_PFO
WETD012A-E4
DPD075_PEM
WETD012A-E2
WETD012A-E3
WETD012A-F3
WETD012A-E1
DPD073_PEM
WBD006
DPD072_PFO
DPD071_U
MP 8
E Way Dr
Sarah Dr
DPC110_U
MATCHLINE A
MATCHLINE A
COMMENT: USACE MOBILE DISTRICT
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 11 of 47

SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 12 of 47

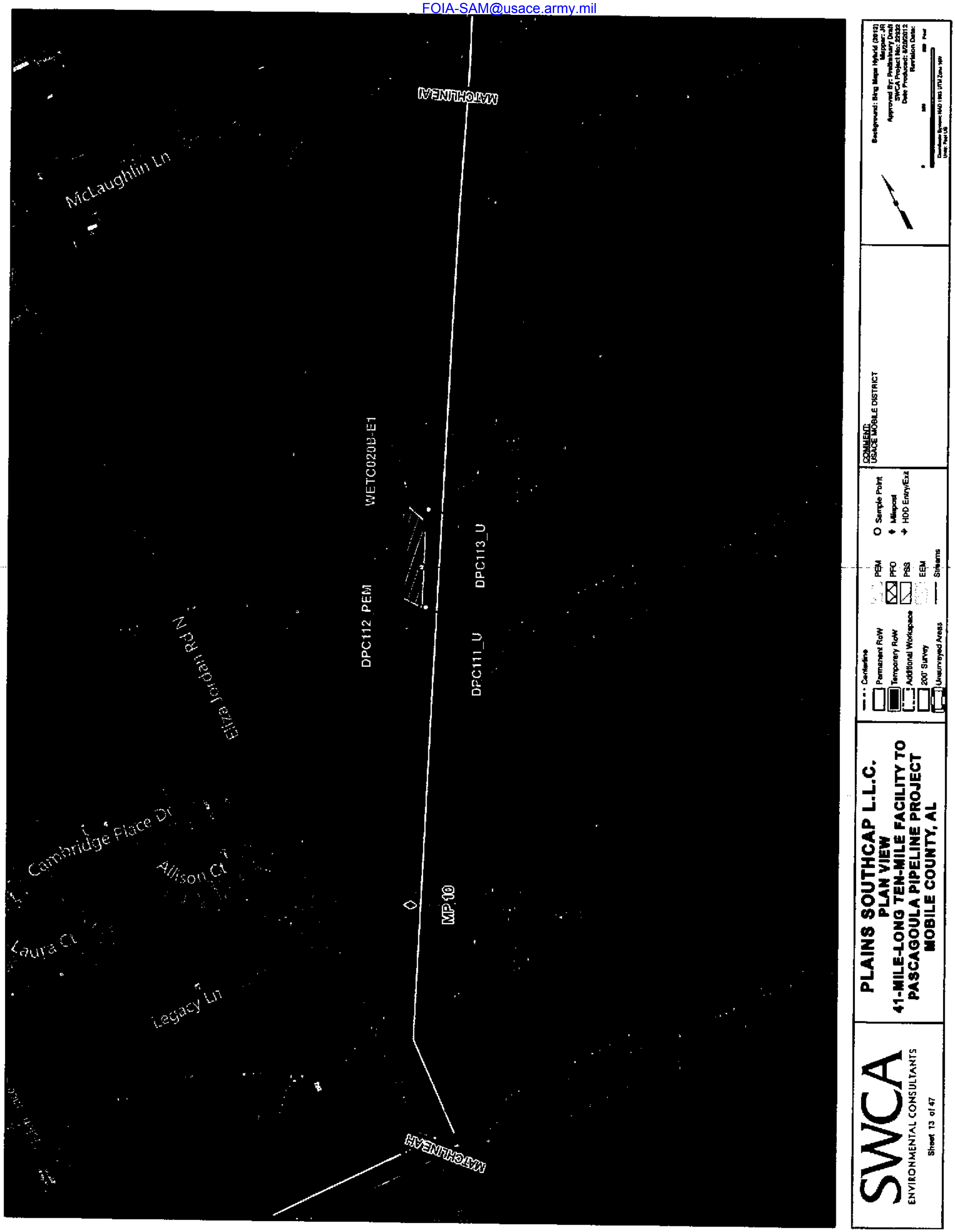
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

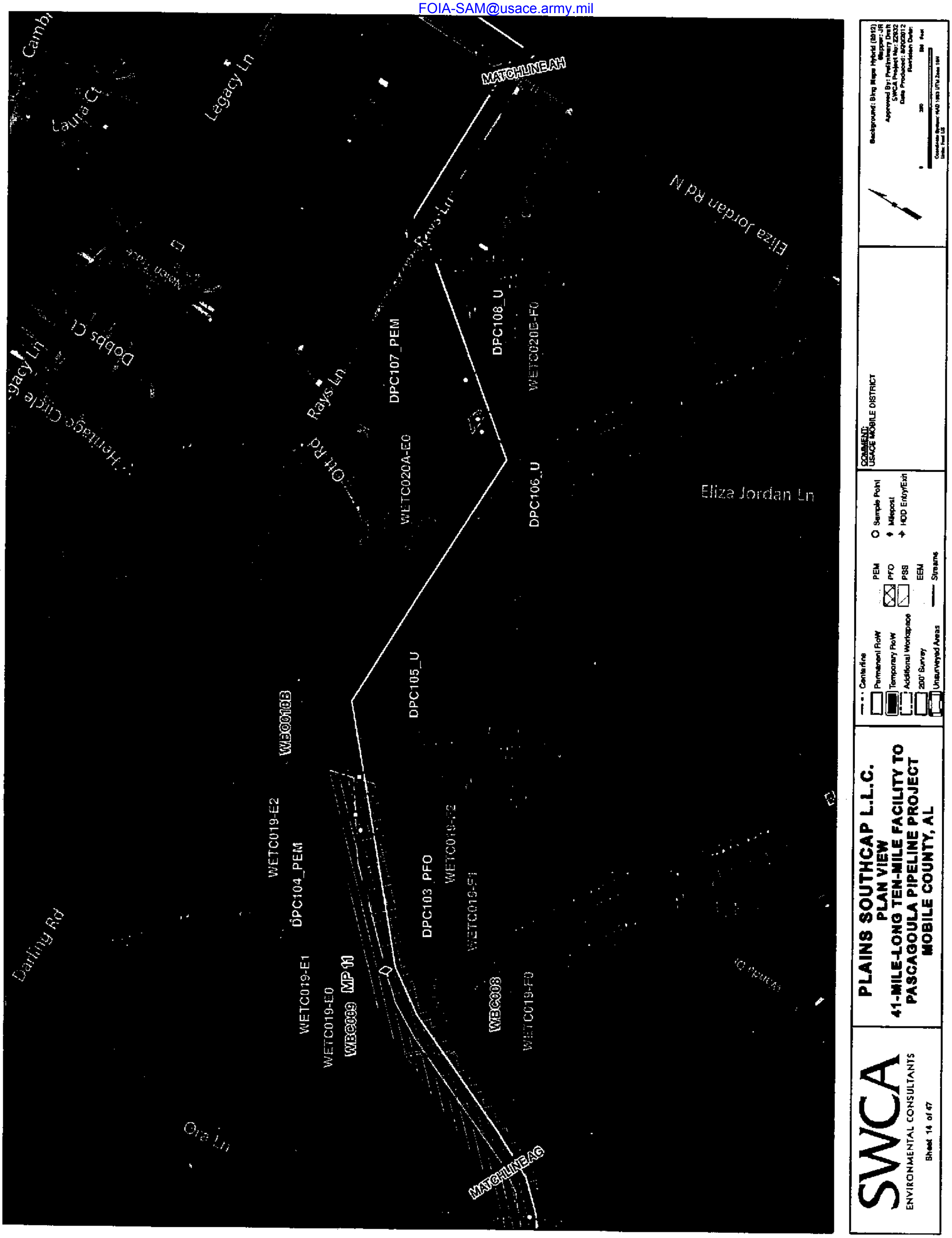
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit

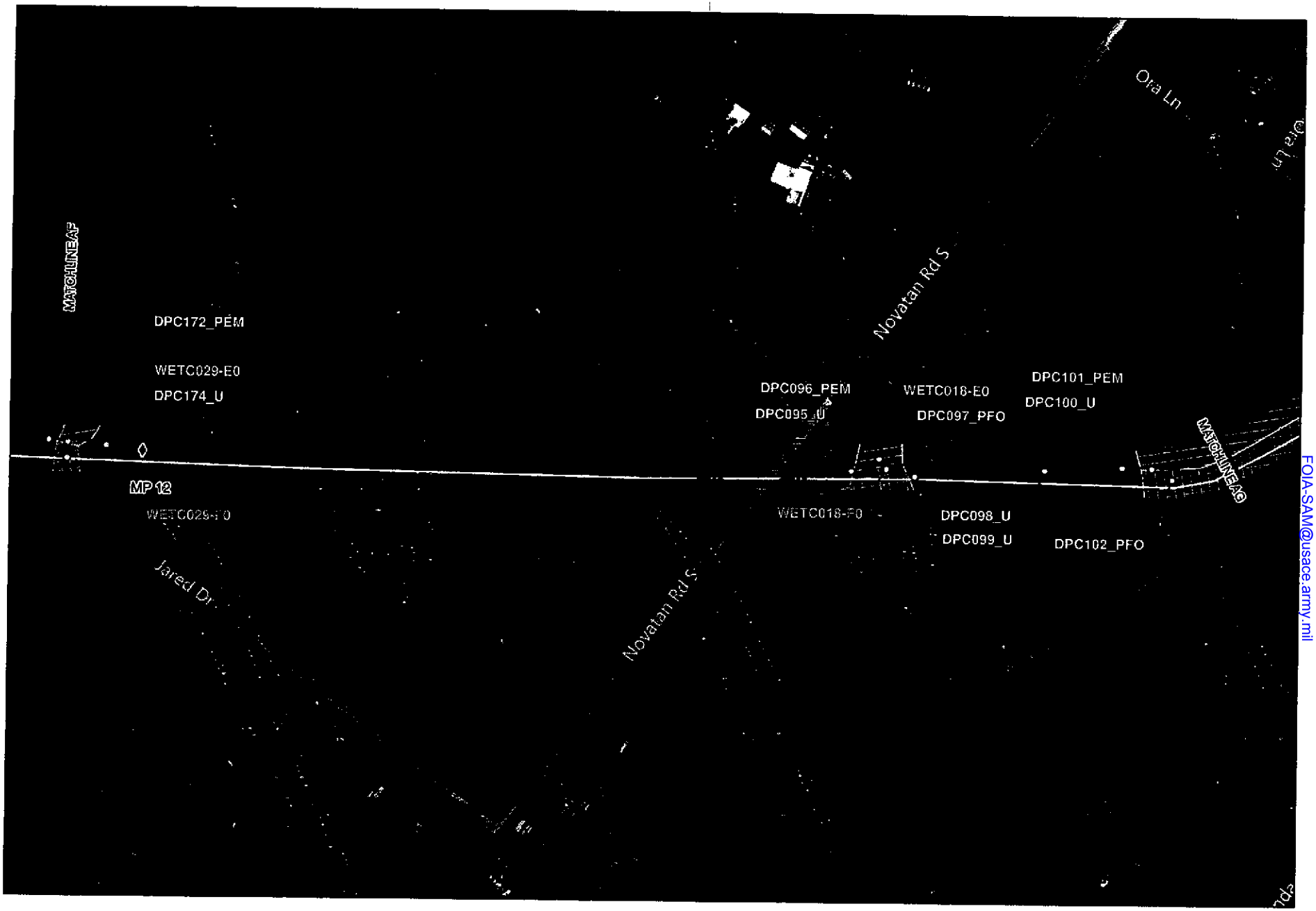
COMMENT:
USACE MOBILE DISTRICT

Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 8/20/2012
Revision Date:

Path: C:\Users\...\Projects\22932_Pascagoula_Pipeline\MAP\...\PCN Plan Views.mxd


MATCHLINE AI
McLaughlin Ln
WETC020B-E1
DPC113_U
DPC112_PEM
DPC111_U
Eliza Jordan Rd N
Cambridge Place Dr
Allison Ct
Laura Ct
MP 10
Legacy Ln
MATCHLINE AH
COMMENT:
USACE MOBILE DISTRICT
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 13 of 47


MATCHLINE AH
MATCHLINE AG
Legacy Ln
Laura Ct
Dobbs Ct
Heritage Circle
Rays Ln
Eliza Jordan Rd N
Eliza Jordan Ln
Darling Rd
Ora Ln
DPC107_PEM
DPC108_U
WETC020B-F0
WETC020A-E0
DPC106_U
DPC105_U
WBC010B
WETC019-E2
DPC104_PEM
DPC103_PFO
WETC019-E1
WETC019-E0
WBC009
MP 11
WBC008
WETC019-F0
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 14 of 47
COMMENT:
USACE MOBILE DISTRICT
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
300' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEN
Streams
Sample Point
Milepost
HDD Entry/Exit



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 15 of 47

PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

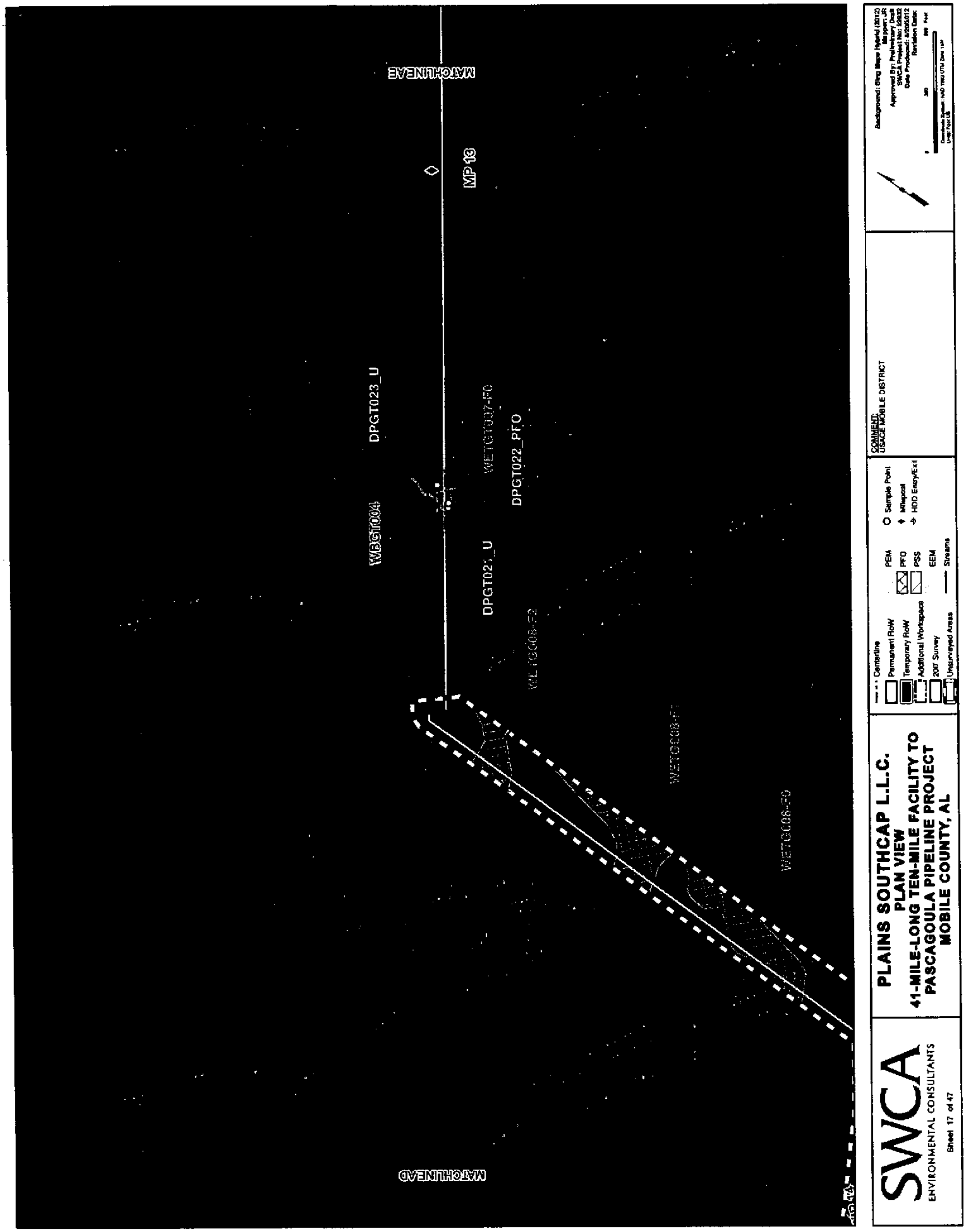
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit

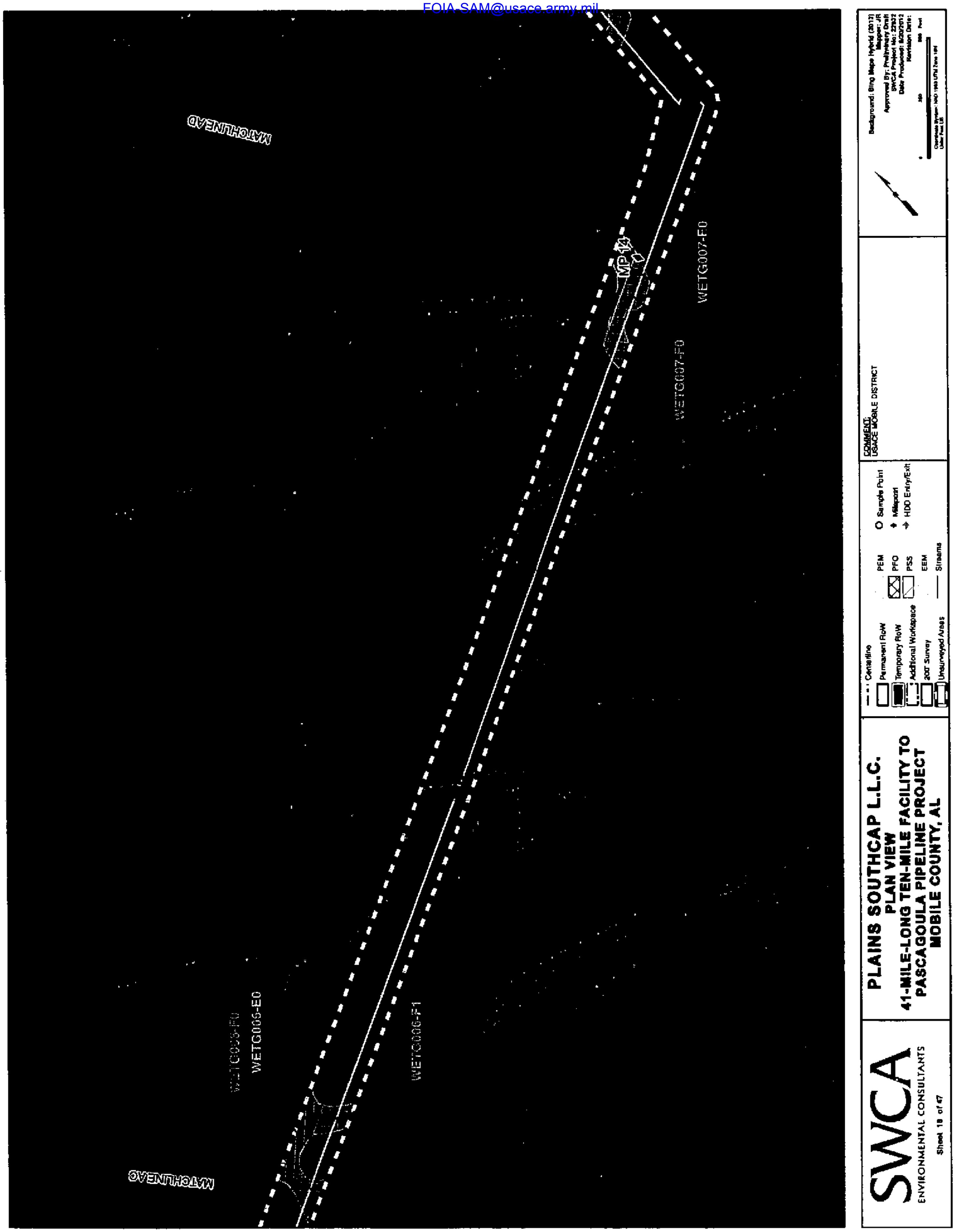
COMMENT:
USACE MOBILE DISTRICT

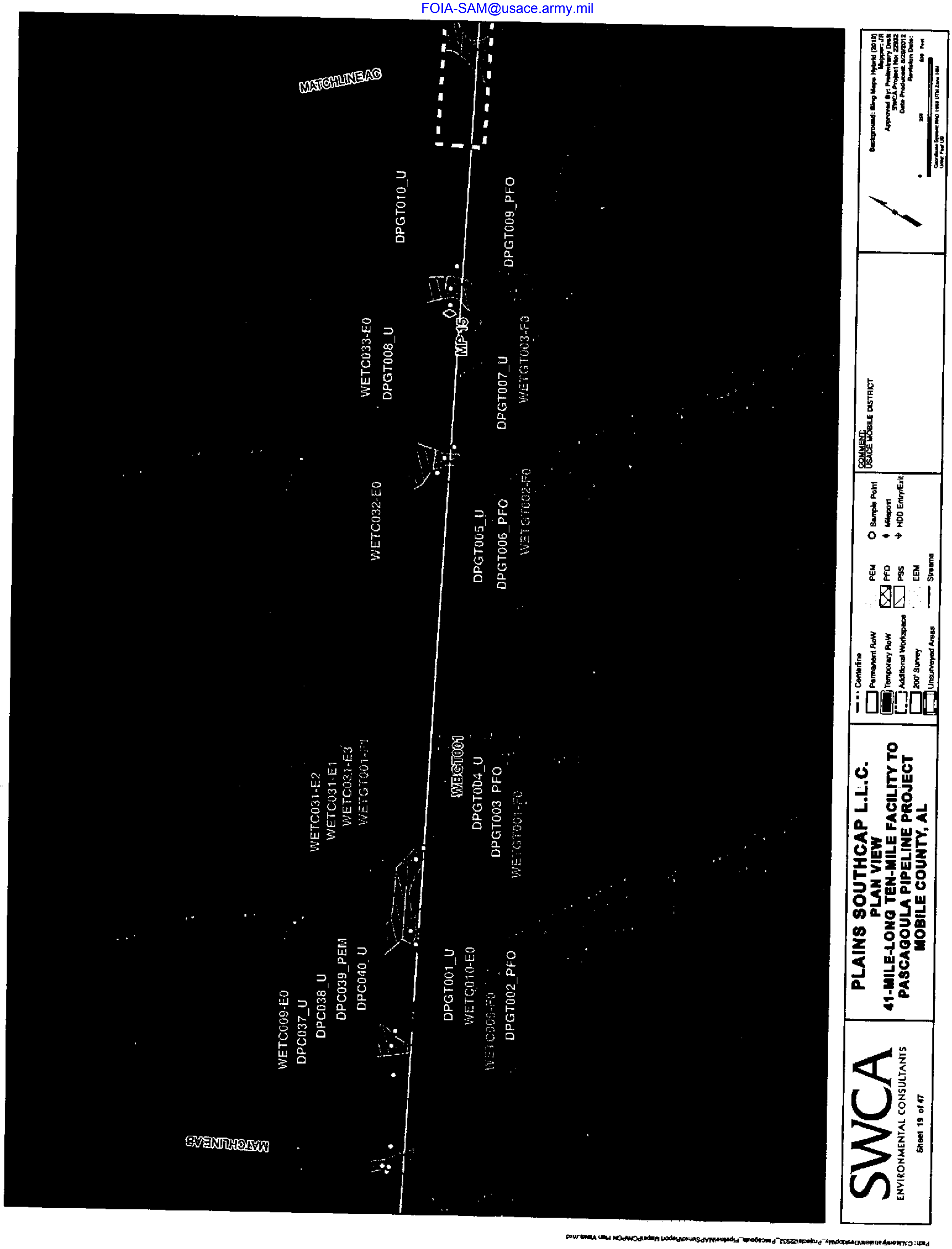
Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 6/29/2012
Revision Date:

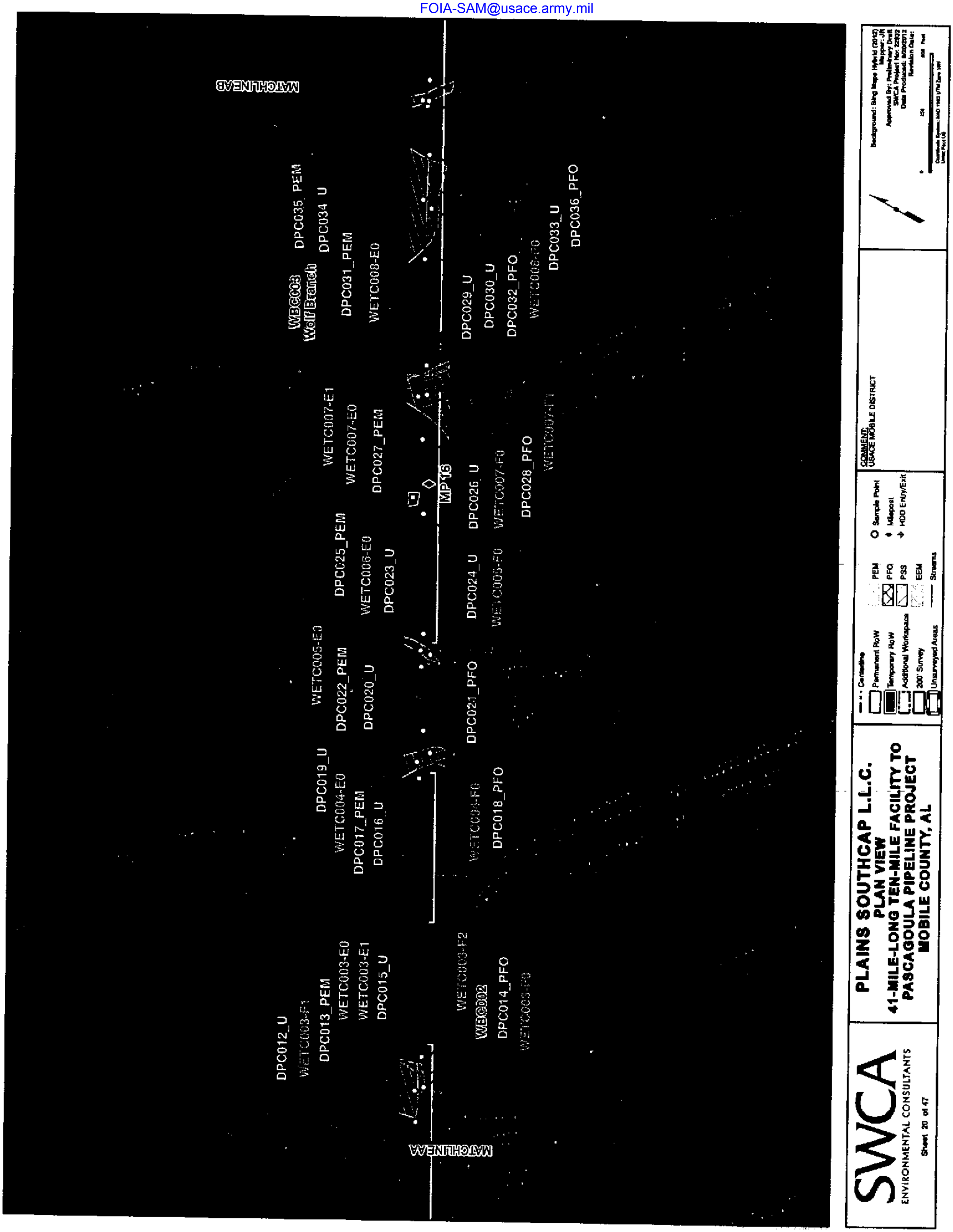
Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

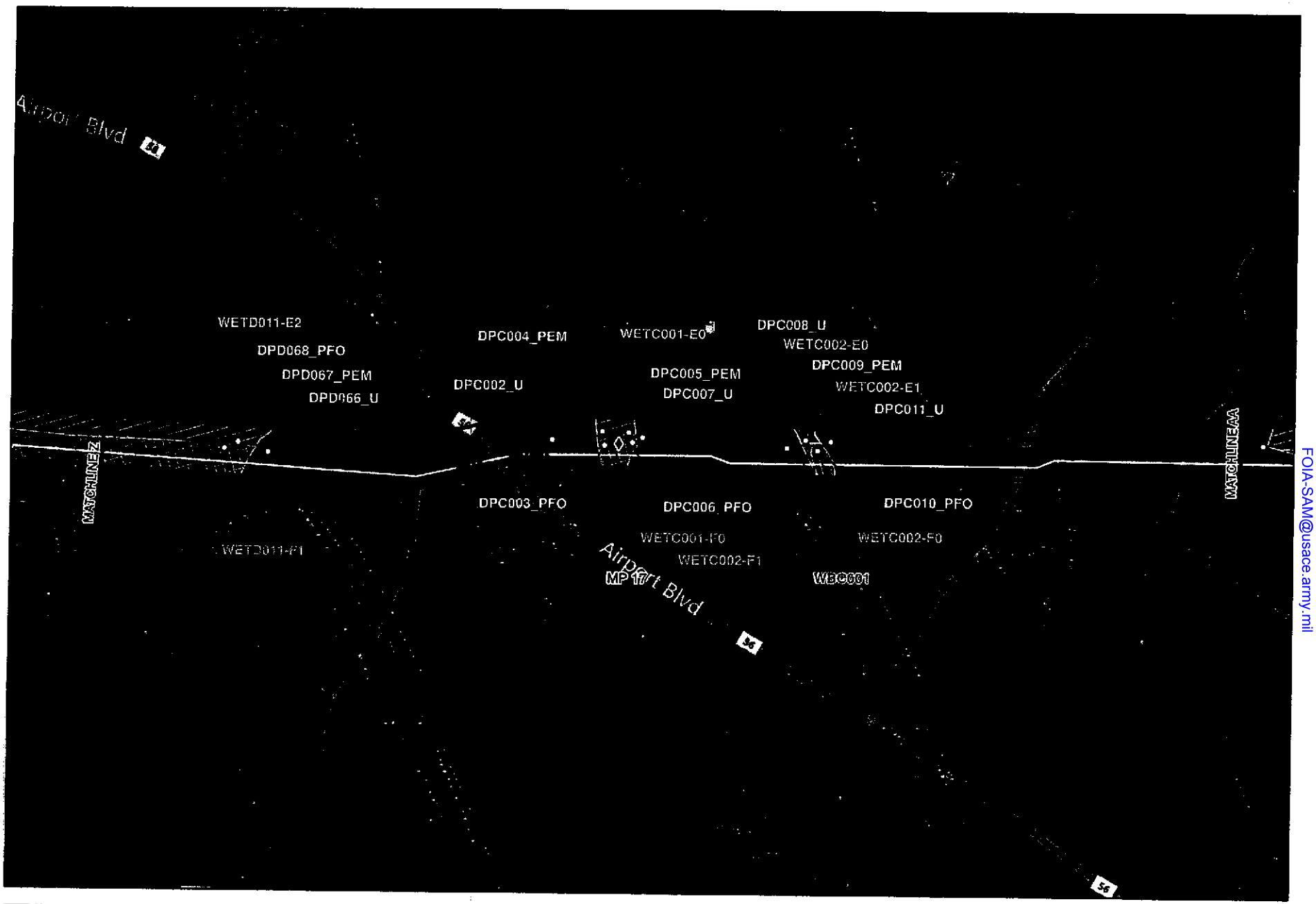
Path: C:\Users\jrandall\Desktop\My_Projects\22932_Pascagoula_Pipeline\MAPS\Sheet\Report Maps\FDMAPCH Plan Views.mxd


MATCHLINE AE
MP 13
DPGT023_U
WBGT004
DPGT022_PFO
DPGT021_U
MATCHLINE AD
COMMENT:
USACE MOBILE DISTRICT
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 17 of 47


MATCHLINE AD
MP 14
WETG007-F0
WETG007-F0
WETG006-F0
WETG006-E0
WETG006-F1
MATCHLINE AD
COMMENT:
USACE MOBILE DISTRICT
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
2007 Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 18 of 47


MATCHLINE AC
MATCHLINE AB
DPGT010_U
DPGT009_PFO
WETC033-E0
DPGT008_U
MP-15
DPGT007_U
WETGT003-F0
WETC032-E0
DPGT005_U
DPGT006_PFO
WETGT002-F0
WETC031-E2
WETC031-E1
WETC031-E3
WETGT001-F1
WETGT001
DPGT004_U
DPGT003_PFO
WETGT001-F0
WETC009-E0
DPC037_U
DPC038_U
DPC039_PEM
DPC040_U
DPGT001_U
WETC010-E0
WETC009-F0
DPGT002_PFO
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 19 of 47
COMMENT: USACE MOBILE DISTRICT
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit


MATCHLINE AB
MATCHLINE AA
DPC035_PEM
DPC034_U
WBC003
Wolf Branch
DPC031_PEM
WETC008-E0
DPC029_U
DPC030_U
DPC032_PFO
WETC008-F0
DPC033_U
DPC036_PFO
WETC007-E1
WETC007-E0
DPC027_PEM
MP 16
DPC026_U
WETC007-F0
DPC028_PFO
WETC007-F1
DPC025_PEM
WETC006-E0
DPC023_U
DPC024_U
WETC006-F0
WETC005-E0
DPC022_PEM
DPC020_U
DPC021_PFO
DPC019_U
WETC004-E0
DPC017_PEM
DPC016_U
WETC004-F0
DPC018_PFO
DPC012_U
WETC003-F1
DPC013_PEM
WETC003-E0
WETC003-E1
DPC015_U
WETC003-F2
WBC002
DPC014_PFO
WETC003-F0
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 20 of 47
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO
PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
COMMENT:
USACE MOBILE DISTRICT



SWCA ENVIRONMENTAL CONSULTANTS

Sheet 21 of 47

PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL

Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit

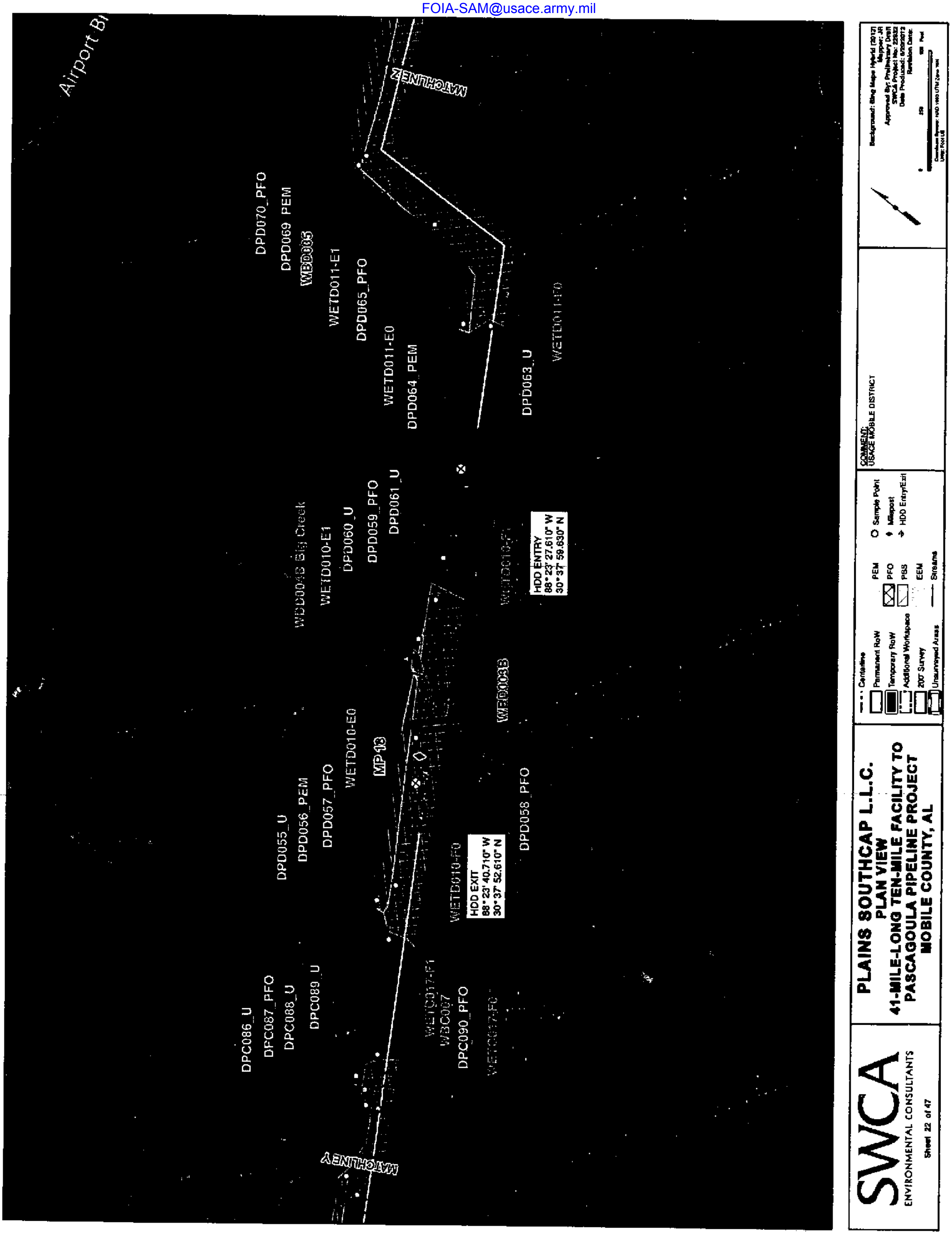
COMMENT:
USACE MOBILE DISTRICT

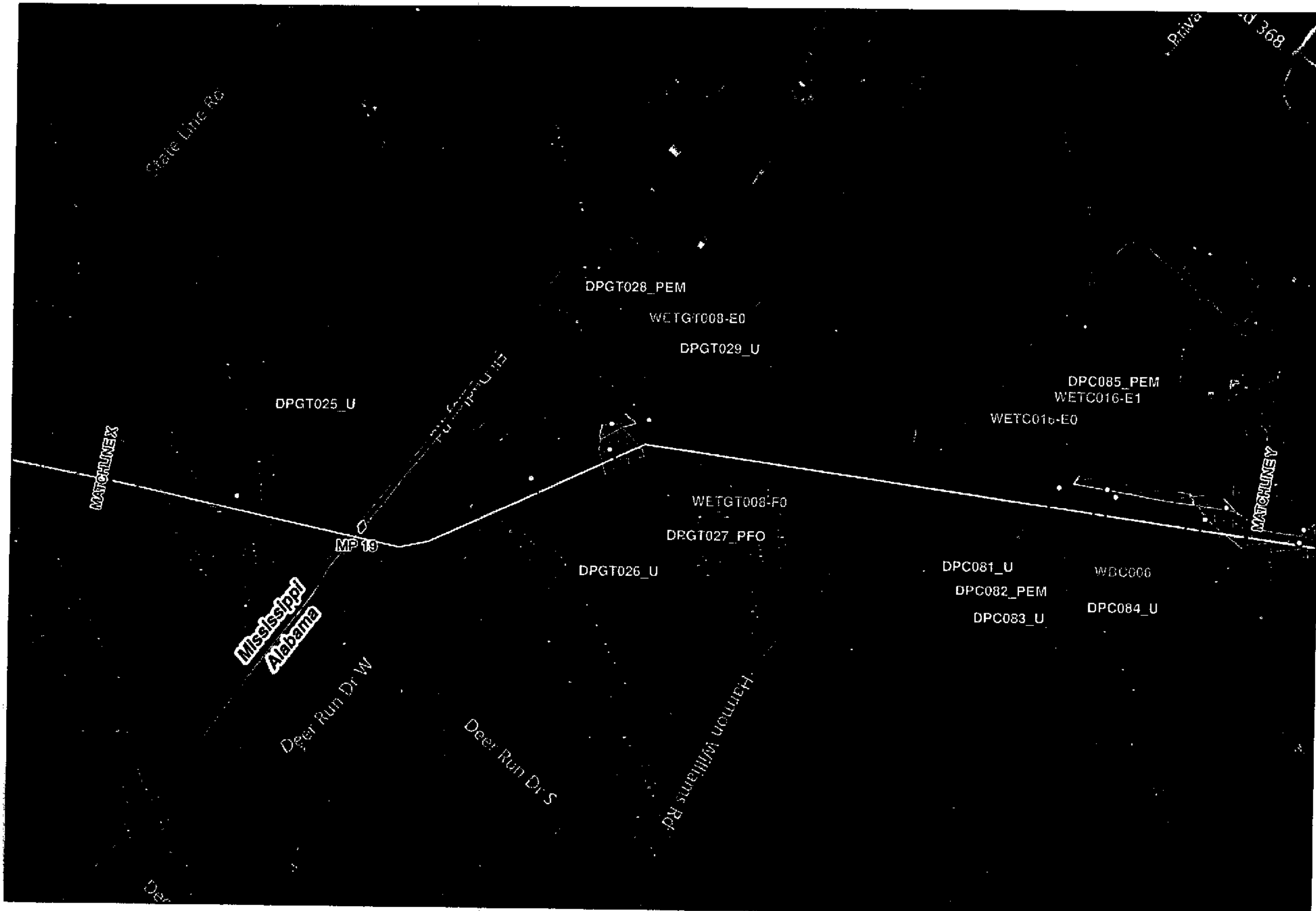
Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 6/20/2012
Revision Date:

0 350 700 Feet

Coordinate System: NAD 1983 UTM Zone 16N
Units: Feet US

Path: C:\Survey\Exhibits\Geospatial_Projects\22932_Pascagoula_Pipeline\MAPS\mxd\Report Maps\PDM\POR Plan Views.mxd


MATCHLINE Z
DPD070_PFO
DPD069_PEM
WETD011-E1
DPD065_PFO
WETD011-E0
DPD064_PEM
DPD063_U
WBD004B Big Creek
WETD010-E1
DPD060_U
DPD059_PFO
DPD061_U
HDD ENTRY
88° 23' 27.610" W
30° 37' 59.630" N
DPD055_U
DPD056_PEM
DPD057_PFO
WETD010-E0
MP 13
DPD058_PFO
HDD EXIT
88° 23' 40.710" W
30° 37' 52.610" N
DPC086_U
DPC087_PFO
DPC088_U
DPC089_U
WBC007
DPC090_PFO
MATCHLINE Y
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit
COMMENT:
USACE MOBILE DISTRICT
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MOBILE COUNTY, AL
SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 22 of 47



SWCA
ENVIRONMENTAL CONSULTANTS
Sheet 23 of 47

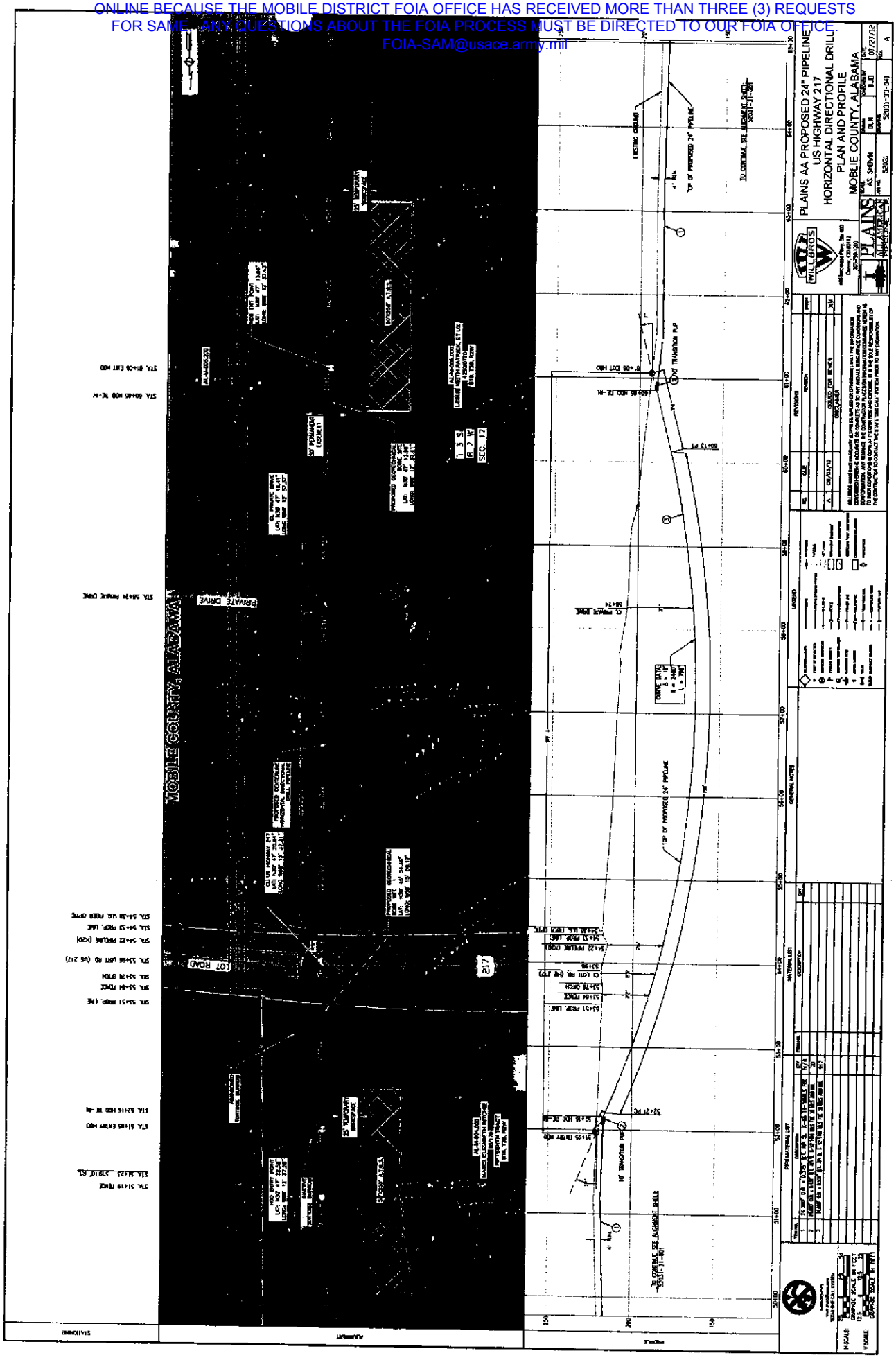
PLAINS SOUTHCAP L.L.C.
PLAN VIEW
41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT
MISSISSIPPI / ALABAMA

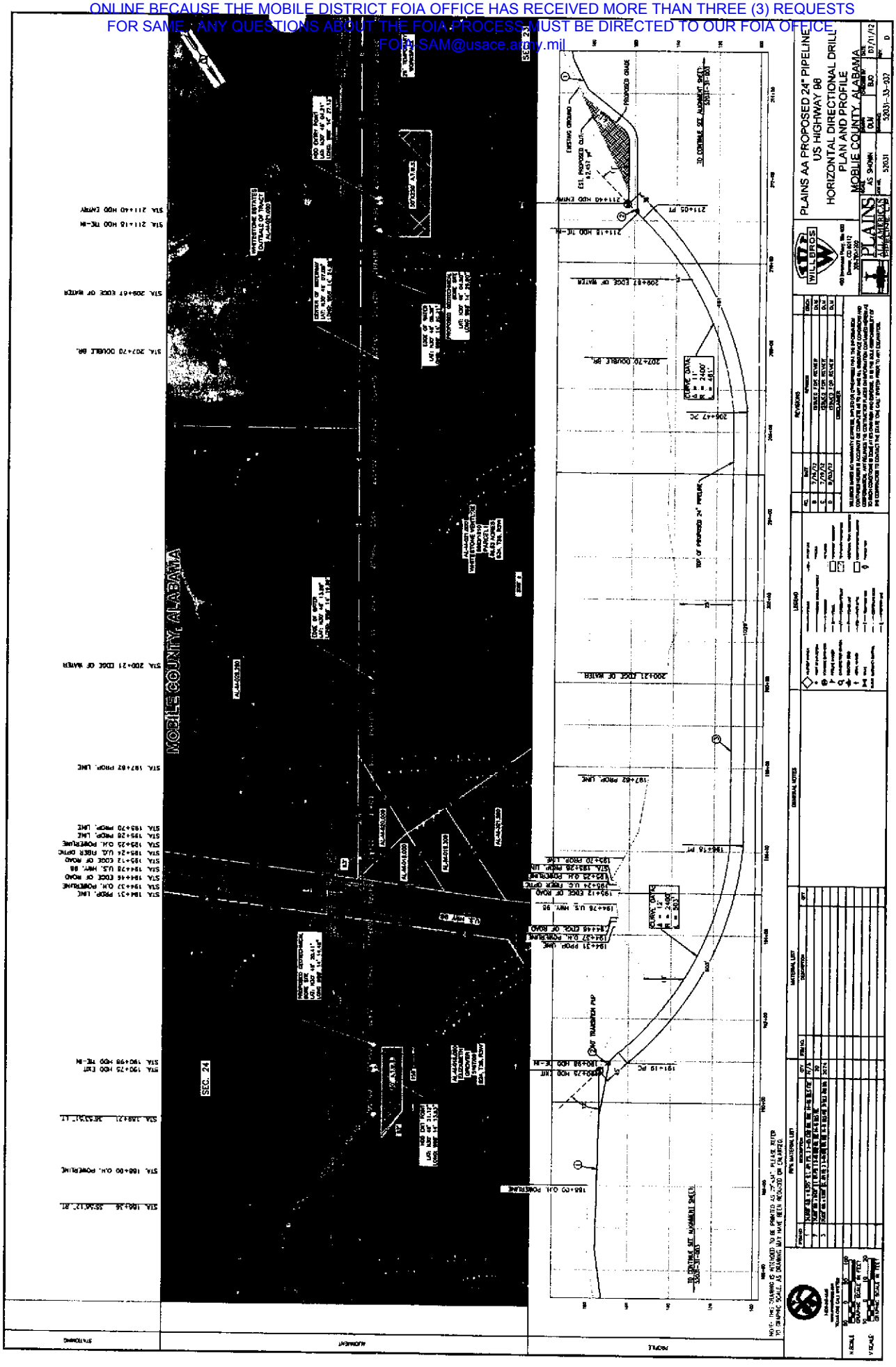
Centerline
Permanent RoW
Temporary RoW
Additional Workspace
200' Survey
Unsurveyed Areas
PEM
PFO
PSS
EEM
Streams
Sample Point
Milepost
HDD Entry/Exit

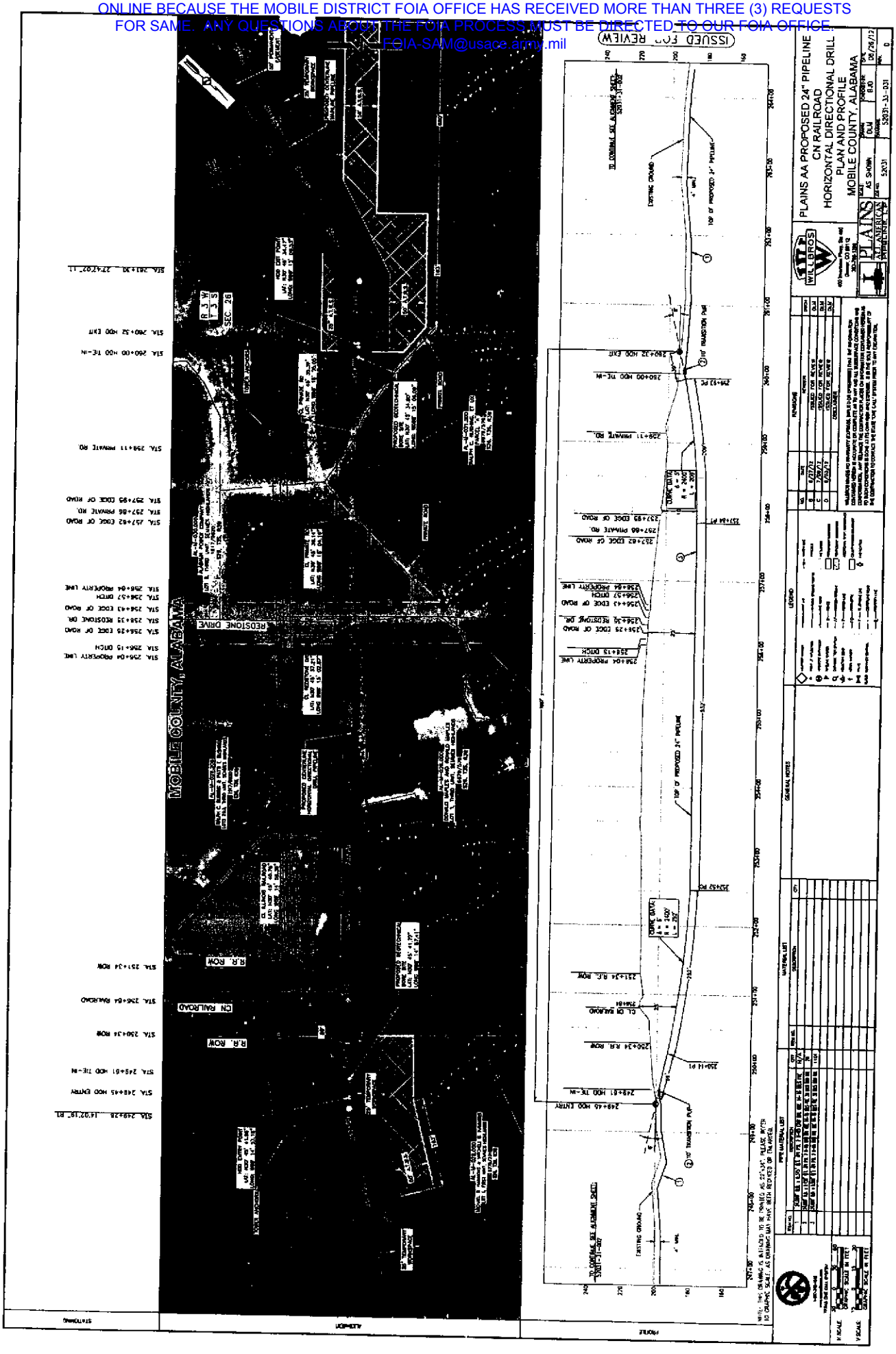
COMMENT:
USACE MOBILE DISTRICT

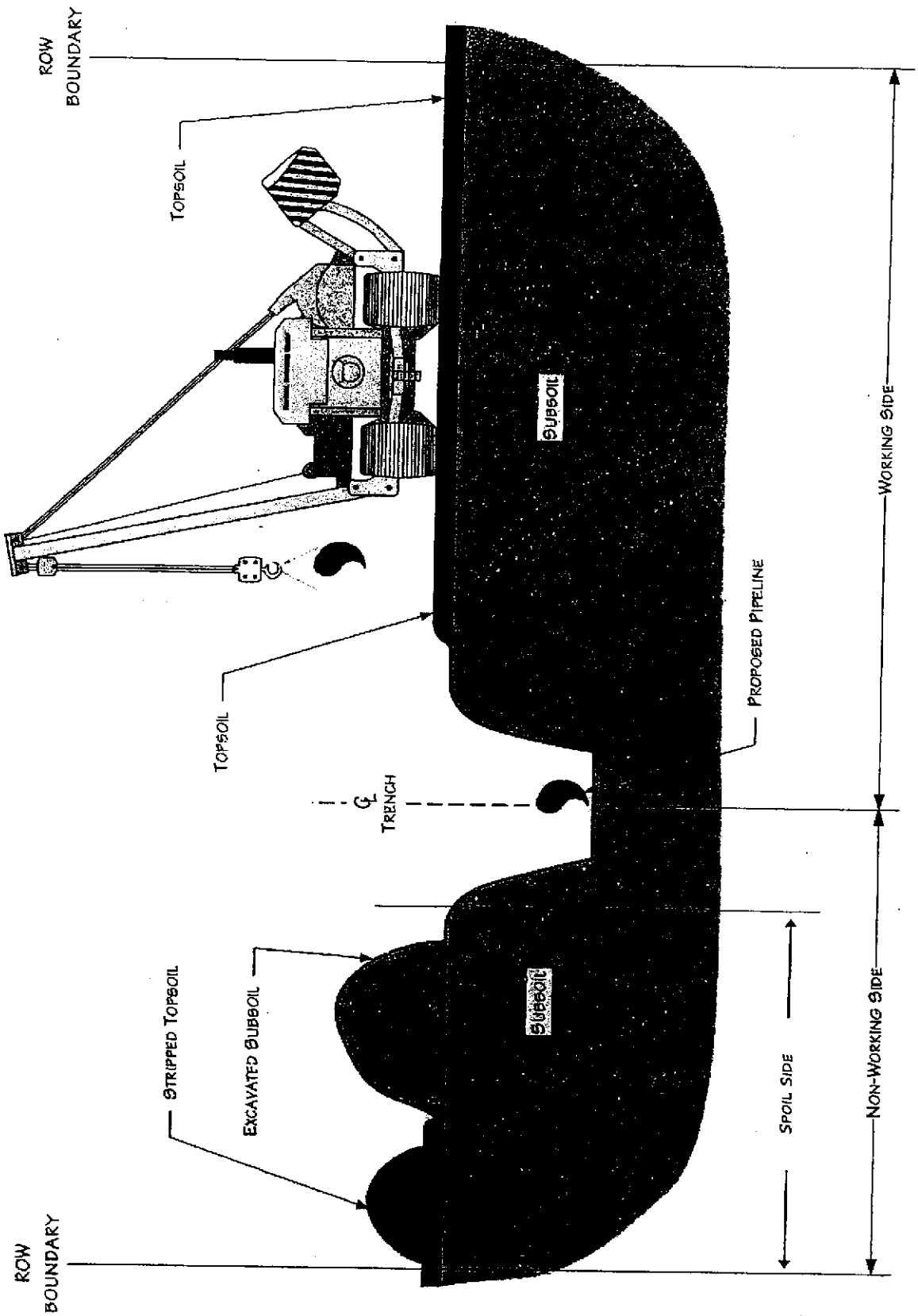
Background: Bing Maps Hybrid (2012)
Mapper: JR
Approved By: Preliminary Draft
SWCA Project No: 22932
Date Produced: 8/20/2012
Revision Date:

0 250 500 Feet
Coordinate System: NAD 1983 UTM Zone 16N
Units: Foot US





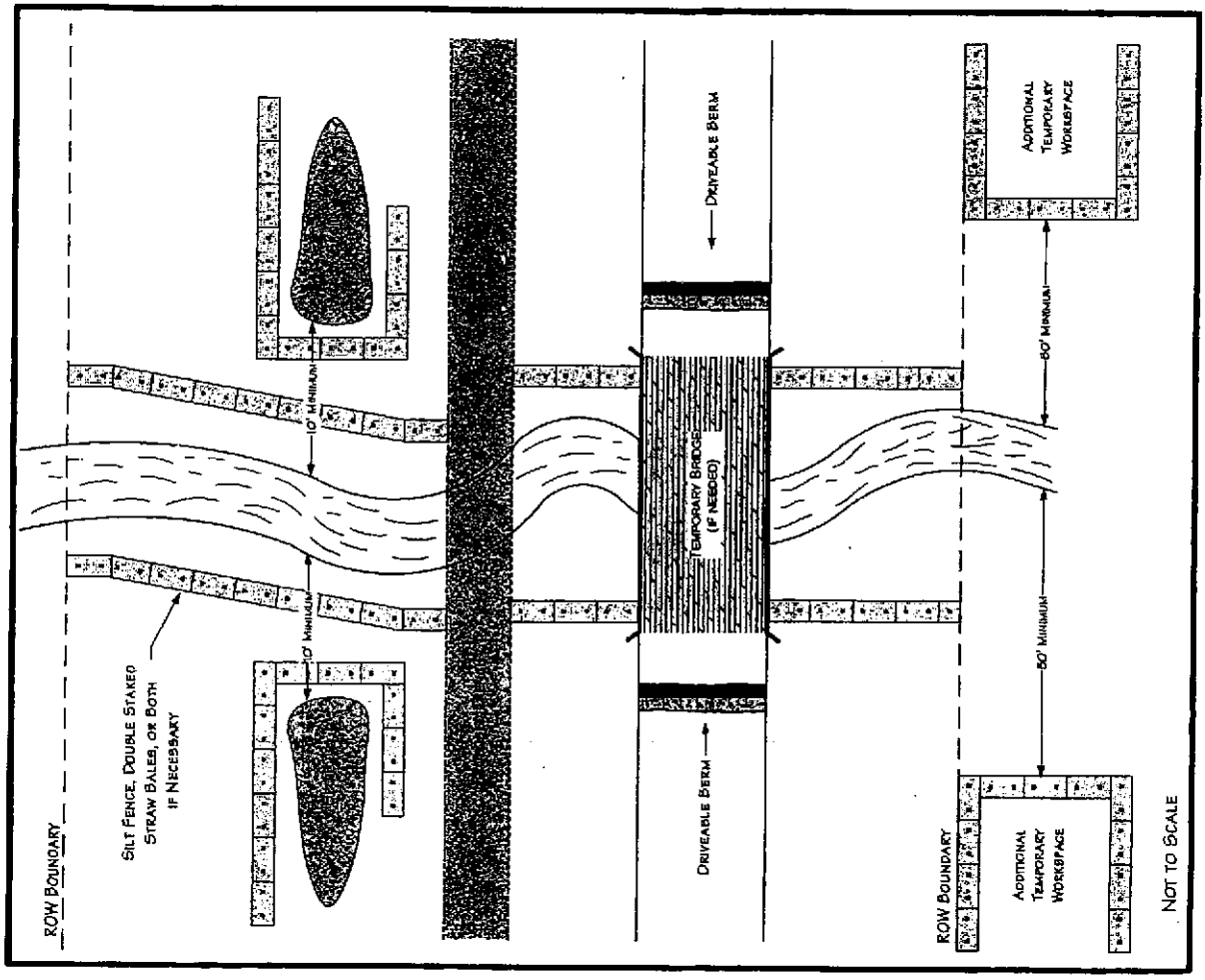




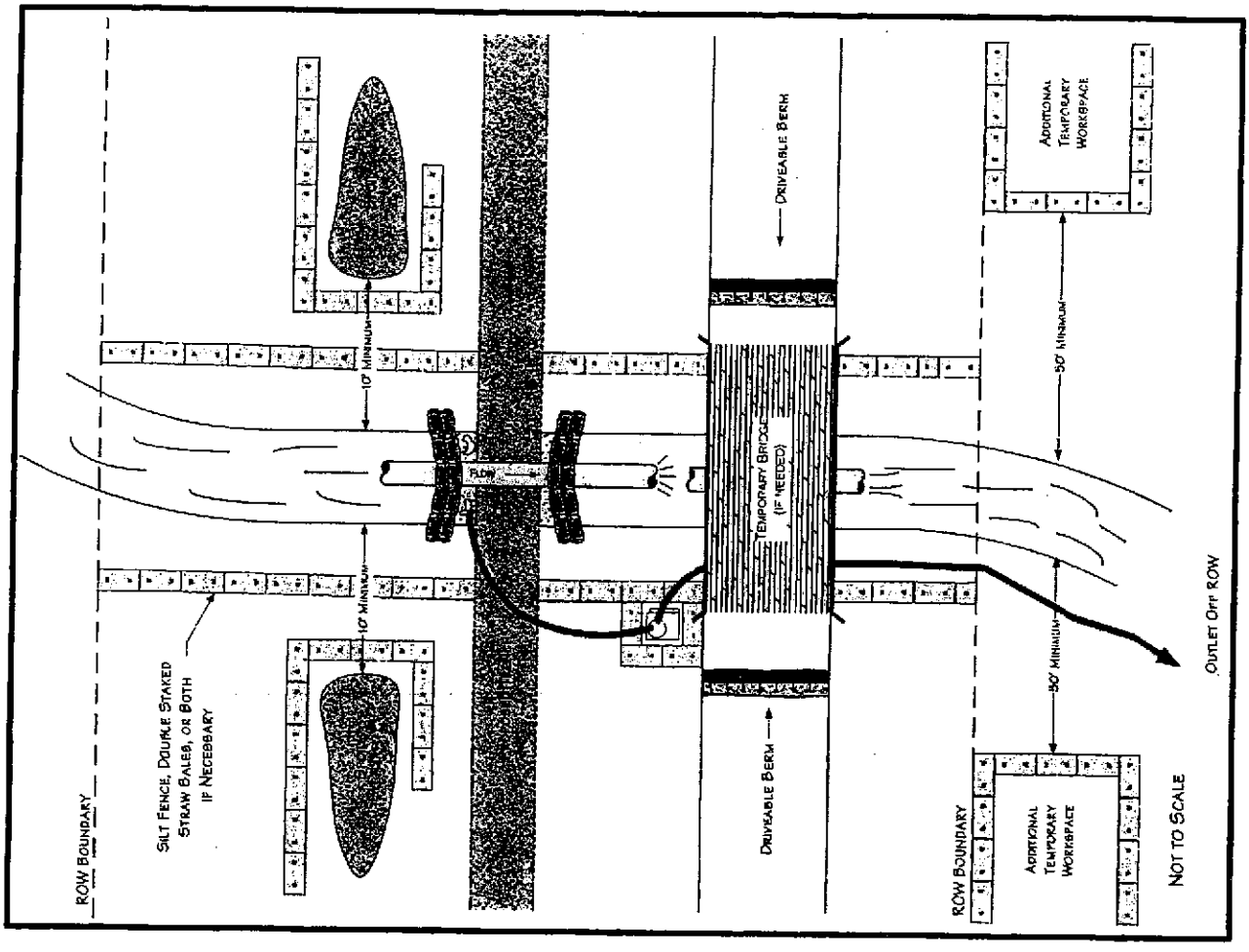
Trench and Spoil Side Method

NOT TO SCALE

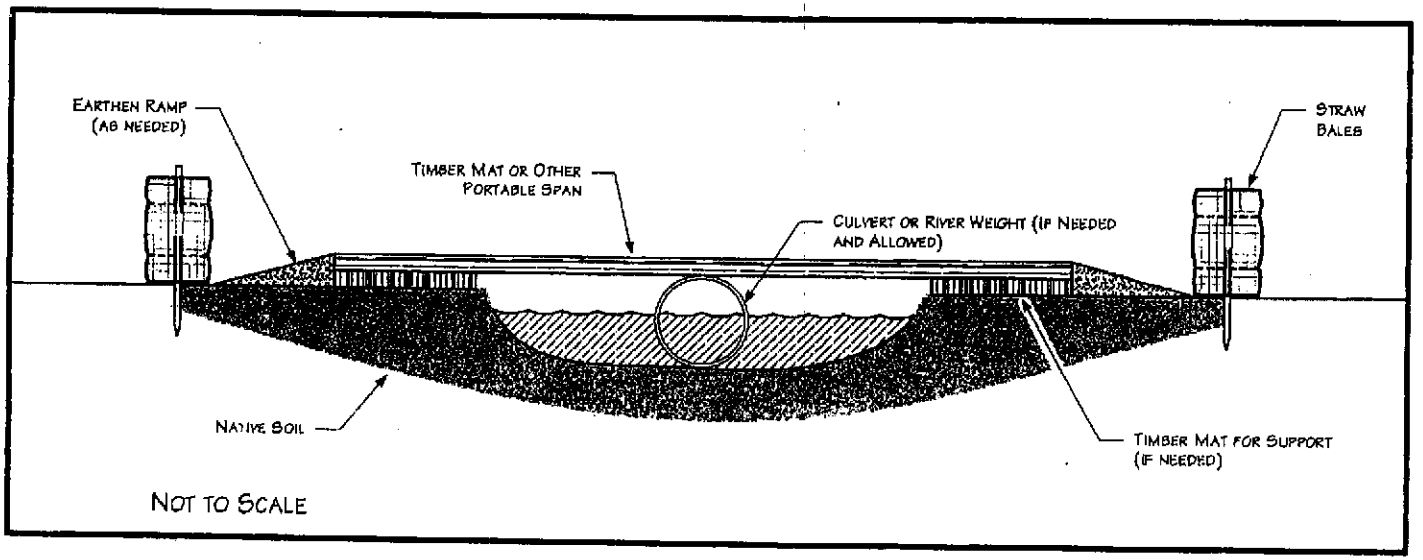
Open-Cut Waterbody Crossing Method



Flumed Waterbody Crossing Method



Equipment Bridge



Performance Criteria

- Design, construct, and maintain to
  - Provide unrestricted flow
  - Withstand and pass highest expected flows
  - Prevent soil from entering waterbody
- Align culverts to prevent bank erosion or streambed scour
- Install energy-dissipating devices downstream of culverts, if necessary

Attachment B

Wetland Delineation Report

SWCA
ENVIRONMENTAL CONSULTANTS

WETLAND DELINEATION REPORT

PLAINS SOUTHCAP, LLC 41-MILE TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT

MOBILE COUNTY, ALABAMA AND
JACKSON COUNTY, MISSISSIPPI

Prepared for:

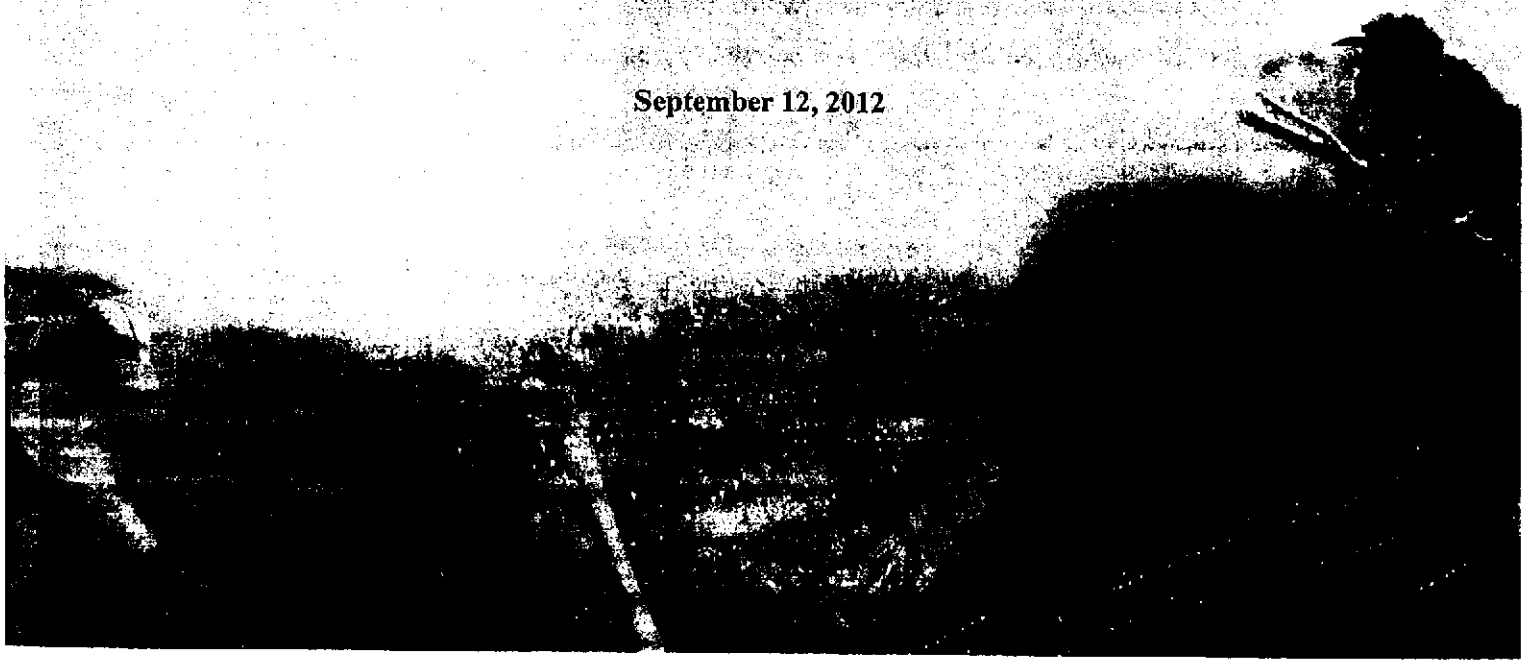
Plains Southcap, LLC
333 Clay Street, Suite 1600
Houston, TX 77210-4648

Prepared by:

SWCA Environmental Consultants
7255 Langtry, Suite 100
Houston, Texas 77040

SWCA Project No. 22932

September 12, 2012



WETLAND DELINEATION REPORT
PLAINS SOUTHCAP, LLC 41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT

MOBILE COUNTY, ALABMA AND JACKSON COUNTY, MISSISSIPPI

Prepared for:

Plains Southcap, LLC
333 Clay Street, Suite 1600 (77002)
Houston, TX 77210-4648

SWCA Project No. 22932

Eric C. Munscher, ESIII (Scientist)
Herpetologist
Houston Natural Resources

R. Thomas Sankey, PWS, CSE
Senior Project Manager / Senior Ecologist
Houston Natural Resources

September 9, 2012

CONTENTS

Tables

Appendices

1.0 INTRODUCTION

Plains Southcap, LLC (Plains) requested that SWCA Environmental Consultants (SWCA) complete a wetland and waters delineation for approximately 41 miles of proposed 24-inch diameter crude oil pipeline. The project area begins at the Plains Southcap Ten-Mile Crude Oil Facility in Mobile County, Alabama located approximately 11 miles northwest of downtown Mobile and extends southwest towards Pascagoula, Mississippi. The line ends at the Chevron Pascagoula Refinery approximately one mile from the Gulf of Mexico (project route).

This wetland delineation includes the identification of areas likely to be considered jurisdictional "waters of the U.S.," as defined by Section 404 of the Clean Water Act (CWA) and regulated by the U.S. Army Corps of Engineers (USACE). "Waters of the U.S." include most wetlands, rivers, creeks, streams, lakes, tributaries, and so forth. Only the USACE has final and/or legal authority in determining the presence of jurisdictional "waters of the U.S." and the extent of their boundaries. This report provides a brief description of the methods utilized for SWCA's wetland delineation and results of the information collected from the on-site delineations conducted in April, May, and June 2012. Please refer to Figures 1 and 2 in **Appendix A** for the location and setting of the project route.

2.0 METHODS

SWCA conducted on-site wetland delineations along an approximate 41-mile proposed crude oil pipeline. The delineations were conducted in accordance with routine determination guidelines provided in both the *USACE Wetland Delineation Manual* (Manual) (USACE 1987) and the newly published *Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Atlantic and Gulf Coastal Plain Region* (Supplement) (USACE 2010). SWCA conducted wetland delineations within a 200-foot-wide survey corridor centered on a 75-foot-wide construction right-of-way (ROW) (project area). Two-person teams were utilized to complete the field work portion of this project.

2.1 Wetlands

According to both the Manual and Supplement, an area is a wetland if positive indicators for the three mandatory wetland criteria are identified in a given area, with special exceptions. These criteria include the presence of hydrophytic vegetation, wetland hydrology, and hydric soils. Identification of dominant vegetation species and their United States Fish and Wildlife Service (USFWS)-designated wetland indicator statuses dictates the presence of hydrophytic vegetation. Typically, a soil pit is dug to identify the presence of hydric soils. Inundation, saturation, and other physical indicators suggesting the presence of water may be used to determine wetland hydrology at each site. All wetlands mapped within the project area are shown on the map book found in **Appendix A**.

Biologists generally took two wetland data points and two upland data points for each wetland delineated along the 200-foot environmental survey corridor. Additional wetland data points were taken in wetlands displaying multiple wetland habitats. In select locations, a single upland data point may have been used to describe a series of upland ridges within a large wetland complex. Data points were generally taken in undisturbed areas, as close to the proposed centerline as possible. A soil pit was typically dug to a depth of approximately 20 inches at each data point to document the presence or absence of hydric soils.

Each data point identified within the proposed pipeline corridor was categorized as herbaceous upland, scrub-shrub upland, forested upland, palustrine emergent (PEM) wetland, palustrine scrub-shrub (PSS) wetland, palustrine forested (PFO) wetland, or estuarine emergent (EEM) wetland communities. Within each community, the vegetation was sub-divided into tree, sapling, shrub, herbaceous, and woody vine vegetative layers. All species within a 30-foot radius were recorded for each vegetative layer and their USFWS indicator statuses were included as well. USFWS indicator statuses include upland (UPL), facultative upland (FACU), facultative (FAC), facultative wetland (FACW), and obligate (OBL). A vegetative community was determined to be hydrophytic if greater than 50 percent of dominant species had an indicator status of FAC, FACW, or OBL. A data point was determined to have wetland hydrology if it displayed at least one primary hydrology indicator or if it displayed at least two notable secondary hydrology indicators as defined in the Supplement (USACE 2010). A data point was determined to have hydric soils if it displayed at least one significant hydric soil indicator as defined in the Supplement (USACE 2010).

Wetland Determination Data Forms (data sheets), which document the presence or absence of the three required wetland criteria, were completed for different vegetation communities along the proposed pipeline route. Data points represent areas of uniformity and allow comparisons between wetland and non-wetland areas. Refer to the data sheets located in **Appendix B** for detailed descriptions of each data point.

2.2 Waterbodies

Streams (i.e., creeks, rivers, etc.,) were identified by the presence of an ordinary high water mark (OHWM), usually identifiable by indicators such as the level of water present, scouring of the channel, or the presence of a vegetation line within the channel. The OHWM typically represents the outer limits of the waterbody's potential USACE jurisdictional limits.

Streams were classified as ephemeral, intermittent, or perennial based on field observations. According to the USACE, an ephemeral stream has flowing water only during, and for a short duration following precipitation events in a typical year and is not fed by groundwater. An intermittent stream has flowing water during times of the year when groundwater provides water for stream flow. Rainfall is supplemental to the stream flow. Perennial streams flow year round under normal hydrologic conditions and are primarily supplied by groundwater. Rainfall is supplemental to the stream flow. Common information recorded for streams included flow, OHWM, observed water, bank slope, substrate, and quality. All streams that occur within the project area are shown on the map book in **Appendix A**.

2.3 Mapping

SWCA used Trimble GeoXH 6000 series global positioning systems (GPS) to geographically reference features, such as data points and wetland boundaries, obtained during the field survey. These units typically have real-time and post-processed sub-meter accuracy. Geographic Information System (GIS) software was used to analyze collected features, calculate areas, and generate attached vicinity and site layout maps, located in **Appendix A**. Please note that all point, line, and polygon data collected using the GPS, and displayed on the attached maps, are for review purposes only and do not represent a professional civil survey.

3.0 RESULTS

3.1 Vegetation Communities

Seven vegetation communities were identified within the project area. Wetlands occurred as PEM, PSS, PFO, and EEM, and non-wetlands occur as herbaceous upland, scrub-shrub upland, and forested upland communities.

3.1.1 Wetland Vegetation

PEM Wetland: PEM wetlands occur throughout the project area and are found within existing maintained ROW. Common dominant herbaceous species within the PEM wetland communities include swamp smartweed (*Polygnum hydropiperoides*, OBL), pale pitcher plant (*Sarracenia alata*, OBL), crimson pitcher plant (*Sarracenia leucophylla*, OBL), parrot pitcher plant (*Sarracenia psittacina*, OBL), roundleaf sundew (*Drosera rotundifolia,* OBL), netted chainfern (*Woodwardia areolata*, OBL), Virginia chainfern (*Woodwardia virginica*, OBL), royal fern (*Osmunda regalis*, OBL), common rush (*Juncus effusus*, OBL), roundhead rush (*Juncus validus*, FACW), roundpod St. Johnswort (*Hypericum cistifolium*, FACW), St. Andrew's cross (*Hypericum hypercoides*, FAC), candyweed (*Polygala lutea*, FACW), low pinebarren milkwort (*Polygala ramosa*, OBL), largeflower milkweed (*Asclepias connivens*, OBL), Frank's sedge (*Carex frankii*, OBL), false hopsedge (*Carex lupuliformis*, OBL), whitehead bogbutton (*Lachnocaulon anceps*, OBL), foxtail clubmoss (*Lycopodiella alopecuroides*, OBL), broadleaved cattail (*Typha latifolia*, OBL), bushy broom grass (*Andropogon glomeratus*, FACW), cogon grass* (*Imperata cylindrical*, UPL), Carolina spider lily (*Hymenocallis caroliniana*, FACW), savannah meadowbeauty (*Rhexia alifanus*, FACW), creeping primrose willow (*Ludwigia repens*, OBL), floating primrose willow (*Ludwigia peploides*, OBL), velvet panicum (*Dicanthelium scoparium*, FACW), disk waterhyssop (*Bacopa rotundifoloia*, OBL), and anglestem beaksedge (*Rhynchospora caduca*, FACW). In occasional instances trees such as slash pine (*Pinus elliottii*, FACW), saplings such as red maple (*Acer rubrum,* OBL) and sweetbay (*Magnolia virginiana*, FACW), shrubs such as wax myrtle (*Myrica cerifera*, FAC) and swamp titi (*Cyrilla racemiflora*, FACW), or woody vines such as sawtooth blackberry (*Rubus argutus*, FAC) and coral greenbriar (*Smilax walteri*, OBL) were identified as minor components within PEM wetlands.

PSS Wetland: PSS wetlands occur within the project area and are found within the existing ROW and along the edges of existing maintained ROWs. The dominant shrub and sapling species within the PSS wetland communities include swamp titi, buckwheat titi (*Cliftonia monophylla*, OBL), gall berry (*Ilex glabra*, FACW), large gallberry (*Ilex coriacea*, FACW), fetterbush (*Lyonia lucida*, FACW), swamp bay (*Persea palustris*, NI), eastern baccharis (*Baccharis halimifolia,* FACW), wax myrtle, sweetleaf (*Symplocos tinctoria*, FAC), highbush blueberry (*Vaccinium corymbosum*, FACW), pawpaw (*Asimina triloba*, FAC), and yaupon (*Ilex vomitoria*, FAC). In occasional instances trees, herbaceous species, or woody vines were identified as minor components within PSS wetlands. Tree species which occur in these instances include red maple, sweetgum (*Liquidambar styraciflua*, FAC), sweetbay, slash pine, Chinese tallow*(*Triadica serbifera*, FAC), laurel oak (*Quercus laurifolia*, FACW), and overcup

oak (*Quercus lyrata*, OBL), Common dominant herbaceous species which occur in these instances include bushy broom grass, netted chainfern, Virginia chainfern, royal fern, bogbutton, foxtail clubmoss, roundpod St. Johnswort, common rush, and Frank's sedge. Common dominate vine species observed inculded coral greenbriar, southern dewberry (*Rubus trivialis*, FAC), and Florida grape (*Vitis cinerea*, FACW).

PFO Wetland: PFO wetlands occur within the project area and are found within the existing ROW and along the edges of existing maintained ROWs. The dominant shrub and sapling species within the PFO wetland communities include swamp tupelo (*Nyssa biflora*, OBL), tulip poplar (*Liriodendron tulipifera*, FAC), sweetbay, slash pine, bald cypress (*Taxodium distichum*, OBL), water oak (*Quercus nigra*, FAC), cherrybark oak (*Quercus pagoda*, FACW), overcup oak, laurel oak, swamp chestnut oak (*Quercus michauxii*, FACW), and boxelder (*Acer negundo*, FACW). On occasion, shrubs such as wax myrtle, swamp titi, sweetleaf, gallberry, and fetterbush dominated the understory. Woody vines such as sawtooth blackberry, coral greenbriar, and saw greenbriar (*Smilax bona-nox*, FAC) were identified as minor components within PFO wetlands.

EEM Wetland: EEM wetlands occur within the project area around the southern Escawtapa River crossing. The dominant vegetation within these communities include giant cut grass (*Zizaniopsis miliacea*, OBL), broadleaved cattail, California bulrush (*Schoenoplectus californicus*, OBL), and on occasion trees such as bald cypress and swamp tupelo.

3.1.2 Non-wetland Vegetation

Herbaceous Upland: Herbaceous upland communities occur throughout the project area and are found within existing maintained ROW. Common dominant herbaceous species within the herbaceous upland communities include Bermudagrass (*Cynodon dactylon*, FACU), Italian ryegrass (*Lolium multiflorum*, FACU), Canada goldenrod (*Solidago canadensis*, FACU), roundpod St. Johnswort, broom grass (*Andropogon virginicus*, FAC), candyroot (*Polygala nana*, FAC), heartwing sorrel (*Rumex hastatulus*, FAC), cogon grass*, poverty rush (*Juncus tenuis*, FAC), slender crab grass (*Digitaria filiformis*, UPL), tapered rosette grass (*Dichanthelium acuminatum*, FAC), cuman ragweed (*Ambrosia psilostachya*, FAC), perennial rye grass (*Lolium perenne*, FACU), romerillo (*Bidens alba*, UPL), and American beauty berry (*Callicarpa americana*, UPL). In occasional instances trees, saplings, shrubs, or woody vines were identified as minor components of herbaceous uplands. Common dominant tree, sapling, shrub or vine species which occur in these instances include red maple, slash pine, long leaf pine (*Pinus palustris*, UPL), sweetbay, Chinese tallow*, dwarf live oak (*Quercus minima*), American holly (*Ilex opaca*, FAC), and saw greenbriar.

Scrub-Shrub Upland: Scrub-shrub upland communities occur throughout the project area and are mostly found along the edges of existing maintained ROW. Common dominant sapling or shrub species within scrub-shrub upland communities include yaupon, fetterbush, gallberry, swamp titi, eastern sweet shrub (*Calycanthus floridus*, FACU), swamp bay, wax myrtle, American holly, slash pine, and highbush blueberry. In occasional instances trees, herbaceous species, or woody vines which were identified as minor components in scrub-shrub uplands include longleaf pine,

southern magnolia (*Magnolia grandiflora*, UPL), dwarf live oak, red maple, and herbaceous species such as American beauty berry, broom grass, saw palmetto (*Serenoa repens*, FACU), and man of the Earth (*Ipomoea pandurata*, FACU) were also identified.

Forested Upland: Forested upland communities occur throughout forested portions of the project area and along the edge of the existing maintained ROW. Common dominant tree or sapling species within the forested upland communities include slash pine, longleaf pine, southern magnolia, sweetbay, tulip poplar, dwarf live oak, water oak, and laurel oak. In occasional instances shrubs, herbaceous species, or woody vines were identified as minor components of forested uplands. Common dominant shrub species which occur in these instances include fetterbush, gallberry, yaupon, and eastern sweetbush. Common herbaceous plants included western bracken fern (*Pteridium aquilinum*, FACU), cogon grass*, broom grass, American beauty berry, St. Andrew's cross and Bermudagrass.

Refer to the data sheets presented in **Appendix B** for specific vegetation species recorded at each data point. Refer to the photographic log in **Appendix C** for a pictorial representation of vegetation communities within the survey corridor. Several exotic species were encountered during the field survey. An asterisk (*) symbol indicates the exotics species identified.

3.2 Hydrology

Wetland communities observed during the delineation effort typically displayed primary hydrology indicators such as inundation, soil saturation in the upper 12 inches, watermarks, water stained leaves, sphagnum moss, root buttressing or hummocks, adventitious roots, and sediment deposits indicative of wetlands. Less common primary hydrology indicators as well as multiple secondary hydrology indicators were also observed in the wetland communities. Refer to the data sheets presented in **Appendix B** for specific hydrology data recorded at each data point.

Alabama and Mississippi received less than average rainfall over the past several months. According to the National Weather Service (NWS)/National Oceanic and Atmospheric Administration (NOAA) NOWData for the Mobile Regional Airport recording location, which is approximately mid-way along the proposed project route, the project area was deficient in rainfall before and during the field delineation effort. **Table 1** shows the recorded and normal rainfall amounts per month.

Table 1. Monthly Recorded Rainfall at the NWS/NOAA Mobile Alabama recording station.

Month	Recorded Rainfall (inches)	Normal Rainfall (inches)	Departure from Normal (inches)
December 2011	1.88	5.06	-3.18
January 2012	2.24	5.65	-3.41
February 2012	7.25	5.12	+2.13
March 2012	6.69	6.14	+0.55
April 2012	2.51	4.79	-2.28
May 2012	7.82	5.14	+2.68
June 2nd 2012	0.35	0.37	-0.02
Total	**28.74**	**32.27**	**-3.53**

3.3 Soils

Wetland communities displayed hydric soil indicators as described in the Supplement (USACE 2010) such as depleted matrix, 5 cm mucky mineral, hydrogen sulfide, and histic epipedon. Upland communities either failed to display hydric soil indicators or they displayed hydric soils, but failed to meet vegetation and/or hydrology criteria. Refer to **Appendix B** for specific soil data recorded at each data point.

According to the Natural Resource Conservation Service Soil Surveys for Mobile County, Alabama and Jackson County, Mississippi, 51 soil map units are present within the proposed project area (NRCS 2012). Seventeen of the 51 soil map units are hydric (USDA 2012). A list of the 51 soil series along with official soil series descriptions and hydric soil statuses can be found in **Appendix D**.

3.4 Wetlands

The wetland delineation identified 262 wetlands including 109 PEM, 22 PSS, 129 PFO, and two EEM within the project area. The vast majority of these wetland crossings had transitional zones where the wetland transitioned from one wetland cover type to another. Some of these wetland crossings were complex, transitioning multiple times within the survey corridor. To gather crossing lengths and acreages by wetland type, we devised a naming system to name each transitional zone within each wetland; for example the label [WETA003-E0], the 003 indicates the third wetland that Team-A mapped; E0-indicates the first emergent wetland that Team-A mapped within this wetland complex. Another such example, the label WETA003-F1 indicates the second forested wetland that Team-A mapped within this third wetland. Refer to the maps located in **Appendix A** for all wetland boundaries and supporting data points. Refer to the data sheets in **Appendix B** for specific characteristics of each wetland such as vegetation, soils, and hydrology observed. The wetland ID, type, centerline crossing length, and temporary, permanent, and horizontal directional drill (HDD) easement acreages are provided in **Table 2** below.

Table 2. Wetland Data

Wetland ID	Type	Centerline Crossing Length (feet)	50-foot Permanent Easement (ac)	25-foot Temporary Easement (ac)	Impacts Avoided by HDD (ac)[1]	Map Book Page #
WETA002-E0	PEM	-	-	-	-	47
WETA002-F0	PFO	1590.8	1.890	0.817	-	46-47
WETA002-S0	PSS	468.9	0.529	0.031	-	47
WETA003-E0	PEM	83.6	0.096	0.253	-	46-47
WETA003-E1	PEM	3020.6	3.190	0.472	-	44-46
WETA003-F0	PFO	2306.7	2.649	1.163	-	46
WETA003-F1	PFO	19.5	0.022	0.003	-	46
WETA003-F2	PFO	1636.0	1.513	0.938	-	45-46
WETA003-F3	PFO	1921.2	1.789	1.101	-	45
WETA003-F4	PFO	44.4	0.049	0.028	-	45
WETA003-F5	PFO	1175.9	1.351	0.675	-	44-45
WETA003-F6	PFO	340.8	1.474	1.337	-	44
WETA003-F7	PFO	994.3	1.127	0.654	-	43-44
WETA003-S0	PSS	1827.3	2.095	1.039	-	45-46
WETA005-E0	PEM	599.7	0.634	0.203	0.035	43-44
WETA005-F0	PFO	366.8	0.446	0.255	-	43-44
WETA005-F1	PFO	370.7	0.547	0.336	-	43
WETA005-F2	PFO	501.6	0.518	0.064	-	43
WETA005-F3	PFO	784.8	0.522	0.311	0.309	43
WETA006-E0	PEM	-	-	-	0.000	43
WETA006-F0	PFO	63.9	-	-	0.074	43
WETA007-E0	PEM	275.3	0.316	0.164	-	42
WETA007-F0	PFO	226.9	0.261	0.129	-	42
WETA008-E0	PEM	121.0	0.173	0.069	-	42
WETA008-F0	PFO	96.0	0.093	0.022	-	42
WETA009-E0	PEM	419.1	0.484	0.241	-	40-41
WETA010-E0	PEM	875.8	-	-	1.050	40
WETA010-E1	PEM	-	-	-	0.056	40
WETA010-F0	PFO	43.4	-	-	0.037	40
WETA010-S0	PSS	56.1	-	-	0.050	40
WETA010-S1	PSS	366.8	-	-	0.360	40
WETA011-E0	PEM	5.5	0.011	-	-	40
WETA011-F0	PFO	103.6	0.139	0.045	-	40
WETA012-E0	PEM	261.1	0.302	0.095	-	40
WETA013-E0	PEM	232.7	0.270	0.123	-	39-40
WETA013-F0	PFO	119.6	0.140	0.056	-	39-40
WETA014-E0	PEM	-	-	-	-	39

Table 2. Wetland Data Continued

Wetland ID	Type	Centerline Crossing length (feet)	50-foot Permanent Easement (ac)	25-foot Temporary Easement (ac)	Impacts Avoided by HDD (ac)[1]	Map Book Page #
WETA015-E0	PEM	120.8	0.184	0.032	-	39
WETA015-F0	PFO	91.3	0.092	0.066	-	39
WETA016-E0	PEM	137.0	0.362	0.000	-	38-39
WETA016-F0	PFO	165.9	0.114	0.121	-	38-39
WETA017-E0	PEM	48.4	0.054	0.041	-	38
WETA017-F0	PFO	219.9	0.253	0.111	-	38
WETA018-E0	PEM	157.0	0.189	0.061	-	38
WETA019-E0	PEM	-	0.005	-	-	38
WETA019-F0	PFO	925.9	0.849	0.588	-	38
WETA020-E0	PEM	38.8	0.047	0.022	-	37-38
WETA020-F0	PFO	278.7	0.319	0.158	-	37-38
WETA021-F0	PFO	212.1	0.241	0.129	-	37
WETA022-E0	PEM	103.4	0.119	0.057	-	36
WETA022-E1	PEM	445.4	0.561	0.246	-	36
WETA022-F0	PFO	1312.0	1.509	0.741	-	36
WETA022-F1	PFO	291.1	0.325	0.187	-	36
WETA022-S0	PSS	91.3	0.104	0.050	-	36
WETA023-F0	PFO	154.4	0.181	0.091	-	36
WETA023-F1	PFO	325.1	0.377	0.141	-	36
WETA024-F0	PFO	89.0	-	-	0.156	35
WETA024-F1	PFO	197.7	-	-	0.332	35
WETA024-F2	PFO	213.8	-	-	0.326	35
WETA024-F3	PFO	14.9	-	-	0.054	35
WETA025-F0	PFO	1882.6	2.161	1.079	-	32
WETA026-F0	PFO	1452.1	1.676	0.825	-	31-32
WETA026-F1	PFO	113.0	0.106	0.080	-	31-32
WETB003-E0	PEM	-	0.287	-	-	28
WETB003-F0	PFO	773.9	0.585	0.481	-	28
WETB004-E0	PEM	-	-	-	-	28
WETB004-E1	PEM	-	-	-	-	28
WETB004-E2	PEM	-	-	-	-	28
WETB004-E3	PEM	-	-	-	0.002	28
WETB004-E4	PEM	-	-	-	0.000	28
WETB004-E5	PEM	-	-	-	0.008	28
WETB004-F0	PFO	1039.0	-	-	1.179	28-29
WETB004-F1	PFO	52.0	-	-	0.055	28
WETB004-F2	PFO	27.0	-	-	0.041	28
WETB004-F3	PFO	60.5	-	-	0.059	28
WETB004-F4	PFO	80.1	-	-	0.089	28

Table 2. Wetland Data Continued

Wetland ID	Type	Centerline Crossing Length (feet)	50-foot Permanent Easement (ac)	25-foot Temporary Easement (ac)	Impacts Avoided by HDD (ac)[1]	Map Book Page #
WETB005-E0	PEM	-	-	-	0.018	28-29
WETB005-S0	PSS	349.9	-	-	0.369	28-29
WETB006-E0	PEM	-	-	-	-	29
WETB006-F0	PFO	99.1	0.101	0.070	-	29
WETB007-E0	PEM	12.3	0.014	0.005	-	29
WETB007-S0	PSS	506.3	0.581	0.290	-	29
WETB008-E0	PEM	-	0.034	-	0.268	25-26
WETB008-F0	PFO	3138.8	1.646	0.856	1.653	25-26
WETB009-E0	PEM	-	0.025	-	-	24-25
WETB009-F0	PFO	328.7	0.358	0.169	-	24-25
WETC001-E0	PEM	-	0.002	-	-	21
WETC001-F0	PFO	154.8	0.175	0.077	-	21
WETC002-E0	PEM	-	-	-	-	21
WETC002-E1	PEM	-	-	-	-	21
WETC002-F0	PFO	66.0	0.070	0.045	-	21
WETC002-F1	PFO	21.7	0.029	0.007	-	21
WETC003-E0	PEM	-	0.057	-	-	20-21
WETC003-E1	PEM	-	0.008	-	-	20
WETC003-F0	PFO	-	-	0.001	-	30
WETC003-F1	PFO	62.0	0.056	0.002	-	20-21
WETC003-F2	PFO	45.9	0.025	-	-	20
WETC004-E0	PEM	-	0.007	-	-	20
WETC004-F0	PFO	71.2	0.075	-	-	20
WETC005-E0	PEM	-	0.014	-	-	20
WETC005-F0	PFO	45.2	0.035	-	-	20
WETC006-E0	PEM	-	-	-	-	20
WETC007-E0	PEM	-	0.005	-	-	20
WETC007-E1	PEM	-	-	-	-	20
WETC007-F0	PFO	179.3	0.195	0.119	-	20
WETC007-F1	PFO	13.3	0.011	0.015	-	20
WETC008-E0	PEM	-	0.063	-	-	20
WETC008-F0	PFO	328.7	0.327	0.087	-	20
WETC009-E0	PEM	-	0.003	-	-	19-20
WETC009-F0	PFO	42.3	0.045	0.025	-	19-20
WETC010-E0	PEM	57.0	0.071	0.009	-	19
WETC011-S0	PSS	-	-	0.001	-	35
WETC011-S1	PSS	3309.6	3.799	1.901	-	35
WETC011-S2	PSS	748.7	0.854	0.410	-	34
WETC012-E0	PEM	464.1	1.900	-	-	33-34

Table 2. Wetland Data Continued

Wetland ID	Type	Centerline Crossing Length (feet)	50-foot Permanent Easement (ac)	25-foot Temporary Easement (ac)	Impacts Avoided by HDD (ac)[1]	Map Bok. Page #
WETC012-S0	PSS	3023.6	2.111	2.003	-	33-34
WETC012-S1	PSS	-	-	-	-	33-34
WETC013A-E0	PEM	-	0.006	-	-	33
WETC013A-F0	PFO	111.2	0.113	0.010	-	33
WETC013B-E1	PEM	-	0.184	-	-	33
WETC013B-S0	PSS	1233.3	1.230	0.704	-	33
WETC014-E0	PEM	-	0.044	-	-	32-33
WETC015-E0	PEM	121.4	0.104	-	-	32
WETC015-E1	PEM	160.7	0.103	-	-	32
WETC015-F0	PFO	11.1	0.091	0.044	-	32
WETC015-F1	PFO	89.3	0.136	0.128	-	32
WETC016-E0	PEM	-	-	-	-	22-23
WETC016-E1	PEM	-	-	-	-	22-23
WETC017-F0	PFO	268.4	0.332	0.221	-	22-23
WETC017-F1	PFO	128.5	0.141	0.079	-	22
WETC018-E0	PEM	-	-	-	-	15
WETC018-F0	PFO	194.3	0.143	0.124	-	15
WETC019-E0	PEM	-	0.255	-	-	14-15
WETC019-E1	PEM	73.1	0.340	-	-	14
WETC019-E2	PEM	0.3	0.032	-	-	14
WETC019-F0	PFO	911.6	0.794	0.521	-	14-15
WETC019-F1	PFO	1071.6	0.978	0.631	-	14
WETC019-F2	PFO	73.6	0.046	0.062	-	14
WETC020A-E0	PEM	-	0.023	-	-	14
WETC020B-E1	PEM	-	0.071	-	-	13
WETC020B-F0	PFO	43.0	0.025	0.001	-	14
WETC021-E0	PEM	-	-	-	-	10
WETC021-E1	PEM	112.6	0.213	0.065	-	9-10
WETC021-F0	PFO	413.9	0.471	0.254	-	10
WETC021-F1	PFO	191.0	0.209	0.141	-	10
WETC021-F2	PFO	2136.0	2.370	0.911	-	9-10
WETC022-F0	PFO	98.5	0.079	0.043	-	9
WETC022-F1	PFO	368.8	0.346	0.352	-	9
WETC022-F2	PFO	118.3	0.129	0.093	-	9
WETC022-S0	PSS	86.1	0.143	-	-	9
WETC022-S1	PSS	425.7	0.568	0.062	-	9
WETC024-E0	PEM	971.9	-	-	1.137	6-7

Table 2. Wetland Data Continued

Wetland ID	Type	Centerline Crossing Length (feet)	50-foot Permanent Easement (ac)	25-foot Temporary Easement (ac)	Impacts Avoided by HDD (ac)[1]	Map Book Page #
WETC025-E0	PEM	-	-	-	-	6
WETC025-F0	PFO	84.6	-	-	0.096	6
WETC026-E0	PEM	-	-	-	-	6
WETC026-F0	PFO	408.9	0.471	0.229	-	6
WETC027-E0	PEM	-	-	-	-	5-6
WETC027-F0	PFO	1314.6	1.513	0.740	-	5-6
WETC028-E0	PEM	-	0.106	-	-	27
WETC028-F0	PFO	251.7	0.196	0.141	-	27
WETC029-E0	PEM	-	0.042	-	-	15-16
WETC029-F0	PFO	87.1	0.068	0.054	-	15-16
WETC030-E0	PEM	-	0.521	-	0.578	26-27
WETC030-E1	PEM	-	-	-	0.006	26
WETC030-E2	PEM	-	-	-	0.082	26
WETC030-F0	PFO	3199.8	1.760	1.192	0.829	26-27
WETC030-F1	PFO	-	-	-	0.012	26
WETC030-F2	PFO	859.3	-	-	0.857	26
WETC031-E1	PEM	-	0.035	-	-	19
WETC031-E2	PEM	-	-	-	-	19
WETC031-E3	PEM	-	0.022	-	-	19
WETC032-E0	PEM	-	0.018	-	-	19
WETC033-E0	PEM	-	0.009	-	-	19
WETD001-E0	PEM	-	0.002	-	-	43
WETD001-F0	PFO	44.7	0.045	0.032	-	43
WETD002-F0	PFO	-	-	-	-	42
WETD003-F0	PFO	1160.2	1.322	-	-	42
WETD004-F0	PFO	2217.8	2.061	1.736	0.491	42
WETD005-F0	PFO	632.7	0.734	0.342	-	31
WETD006-F0	PFO	134.0	0.143	0.121	-	31
WETD006-F1	PFO	46.7	0.059	0.011	-	31
WETD006-F2	PFO	-	-	-	-	31
WETD007-F0	PFO	-	0.006	-	-	31
WETD008-E0	PEM	35.7	0.233	-	-	31
WETD008-F0	PFO	676.3	0.642	0.439	-	31-32
WETD008-S0	PSS	125.2	0.090	0.036	-	31
WETD009-E0	PEM	-	0.833	-	-	30-31
WETD009-E1	PEM	-	0.098	-	-	29-30
WETD009-F0	PFO	1404.4	1.094	0.797	-	30-31
WETD009-F1	PFO	431.4	0.450	0.244	-	30
WETD009-F2	PFO	60.6	0.066	0.029	-	29-30

Table 2. Wetland Data Continued

Wetland ID	Type	Centerline Crossing Length (feet)	50-foot Permanent Easement (ac)	25-foot Temporary Easement (ac)	Impacts Avoided by HDD (ac)	Map Book Page
WETD009-F3	PFO	140.6	0.161	0.081	-	29-30
WETD009-S0	PSS	1212.9	1.124	0.702	-	30
WETD009-S1	PSS	1349.3	1.461	0.778	-	29-30
WETD009-S2	PSS	285.7	0.321	0.169	-	29-30
WETD010-E0	PEM	-	-	-	-	22
WETD010-E1	PEM	-	-	-	-	22
WETD010-F0	PFO	997.3	0.733	0.400	0.399	22
WETD010-F1	PFO	412.8	-	-	0.461	22
WETD011-E0	PEM	-	-	-	-	22
WETD011-E1	PEM	-	-	-	-	22
WETD011-E2	PEM	-	0.195	-	-	21-22
WETD011-F0	PFO	809.4	0.928	0.478	-	22
WETD011-F1	PFO	1150.9	1.142	0.627	-	21-22
WETD012A-E0	PEM	34.2	0.039	0.015	-	11
WETD012A-E1	PEM	-	-	0.002	-	11
WETD012A-E2	PEM	-	-	-	-	11
WETD012A-E3	PEM	3.0	0.007	-	-	11
WETD012A-E4	PEM	-	0.000	0.001	-	11
WETD012A-E5	PEM	315.3	0.333	0.121	-	11
WETD012A-F0	PFO	-	-	0.003	-	11
WETD012A-F1	PFO	92.1	0.084	0.091	-	11
WETD012A-F2	PFO	42.5	0.054	0.004	-	11
WETD012A-F3	PFO	484.3	0.558	0.338	-	11
WETD012B-E0	PEM	-	-	-	-	10-11
WETD012B-E1	PEM	-	-	-	-	10-11
WETD012B-F0	PFO	1128.8	1.287	0.676	-	10-11
WETD013-E0	PEM	-	0.031	-	-	8-9
WETD013-E1	PEM	-	0.004	-	-	8
WETD013-E2	PEM	-	0.004	-	-	8
WETD013-F0	PFO	2496.8	2.863	1.452	-	8-9
WETD013-F1	PFO	180.2	0.153	0.160	-	8
WETD013-F2	PFO	538.3	0.696	0.291	-	8
WETD013-F3	PFO	-	-	-	-	8
WETD013-F4	PFO	63.4	0.064	0.051	-	8
WETD014-E0	PEM	-	-	-	-	7-8
WETD014-F0	PFO	64.3	0.169	-	-	8
WETD015-E0	PEM	-	0.021	-	-	4
WETD015-F0	PFO	488.5	0.502	0.152	-	4
WETD016-E0	PEM	-	-	-	-	4
WETD017-F0	PFO	149.5	0.166	0.102	-	5

Table 3. Wetland Summary Table

Type	Crossing Length (Centerline feet)	Total Acreages			
		200' Survey Corridor	25' Wide Temporary Construction Easement	50' Wide Permanent Easement	Horizontal Directional Drill (ac)
PEM Wetlands	9,256.40	122.314	2.412	14.126	3.241
EEM Wetlands	3,707.89	17.056	2.675	3.870	0.394
PSS Wetlands	17,177.143	63.331	9.396	16.972	0.779
PFO Wetlands	58,802.62	200.240	30.528	55.989	7.511
Totals:	**88,944.05**	**402.941**	**45.011**	**90.957**	**11.925**

3.5 Waterbodies

The wetland delineation identified 52 streams and seven ponds within the 200-foot survey area. Of the 52 streams delineated, six are ephemeral, 13 are intermittent, and 33 are perennial. The seven ponds are a mixture of man-made and natural waterbodies. Refer to Figure 2 located in **Appendix A** for locations of waterbody crossings along the pipeline route.

Table 4. Waterbody Data

Name	OHWM Width (feet)	OHWM Depth (feet)	TOB Width (feet)	Flow/Type	Substrate	50-foot Permanent Easement (ac)	25-foot Temporary Easement (ac)	Centerline Crossing Length
WBA001	8	1.5	20	Intermittent	Clay	0.035	0.040	31.5
WBA002	40	2	50	Perennial	Clay	-	-	37.0
WBA003	2	0.5	2.5	Ephemeral	Clay	0.011	0.001	2.1
WBA004	35	10	40	Perennial	Clay	0.050	0.014	41.0
WBA005	8	3	10	Perennial	Clay	0.013	0.006	20.5
WBA006	3	1	10	Perennial	Clay	0.003	0.002	8.3
WBA007	8	1.5	10	Perennial	Clay	0.019	0.009	8.5
WBB001	75	4	80	Perennial	Clay	-	-	234.3
WBB004	4	2	20	Intermittent	Organic	-	-	4.1
WBB005	3	2	5	Intermittent	Sand	-	-	6.6
WBB006	2.5	1	7	Intermittent	Sand	-	-	2.8
WBB007	5	2	10	Perennial	Sand	-	-	5.0
WBB008	110	5	120	Perennial	Sand	-	-	-
WBC001	1.5	1	2	Perennial	Organic	0.002	0.001	1.5
WBC002	2	0.5	3	Perennial	Clay	0.003	0.001	2.5
WBC003	10	2	12	Perennial	Sandy Clay	0.009	0.005	8.0
WBC004	4	0.5	8	Ephemeral	Sandy Clay	0.003	0.002	4.1

Name	OHWM Width (feet)	OHWM Depth (feet)	TOB Width (feet)	Flow/Type	Substrate	50-foot Permanent Easement (ac)	25-foot Temporary Easement (ac)	Centerline Crossing Length
WBC005	40	4	50	Perennial	Clay	0.035	0.055	29.4
WBC006	2.5	1	3	Perennial	Sandy Clay	0.003	0.002	3.1
WBC007	3	1	4	Perennial	Sandy Clay	0.004	0.002	3.0
WBC008	10	3	12	Perennial	Clay	0.017	0.006	11.1
WBC009	2	0.75	4	Ephemeral	Clay	-	-	-
WBC010A	0	0	10	Ephemeral	Concrete	0.017	0.009	15.0
WBC010B	1.5	0.75	2	Intermittent	Clay	0.011	0.005	9.9
WBC011	25	3	30	Perennial	Clay	0.035	0.049	30.8
WBC012	100	5	120	Perennial	Clay	0.105	-	116.1
*WBC013	6	2	12	Intermittent	Clay	-	-	23.7
WBC112A	0	0	0	Perennial		0.026	0.019	21.9
WBC112B	0	0	0	Perennial		-	-	-
WBD001	2	2	3	Ephemeral	Sand	0.007	0.002	2.7
WBD002	63	10	65	Perennial	Sand	0.182	-	158.5
WBD003A	6	1	10	Intermittent	Sand	0.010	0.004	9.7
*WBD003B	20	2	40	Perennial	Clay	-	-	-
WBD004A	3	1	5	Intermittent	Sand	0.003	0.002	3.0
*WBD004B	40	3	50	Perennial	Sand	-	-	64.4
WBD005	3	1	4	Intermittent	Clay	0.004	0.002	3.5
WBD006	5	2	6	Perennial	Sand	0.006	0.014	5.2
WBD007	10	2	12	Perennial	Sand	0.036	0.022	17.1
WBD008	30	5	30	Perennial	Clay	0.040	0.001	47.1
WBD009A	5	2	8	Perennial	Clay	0.016	0.003	42.8
WBD009B	5	2	8	Perennial	Clay	-	-	-
WBD009C	5	2	8	Perennial	Clay	0.006	0.003	5.7
WBD009D	0	0	0	Intermittent		-	-	-
*WBD010	60	6	65	Perennial	Clay	-	-	-
WBD011	5	3	7	Perennial	Clay	0.006	0.003	5.0
WBG003	0	0	0	Perennial		-	0.012	-
WBG004	0	0	0	Perennial		-	-	-
WBG005	3	0	0	Intermittent	Clay	0.004	0.002	3.6
*WBG006	20	0	0	Perennial	Clay	-	-	19.8
*WBG007	270	0	0	Perennial	Clay	-	-	266.5
WBG008	15	0	0	Perennial	Clay	0.023	0.016	22.8
*WBG009	195	0	0	Perennial	Clay	-	-	-
WBG010	0	0	0	Intermittent		0.003	0.002	2.3
WBG011	12	0	12	Perennial		0.014	0.007	12.0
WBG012	12	0	12	Perennial		0.014	0.007	12.0
WBGT001	3	0.5	5	Intermittent	Sandy Clay	0.013	0.002	34.6

Name	OHWM Width (feet)	OHWM Depth (feet)	TOB Width (feet)	Flow/Type	Substrate	50-foot Permanent Easement (ac)	25-foot Temporary Easement (ac)	Centerline Crossing Length
WBGT004	10	2	18	Perennial	Sandy Silt	0.021	0.010	12.1
WBGT005	12	3	15	Ephemeral	Sandy Clay	0.005	0.010	5.6
WBGT006	25	3	35	Perennial	Sandy Clay	0.010	0.006	11.8
Totals						**0.824**	**0.358**	**1,449.3**

*Waterbodies that will be horizontally directional drilled. **Waterbodies that have 0 within the typical waterbody data (OHWM, Top of Bank etc.) were aerially interpreted.

SWCA identified and delineated a total of 52 streams within the project area. Many of the streams were small perennial hillside seeps. Another 7 waterbodys were delineated within the project area. Most of these were man-made ponds.

Only one of the waterbodies (two crossings) delineated (Escatawpa River) in the project area are considered Section 10 navigable waters. Plains Southcap, LLC will use a HDD to proceed under both the lower and upper crossings of the Escatawpa River.

SWCA identified a total of seven other waterbodies within the project area, most of which were man-made ponds. **Table 5** below provides the crossing lengths and total acreages for waterbodies within the survey corridor and project area.

Table 5. Stream/Waterbody Summary Table

Type	Crossing Length (Centerline, feet)	Total Acreages		
		Survey Corridor	50' Wide Permanent Easement	25' Wide Temporary Easement
Ephemeral Streams	29.46	0.416	0.0431	0.023
Intermittent Streams	135.15	0.516	0.084	0.059
Perennial Streams	1,121.5	5.717	0.552	0.262
Other Waterbodies	163.23	1.166	0.145	0.013
Totals:	**1,424.35**	**7.705**	**1.624**	**0.363**

All wetlands and waterbodies delineated within the project area are subject to USACE jurisdiction under section 404 of the CWA. It should be understood that the scope of these delineations was to ascertain the presence of potential jurisdictional areas. In SWCA's professional opinion, physical features identified during site visits may be considered "waters of the U.S." (i.e. wetlands and waterbodies); however, this report is not a legal delineation of the boundaries of "waters of the U.S." or a determination of their jurisdictional status. Only the USACE has final and/or legal authority in determining the presence of jurisdictional "waters of the U.S." and the extent of their boundaries.

4.0 PERMITTING

Based on survey findings, the project could be constructed under Nationwide Permit (NWP) 12 – Utility Line Activities. NWP 12 conditions are provided in **Appendix E**. In accordance with NWP 12, a project sponsor must submit a pre-construction notification (PCN) to the USACE

prior to commencing the activity in waters and wetlands if any of the following criteria are met:

(1) The activity involves mechanized land clearing in a forested wetland for the utility line right-of-way.

(2) A Section 10 Permit is required.

(3) The utility line in "waters of the U.S.," excluding overhead lines, exceeds 500 feet.

(4) The utility line is placed within a jurisdictional area, and it runs parallel to a stream bed that is within that jurisdictional area.

(5) Discharges that result in a loss greater than $1/10^{th}$ acre of waters of the United States.

(6) Permanent access roads are constructed above grade in waters of the United States for a distance more than 500 feet.

(7) Permanent access roads are constructed in waters of the United States with impervious materials.

Regulatory Analysis

The following responses are given for each of the seven criteria mentioned above:

(1) A total of 129 forested wetlands and 22 scrub shrub wetlands were delineated within the project area. The majority of these wetlands will be avoided by HDD. However, in some areas using HDD practices will not be possible and as a result the project will require mechanized land clearing in some forested wetlands for the utility line right-of-way throughout the proposed project line.

(2) SWCA examined the existing USACE List of Navigable Waters of the U.S. (Section 10 waters), and the section 10 waters found within the project area are the two crossings of the Escawtapa River.

(3) The pipeline crossing at the Escatawpa River and the associated wetlands is over 500 feet long. Plains proposes to HDD under the river and adjacent EEM wetland.

(4) The pipeline does not run parallel to a stream bed that is within a jurisdictional area.

(5) It is our understanding that permanent conversions for wetlands or waters as a result of project construction will be inevitable due to construction constraints. Mitigation for permanent conversions of forested and scrub shrub wetlands into emergent wetlands will be completed by purchasing credits through a local mitigation bank. A mitigation plan for the use of that mitigation bank will be provided within 21 calendar days of the submission of this document.

(6) It is our understanding that pre-existing roads will be utilized and new roads within "waters of the U.S." are not proposed as part of this project.

(7) It is our understanding that permanent access road crossing of waterbodies using impervious materials will not be constructed as part of this project.

5.0 SUMMARY

In April, May, and June of 2012, SWCA biologists conducted a wetland delineation survey for approximately 41 miles of crude oil pipeline for Plains Southcap, LLC, in Mobile County, Alabama and Jackson County, Mississippi. Under Section 404 of the CWA, the USACE regulates the discharge of dredged or fill material into "waters of the United States," including wetlands. SWCA's scope of work was to determine the location of potential jurisdictional "waters of the U.S.," including wetlands. SWCA identified and delineated 248 wetlands and 57 waterbodies within the boundaries of the project area. Based on our regulatory analysis, the proposed project could be constructed under the conditions of NWP 12 with submittal of a PCN.

All wetlands and waterbodies delineated along the pipeline route are subject to USACE jurisdiction under Section 404 of the CWA. It should be understood that the scope of these delineations was to ascertain the presence of potential jurisdictional areas. In SWCA's professional opinion, physical features identified during site visits may be considered "waters of the U.S." (i.e. wetlands and waterbodies). This report is not a legal delineation of the boundaries of "waters of the U.S." or a determination of their jurisdictional status. Only the USACE has final and/or legal authority in determining the presence of jurisdictional "waters of the U.S." and the extent of their boundaries.

6.0 REFERENCES

NOAA Online Weather Data (NOWData), National Oceanic and Atmospheric Administration. Climatology data for Mobile, Alabama. Available online at http://www.weather.gov/climate. Accessed 7/5/2012.

Soil Survey Staff, Natural Resources Conservation Service, United States Department of Agriculture. Soil Survey Geographic (SSURGO) Database for Mobile county Alabama and Jackson county Mississippi. Available online at http://soildatamart.nrcs.usda.gov . Accessed 07/21/2012.

United States Army Corps of Engineers (USACE) (1987) Corps of Engineers Wetland Delineation Manual. United States Corps of Engineers Research and Development Center, Vicksburg, MS. Techinal ReportY-87-1.

United States Army Corps of Engineers (USACE) (2010) Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Atlantic andGulf Coastal Plain Region (Version 2.0). United States Corps of Engineers Research and Development Center, Vicksburg, MS. ERDC/EL TR-10-20

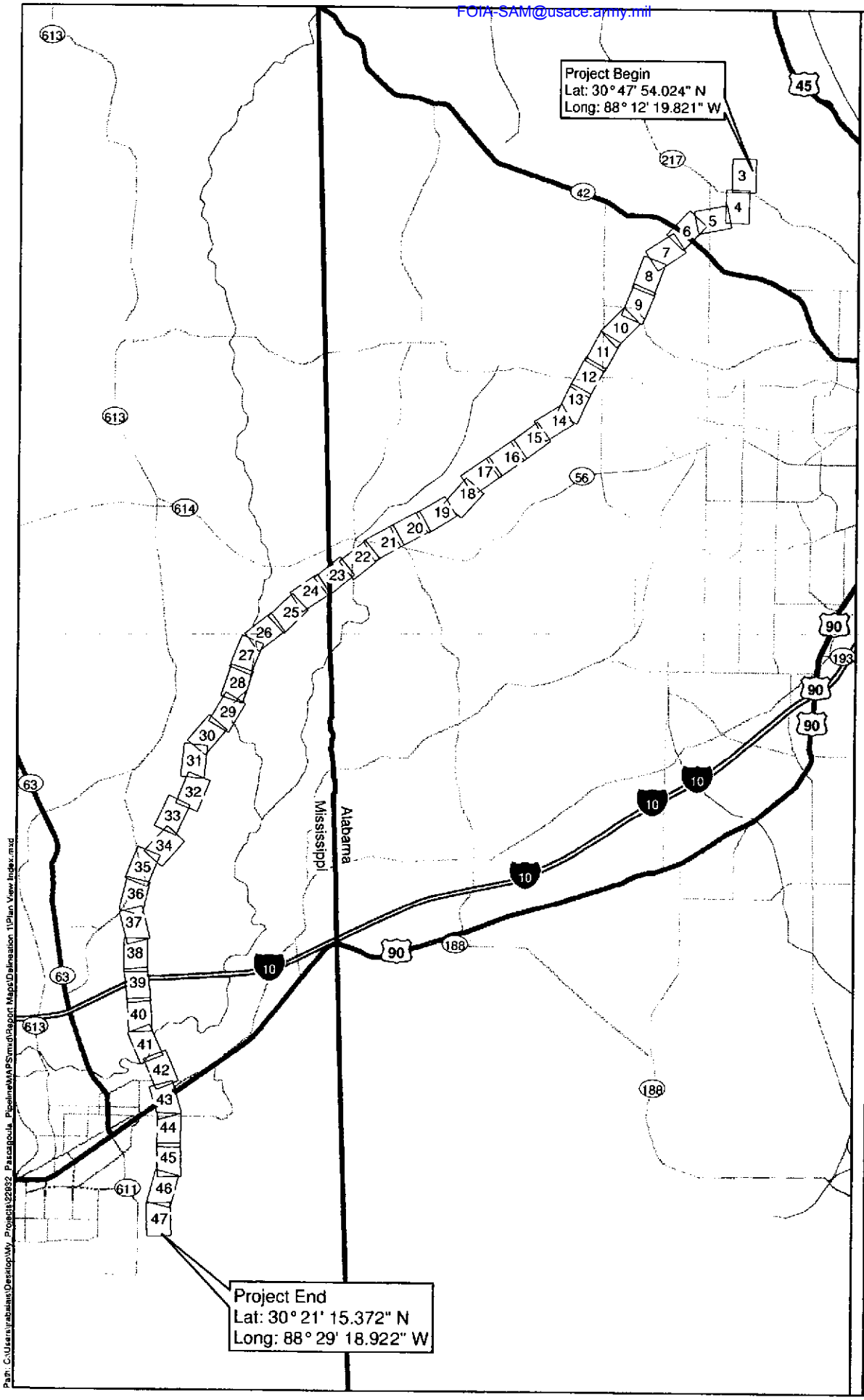
PROJECT QUANTITIES

WETLANDS	
PEM	122.314 ac.
PFO	200.240 ac.
PSS	63.331 ac.
EEM	17.056 ac.
TOTAL-	402.941 ac.
RIVERS / STREAMS	
EPHEMERAL	0.416 ac.
INTERMITTENT	0.516 ac.
PERENNIAL	5.717 ac.
TOTAL-	6.539 ac.
WATERBODIES	
PERRENIAL	1.166 ac.
UPLANDS	590.400 ac.
SITE TOTAL	1,001.047 ac.

LEGEND

Project Area

J:\projects\22802 Pascagoula Pipeline\MAPS\mxd\Report Maps\Delineation 1\Vicinity map.mxd



PLAINS SOUTHCAP L.L.C.

PLAN VIEW INDEX 41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT

JACKSON COUNTY, MS
MOBILE COUNTY, AL

LEGEND

Plan View

0 2 4 Miles

SWCA
ENVIRONMENTAL CONSULTANTS

Path: C:\Users\rabalais\Desktop\My_Projects\22832_Pascagoula_Pipeline\MAPS\mxd\Report Maps\Delineation 1\Plan View Index.mxd

PRELIMINARY JURISDICTIONAL DETERMINATION FORM

BACKGROUND INFORMATION

A. REPORT COMPLETION DATE FOR PRELIMINARY JURISDICTIONAL DETERMINATION (JD): 08/31/2012

B. NAME AND ADDRESS OF PERSON REQUESTING PRELIMINARY JD:

R. Thomas Sankey, Senior Project Manager, SWCA
7255 Langtry, Suite 100
Houston, TX 77040

C. DISTRICT OFFICE, FILE NAME, AND NUMBER: Mobile District,

D. PROJECT LOCATION(S) AND BACKGROUND INFORMATION:

Plains Southcap, LLC (Plains) requested that SWCA Environmental Consultants (SWCA) complete a wetland and waters delineation for the approximately 41 miles of 24-inch crude oil pipeline. The project area begins at the Plains Ten-Mile Crude Oil Facility in Mobile Alabama, located approximately 11 miles northwest of downtown Mobile, and extends southwest towards Pascagoula, Mississippi. The line ends at the Chevron Pascagoula Refinery approximately one mile from the Gulf of Mexico (project site).

Construction of the proposed project is slated to begin in March 2013 and end before September 2013. No fill material will be placed within waters or wetlands for more than three months.

The proposed project will consist of the construction and placement of approximately 41 miles of 24-inch diameter pipeline from Ten-Mile, Alabama to Pascagoula, Mississippi. Construction of the pipeline will be within a 75-foot-wide right-of-way (ROW) and will consist of clearing vegetation, excavating a trench, laying the pipe, replacing the soil, adjusting the topography to match pre-construction contours, and re-establishing vegetation. A permanent 50-foot-wide easement will be maintained and mowed on a regular basis. Please refer to the permit application map book for an illustration of the ROW showing both temporary and permanent easements within the project area, cross-sectional illustrations for open-cut techniques and site-specific plan and profile exhibits for horizontal directional drills (HDD) under Rivers and Harbor Act, Section 10 waters.

(USE THE WATER RESOURCES TABLE ATTACHED TO THIS PACKET THAT DOCUMENTS MULTIPLE WATERBODIES AT DIFFERENT SITES)

State: Alabama / Mississippi County/parish/borough: Mobile / Jackson
City: Mobile and Pascagoula
Center coordinates of site (lat/long in degree decimal format): Lat. 30° 36' 46.437"° N, Long. -88° 25' 24.257"° W.

Universal Transverse Mercator: 15

Name of nearest waterbody: Escatawpa River Project crosses this river twice.

Identify (estimate) amount of waters in the review area:

Non-wetland waters: 1425.4 linear feet: width (ft) and/or 7.70 acres.

Cowardin Class: Riverine

Stream Flow: Perennial

Wetlands: 386.2 acres

Cowardin Class: Emergent Wetland

Name of any water bodies on the site that have been identified as Section 10 waters:

Tidal: Escatawpa River and associated estuarine wetlands for the southern crossing.

Non-Tidal:

E. REVIEW PERFORMED FOR SITE EVALUATION (CHECK ALL THAT APPLY):

☐ Office (Desk) Determination. Date:

☒ Field Determination. Date(s): April, May, and the first week of June.

1. The Corps of Engineers believes that there may be jurisdictional waters of the United States on the subject site, and the permit applicant or other affected party who requested this preliminary JD is hereby advised of his or her option to request and obtain an approved jurisdictional determination (JD) for that site. Nevertheless, the permit applicant or other person who requested this preliminary JD has declined to exercise the option to obtain an approved JD in this instance and at this time.

2. In any circumstance where a permit applicant obtains an individual permit, or a Nationwide General Permit (NWP) or other general permit verification requiring "pre-construction notification" (PCN), or requests verification for a non-reporting NWP or other general permit, and the permit applicant has not requested an approved JD for the activity, the permit applicant is hereby made aware of the following: (1) the permit applicant has elected to seek a permit authorization based on a preliminary JD, which does not make an official determination of jurisdictional waters; (2) that the applicant has the option to request an approved JD before accepting the terms and conditions of the permit authorization, and that basing a permit authorization on an approved JD could possibly result in less compensatory mitigation being required or different special conditions; (3) that the applicant has the right to request an individual permit rather than accepting the terms and conditions of the NWP or other general permit authorization; (4) that the applicant can accept a permit authorization and thereby agree to comply with all the terms and conditions of that permit, including whatever mitigation requirements the Corps has determined to be necessary; (5) that undertaking any activity in reliance upon the subject permit authorization without requesting

an approved JD constitutes the applicant's acceptance of the use of the preliminary JD, but that either form of JD will be processed as soon as is practicable; (6) accepting a permit authorization (e.g., signing a proffered individual permit) or undertaking any activity in reliance on any form of Corps permit authorization based on a preliminary JD constitutes agreement that all wetlands and other water bodies on the site affected in any way by that activity are jurisdictional waters of the United States, and precludes any challenge to such jurisdiction in any administrative or judicial compliance or enforcement action, or in any administrative appeal or in any Federal court; and (7) whether the applicant elects to use either an approved JD or a preliminary JD, that JD will be processed as soon as is practicable. Further, an approved JD, a proffered individual permit (and all terms and conditions contained therein), or individual permit denial can be administratively appealed pursuant to 33 C.F.R. Part 331, and that in any administrative appeal, jurisdictional issues can be raised (see 33 C.F.R. 331.5(a)(2)). If, during that administrative appeal, it becomes necessary to make an official determination whether CWA jurisdiction exists over a site, or to provide an official delineation of jurisdictional waters on the site, the Corps will provide an approved JD to accomplish that result, as soon as is practicable. This preliminary JD finds that there *"may be"* waters of the United States on the subject project site, and identifies all aquatic features on the site that could be affected by the proposed activity, based on the following information:

SUPPORTING DATA. Data reviewed for preliminary JD (check all that apply - checked items should be included in case file and, where checked and requested, appropriately reference sources below):

☒ Maps, plans, plots or plat submitted by or on behalf of the applicant/consultant: SWCA delineation maps .

☒ Data sheets prepared/submitted by or on behalf of the applicant/consultant.

- ☐ Office concurs with data sheets/delineation report.
- ☐ Office does not concur with data sheets/delineation report.

☐ Data sheets prepared by the Corps: .

☐ Corps navigable waters' study: .

☐ U.S. Geological Survey Hydrologic Atlas: .

- ☐ USGS NHD data.
- ☐ USGS 8 and 12 digit HUC maps.

☐ U.S. Geological Survey map(s). Cite scale & quad name: .

☐ USDA Natural Resources Conservation Service Soil Survey. Citation:

.

☐ National wetlands inventory map(s). Cite name: .

☐ State/Local wetland inventory map(s): .

☐ FEMA/FIRM maps: .

☐ 100-year Floodplain Elevation is: (National Geodectic Vertical Datum of 1929)

☒ Photographs: ☐ Aerial (Name & Date): .

or ☒ Other (Name & Date): See Attached. Photographs prepared/submitted by or on behalf of the applicant/consultant.

☐ Previous determination(s). File no. and date of response letter: .

☐ Other information (please specify): .

IMPORTANT NOTE: The information recorded on this form has not necessarily been verified by the Corps and should not be relied upon for later jurisdictional determinations.

Signature and date of
Regulatory Project Manager
(REQUIRED)

R. Thomas Young 9/9/12

Signature and date of
person requesting preliminary JD
(REQUIRED, unless obtaining
the signature is impracticable)

		HGM_Code							Local_Waterway
WBA001	R4	RIVERINE	AREA	0.098092	ACRE	RPW	30.362179	-88.483413	Pt Aux Chenes Bay-Mississippi Sound
WBA002	R5	RIVERINE	AREA	0.193311	ACRE	RPW	30.441738	-88.495247	Little Black Creek
WBA003	R6	RIVERINE	AREA	0.021627	ACRE	NRPW	30.453589	-88.496405	Black Creek-Escatawpa River
WBA004	R5	RIVERINE	AREA	0.147623	ACRE	RPW	30.480654	-88.499077	Black Creek-Escatawpa River
WBA005	R5	RIVERINE	AREA	0.276305	ACRE	RPW	30.496089	-88.497469	Black Creek-Escatawpa River
WBA006	R5	RIVERINE	AREA	0.103812	ACRE	RPW	30.500321	-88.496286	Black Creek-Escatawpa River
WBA007	R5	RIVERINE	AREA	0.058694	ACRE	RPW	30.54165	-88.4716	Black Creek-Escatawpa River
WBB001	R5	RIVERINE	AREA	1.088488	ACRE	RPW	30.600421	-88.440078	Escatawpa River
WBB004	R4	RIVERINE	AREA	0.022758	ACRE	NRPW	30.578524	-88.452051	Rocky Creek-Escatawpa River
WBB005	R4	RIVERINE	AREA	0.02304	ACRE	NRPW	30.578401	-88.452114	Rocky Creek-Escatawpa River
WBB006	R4	RIVERINE	AREA	0.009998	ACRE	NRPW	30.578317	-88.452218	Rocky Creek-Escatawpa River
WBB007	R4	RIVERINE	AREA	0.025588	ACRE	RPW	30.578203	-88.452216	Rocky Creek-Escatawpa River
WBB008	L2	DEPRESS	AREA	0.211361	ACRE	ISOLATE	30.56868	-88.454774	Rocky Creek-Escatawpa River
WBC001	R5	RIVERINE	AREA	0.00735	ACRE	RPW	30.640651	-88.379625	Upper Big Creek
WBC002	R5	RIVERINE	AREA	0.00904	ACRE	RPW	30.643378	-88.374183	Upper Big Creek
WBC003	R5	RIVERINE	AREA	0.03992	ACRE	RPW	30.647379	-88.365877	Wolf Branch
WBC004	R6	RIVERINE	AREA	0.260021	ACRE	NRPW	30.505584	-88.493876	Black Creek-Escatawpa River
WBC005	R5	RIVERINE	AREA	0.259906	ACRE	RPW	30.529756	-88.473698	Black Creek-Escatawpa River
WBC006	R5	RIVERINE	AREA	0.016304	ACRE	RPW	30.628735	-88.399393	Upper Big Creek
WBC007	R5	RIVERINE	AREA	0.01461	ACRE	RPW	30.629391	-88.39816	Upper Big Creek
WBC008	R6	RIVERINE	AREA	0.05965	ACRE	RPW	30.688826	-88.304762	Upper Big Creek
WBC009	R6	RIVERINE	AREA	0.008356	ACRE	NRPW	30.68892	-88.30505	Upper Big Creek
WBC010A	R6	RIVERINE	AREA	0.068935	ACRE	NRPW	30.73353	-88.265678	Upper Big Creek
WBC010B	R4	RIVERINE	AREA	0.077735	ACRE	RPW	30.69158	-88.301973	Upper Big Creek
WBC011	R5	RIVERINE	AREA	0.19062	ACRE	RPW	30.740001	-88.259513	Upper Big Creek
WBC012	L2	DEPRESS	AREA	0.291451	ACRE	ISOLATE	30.763655	-88.24497	Chickasaw Creek
WBC013	R4	RIVERINE	AREA	0.062134	ACRE	RPW	30.598884	-88.442303	Rocky Creek-Escatawpa River
WBC112A	R5	RIVERINE	AREA	0.144441	ACRE	RPW	30.776981	-88.226859	Double Branch
WBC112B	R5	RIVERINE	AREA	0.012339	ACRE	RPW	30.777217	-88.226265	Double Branch
WBD001	R6	RIVERINE	AREA	0.013549	ACRE	NRPW	30.408902	-88.483617	Black Creek-Escatawpa River
WBD002	R5	RIVERINE	AREA	0.721735	ACRE	RPW	30.417491	-88.482852	Black Creek-Escatawpa River
WBD003A	R4	RIVERINE	AREA	0.033335	ACRE	RPW	30.546427	-88.471696	Black Creek-Escatawpa River
WBD003B	L2	DEPRESS	AREA	0.042289	ACRE	ISOLATE	30.631695	-88.394076	Upper Big Creek
WBD004A	R4	RIVERINE	AREA	0.093728	ACRE	RPW	30.548429	-88.471501	Black Creek-Escatawpa River
WBD004B	R5	RIVERINE	AREA	0.248155	ACRE	RPW	30.631923	-88.393515	Big Creek
WBD005	R4	RIVERINE	AREA	0.014663	ACRE	RPW	30.635896	-88.388556	Upper Big Creek
WBD006	R5	RIVERINE	AREA	0.086427	ACRE	RPW	30.723109	-88.275295	Upper Big Creek
WBD007	R5	RIVERINE	AREA	0.138855	ACRE	RPW	30.7244	-88.27433	Hamilton Creek
WBD008	L2	DEPRESS	AREA	0.043001	ACRE	ISOLATE	30.75326	-88.254497	Upper Big Creek
WBD009A	L2	DEPRESS	AREA	0.051053	ACRE	RPW	30.753782	-88.254431	Upper Big Creek
WBD009B	R5	RIVERINE	AREA	0.017824	ACRE	RPW	30.754468	-88.254234	Upper Big Creek
WBD009C	R5	RIVERINE	AREA	0.02993	ACRE	RPW	30.755055	-88.253672	Upper Big Creek
WBD009D	R4	RIVERINE	AREA	0.007417	ACRE	RPW	30.757013	-88.252598	Upper Big Creek
WBD010	L2	DEPRESS	AREA	0.198141	ACRE	ISOLATE	30.759935	-88.251594	Upper Big Creek
WBD011	R5	RIVERINE	AREA	0.023308	ACRE	RPW	30.77766	-88.222117	Red Creek
WBG003	L2	DEPRESS	AREA	0.064323	ACRE	ISOLATE	30.464371	-88.497297	Black Creek-Escatawpa River
WBG004	R5	RIVERINE	AREA	0.040654	ACRE	RPW	30.480747	-88.49869	Black Creek-Escatawpa River
WBG005	R4	RIVERINE	AREA	0.016445	ACRE	RPW	30.794895	-88.210302	Chickasaw Creek
WBG006	R5	RIVERINE	AREA	0.109093	ACRE	RPW	30.498219	-88.49696	Black Creek
WBG007	R5	RIVERINE	AREA	1.231759	ACRE	TNW	30.421551	-88.468024	Escatawpa River
WBG008	R5	RIVERINE	AREA	0.120238	ACRE	RPW	30.428795	-88.492343	Black Creek-Escatawpa River
WBG009	L2	DEPRESS	AREA	0.315826	ACRE	ISOLATE	30.760948	-88.249771	Chickasaw Creek
WBG010	R4	RIVERINE	AREA	0.013918	ACRE	RPW	30.719949	-88.277235	Upper Big Creek
WBG011	R5	RIVERINE	AREA	0.055186	ACRE	RPW	30.35603	-88.487115	Pt Aux Chenes Bay-Mississippi Sound
WBG012	R5	RIVERINE	AREA	0.05488	ACRE	RPW	30.355344	-88.488586	Pt Aux Chenes Bay-Mississippi Sound
WBGT001	R4	RIVERINE	AREA	0.042462	ACRE	RPW	30.650564	-88.359404	Upper Big Creek
WBGT004	R5	RIVERINE	AREA	0.059167	ACRE	RPW	30.669693	-88.333594	Upper Big Creek
WBGT005	R5	RIVERINE	AREA	0.043246	ACRE	NRPW	30.672919	-88.326116	Pierce Creek
WBGT006	R5	RIVERINE	AREA	0.081181	ACRE	RPW	30.673152	-88.328035	Pierce Creek
WETA002-E0	PEM	MINSOILFLT	AREA	0.050595	ACRE	TNWW	30.355817	-88.483218	Pt Aux Chenes Bay-Mississippi Sound
WETA002-F0	PFO	MINSOILFLT	AREA	6.777804	ACRE	TNWW	30.359738	-88.483396	Pt Aux Chenes Bay-Mississippi Sound
WETA002-S0	PSS	MINSOILFLT	AREA	1.526831	ACRE	TNWW	30.356521	-88.483371	Pt Aux Chenes Bay-Mississippi Sound
WETA003-E0	PEM	MINSOILFLT	AREA	3.686245	ACRE	TNWW	30.356111	-88.483571	Pt Aux Chenes Bay-Mississippi Sound

WETA003-E1	PEM	MINSOILFLT	AREA	18.075825	ACRE	RPWWN	30.386137	-88.479995	Pt Aux Chenes Bay-Mississippi Sound
WETA003-F0	PFO	MINSOILFLT	AREA	7.803755	ACRE	TNWW	30.366167	-88.483281	Pt Aux Chenes Bay-Mississippi Sound
WETA003-F1	PFO	MINSOILFLT	AREA	0.06148	ACRE	TNWW	30.369471	-88.483237	Pt Aux Chenes Bay-Mississippi Sound
WETA003-F2	PFO	MINSOILFLT	AREA	4.466564	ACRE	TNWW	30.376091	-88.480074	Pt Aux Chenes Bay-Mississippi Sound
WETA003-F3	PFO	MINSOILFLT	AREA	5.169493	ACRE	RPWWN	30.381474	-88.480167	Pt Aux Chenes Bay-Mississippi Sound
WETA003-F4	PFO	MINSOILFLT	AREA	0.187013	ACRE	RPWWN	30.384309	-88.480314	Pt Aux Chenes Bay-Mississippi Sound
WETA003-F5	PFO	MINSOILFLT	AREA	4.36282	ACRE	RPWWN	30.388262	-88.480282	Pt Aux Chenes Bay-Mississippi Sound
WETA003-F6	PFO	MINSOILFLT	AREA	5.013388	ACRE	RPWWN	30.391451	-88.48038	Pt Aux Chenes Bay-Mississippi Sound
WETA003-F7	PFO	MINSOILFLT	AREA	4.182854	ACRE	RPWWN	30.397319	-88.480301	Pt Aux Chenes Bay-Mississippi Sound
WETA003-S0	PSS	MINSOILFLT	AREA	8.351466	ACRE	TNWW	30.371704	-88.481687	Pt Aux Chenes Bay-Mississippi Sound
WETA005-E0	PEM	MINSOILFLT	AREA	5.222936	ACRE	RPWWN	30.40253	-88.480762	Pt Aux Chenes Bay-Mississippi Sound
WETA005-F0	PFO	MINSOILFLT	AREA	1.28969	ACRE	RPWWN	30.399673	-88.480255	Pt Aux Chenes Bay-Mississippi Sound
WETA005-F1	PFO	MINSOILFLT	AREA	1.741713	ACRE	RPWWN	30.401093	-88.480226	Pt Aux Chenes Bay-Mississippi Sound
WETA005-F2	PFO	MINSOILFLT	AREA	1.558333	ACRE	RPWWN	30.402922	-88.480294	Pt Aux Chenes Bay-Mississippi Sound
WETA005-F3	PFO	MINSOILFLT	AREA	2.20656	ACRE	RPWWN	30.40473	-88.481768	Pt Aux Chenes Bay-Mississippi Sound
WETA006-E0	PEM	MINSOILFLT	AREA	0.108332	ACRE	RPWWN	30.405627	-88.482907	Pt Aux Chenes Bay-Mississippi Sound
WETA006-F0	PFO	MINSOILFLT	AREA	0.181672	ACRE	RPWWN	30.405763	-88.482651	Pt Aux Chenes Bay-Mississippi Sound
WETA007-E0	PEM	ORGSOILFLT	AREA	1.440423	ACRE	RPWWN	30.431792	-88.494193	Black Creek-Escatawpa River
WETA007-F0	PFO	MINSOILFLT	AREA	0.824381	ACRE	RPWWN	30.431216	-88.493949	Black Creek-Escatawpa River
WETA008-E0	PEM	DEPRESS	AREA	0.998822	ACRE	NRPWW	30.433388	-88.494576	Black Creek-Escatawpa River
WETA008-F0	PFO	DEPRESS	AREA	0.11627	ACRE	NRPWW	30.433225	-88.494448	Black Creek-Escatawpa River
WETA009-E0	PEM	ORGSOILFLT	AREA	1.979721	ACRE	NRPWW	30.435943	-88.494702	Black Creek-Escatawpa River
WETA010-E0	PEM	RIVERINE	AREA	4.468533	ACRE	RPWWD	30.440197	-88.495105	Black Creek-Escatawpa River
WETA010-E1	PEM	RIVERINE	AREA	0.62285	ACRE	RPWWD	30.442262	-88.495436	Black Creek-Escatawpa River
WETA010-F0	PFO	RIVERINE	AREA	0.079146	ACRE	RPWWN	30.43919	-88.494867	Black Creek-Escatawpa River
WETA010-S0	PSS	RIVERINE	AREA	0.157278	ACRE	RPWWD	30.441596	-88.495044	Black Creek-Escatawpa River
WETA010-S1	PSS	RIVERINE	AREA	0.998642	ACRE	RPWWD	30.442285	-88.495122	Black Creek-Escatawpa River
WETA011-E0	PEM	DEPRESS	AREA	0.616275	ACRE	NRPWW	30.444244	-88.495643	Black Creek-Escatawpa River
WETA011-F0	PFO	DEPRESS	AREA	0.309868	ACRE	NRPWW	30.444481	-88.495397	Black Creek-Escatawpa River
WETA012-E0	PEM	RIVERINE	AREA	0.879316	ACRE	NRPWW	30.445633	-88.495656	Black Creek-Escatawpa River
WETA013-E0	PEM	RIVERINE	AREA	1.251247	ACRE	NRPWW	30.447739	-88.495778	Black Creek-Escatawpa River
WETA013-F0	PFO	RIVERINE	AREA	0.290464	ACRE	NRPWW	30.447662	-88.495649	Black Creek-Escatawpa River
WETA014-E0	PEM	MINSOILFLT	AREA	0.158506	ACRE	NRPWW	30.456093	-88.497043	Black Creek-Escatawpa River
WETA015-E0	PEM	MINSOILFLT	AREA	0.767089	ACRE	NRPWW	30.457236	-88.497125	Black Creek-Escatawpa River
WETA015-F0	PFO	MINSOILFLT	AREA	0.191209	ACRE	NRPWW	30.45685	-88.496861	Black Creek-Escatawpa River
WETA016-E0	PEM	MINSOILFLT	AREA	1.245398	ACRE	NRPWW	30.459875	-88.497613	Black Creek-Escatawpa River
WETA016-F0	PFO	MINSOILFLT	AREA	0.311735	ACRE	NRPWW	30.459861	-88.497376	Black Creek-Escatawpa River
WETA017-E0	PEM	RIVERINE	AREA	0.621626	ACRE	NRPWW	30.461878	-88.497633	Black Creek-Escatawpa River
WETA017-F0	PFO	RIVERINE	AREA	0.632249	ACRE	NRPWW	30.462061	-88.497429	Black Creek-Escatawpa River
WETA018-E0	PEM	LACUSTRINE	AREA	0.697045	ACRE	NRPWW	30.464232	-88.497612	Black Creek-Escatawpa River
WETA019-E0	PEM	RIVERINE	AREA	0.504257	ACRE	NRPWW	30.468055	-88.497708	Black Creek-Escatawpa River
WETA019-F0	PFO	RIVERINE	AREA	2.674708	ACRE	NRPWW	30.469302	-88.497375	Black Creek-Escatawpa River
WETA020-E0	PEM	RIVERINE	AREA	0.566355	ACRE	NRPWW	30.47276	-88.497653	Black Creek-Escatawpa River
WETA020-F0	PFO	RIVERINE	AREA	0.882001	ACRE	NRPWW	30.47276	-88.497407	Black Creek-Escatawpa River
WETA021-F0	PFO	RIVERINE	AREA	0.964981	ACRE	RPWWD	30.480986	-88.499295	Black Creek-Escatawpa River
WETA022-E0	PEM	DEPRESS	AREA	0.337353	ACRE	NRPWW	30.490184	-88.498532	Black Creek-Escatawpa River
WETA022-E1	PEM	DEPRESS	AREA	1.706126	ACRE	NRPWW	30.491844	-88.498114	Black Creek-Escatawpa River
WETA022-F0	PFO	DEPRESS	AREA	4.407486	ACRE	NRPWW	30.488128	-88.499075	Black Creek-Escatawpa River
WETA022-F1	PFO	DEPRESS	AREA	1.031724	ACRE	NRPWW	30.490728	-88.498365	Black Creek-Escatawpa River
WETA022-S0	PSS	DEPRESS	AREA	0.216029	ACRE	NRPWW	30.488449	-88.499027	Black Creek-Escatawpa River
WETA023-F0	PFO	RIVERINE	AREA	0.606651	ACRE	RPWWD	30.494338	-88.498085	Black Creek-Escatawpa River
WETA023-F1	PFO	RIVERINE	AREA	0.903965	ACRE	RPWWD	30.495022	-88.497936	Black Creek-Escatawpa River
WETA024-F0	PFO	RIVERINE	AREA	0.357641	ACRE	RPWWD	30.497594	-88.49726	Black Creek-Escatawpa River
WETA024-F1	PFO	RIVERINE	AREA	0.599237	ACRE	RPWWD	30.497965	-88.497104	Black Creek-Escatawpa River
WETA024-F2	PFO	RIVERINE	AREA	0.633631	ACRE	RPWWD	30.498524	-88.496924	Black Creek-Escatawpa River
WETA024-F3	PFO	RIVERINE	AREA	0.164001	ACRE	RPWWD	30.498808	-88.497028	Black Creek-Escatawpa River
WETA025-F0	PFO	MINSOILFLT	AREA	8.637815	ACRE	NRPWW	30.533543	-88.471512	Black Creek-Escatawpa River
WETA026-F0	PFO	RIVERINE	AREA	6.74688	ACRE	RPWWD	30.539633	-88.471603	Black Creek-Escatawpa River
WETA026-F1	PFO	RIVERINE	AREA	0.384105	ACRE	RPWWD	30.541777	-88.471558	Black Creek-Escatawpa River
WETB003-E0	PEM	RIVERINE	AREA	1.397578	ACRE	NRPWW	30.582457	-88.450813	Rocky Creek-Escatawpa River
WETB003-F0	PFO	RIVERINE	AREA	2.162059	ACRE	NRPWW	30.582521	-88.450453	Rocky Creek-Escatawpa River
WETB004-E0	PEM	RIVERINE	AREA	0.297522	ACRE	RPWWN	30.575998	-88.453263	Rocky Creek-Escatawpa River
WETB004-E1	PEM	RIVERINE	AREA	0.373762	ACRE	RPWWD	30.577901	-88.452536	Rocky Creek-Escatawpa River

WETB004-E2	PEM	RIVERINE	AREA	0.056904	ACRE	RPWWD	30.578328	-88.452368	Rocky Creek-Escatawpa River
WETB004-E3	PEM	RIVERINE	AREA	0.10662	ACRE	NRPWW	30.57849	-88.452314	Rocky Creek-Escatawpa River
WETB004-E4	PEM	RIVERINE	AREA	0.047637	ACRE	NRPWW	30.578646	-88.452266	Rocky Creek-Escatawpa River
WETB004-E5	PEM	RIVERINE	AREA	0.192522	ACRE	NRPWW	30.578865	-88.452177	Rocky Creek-Escatawpa River
WETB004-F0	PFO	RIVERINE	AREA	4.010395	ACRE	RPWWD	30.576537	-88.452708	Rocky Creek-Escatawpa River
WETB004-F1	PFO	RIVERINE	AREA	0.070569	ACRE	RPWWD	30.57825	-88.452198	Rocky Creek-Escatawpa River
WETB004-F2	PFO	RIVERINE	AREA	0.106653	ACRE	RPWWD	30.578286	-88.452081	Rocky Creek-Escatawpa River
WETB004-F3	PFO	RIVERINE	AREA	0.168199	ACRE	NRPWW	30.578403	-88.452019	Rocky Creek-Escatawpa River
WETB004-F4	PFO	RIVERINE	AREA	0.217404	ACRE	NRPWW	30.578577	-88.451959	Rocky Creek-Escatawpa River
WETB005-E0	PEM	RIVERINE	AREA	0.573594	ACRE	NRPWW	30.57361	-88.454134	Rocky Creek-Escatawpa River
WETB005-S0	PSS	RIVERINE	AREA	1.18764	ACRE	NRPWW	30.573456	-88.453845	Rocky Creek-Escatawpa River
WETB006-E0	PEM	RIVERINE	AREA	0.118438	ACRE	NRPWW	30.571167	-88.455075	Rocky Creek-Escatawpa River
WETB006-F0	PFO	RIVERINE	AREA	0.36774	ACRE	NRPWW	30.571003	-88.454785	Rocky Creek-Escatawpa River
WETB007-E0	PEM	RIVERINE	AREA	0.212794	ACRE	NRPWW	30.570023	-88.455463	Rocky Creek-Escatawpa River
WETB007-S0	PSS	RIVERINE	AREA	2.195501	ACRE	NRPWW	30.569456	-88.454944	Rocky Creek-Escatawpa River
WETB008-E0	PEM	RIVERINE	AREA	5.183512	ACRE	RPWWN	30.603578	-88.43586	Rocky Creek-Escatawpa River
WETB008-F0	PFO	RIVERINE	AREA	9.254825	ACRE	RPWWD	30.603197	-88.435919	Rocky Creek-Escatawpa River
WETB009-E0	PEM	DEPRESS	AREA	0.297585	ACRE	NRPWW	30.614633	-88.422257	Upper Big Creek
WETB009-F0	PFO	DEPRESS	AREA	0.907899	ACRE	NRPWW	30.614258	-88.422211	Upper Big Creek
WETC001-E0	PEM	RIVERINE	AREA	0.256998	ACRE	NRPWW	30.639812	-88.381936	Upper Big Creek
WETC001-F0	PFO	RIVERINE	AREA	0.389776	ACRE	NRPWW	30.639595	-88.38177	Upper Big Creek
WETC002-E0	PEM	RIVERINE	AREA	0.058544	ACRE	RPWWD	30.640767	-88.379647	Upper Big Creek
WETC002-E1	PEM	RIVERINE	AREA	0.051943	ACRE	RPWWD	30.640811	-88.379725	Upper Big Creek
WETC002-F0	PFO	RIVERINE	AREA	0.210766	ACRE	RPWWD	30.640621	-88.379441	Upper Big Creek
WETC002-F1	PFO	RIVERINE	AREA	0.051337	ACRE	RPWWD	30.640629	-88.37965	Upper Big Creek
WETC003-E0	PEM	RIVERINE	AREA	0.419841	ACRE	RPWWD	30.643439	-88.374429	Upper Big Creek
WETC003-E1	PEM	RIVERINE	AREA	0.040246	ACRE	RPWWD	30.643563	-88.374103	Upper Big Creek
WETC003-F0	PFO	RIVERINE	AREA	0.002593	ACRE	RPWWD	30.643158	-88.37424	Upper Big Creek
WETC003-F1	PFO	RIVERINE	AREA	0.063158	ACRE	RPWWD	30.643308	-88.374281	Upper Big Creek
WETC003-F2	PFO	RIVERINE	AREA	0.025146	ACRE	RPWWD	30.643421	-88.374096	Upper Big Creek
WETC004-E0	PEM	RIVERINE	AREA	0.15022	ACRE	NRPWW	30.645313	-88.370568	Upper Big Creek
WETC004-F0	PFO	RIVERINE	AREA	0.197123	ACRE	NRPWW	30.645109	-88.370329	Upper Big Creek
WETC005-E0	PEM	RIVERINE	AREA	0.076672	ACRE	NRPWW	30.645965	-88.369154	Upper Big Creek
WETC005-F0	PFO	RIVERINE	AREA	0.052799	ACRE	NRPWW	30.645742	-88.369158	Upper Big Creek
WETC006-E0	PEM	RIVERINE	AREA	0.058394	ACRE	NRPWW	30.646808	-88.367438	Upper Big Creek
WETC007-E0	PEM	RIVERINE	AREA	0.221863	ACRE	RPWWD	30.647411	-88.366185	Upper Big Creek
WETC007-E1	PEM	RIVERINE	AREA	0.004867	ACRE	RPWWD	30.647581	-88.366054	Upper Big Creek
WETC007-F0	PFO	RIVERINE	AREA	0.619515	ACRE	RPWWD	30.647122	-88.366107	Upper Big Creek
WETC007-F1	PFO	RIVERINE	AREA	0.051916	ACRE	RPWWD	30.647286	-88.365724	Upper Big Creek
WETC008-E0	PEM	RIVERINE	AREA	0.818636	ACRE	NRPWW	30.648484	-88.363962	Upper Big Creek
WETC008-F0	PFO	RIVERINE	AREA	0.427921	ACRE	NRPWW	30.648343	-88.363788	Upper Big Creek
WETC009-E0	PEM	RIVERINE	AREA	0.078543	ACRE	NRPWW	30.649068	-88.362754	Upper Big Creek
WETC009-F0	PFO	RIVERINE	AREA	0.107255	ACRE	NRPWW	30.648888	-88.362503	Upper Big Creek
WETC010-E0	PEM	RIVERINE	AREA	0.281293	ACRE	NRPWW	30.649732	-88.361268	Upper Big Creek
WETC011-S0	PSS	MINSOILFLT	AREA	1.56063	ACRE	NRPWW	30.505764	-88.493845	Black Creek-Escatawpa River
WETC011-S1	PSS	MINSOILFLT	AREA	11.026636	ACRE	NRPWW	30.506044	-88.493181	Black Creek-Escatawpa River
WETC011-S2	PSS	MINSOILFLT	AREA	3.419148	ACRE	NRPWW	30.508763	-88.488686	Black Creek-Escatawpa River
WETC012-E0	PEM	MINSOILFLT	AREA	5.76064	ACRE	NRPWW	30.517279	-88.482759	Black Creek-Escatawpa River
WETC012-S0	PSS	MINSOILFLT	AREA	8.114123	ACRE	NRPWW	30.515975	-88.482432	Black Creek-Escatawpa River
WETC012-S1	PSS	MINSOILFLT	AREA	2.14487	ACRE	NRPWW	30.517238	-88.482911	Black Creek-Escatawpa River
WETC013A-E0	PEM	DEPRESS	AREA	0.100501	ACRE	NRPWW	30.525166	-88.482827	Black Creek-Escatawpa River
WETC013A-F0	PFO	DEPRESS	AREA	0.123088	ACRE	NRPWW	30.525218	-88.482971	Black Creek-Escatawpa River
WETC013B-E1	PEM	MINSOILFLT	AREA	2.370972	ACRE	NRPWW	30.527375	-88.48114	Black Creek-Escatawpa River
WETC013B-S0	PSS	MINSOILFLT	AREA	3.367778	ACRE	NRPWW	30.5278	-88.481203	Black Creek-Escatawpa River
WETC014-E0	PEM	DEPRESS	AREA	0.323622	ACRE	NRPWW	30.529048	-88.478363	Black Creek-Escatawpa River
WETC015-E0	PEM	DEPRESS	AREA	0.468837	ACRE	RPWWD	30.529502	-88.474329	Black Creek-Escatawpa River
WETC015-E1	PEM	DEPRESS	AREA	0.369828	ACRE	RPWWD	30.529558	-88.473648	Black Creek-Escatawpa River
WETC015-F0	PFO	DEPRESS	AREA	0.14328	ACRE	RPWWD	30.529746	-88.473573	Black Creek-Escatawpa River
WETC015-F1	PFO	DEPRESS	AREA	0.567775	ACRE	RPWWD	30.529838	-88.474139	Black Creek-Escatawpa River
WETC016-E0	PEM	RIVERINE	AREA	0.498546	ACRE	RPWWD	30.628492	-88.400305	Upper Big Creek
WETC016-E1	PEM	RIVERINE	AREA	0.177762	ACRE	RPWWD	30.628914	-88.399515	Upper Big Creek
WETC017-F0	PFO	RIVERINE	AREA	1.048957	ACRE	RPWWD	30.629009	-88.398696	Upper Big Creek
WETC017-F1	PFO	RIVERINE	AREA	0.410182	ACRE	RPWWD	30.629415	-88.397944	Upper Big Creek

WETC018-E0	PEM	RIVERINE	AREA	0.354998	ACRE	NRPWW	30.685166	-88.309026	Upper Big Creek
WETC018-F0	PFO	RIVERINE	AREA	0.572532	ACRE	NRPWW	30.684938	-88.308831	Upper Big Creek
WETC019-E0	PEM	RIVERINE	AREA	1.87554	ACRE	RPWWD	30.687829	-88.305532	Upper Big Creek
WETC019-E1	PEM	RIVERINE	AREA	2.424476	ACRE	RPWWD	30.690284	-88.303743	Upper Big Creek
WETC019-E2	PEM	RIVERINE	AREA	0.044259	ACRE	RPWWD	30.691331	-88.302265	Upper Big Creek
WETC019-F0	PFO	RIVERINE	AREA	2.345845	ACRE	RPWWD	30.687585	-88.305322	Upper Big Creek
WETC019-F1	PFO	RIVERINE	AREA	2.87068	ACRE	RPWWD	30.689981	-88.303537	Upper Big Creek
WETC019-F2	PFO	RIVERINE	AREA	0.245906	ACRE	RPWWD	30.691052	-88.302276	Upper Big Creek
WETC020A-E0	PEM	SLOPE	AREA	0.050603	ACRE	NRPWW	30.692306	-88.297295	Upper Big Creek
WETC020B-E1	PEM	DEPRESS	AREA	0.719485	ACRE	NRPWW	30.700355	-88.289889	Upper Big Creek
WETC020B-F0	PFO	SLOPE	AREA	0.02627	ACRE	NRPWW	30.692282	-88.297174	Upper Big Creek
WETC021-E0	PEM	RIVERINE	AREA	0.443471	ACRE	NRPWW	30.732862	-88.266833	Upper Big Creek
WETC021-E1	PEM	RIVERINE	AREA	4.215765	ACRE	NRPWW	30.736114	-88.262791	Upper Big Creek
WETC021-F0	PFO	RIVERINE	AREA	1.464878	ACRE	NRPWW	30.732632	-88.266637	Upper Big Creek
WETC021-F1	PFO	RIVERINE	AREA	0.770529	ACRE	NRPWW	30.733924	-88.26501	Upper Big Creek
WETC021-F2	PFO	RIVERINE	AREA	6.179392	ACRE	NRPWW	30.736393	-88.262045	Upper Big Creek
WETC022-F0	PFO	RIVERINE	AREA	0.12647	ACRE	RPWWD	30.739797	-88.259569	Upper Big Creek
WETC022-F1	PFO	RIVERINE	AREA	1.433291	ACRE	RPWWD	30.740883	-88.259071	Upper Big Creek
WETC022-F2	PFO	RIVERINE	AREA	0.534549	ACRE	RPWWD	30.742536	-88.259254	Upper Big Creek
WETC022-S0	PSS	RIVERINE	AREA	0.55064	ACRE	RPWWD	30.73983	-88.259794	Upper Big Creek
WETC022-S1	PSS	RIVERINE	AREA	2.135625	ACRE	RPWWD	30.741389	-88.259248	Upper Big Creek
WETC024-E0	PEM	RIVERINE	AREA	4.914226	ACRE	NRPWW	30.769326	-88.239646	Chickasaw Creek
WETC025-E0	PEM	RIVERINE	AREA	0.107317	ACRE	NRPWW	30.771793	-88.237498	Chickasaw Creek
WETC025-F0	PFO	RIVERINE	AREA	0.305326	ACRE	NRPWW	30.772049	-88.237704	Chickasaw Creek
WETC026-E0	PEM	RIVERINE	AREA	0.397333	ACRE	NRPWW	30.776212	-88.233774	Chickasaw Creek
WETC026-F0	PFO	RIVERINE	AREA	1.536409	ACRE	NRPWW	30.776133	-88.233455	Chickasaw Creek
WETC027-E0	PEM	RIVERINE	AREA	1.466568	ACRE	RPWWD	30.777143	-88.227931	Chickasaw Creek
WETC027-F0	PFO	RIVERINE	AREA	4.585799	ACRE	RPWWD	30.776874	-88.228398	Chickasaw Creek
WETC028-E0	PEM	RIVERINE	AREA	0.832808	ACRE	NRPWW	30.588265	-88.448732	Rocky Creek-Escatawpa River
WETC028-F0	PFO	RIVERINE	AREA	0.607717	ACRE	NRPWW	30.587934	-88.448508	Rocky Creek-Escatawpa River
WETC029-E0	PEM	RIVERINE	AREA	0.258927	ACRE	NRPWW	30.680046	-88.317181	Upper Big Creek
WETC029-F0	PFO	RIVERINE	AREA	0.257321	ACRE	NRPWW	30.679735	-88.317108	Upper Big Creek
WETC030-E0	PEM	RIVERINE	AREA	7.301266	ACRE	RPWWD	30.595793	-88.445514	Rocky Creek-Escatawpa River
WETC030-E1	PEM	RIVERINE	AREA	0.006476	ACRE	RPWWD	30.598805	-88.442463	Rocky Creek-Escatawpa River
WETC030-E2	PEM	RIVERINE	AREA	1.150608	ACRE	RPWWD	30.599762	-88.441304	Rocky Creek-Escatawpa River
WETC030-F0	PFO	RIVERINE	AREA	7.712206	ACRE	RPWWD	30.595236	-88.445532	Rocky Creek-Escatawpa River
WETC030-F1	PFO	RIVERINE	AREA	0.01204	ACRE	RPWWD	30.598906	-88.442272	Rocky Creek-Escatawpa River
WETC030-F2	PFO	RIVERINE	AREA	2.420431	ACRE	RPWWD	30.599376	-88.441362	Rocky Creek-Escatawpa River
WETC031-E1	PEM	RIVERINE	AREA	0.293918	ACRE	RPWWD	30.650445	-88.359783	Upper Big Creek
WETC031-E2	PEM	RIVERINE	AREA	0.067991	ACRE	RPWWD	30.650438	-88.360046	Upper Big Creek
WETC031-E3	PEM	RIVERINE	AREA	0.127605	ACRE	RPWWD	30.650684	-88.359244	Upper Big Creek
WETC032-E0	PEM	RIVERINE	AREA	0.292563	ACRE	NRPWW	30.653086	-88.354388	Upper Big Creek
WETC033-E0	PEM	RIVERINE	AREA	0.182373	ACRE	NRPWW	30.654081	-88.352298	Upper Big Creek
WETD001-E0	PEM	RIVERINE	AREA	0.069525	ACRE	NRPWW	30.409225	-88.483868	Black Creek-Escatawpa River
WETD001-F0	PFO	RIVERINE	AREA	0.103936	ACRE	NRPWW	30.409143	-88.48355	Black Creek-Escatawpa River
WETD002-F0	PFO	RIVERINE	AREA	0.008545	ACRE	RPWWN	30.413603	-88.482927	Black Creek-Escatawpa River
WETD003-F0	PFO	ORGSOILFLT	AREA	4.754328	ACRE	RPWWN	30.415632	-88.482824	Black Creek-Escatawpa River
WETD004-F0	PFO	ORGSOILFLT	AREA	10.149707	ACRE	TNWW	30.419186	-88.485628	Black Creek-Escatawpa River
WETD005-F0	PFO	RIVERINE	AREA	3.101092	ACRE	NRPWW	30.544185	-88.471693	Black Creek-Escatawpa River
WETD006-F0	PFO	RIVERINE	AREA	0.680649	ACRE	RPWWD	30.546176	-88.47158	Black Creek-Escatawpa River
WETD006-F1	PFO	RIVERINE	AREA	0.3017	ACRE	RPWWD	30.546532	-88.471817	Black Creek-Escatawpa River
WETD006-F2	PFO	RIVERINE	AREA	0.014472	ACRE	RPWWD	30.546699	-88.471409	Black Creek-Escatawpa River
WETD007-F0	PFO	MINSOILFLT	AREA	0.027838	ACRE	RPWWD	30.549742	-88.471867	Black Creek-Escatawpa River
WETD008-E0	PEM	MINSOILFLT	AREA	1.341908	ACRE	RPWWN	30.552149	-88.471554	Black Creek-Escatawpa River
WETD008-F0	PFO	MINSOILFLT	AREA	2.494545	ACRE	RPWWN	30.551646	-88.471437	Black Creek-Escatawpa River
WETD008-S0	PSS	MINSOILFLT	AREA	0.127711	ACRE	RPWWN	30.552008	-88.471432	Black Creek-Escatawpa River
WETD009-E0	PEM	MINSOILFLT	AREA	6.15087	ACRE	NRPWW	30.556909	-88.467092	Rocky Creek-Escatawpa River
WETD009-E1	PEM	MINSOILFLT	AREA	3.328962	ACRE	NRPWW	30.5625	-88.461803	Rocky Creek-Escatawpa River
WETD009-F0	PFO	MINSOILFLT	AREA	3.495099	ACRE	NRPWW	30.555082	-88.468406	Black Creek-Escatawpa River
WETD009-F1	PFO	MINSOILFLT	AREA	1.177936	ACRE	NRPWW	30.559597	-88.464144	Rocky Creek-Escatawpa River
WETD009-F2	PFO	MINSOILFLT	AREA	0.150657	ACRE	NRPWW	30.563347	-88.460597	Rocky Creek-Escatawpa River
WETD009-F3	PFO	MINSOILFLT	AREA	0.419219	ACRE	NRPWW	30.564177	-88.459807	Rocky Creek-Escatawpa River
WETD009-S0	PSS	MINSOILFLT	AREA	3.211557	ACRE	NRPWW	30.557863	-88.46576	Rocky Creek-Escatawpa River

WETD009-S1	PSS	MINSOILFLT	AREA	3.791372	ACRE	NRPWW	30.561855	-88.462	Rocky Creek-Escatawpa River
WETD009-S2	PSS	MINSOILFLT	AREA	0.839516	ACRE	NRPWW	30.563713	-88.460237	Rocky Creek-Escatawpa River
WETD010-E0	PEM	RIVERINE	AREA	1.097842	ACRE	RPWWD	30.631308	-88.395026	Upper Big Creek
WETD010-E1	PEM	RIVERINE	AREA	0.024054	ACRE	RPWWD	30.632271	-88.393153	Upper Big Creek
WETD010-F0	PFO	RIVERINE	AREA	3.356577	ACRE	RPWWD	30.631008	-88.394994	Upper Big Creek
WETD010-F1	PFO	RIVERINE	AREA	1.492907	ACRE	RPWWD	30.632109	-88.392937	Upper Big Creek
WETD011-E0	PEM	RIVERINE	AREA	0.287921	ACRE	RPWWD	30.634424	-88.389233	Upper Big Creek
WETD011-E1	PEM	RIVERINE	AREA	0.025497	ACRE	RPWWD	30.635658	-88.388836	Upper Big Creek
WETD011-E2	PEM	RIVERINE	AREA	2.217785	ACRE	RPWWD	30.637052	-88.387411	Upper Big Creek
WETD011-F0	PFO	RIVERINE	AREA	3.376432	ACRE	RPWWD	30.634901	-88.388618	Upper Big Creek
WETD011-F1	PFO	RIVERINE	AREA	3.169254	ACRE	RPWWD	30.636755	-88.387367	Upper Big Creek
WETD012A-E0	PEM	RIVERINE	AREA	0.055602	ACRE	RPWWD	30.722908	-88.275335	Upper Big Creek
WETD012A-E1	PEM	RIVERINE	AREA	0.04465	ACRE	RPWWD	30.72293	-88.275084	Upper Big Creek
WETD012A-E2	PEM	RIVERINE	AREA	0.171493	ACRE	RPWWD	30.723253	-88.275426	Upper Big Creek
WETD012A-E3	PEM	RIVERINE	AREA	0.505144	ACRE	RPWWD	30.723732	-88.27507	Upper Big Creek
WETD012A-E4	PEM	RIVERINE	AREA	0.001446	ACRE	RPWWD	30.724489	-88.274165	Upper Big Creek
WETD012A-E5	PEM	RIVERINE	AREA	1.107156	ACRE	RPWWD	30.724638	-88.274326	Upper Big Creek
WETD012A-F0	PFO	RIVERINE	AREA	0.216571	ACRE	RPWWD	30.722625	-88.275257	Upper Big Creek
WETD012A-F1	PFO	RIVERINE	AREA	0.299958	ACRE	RPWWD	30.722523	-88.275453	Upper Big Creek
WETD012A-F2	PFO	RIVERINE	AREA	0.067504	ACRE	RPWWD	30.723006	-88.275325	Upper Big Creek
WETD012A-F3	PFO	RIVERINE	AREA	1.752276	ACRE	RPWWD	30.723723	-88.274718	Upper Big Creek
WETD012B-E0	PEM	RIVERINE	AREA	0.214836	ACRE	RPWWN	30.726483	-88.273322	Upper Big Creek
WETD012B-E1	PEM	RIVERINE	AREA	0.910757	ACRE	RPWWN	30.7278	-88.272534	Upper Big Creek
WETD012B-F0	PFO	RIVERINE	AREA	3.984942	ACRE	RPWWN	30.727285	-88.272484	Upper Big Creek
WETD013-E0	PEM	RIVERINE	AREA	4.14495	ACRE	RPWWD	30.749785	-88.255782	Upper Big Creek
WETD013-E1	PEM	RIVERINE	AREA	0.121235	ACRE	RPWWD	30.754876	-88.253589	Upper Big Creek
WETD013-E2	PEM	RIVERINE	AREA	0.088152	ACRE	RPWWD	30.755205	-88.253391	Upper Big Creek
WETD013-F0	PFO	RIVERINE	AREA	7.978576	ACRE	RPWWN	30.748971	-88.256467	Upper Big Creek
WETD013-F1	PFO	RIVERINE	AREA	0.684939	ACRE	RPWWD	30.753382	-88.254607	Upper Big Creek
WETD013-F2	PFO	RIVERINE	AREA	1.519709	ACRE	RPWWD	30.75427	-88.254123	Upper Big Creek
WETD013-F3	PFO	RIVERINE	AREA	0.038259	ACRE	RPWWD	30.754467	-88.254248	Upper Big Creek
WETD013-F4	PFO	RIVERINE	AREA	0.271189	ACRE	RPWWD	30.755175	-88.253822	Upper Big Creek
WETD014-E0	PEM	RIVERINE	AREA	1.034138	ACRE	RPWWD	30.757662	-88.252336	Upper Big Creek
WETD014-F0	PFO	RIVERINE	AREA	0.298207	ACRE	RPWWD	30.757697	-88.252502	Upper Big Creek
WETD015-E0	PEM	RIVERINE	AREA	0.489713	ACRE	NRPWW	30.783799	-88.210156	Chickasaw Creek
WETD015-F0	PFO	RIVERINE	AREA	0.89531	ACRE	NRPWW	30.783947	-88.210388	Chickasaw Creek
WETD016-E0	PEM	RIVERINE	AREA	0.091577	ACRE	NRPWW	30.776756	-88.210106	Chickasaw Creek
WETD017-F0	PFO	RIVERINE	AREA	0.853654	ACRE	RPWWD	30.777539	-88.222337	Chickasaw Creek
WETD017-F1	PFO	RIVERINE	AREA	0.844291	ACRE	RPWWD	30.777871	-88.221913	Chickasaw Creek
WETD018-E0	PEM	RIVERINE	AREA	0.462034	ACRE	RPWWN	30.777002	-88.224506	Chickasaw Creek
WETD018-F0	PFO	RIVERINE	AREA	0.21714	ACRE	RPWWN	30.776752	-88.224728	Chickasaw Creek
WETG001-E0	E2EM	ORGSOILFLT	AREA	12.953944	ACRE	TNWW	30.425354	-88.49021	Black Creek-Escatawpa River
WETG002-E0	E2EM	ORGSOILFLT	AREA	4.104646	ACRE	RPWWD	30.429913	-88.493043	Black Creek-Escatawpa River
WETG003-E0	PEM	RIVERINE	AREA	0.74079	ACRE	NRPWW	30.675501	-88.324451	Upper Big Creek
WETG003-F0	PFO	RIVERINE	AREA	1.060939	ACRE	NRPWW	30.675566	-88.323824	Upper Big Creek
WETG004-E0	PEM	RIVERINE	AREA	0.579371	ACRE	NRPWW	30.678303	-88.319991	Upper Big Creek
WETG004-F0	PFO	RIVERINE	AREA	0.600754	ACRE	NRPWW	30.67797	-88.319984	Upper Big Creek
WETG005-E0	PEM	MINSOILFLT	AREA	0.166405	ACRE	RPWWD	30.35541	-88.488585	Pt Aux Chenes Bay-Mississippi Sound
WETG005-E1	PEM	MINSOILFLT	AREA	0.643341	ACRE	RPWWD	30.355135	-88.488585	Pt Aux Chenes Bay-Mississippi Sound
WETG005-E2	PEM	MINSOILFLT	AREA	0.105511	ACRE	RPWWD	30.354811	-88.488588	Pt Aux Chenes Bay-Mississippi Sound
WETG005-F0	PFO	MINSOILFLT	AREA	1.049851	ACRE	TNWW	30.358698	-88.48372	Pt Aux Chenes Bay-Mississippi Sound
WETG005-S0	PSS	MINSOILFLT	AREA	2.756574	ACRE	TNWW	30.356174	-88.484182	Pt Aux Chenes Bay-Mississippi Sound
WETG005-S1	PSS	MINSOILFLT	AREA	2.591749	ACRE	RPWWD	30.356028	-88.486201	Pt Aux Chenes Bay-Mississippi Sound
WETG005-S3	PSS	MINSOILFLT	AREA	3.057929	ACRE	RPWWD	30.355964	-88.48811	Pt Aux Chenes Bay-Mississippi Sound
WETG006-E0	PEM	RIVERINE	AREA	0.618791	ACRE	RPWWD	30.65569	-88.348937	Upper Big Creek
WETG006-F0	PFO	RIVERINE	AREA	0.388317	ACRE	RPWWD	30.655147	-88.349333	Upper Big Creek
WETG006-F1	PFO	RIVERINE	AREA	0.342439	ACRE	RPWWD	30.655623	-88.348409	Upper Big Creek
WETG007-E0	PEM	RIVERINE	AREA	0.353979	ACRE	NRPWW	30.660884	-88.338054	Upper Big Creek
WETG007-F0	PFO	RIVERINE	AREA	0.810123	ACRE	NRPWW	30.660457	-88.3384	Upper Big Creek
WETG008-F0	PFO	RIVERINE	AREA	1.799484	ACRE	NRPWW	30.663781	-88.335818	Upper Big Creek
WETG008-F1	PFO	RIVERINE	AREA	1.381855	ACRE	NRPWW	30.665548	-88.335765	Upper Big Creek
WETG008-F2	PFO	RIVERINE	AREA	0.702847	ACRE	NRPWW	30.667392	-88.335876	Upper Big Creek
WETGT001-F0	PFO	RIVERINE	AREA	0.298388	ACRE	RPWWD	30.650392	-88.359536	Upper Big Creek

WETGT001-F1	PFO	RIVERINE	AREA	0.058248	ACRE	RPWWD	30.650659	-88.359067	Upper Big Creek
WETGT002-F0	PFO	RIVERINE	AREA	0.15239	ACRE	NRPWW	30.652879	-88.354183	Upper Big Creek
WETGT003-F0	PFO	RIVERINE	AREA	0.273426	ACRE	NRPWW	30.653826	-88.352143	Upper Big Creek
WETGT007-F0	PFO	RIVERINE	AREA	0.118194	ACRE	RPWWD	30.669523	-88.333462	Upper Big Creek
WETGT006-F0	PEM	RIVERINE	AREA	0.160186	ACRE	NRPWW	30.625392	-88.405736	Upper Big Creek
WETGT008-F0	PFO	RIVERINE	AREA	0.483707	ACRE	NRPWW	30.625199	-88.405478	Upper Big Creek

Wetland_Name	Name	Activity	Permanent	[illegible]	Initially_Proposed_Area	Proposed_Area	Authorized_Area	Units_Area
WBA001.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA001.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA001.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA001.3		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA002.0	Little Black Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA003.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA003.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA004.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA004.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA005.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA005.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA005.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA005.3		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA006.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA006.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA006.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA006.3		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA007.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA007.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBA007.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBB001.0	Escatawpa River	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBB004.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBB005.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBB006.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBB007.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC001.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC001.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC002.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC002.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC003.0	Wolf Branch	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC003.1	Wolf Branch	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC003.2	Wolf Branch	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC004.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC004.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC005.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC005.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC005.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC006.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC006.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC006.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC007.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC007.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC008.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC008.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC010A.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC010A.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC010A.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC010A.3		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC010A.4		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC010B.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC010B.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC011.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC011.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC012.0		Other (directional boring, crossir Pond	No	Temporary	0	0	0	ACRE
WBC013.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC013.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBC112A.0	Double Branch	Conversion of waters type (Fores Non-Tidal Wetland	No	Temporary	0	0	0	ACRE
WBC112A.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD001.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD001.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD002.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD003A.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD003A.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD003A.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD003A.3		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD003B.0		Other (directional boring, crossir Pond	No	Temporary	0	0	0	ACRE
WBD004A.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD004A.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD004A.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD004B.0	Big Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD005.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD005.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD006.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD006.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD007.0	Hamilton Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD007.1	Hamilton Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD007.2	Hamilton Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD007.3	Hamilton Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD007.4	Hamilton Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD007.5	Hamilton Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD008.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD008.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD009A.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD009A.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD009C.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD009C.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD010.0		Other (directional boring, crossir Pond	No	Temporary	0	0	0	ACRE
WBD011.0	Red Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD011.1	Red Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBD011.2	Red Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBG003.0		Other (directional boring, crossir Pond	No	Temporary	0	0	0	ACRE
WBG005.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBG005.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBG006.0	Black Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBG006.1	Black Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBG007.0	Escatawpa River	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBG008.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBG008.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBG009.0		Other (directional boring, crossir Pond	No	Temporary	0	0	0	ACRE
WBG010.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBG010.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT001.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT001.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT004.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT004.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT004.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT005.0		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT005.1		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT005.2		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT005.3		Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE
WBGT006.0	Pierce Creek	Other (directional boring, crossir River/Stream	No	Temporary	0	0	0	ACRE

WBGT006.1	Pierce Creek	Other (directional boring, crossi	River/Stream	No	Temporary	0	0	0 ACRE
WETA002-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA002-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA002-F0.2		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETA002-S0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA002-S0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E0.2		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E0.3		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E0.4		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E0.5		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E0.6		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E0.7		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E0.8		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E0.9		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.10		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.11		Work	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-E1.12		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.13		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.2		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.3		Work	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-E1.4		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.5		Work	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-E1.6		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.7		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.8		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-E1.9		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	3	0 ACRE
WETA003-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-F1.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-F1.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-F2.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETA003-F2.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-F3.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-F3.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETA003-F4.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-F4.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-F5.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-F5.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-F6.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-F6.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-F7.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA003-F7.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-F7.2		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA003-S0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETA003-S0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA005-E0.0		Other (directional boring, crossi	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-E0.2		Work	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA005-E0.3		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-E0.4		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-E0.5		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-E0.6		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-E0.7		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F0.2		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F1.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F1.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F1.2		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F2.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA005-F2.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F2.2		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA005-F3.0		Other (directional boring, crossi	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F3.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F3.2		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA005-F3.3		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA006-E0.0		Other (directional boring, crossi	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA006-F0.0		Other (directional boring, crossi	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA007-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA007-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA007-E0.2		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA007-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA007-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA008-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA008-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA008-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA008-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA009-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA009-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA010-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA010-E1.0		Work	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA010-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA010-S0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA010-S1.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA011-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA011-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA011-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA012-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA012-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA013-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA013-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA013-E0.2		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA013-E0.3		Work	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETA013-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA013-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA015-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA015-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA015-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA015-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA015-F0.2		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA016-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA016-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA016-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA016-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA017-E0.0		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA017-E0.1		Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA017-F0.0		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA017-F0.1		Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE

WETA018-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA018-E0.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA019-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA019-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA019-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA020-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA020-E0.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA020-E0.2	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA020-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA020-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA020-F0.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA021-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA021-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA022-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA022-E0.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA022-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA022-E1.1	Work	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA022-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA022-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA022-F0.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA022-F0.3	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA022-F1.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA022-F1.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA022-S0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA022-S0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA023-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA023-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA023-F1.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA023-F1.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA023-F1.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA024-F0.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA024-F0.1	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA024-F1.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA024-F1.1	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA024-F2.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA024-F2.1	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA024-F3.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA024-F3.1	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA025-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETA025-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA025-F0.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA026-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA026-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETA026-F0.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETA028-F1.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETA028-F1.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB003-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB003-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETB003-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB004-E3.1	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB004-E4.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB004-E5.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB004-F0.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB004-F1.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB004-F2.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB004-F3.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB004-F4.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB005-E0.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB005-S0.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB006-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB006-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB007-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB007-E0.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB007-S0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB007-S0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETB008-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB008-E0.1	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB008-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETB008-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETB008-F0.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB008-F0.3	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB009-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB009-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETB009-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC001-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC001-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC001-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC002-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC002-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC002-F1.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC002-F1.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC003-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC003-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC003-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC003-F1.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC003-F1.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC003-F2.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC004-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC004-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC005-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC005-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC007-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC007-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC007-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC007-F0.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC007-F1.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC007-F1.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC007-F1.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC008-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC008-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC008-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC008-F0.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC008-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC009-F0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC009-F0.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC010-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC010-E0.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC011-S0.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC011-S1.0	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC011-S1.1	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	4	0 ACRE
WETC011-S1.2	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETC011-S1.3	Conversion of waters type (fores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE

WETC011-S2.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC011-S2.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC011-S2.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC012-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETC012-S0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETC012-S0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETC013A-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC013A-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC013A-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC013B-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC013B-S0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC013B-S0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC014-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC015-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC015-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC015-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC015-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC015-F0.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC015-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC015-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC015-F1.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC015-F1.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC017-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC017-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC017-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC017-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC018-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC018-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC019-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC019-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC019-E1.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC019-E2.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC019-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC019-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC019-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC019-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC019-F2.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC019-F2.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC020A-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC020B-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC020B-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC020B-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-E1.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-E1.2	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-E1.3	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-E1.4	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-E1.5	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-E1.6	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F0.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F0.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F1.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F1.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F1.4	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F2.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F2.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC021-F2.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETC021-F2.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F2.4	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F2.5	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F2.6	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F2.7	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F2.8	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC021-F2.9	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-F1.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-F1.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-F2.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-F2.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-S0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-S1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-S1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-S1.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC022-S1.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC024-E0.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC024-E0.1	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC025-F0.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC026-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC026-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC027-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETC027-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC028-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC028-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC028-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC029-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC029-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC029-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC030-E0.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC030-E0.1	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC030-E0.2	Work	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC030-E1.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC030-E2.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC030-F0.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC030-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC030-F0.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETC030-F0.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	2	0 ACRE
WETC030-F1.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC030-F2.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC031-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC031-E3.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC032-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETC033-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD001-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD001-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD001-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE

WETD003-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD004-F0.0	Other (directional boring, crossir	Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD004-F0.1	Conversion of waters type (flores	Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD004-F0.2	Conversion of waters type (flores	Tidal Wetland	No	Temporary	0	2	0 ACRE
WETD004-F0.3	Conversion of waters type (flores	Tidal Wetland	No	Temporary	0	2	0 ACRE
WETD005-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD005-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD005-F0.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD005-F0.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD005-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD006-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD006-F0.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD006-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD006-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD006-F1.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD007-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD008-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD008-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD008-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD008-F0.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD008-F0.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD008-S0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD008-S0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD009-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD009-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD009-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD009-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD009-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD009-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD009-F2.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD009-F2.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD009-F3.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD009-F3.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD009-S0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD009-S0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD009-S1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD009-S1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD009-S2.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD009-S2.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD010-F0.0	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD010-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD010-F0.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD010-F0.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD010-F1.4	Other (directional boring, crossir	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD011-E2.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD011-E2.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD011-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD011-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD011-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD011-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD012A-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-E0.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-E3.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-E4.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-E4.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-E5.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-E5.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-E5.2	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-E5.3	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-F2.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-F2.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-F3.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-F3.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-F3.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012A-F3.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD012A-F3.4	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD012B-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD012B-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD013-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD013-E0.1	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD013-E1.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD013-E2.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD013-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	3	0 ACRE
WETD013-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD013-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD013-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD013-F1.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD013-F2.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD013-F2.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD013-F4.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD013-F4.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD014-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD014-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD015-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD015-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD015-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	1	0 ACRE
WETD017-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD017-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD017-F0.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD017-F0.3	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD017-F1.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD017-F1.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD017-F1.2	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD018-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETD018-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETG001-E0.0	Work	Tidal Wetland	No	Temporary	0	1	0 ACRE
WETG001-E0.1	Work	Tidal Wetland	No	Temporary	0	3	0 ACRE
WETG001-E0.2	Work	Tidal Wetland	No	Temporary	0	1	0 ACRE
WETG001-E0.3	Work	Tidal Wetland	No	Temporary	0	0	0 ACRE
WETG001-E0.4	Other (directional boring, crossir	Tidal Wetland	No	Temporary	0	0	0 ACRE
WETG002-E0.0	Work	Tidal Wetland	No	Temporary	0	1	0 ACRE
WETG002-E0.1	Work	Tidal Wetland	No	Temporary	0	1	0 ACRE
WETG003-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETG003-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETG003-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETG004-E0.0	Work	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETG004-F0.0	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE
WETG004-F0.1	Conversion of waters type (flores	Non-Tidal Wetland	No	Temporary	0	0	0 ACRE

SWCA
ENVIRONMENTAL CONSULTANTS

PHASE I CULTURAL RESOURCES SURVEY OF THE PROPOSED TEN-MILE FACILITY TO PASCAGOULA 41-MILE CRUDE OIL PIPELINE, MOBILE COUNTY, ALABAMA AND JACKSON COUNTY, MISSISSIPPI

Prepared for

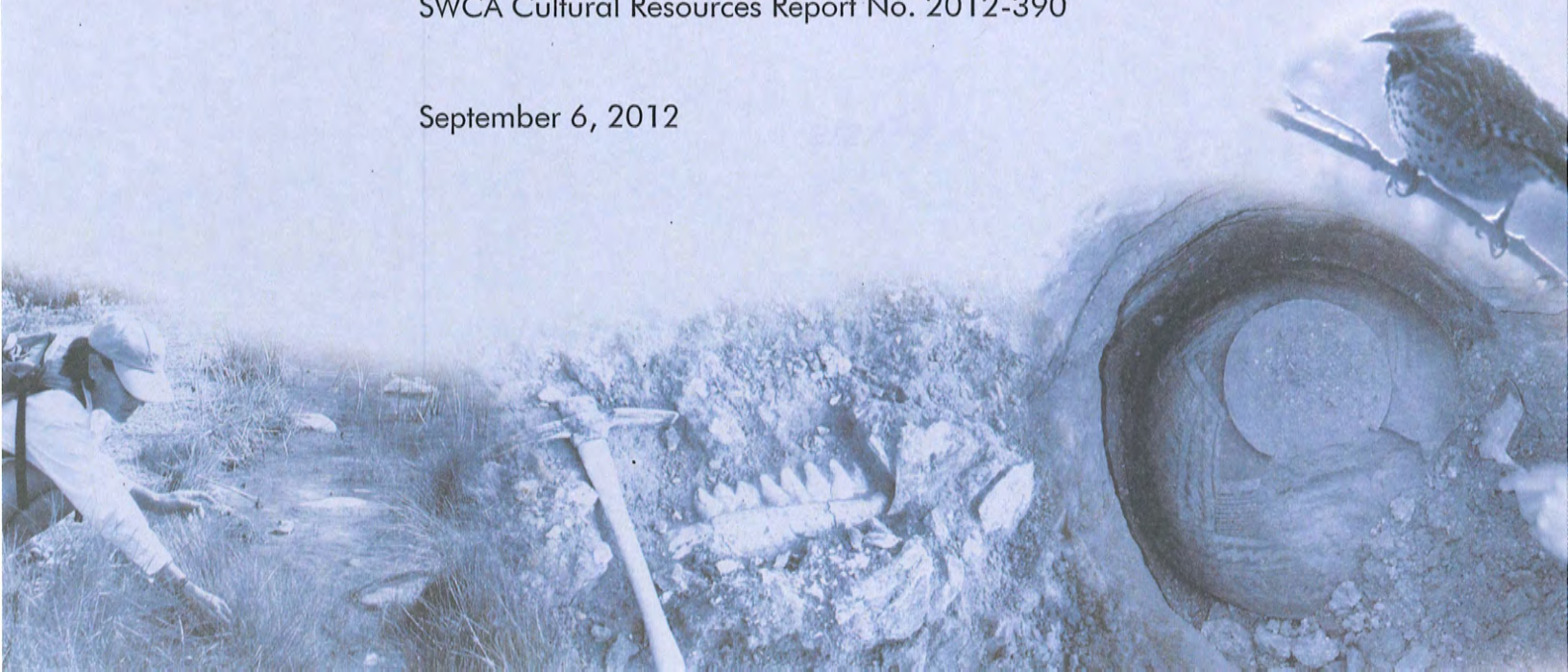
Plains Southcap, LLC

Prepared by

Todd L. Butler and Brian Huttick

SWCA Cultural Resources Report No. 2012-390

September 6, 2012



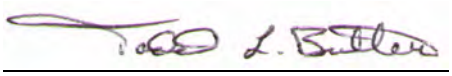
PHASE I CULTURAL RESOURCES SURVEY OF THE PROPOSED TEN-MILE FACILITY TO PASCAGOULA 41-MILE CRUDE OIL PIPELINE, MOBILE COUNTY, ALABAMA AND JACKSON COUNTY, MISSISSIPPI

Prepared for
Plains Southcap, LLC
333 Clay Street, Suite 1600
Houston, Texas 77210-4648

Prepared by
Todd L. Butler and Brian R. Huttick

SWCA ENVIRONMENTAL CONSULTANTS
7255 Langtry, Suite 100
Houston, Texas 77040
www.swca.com

Under the direction of
Todd L. Butler, RPA
Principal Investigator

Signature: 

For submission to

MISSISSIPPI DEPARTMENT OF ARCHIVES AND HISTORY
100 South State Street
Jackson, Mississippi 39201

and

ALABAMA HISTORICAL COMMISSION
468 South Perry Street
Montgomery, Alabama 36104

SWCA Project Number 22932

SWCA Cultural Resources Report No. 2012-390

September 6, 2012

Page 3 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 4 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 5 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 6 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 7 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 8 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 9 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 10 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 11 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 12 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 13 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 14 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 15 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 16 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 17 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 18 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 19 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 20 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 21 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 22 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 23 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 24 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 25 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 26 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 27 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 28 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 29 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 30 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 31 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 32 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 33 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 34 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 35 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 36 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 37 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 38 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 39 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 40 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 41 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 42 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 43 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 44 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 45 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 46 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 47 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 48 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 49 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 50 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 51 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 52 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 53 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 54 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 55 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 56 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 57 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 58 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 59 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 60 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 61 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 62 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 63 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 64 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 65 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 66 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 67 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 68 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 69 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 70 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 71 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 72 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 73 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 74 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 75 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 76 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 77 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 78 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 79 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 80 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 81 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 82 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 83 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 84 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 85 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 86 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 87 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 88 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 89 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 90 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 91 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 92 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 93 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 94 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 95 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 96 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 97 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 98 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 99 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 100 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 101 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 102 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 103 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 104 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 105 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 106 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 107 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 108 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 109 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 110 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 111 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 112 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 113 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 114 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 115 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 116 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 117 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 118 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

Page 119 redacted for the following reason:
- - - - - - - - - - - - - - - - - - - -
(b) 3 (16 U.S.C. § 470hh)

SWCA
ENVIRONMENTAL CONSULTANTS

THREATENED AND ENDANGERED SPECIES REPORT FOR THE PLAINS SOUTHCAP LLC 41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA PIPELINE PROJECT

MOBILE COUNTY, ALABAMA AND JACKSON COUNTY, MISSISSIPPI

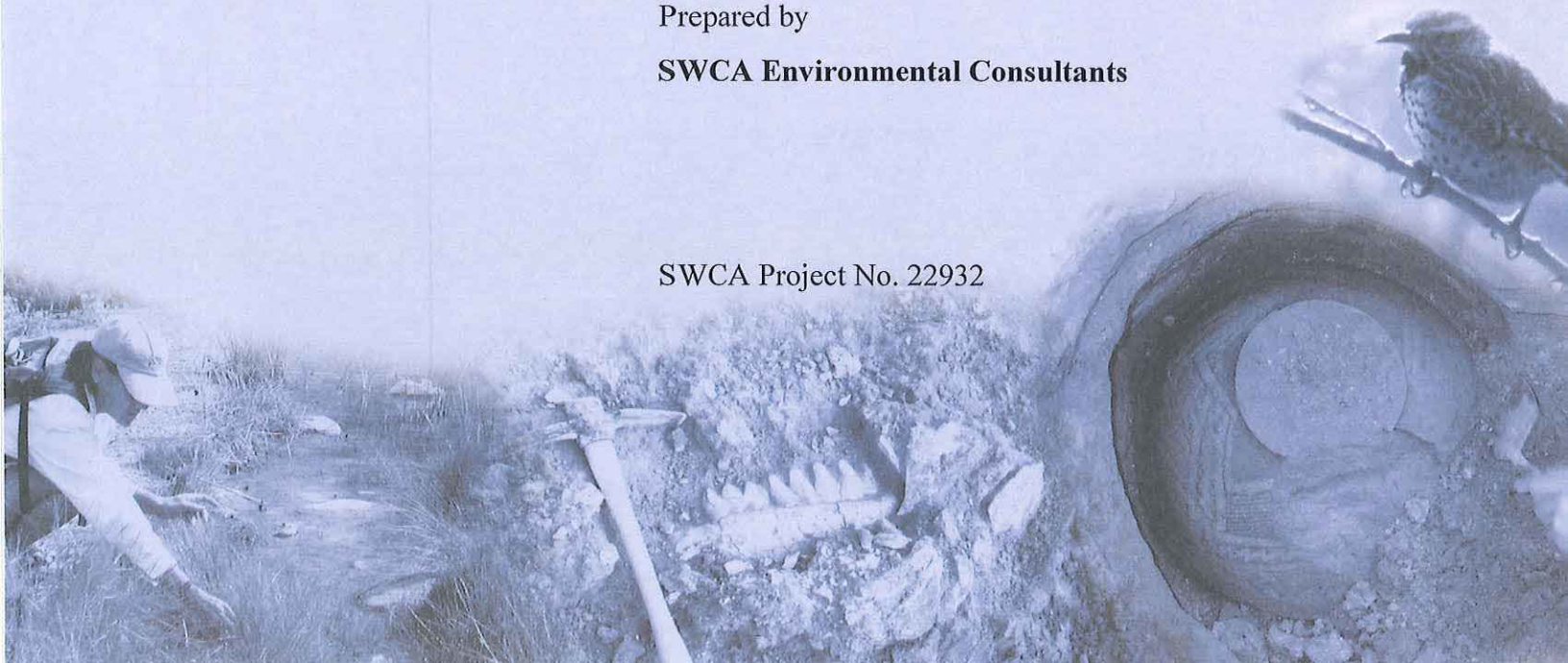
Prepared for

PLAINS SOUTHCAP, LLC

Prepared by

SWCA Environmental Consultants

SWCA Project No. 22932



THREATENED AND ENDANGERED SPECIES REPORT FOR THE PLAINS SOUTHCAP LLC 41-MILE-LONG TEN-MILE FACILITY TO PASCAGOULA REFINMERY PIPELINE PROJECT

MOBILE COUNTY, ALABAMA AND JACKSON COUNTY, MISSISSIPPI

Prepared for

Plains Southcap, LLC
333 Clay Street, Suite 1600 (77002)
Houston, TX 77210-4648
Attn: Dean Gore

Prepared by

SWCA®
ENVIRONMENTAL CONSULTANTS
Sound Science. Creative Solutions.®

7255 Langtry, Suite 100
Houston, TX 77040
(713) 934-9900
www.swca.com

Eric Munscher
Herpetologist (Scientist)
Houston Natural Resources

Tom Sankey
Senior Project Manager
Houston Natural Resources

SWCA Project No. 22932

September 9, 2012

EXECUTIVE SUMMARY

SWCA Environmental Consultants (SWCA) has prepared this threatened and endangered species report for the proposed approximately 41-mile-long Plains Southcap, LLC (Plains) Ten-Mile Facility to Chevron Pascagoula Refinery Pipeline Project (proposed project) in Mobile County, Alabama and Jackson County, Mississippi (Figure 1). The work was conducted at the request of Plains Southcap, LLC in order to facilitate compliance with the Endangered Species Act of 1973 (ESA), as amended.

SWCA performed a threatened and endangered species review to determine which federally listed species would have the potential to occur within the proposed project area (Figure 1). Based upon field observations and habitat descriptions and requirements of listed species, SWCA determined that the proposed project may affect the gopher tortoise, eastern indigo snake, gopher frog, and bald eagle. SWCA recommends avoiding gopher tortoise burrows which will, in turn, minimize potential impacts to the eastern indigo snake and gopher frog. SWCA also recommends performing a second eagle survey before the construction phase of the project to verify that the documented nests are not active during the 2012-2013 breeding season.

Within the limitations of schedule, budget, and scope of work, SWCA warrants that this study was conducted in accordance with accepted environmental science practices, including the technical guidelines, evaluation criteria, and species' listing status in effect at the time this evaluation was performed.

The results and conclusions of this report represent the best professional judgment of SWCA scientists. No other warranty, expressed or implied, is made.

Please be aware that only the U.S. Fish and Wildlife Service and/or lead federal agency can determine compliance with the Endangered Species Act.

Table of Contents

List of Figures

List of Tables

List of Attachments

1.0 INTRODUCTION

SWCA Environmental Consultants (SWCA) has prepared this threatened and endangered species report for the proposed 41-mile-long Ten-Mile to Pascagoula Crude Oil Pipeline Project (proposed project) in Mobile County Alabama and Jackson County Mississippi (Figure 1). The work was conducted at the request of Plains Southcap, LLC in order to facilitate compliance with the Endangered Species Act of 1973 (ESA), as amended.

The scope of work for this threatened and endangered species report included:

- review of the U.S. Fish and Wildlife Service (USFWS) threatened and endangered species lists for Mobile County Alabama and Jackson County Mississippi (**Appendix A**);
- review of the Alabama and Mississippi Natural Diversity Databases (NDD) occurrence records for threatened and endangered species near the project location;
- field reconnaissance survey of a 200-foot-wide corridor centered on the proposed pipeline centerline (project area); and
- evaluation of the potential for the species listed in this report to occur in the project area.

1.1 PROJECT PURPOSE

The proposed project will be constructed to transport crude oil from the Plains Southcap, LLC Ten-Mile facility northwest of Mobile Alabama, to the Chevron Rrefinery in Pascagoula, Mississippi.

1.2 PROJECT LOCATION

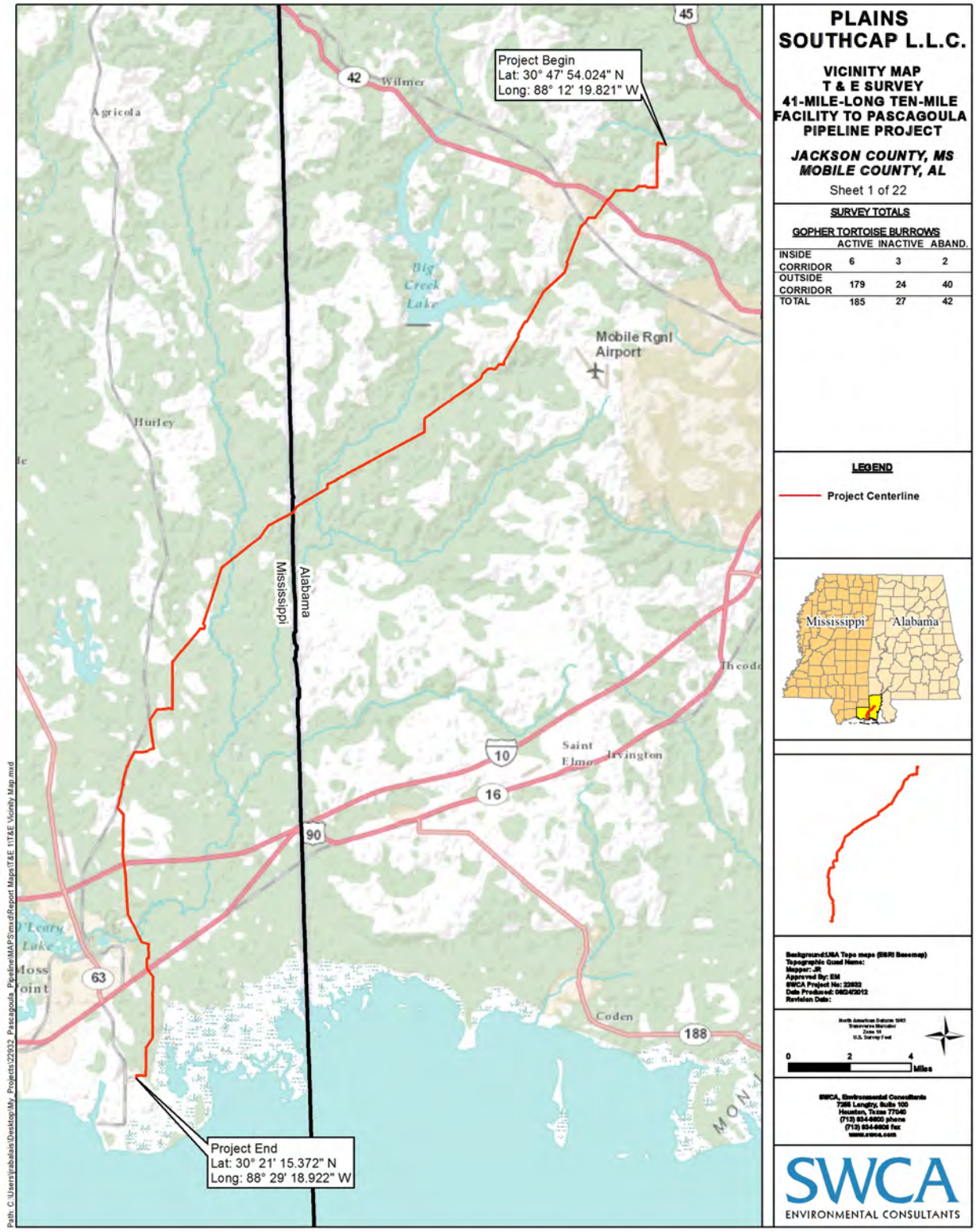
The proposed project will originate at the Plains Southcap, LLC Ten-Mile crude oil facility approximately 0.5 mile north off of County Road 217 on Whigham Rd. The proposed project will extend southwest through Mobile County, Alabama and Jackson County, Mississippi for approximately 41 miles and terminate at the Chevron Pascagoula Refinery, Mississippi. Above-ground facility locations are not yet defined, but once identified will be constructed in upland locations within or immediately adjacent to the pipeline right-of-way (ROW) and will include pig launching stations, pig receiving stations, and valve sites.

1.3 PROJECT DESCRIPTION

Construction of the proposed project is slated to begin in March 2013 and end before September 2013. No fill material will be placed within waters or wetlands for more than three months.

The proposed project will consist of the construction and placement of approximately 41 miles of 24-inch diameter crude oil pipeline. Construction of the pipeline will be within a 50-foot-wide ROW and will consist of clearing vegetation, excavating a trench, laying the pipe, replacing the soil, adjusting the topography to match pre-construction contours, and re-establishing vegetation Please refer to the attached map book (**Appendix B**) for an illustration of the survey corridor and 50' permanent ROW within the project area.

Figure 1: Project Location Map



2.0 METHODS

SWCA performed a threatened and endangered species review to determine which federally and state listed threatened, endangered, and candidate species would have the potential to occur within the project area. The first step was to review the U.S. Fish and Wildlife Service (USFWS) County records for each state as well as the Alabama Department of Conservation and Natural Resources and the Mississippi Department of Wildlife, Fisheries, and Parks annotated county lists of rare species for Mobile County, Alabama and Jackson County, Mississippi, respectively (**Appendix A**). The next step was to determine which listed species may occur in the project area based on species biology and habitat requirements. A Natural Diversity Database review for both Alabama and Mississippi was also completed to acknowledge and note occurrences of rare, threatened, or endangered species within the project area. Finally, the biology and life history requirements for each species were discussed and the project's potential effect on each species was evaluated.

2.1 SPECIES IDENTIFICATION

The threatened and endangered species evaluated in this report were based on lists of federally listed species for Mobile County, Alabama and Jackson County, Mississippi, available at the USFWS (2011) website as well as NDD documentation from both state (Alabama and Mississippi) wildlife departments (see **Appendix A**). SWCA also accessed the NDD databases for both states, which provides known occurrence records for listed species. The potential for occurrence within the project area of the species addressed in this report was based on 1) documented occurrences, 2) existing information on distribution, and 3) qualitative comparisons of the habitat requirements of each species with vegetation communities or landscape features in the project area. Possible impacts to these species were evaluated based on reasonably foreseeable project-related activities.

2.2 SPECIES EVALUATION

The potential for occurrence of each species was summarized according to the categories listed below. Because not all species are accommodated precisely by a given category (i.e., category definitions may be too restrictive), an expanded rationale for each category assignment is provided. Potential for occurrence categories are as follows:

- *Known to occur*—the species has been documented in the project area by a reliable observer.
- *May occur*—the project area is within the species' currently known range, and vegetation communities, soils, etc., resemble those known to be used by the species.
- *Unlikely to occur*—the project area is within the species' currently known range, but vegetation communities, soils, etc., do not resemble those known to be used by the species, or the project area is clearly outside the species' currently known range.

Those species listed by the USFWS were assigned to one of three categories of possible effect, following USFWS recommendations. The effects determinations recommended by USFWS include:

- *May affect, is likely to adversely affect*—adverse effects to listed species may occur as a direct or indirect result of the proposed action or its interrelated or interdependent actions, and the effect is not discountable, insignificant, or beneficial.

- *May affect, is not likely to adversely affect*—the proposed action may affect listed species and/or critical habitat; however, the effects are expected to be discountable, insignificant, or completely beneficial.
- *No effect*—the proposed action will not affect federally listed species or critical habitat.

3.0 RESULTS

3.1 ECOLOGICAL OVERVIEW

The project area consists of numerous vegetated communities across the 41-mile project area including, palustrine emergent (PEM), palustrine scrub-shrub (PSS), palustrine forested (PFO), and estuarine emergent (EEM) wetlands, as well as herbaceous, scrub-shrub, and forested uplands as described below.

3.2 VEGETATION

Biologists identified seven general types of vegetative communities within the project area. Determination of wetland habitat (type) is based on the classification system developed by Cowardin et al. (1979). These vegetative communities were classified as herbaceous upland, scrub-shrub upland, forested upland, PEM, PSS, PFO, and EEM wetlands. Examples of common dominant species identified within each vegetative community are listed below.

3.2.1 *Herbaceous Upland*

Herbaceous upland communities occur throughout the project area and are found within existing maintained right of way (ROW). Common dominant herbaceous species within the herbaceous upland communities include Bermuda grass (*Cynodon dactylon*), Italian ryegrass (*Lolium multiflorum*), Canada goldenrod (*Solidago canadensis*), roundpod St. Johnswort (*Hypericum cistifolium*, FACW), broom grass (*Andropogon virginicus*, FAC), candyroot (*Polygala nana*, FAC), heartwing sorrel (*Rumex hastatulus*, FAC), cogon grass (*Imperata cylindrical,* UPL), poverty rush (*Juncus tenuis*, FAC), slender crab grass (*Digitaria filiformis*, UPL), tapered rosette grass (*Dichanthelium acuminatum*, FAC), cuman ragweed (*Ambrosia psilostachya*, FAC), perennial rye grass (*Lolium perenne*, FACU), romerillo (*Bidens alba*, UPL), and American beauty berry (*Callicarpa americana*, UPL). In occasional instances trees, saplings, shrubs, or woody vines were identified as minor components of herbaceous uplands. Common dominant tree, sapling, or shrub species which occur in these instances include red maple (*Acer rubrum*, FAC) slash pine (*Pinus ellioittii*, FACW), long leaf pine (*Pinus palustris*, UPL), sweetbay (*Magnolia virginiana*, FACW), Chinese tallow (*Triadica sebifera*, FAC) dwarf live oak (*Quercus minima*), American holly (*Ilex opaca*, FAC), and saw greenbriar (*Smilax bona-nox*, FAC).

3.2.2 *Scrub-Shrub Upland*

Scrub-shrub upland communities occur throughout the project area and are mostly found along the edges of existing maintained ROW. Common dominant sapling or shrub species within scrub-shrub upland communities include yaupon (*Ilex vomitoria*, FAC), fetterbush (*Lyonia lucida*, FACW), gallberry (*Ilex glabra*, FACW), swamp titi (*Cyrilla racemiflora*, FACW), eastern sweet shrub (*Calycanthus floridus*, FACU), swamp bay (*Persea palustris*, FAC), wax myrtle (*Myrica cerifera*,

FAC), American holly (*Ilex opaca*, FAC), slash pine, and highbush blueberry (*Vaccinium corymbosum*). In occasional instances trees, herbaceous species, or woody vines, were identified as minor components for scrub-shrub uplands. Common examples of the following are longleaf pine, southern magnolia (*Magnolia grandiflora*, UPL), dwarf live oak, red maple, and herbaceous species such as American beauty berry, broom grass, and saw palmetto (*Serenoa repens*, FACU).

3.2.3 Forested Upland

Forested upland communities occur throughout forested portions of the project area along the edge of the existing maintained ROW. Common dominant tree or sapling species within the forested upland communities include slash pine, longleaf pine, southern magnolia, sweetbay, tulip poplar (*Liriodendron tulipifera*, FAC), dwarf live oak, water oak (*Quercus nigra*, FAC), and laurel oak (*Quercus laurifolia*, FAC). In occasional instances shrubs, herbaceous species, or woody vines, were identified as minor components of forested uplands. Common dominant shrub species which occur in these instances include fetterbush, gallberry, yaupon, and eastern sweetbush (*Calycanthus floridus*, FACU). Common herbaceous plants were western bracken fern (*Pteridium aquilinum*, FACU), cogon grass, broom grass, American beauty berry, St. Andrew's cross (*Hypericum hypericoides,* FAC), and Bermuda grass.

3.2.4 Palustrine Emergent Wetland

PEM wetlands occur throughout the project area and are found within existing maintained ROW. Common dominant herbaceous species within the PEM wetland communities include swamp smartweed (*Polygonum hydropiperoides*, OBL), pale pitcher plant (*Sarracenia alata*, OBL), crimson pitcher plant (*Sarracenia leucophylla*, OBL), parrot pitcher plant (*Sarracenia psittacina*, OBL), roundleaf sundew (*Drosera rotundifolia,* OBL), netted chainfern (*Woodwardia areolata*, OBL), Virginia chainfern (*Woodwardia viringinica*, OBL), royal fern (*Osmunda regalis*, OBL), common rush (*Juncus effuses*, OBL), roundhead rush (*Juncus validus*, FACW), roundpod St. Johnswort, St. Andrew's cross (*Hypericum hypericoides*, FAC), candyweed (*Polygala lutea*, FACW), Frank's sedge (*Carex frankii*, OBL), false hopsedge (*Carex lupuliformis*, OBL), whitehead bugbutton (*Lachnocaulon anceps*, OBL), foxtail clubmoss (*Lycopodiella alopecuroides*, OBL), broadleaved cattail (*Typha latifolia*, OBL), bushy broom grass (*Andropogon glomeratus*, FACW), *cogon grass, Carolina spider lily (*Hymenocallis caroliniana*, FACW), creeping primrose willow (*Ludwigia repens*, OBL), floating primrose willow (*Ludwigia peploides*, OBL), velvet panicum (*Dicanthelium scoparium*, FACW), disk waterhyssop (*Bacopa rotundifoloia*, OBL), and anglestem beaksedge (*Rhynchospora caduca*, FACW). In occasional instances, trees such as slash pine, saplings such as red maple, and sweetbay, shrubs such as wax myrtle and swamp titi, or woody vines such as sawtooth blackberry (*Rubus argutus*, FAC) and coral greenbriar (*Smilax walteri*, OBL) were identified as minor components within PEM wetlands.

3.2.5 Palustrine Scrub-shrub Wetland

PSS wetlands occur within the project area and are found within existing ROW and along the edges of existing maintained ROWs. The dominant shrub and sapling species within the PSS wetland communities include, swamp titi, buckwheat titi (*Cliftonia monophylla*, OBL), gall berry, large gallberry (*Ilex coriacea*, FACW), fetterbush, swamp bay, eastern baccharis (*Baccharis halimifolia,*

FACW), wax myrtle, sweetleaf (*Symplocos tinctoria*, FAC), highbush blueberry, pawpaw (*Asimina triloba*, FAC), and yaupon. In occasional instances, trees such as red maple, sweetgum (*Liquidambar styraciflua*, FAC), sweetbay, slash pine, *Chinese tallow, laurel oak, and overcup oak (*Quercus lyrata*, OBL), herbaceous species, or woody vines were identified as minor components within PSS wetlands. Common dominant herbaceous species which occur in these instances include bushy bluestem, netted chainfern, Virginia chainfern, royal fern, bog button, foxtail clubmoss, roundpod St. Johnswort, common rush, and Franks sedge. Common dominate vine species observed were coral greenbriar, southern dewberry (*Rubus trivialis*, FAC), and Florida grape (*Vitis cinerea*, FACW).

3.2.6 Palustrine Forested Wetland

PFO wetlands occur within the project and are found within the existing ROW and along the edges of existing maintained ROWs. The dominant shrub and sapling species within the PSS wetland community include swamp tupelo (*Nyssa biflora*, OBL), tulip poplar, sweetbay, slash pine, bald cypress (*Taxodium distichum*, OBL), water oak, cherrybark oak (*Quercus pagoda*, FACW), overcup oak, laurel oak, swamp chestnut oak (*Quercus michauxii*, FACW), and boxelder (*Acer negundo*, FACW). On occasion shrubs such as wax myrtle, swamp titi, sweetleaf, gall berry, and fetterbush dominated the understory. Woody vines such as sawtooth blackberry, coral greenbriar, and saw greenbriar (*Smilax bona-nox*, FAC) were identified as minor components within PFO wetlands.

3.2.7 Estuarine Emergent Wetland

EEM wetlands occur within the project area around the southern Escatawpa River crossing. The dominant vegetation within these communities include giant cut grass (*Zizaniopsis miliacea*, OBL), broadleaved cattail, California bulrush (*Schoenoplectus californicus*, OBL), and on occasion trees such as bald cypress and swamp tupelo.

3.3 ALABAMA AND MISSISSIPPI NATURAL DIVERSITY DATABASE RECORDS

According to the USFWS and the Alabama and Mississippi NDD records (**Appendix A**), there are occurrence records for two federally protected species within 5 miles of the project area. The gopher tortoise (*Gopherus polyphemus*) occurs in both Jackson County, Mississippi and Mobile County, Alabama. The bald eagle (*Haliaeetus leucocephalus*), which has been delisted from the federal list of threatened and endangered species, is also documented in the project vicinity. A summary of these species as they relate to the proposed project is discussed in detail in Section 3.4.

Absence of mapped occurrences in the NDD database does not constitute an absence of protected species within the project area.

3.4 SPECIES EVALUATION

The Alabama and Mississippi USFWS NDD data (2011) lists a total of 16 federally threatened or endangered species that have the potential to occur in Jackson County, Mississippi and Mobile County, Alabama. The Alabama and Mississippi USFWS NDD (2011) lists one candidate species as well as one delisted species that has the potential to occur in both counties. Additionally the Alabama and Mississippi NDD (2011) list two important state listed species. Table 1 summarizes the habitat requirements, the potential for occurrence, and possible effects on these species. All

currently listed candidates, threatened, or endangered species that are assigned the occurrence categories "known to occur" or "may occur" and which may be affected, are discussed in detail in Sections 3.4.1 through 3.4.13.

Table 1: Federally Listed Species Potentially Occurring in Jackson County Mississippi and Mobile County Alabama.

Common Name (Scientific Name)	Status*	Range or Habitat Requirements	Potential for Occurrence in Project Area	Determination of Effect
BIRDS				
Bald eagle (*Haliaeetus leucocephalus*)	USFWS (DL) all counties	Found primarily near large bodies of water. Nests in tall trees or cliffs near water.	May occur. Mississippi and Alabama NDD occurrence records indicate the presence of bald eagles within and around the project area.	May affect, is not likely to adversely affect. See Section 3.4.1 below.
Piping plover (*Charadrius melodus*)	USFWS (T) all counties	Wintering migrant along the Mississippi and Alabama coast; beaches and bayside mud or salt flats.	Unlikely to occur. The project area does not occur near coastal beaches.	No effect.
Mississippi Sandhill Crane (*Grus canadensis pulla*)	USFWS (E) all counties	Open pine savannah. Today found only in the Mississippi Sandhill Crane National Wildlife Refuge.	Unlikely to occur. The project does not cross near the national wildlife refuge in which the current and only population lives.	No effect.
Red-Cockaded Woodpecker (*Picoides borealis*)	USFWS (E) Mobile county	Suitable nesting habitat for the RCW consists of pine stands that contain mature (60 + year old) trees with DBH of 16 inches of greater and is devoid of a midstory. Suitable foraging habitat consists of pine stands in which 50% of pines are mature.	Unlikely to occur. The project area lacks adequate nesting habitat.	May affect, is not likely to adversely affect. See Section 3.4.2 below.
Wood Stork (*Mycteria americana*)	USFWS (E) all counties	Freshwater wetlands dominated by large cypress trees in which they use to nest in colonies. Regular visitors to the state of Alabama but have not been observed nesting since the 1960's.	Unlikely to occur. The project area is historic habitat.	May affect, is not likely to adversely affect. See Section 3.4.3 below
*Bewick's Wren (*Thryomanes bewickii*)	Alabama (E) Jackson county	Brush habitat in open country or open woodlands.	Unlikely to occur. The project area is historic habitat.	No effect.
REPTILES and AMPHIBIANS				
Atlantic hawksbill sea turtle (*Eretmochelys imbricata*)	USFWS (E) all counties	Found in clear waters off of mainland and island shelves. Commonly found near coral reef formations. The turtles nest on sandy beaches with a close proximity to coral reefs.	Unlikely to occur. The project area does not occur near coastal waters.	No effect.
Green sea turtle (*Chelonia mydas*)	USFWS (T) all counties	Found in gulf and bay systems with shallow water seagrass beds, open water between feeding and nesting areas, and barrier island beaches.	Unlikely to occur. The project area does not occur near coastal waters.	No effect.
Kemp's Ridley sea turtle (*Lepidochelys kempii*)	USFWS (E) all counties	Found in gulf and bay systems with shallow water; feeds primarily on crabs, snails, clams, and other crustaceans and plants; nests April through August.	Unlikely to occur. The project area does not occur near coastal waters.	No effect.
Leatherback sea turtle (*Dermochelys coriacea*)	USFWS (E) all counties	Found in pelagic (open ocean) habitats. Has been found in coastal areas. Lays nests in large expanses of beach.	Unlikely to occur. The project area does not occur near coastal waters.	No effect.
Flatwoods Salamander (*Ambystoma cingulatum*)	USFWS (T) Mobile County	Found in pine flatwood communities dominated by longleaf or slash pine with wiregrass cover. Isolated pocket wetlands dominated by cypress and black gum trees.	Unlikely to occur. Habitat is available, however, the project area is historic habitat.	May affect, is not likely to adversely affect. See Section 3.4.4 below.

Gopher Frog (*Rana sevosa*)	USFWS (E) Jackson County	Found in upland, sandy areas dominated by longleaf pine forests, with isolated, temporary, wetland breeding sites within.	Unlikely to occur. Abundant habitat is available however; this species has not been observed in the project vicinity in over 50 years.	May affect, is not likely to adversely affect. See Section 3.4.5 below.
Gopher tortoise (*Gopherus polyphemus*)	USFWS (T) In parts of its range	The gopher tortoise digs and lives in burrows throughout its range from South Carolina, into Florida, west into Alabama and far east Louisiana. They can use a variety of upland habitats including scrub, pine Flatwoods, and dunes along the beach. Tortoises have also been observed using newly created edge habitat due to the construction of pipeline and power line easements.	Likely to occur. The project area has an abundance of suitable habitat.	May affect, is likely to adversely affect unless tortoises are found and relocated. See Section 3.4.6 below.
Alabama Red-bellied turtle (*Pseudemys alabamensis*)	USFWS (E) all counties	Found in shallow water ranging from 3 to 6 feet in backwater bays, lakes, and river channels. This turtle prefers broad vegetated expanses in these shallow water habitats. Current distribution is thought to occur in the Mobile Bay and its tributary system.	Unlikely to occur. The project area does not occur near broad expanses of shallow water such as bays.	No effect. Section 3.4.7 below.
Yellow blotched map turtle (Graptemys flavimaculata)	USFWS (T) all counties	Found in the Pascagoula River drainage system. Inhabitats sandy/mud bottomed rivers and tributaries. It is associated with vegetated debris such as snags and fallen down trees.	May occur. The project does not cross the Pascagoula River but does cross the Escatawpa River and tributaries.	May affect, is not likely to adversely affect. See Section 3.4.8 below
Eastern Indigo Snake (*Drymarchon corais couperi*)	USFWS (T) all counties	Almost always associated with gopher tortoises and gopher tortoise habitats.	May occur. Project area does support abundant gopher tortoise habitat and burrows.	May affect, is not likely to adversely affect. See Section 3.4.9 below
Black Pine Snake (*Pituophis melanoleucus lodingi*)	USFWS (C)	Xeric, fire maintained longleaf pine forest with well drained sandy soils. Usually found along hill tops, in open canopied and dense herbaceous areas.	May occur. Project area does support abundant gopher tortoise habitat and burrows	May affect, is not likely to adversely affect. See Section 3.4.10 below
Fish				
Gulf Sturgeon (*Acipenser oxyrinchus desotoi*)	USFWS (T) all counties	Found in coastal rivers along the Gulf of Mexico. These rivers contain high levels of tanic acid that make the water appear dark in color.	May occur. Project area does cross the Escatawpa River twice. This river is a large tanic coastal river.	May affect, is not likely to adversely affect. See Section 3.4.11 below.
*Iron Color Shiner (*Notropis chaybacus*)	Mississippi (T)	Inhabits slow acidic blackwater steams and drainages and other types of vegetated wetlands from Chipola River to Big Creek.	May occur. Project area does cross Big Creek and tributaries.	May affect, is not likely to adversely affect. See Section 3.4.12 below.
Plants				
Louisiana quillwort (*Isoetes louisianensis*)	USFWS (E) all counties	Occurs in small blackwater streams as well as sand and gravel mud bars and steam banks. Associated with Laurel and water oaks as well as sweet bay magnolia trees.	Unlikely to occur. Historic populations. Species has not been identified in the part of Jackson county the project occurs in.	May affect, is not likely to adversely affect. See Section 3.4.13 below.

USFWS Status Definitions
E = Endangered. The ESA specifically prohibits the take of a species listed as endangered. Take is defined by the ESA as to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to engage in any such conduct.
T = Threatened. The ESA specifically prohibits the take of a species listed as threatened. Take is defined by the ESA as to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to engage in any such conduct.
C=Candidate species. A species that has warranted further attention to gain federally threatened or endangered status.
DL = Delisted. Delisted species are those which USFWS had previously listed as threatened or endangered. These species are considered rare and vulnerable to population decrease. This listing has no legal protection.
Range or habitat information is from USFWS 2011, and Campbell 2003
*Indicates a state listed species. These two species are not federally listed and have no federal protection.

3.4.1 Bald Eagle

Current Federal Status: The bald eagle has been delisted by the USFWS. However it still holds protection under the Bald and Golden Eagle Protection Act (BGEPA).

Habitat and Range Requirements: Bald eagles build large stick nests lined with soft materials such as grass, leaves, and Spanish moss. Nests are used for several years by the same pair of eagles, with the birds adding materials each year. Nests are often very large, measuring 6 feet across and weighing hundreds of pounds. In south Alabama and Mississippi, eagle nest-building activities generally begin in October of each year. Peak egg-laying occurs in December and hatching occurs in January. The young eagles generally fledge in April after 10-12 weeks of growth but parental care continues in the nesting territory for another 4-6 weeks. Adults and juveniles begin to migrate north in May (Campbell, 1995).

Eagles are vulnerable to disturbance throughout the nesting period but are particularly vulnerable during the first 12 weeks, during courtship, nest-building, egg-laying, incubation and brooding. Disturbance at this time may cause nest abandonment and chilled or overheated eggs or young. Human activity, even late in the nesting cycle, may cause premature fledging and reduce the young eagles' chance of survival (Campbell, 1995).

Once a suitable breeding territory is found, breeding pairs will return to the same area year after year, often using alternate nests within the territory during different breeding years. Although a given nest may be lost due to weather or age of the tree, a pair often returns to the same territory to begin building another nest. In cases where one member of a pair dies, the nest may be colonized by the surviving member returning with a new mate. Nesting territories can also be inherited by subsequent generations (Campbell, 1995).

Bald eagles generally inhabit areas near large bodies of open water such as lakes, marshes, rivers, and sea coasts where there are plenty of fish to eat and tall trees for nesting and roosting (Campbell, 1995). Although the bald eagle was removed from the federal endangered species list on June 28, 2007, this species remains protected by the BGEPA of 1940 and the Migratory Bird Treaty Act of 1918.

SWCA discovered in our file search through the Mississippi and Alabama wildlife departments that there are records for bald eagles nesting near the Lower Escatawpa River in Mississippi. Based on these results, SWCA conducted an extensive aerial survey to identify bald eagle nests. The methods and results of this survey are discussed below.

Potential for Occurrence: This species likely occurs within the project area. Large expanses of open water with large associated forested wetlands occur throughout the southern portion of this project.

Determination of Impact: SWCA biologists Mr. Tom Sankey and Ms. Colette Craft were flown by Mr. Doug Dickey of Apex Helicopters out of Trent Lott Airport (TLA) to the project area on the morning of February 23, 2012. The investigators utilized a Robinson R-44 helicopter to complete a

bald eagle survey. The investigators took off from TLA at approximately 0930. The weather was cloudy and overcast. Visibility was estimated at 2 miles and the winds were out of the southwest at 5-10 knots. The investigators arrived at the northern end of the pipeline ROW in Mobile County by approximately 0950 to initiate the aerial survey.

The entire proposed ROW was searched methodically for the presence of bald eagles and/or eagle nests. The majority of the survey effort was spent searching a swath of land centered on the northern and the southern Escatawpa River crossings. These areas were searched for a distance of approximately one mile upstream of the proposed ROW and for a distance of approximately one mile downstream of the proposed ROW. The purpose of the survey was to ensure that eagle nests were not within the vicinity of the proposed pipeline construction area. The investigators left the project area at approximately 1330, after spending approximately 3 hours and 40 minutes in the search area.

Results of the Bald Eagle Survey

A total of five large nests were identified within the Lower Escatawpa River wetland complex during the helicopter survey (**Appendix C**). Nests 1 and 2 were identified as either inactive or abandoned bald eagle nests or possible osprey nests (*Pandion haliaetus*). Nest 4 was identified as either an inactive or abandoned eagle nest. Another nest was later identified as an osprey nest and is not shown in **Appendix C.** Nest 3 was determined to be a probable active bald eagle nest during the 2011-2012 breeding season.

Nest 1 is located over 2,700 feet away from the proposed project ROW. Nest 2 is located immediately adjacent to the proposed project area. Nest 3 is located approximately 5,000 feet west of the project area. Nest 4 is located immediately adjacent to the Escatawpa River, approximately 500 feet northeast of the proposed project area. SWCA biologists located one adult and two recently fledged juvenile bald eagles in the immediate vicinity of Nest 3.

Based on the results of the aerial survey, SWCA was able to verify that bald eagles are actively nesting in the Lower Escatawpa River marshes and tributaries in the vicinity of the proposed project area. With respect to the remainder of the project pipeline ROW (i.e., those areas located outside of the Lower Escatawpa River marshes and tributaries), due to the project's distance from large waterbodies, the lack of available foraging, roosting and nesting habitat for this species in the project area, as well as the mobility of this species, it is our professional opinion that the proposed project is not likely to adversely affect this species within the remainder of the project area (i.e., outside the Lower Escatawpa River marshes and tributaries).

Based on the location of the confirmed probable active nest within 5,000 feet of the proposed ROW, as well as the location of additional possible inactive nests in the project area, it is possible that bald eagles may nest within the immediate project vicinity during the upcoming 2012-2013 breeding season. SWCA recommends performing a boat or an additional helicopter survey during the beginning of the 2012-2013 bald eagle breeding season (i.e., December 2012 or January 2013) to determine if eagles are in the area and are nesting within the project area. If Nests 2 and 4 are active, then it will be necessary for the project to either be constructed via HDD across this portion of the

Escatawpa River, or construction will need to be delayed until after the end of the eagle breeding season (i.e., after March 2013).

3.4.2 Red-Cockaded Woodpecker

Current Federal Status: Federally endangered throughout its range.

Habitat and Range Requirements: Suitable nesting habitat for red-cockaded woodpecker (RCW) consists of pine stands that contain pine trees greater than 60 years of age, approximately 16-inch diameter at breast height (dbh), and that are located within 0.5 mile of suitable foraging habitat. Suitable foraging habitat for the RCW consists of pine stands in which 50 percent or more of the dominant trees are mature pines (greater than 30 years old, 10 inch dbh). Preferred nesting habitat is typically devoid of moderate to heavy mid-story layers (20 to 50 feet above the ground) (USFWS, 1985).

The RCW recovery plan survey protocol states that if the project area contains any suitable foraging habitat that will be impacted by the project, that habitat, if it contains any 60 year old pine trees or older, and all other suitable nesting habitat within 0.8 km (0.5 mi) of the project site, regardless of ownership, must be surveyed for the presence of red-cockaded woodpeckers (USFWS, 1985).

The project area's upland habitat consists mainly of mixed young pine and hardwoods or young silvicultural stands. Approximately 40-60 percent of the canopy is comprised of slash pine and long leaf pine approximately 10-20 years old with a dbh average of 12-16 inches. The pines are closely spaced along the ROW, with a tall midstory (40-50 feet) and at times a very thick understory (15-30 feet) existing within the project corridor. No 60 year old or older trees were identified within the project area and surrounding vicinity. The age and size of the pines are not suitable for RCW nesting habitat. Furthermore, most of these areas were determined not to be potential RCW foraging or nesting habitat due to the overall height and density of the midstory and understory. However, several areas along the project corridor did match up with potential foraging habitat requirements. In these areas the pine to hardwood ratio was adequate. The trees were spread farther apart and greater than 50% of the canopy was occupied by either maturing slash or long leaf pine. The midstory was thin and adequate to allow for flight paths.

Potential for Occurrence: RCWs have not been observed recently in either county the project occurs in. Habitat assessment was conducted during the gopher tortoise and wetland surveys. No suitable nesting habitat was documented.

Determination of Impact: The red cockaded woodpecker has not been observed in Mobile County, Alabama and Jackson County, Mississippi for a long time. SWCA conducted habitat surveys along the entire length of the proposed project and did not observe any habitat that would be considered RCW nesting habitat. Due to the lack of recent observations and habitat to support the species in the project vicinity it is our opinion that this project will not have any adverse affects to the red cockaded woodpecker.

3.4.3 Wood Stork

Current Federal Status: Federally endangered throughout its range.

Habitat and Range Requirements: Wood storks are large wading birds that inhabit freshwater wetlands. They use tall cypress trees near wetlands and waterbodies as colonial nesters. Nesting sites historically reached upwards of 10,000 pairs. Today the colonies are much smaller. They are regular visitors to Alabama's swamps and wetlands to forage, but are not known to nest in the state since the 1960's. Nesting has also not been confirmed in Mississippi (MDWFP, 2001).

Potential for Occurrence: This species is highly mobile, and has not been observed actually nesting or breeding in Alabama since the 1960s, and it has been an unconfirmed breeder in Mississippi.

Determination of Impact: Due to the absence of breeding individuals and known breeding colonies it is unlikely that this project will adversely affect this species.

3.4.4 Flatwoods Salamander

Current Federal Status: Threatened

Habitat and Range Requirements: Adults live underground in pine flatwood communities dominated by longleaf or slash pine with wiregrass ground cover in isolated pocket wetlands dominated by cypress and gum trees (Palis, 1996; Palis and Means, 2005). Ponds that are free of predatory fish are preferred breeding habitat. In Alabama, range is restricted to the lower coastal plain in Mobile, Baldwin, Escambia, Covington, Geneva, and Houston counties. No individuals have been found in Alabama since 1981 despite intensive survey of 143 ponds in winter (1992-1993 and 1993-1994) (Goodwin, 2002).

Potential for Occurrence: Abundant habitat is available throughout the proposed project route; however, Due to the lack of recent populations and individuals being found within Alabama, it is SWCA's opinion that this project will not likely adversely affect this species.

Determination of Impact: SWCA believes that this species had historic populations in this area. However, due to the extreme time frame in which it has not been documented in either state it is SWCA's opinion that the proposed project may affect, but is not likely to adversely affect this species.

3.4.5 Gopher Frog

Current Federal Status: Endangered

Habitat and Range Requirements: This species was once found in nine counties from Louisiana, Mississippi, and Alabama. It has not been observed in Louisiana since 1967 or in Alabama since 1922. The gopher frog is presently known to inhabit only one site in Harrison County, Mississippi (MDWFP, 2001).

Typical habitat for this species includes both upland, sandy areas dominated by longleaf pine forests, with isolated, temporary, wetland breeding sites within. The frogs spend most of their lives underground. They use active and abandoned gopher tortoise and armadillo burrows (Ashton and Ashton, 2008). This species requires sufficient winter precipitation to fill up breeding habitat to allow for reproduction.

Potential for Occurrence: Abundant habitat is available throughout the proposed project route; however, due to the amount of time which has passed since this species was last documented in the project area; it is SWCA's opinion that this project will not likely adversely affect this species.

Determination of Impact: SWCA believes that this species had historic populations in this area. However, due to the extreme time frame in which it has not been documented in the project area, it is SWCA's opinion that the proposed project is not likely to adversely affect this species. Also due to Plains ability to narrow the ROW foot print, the majority of gopher tortoise burrows have been avoided. Only six active burrows occur within the construction ROW, limiting the available habitat or this species.

3.4.6 Gopher Tortoise

Current Federal Status: Federally threatened in both counties the project occurs in. The species is protected through much of its range from South Carolina, throughout Florida, and into the four eastern parishes of Louisiana.

Habitat and Range Requirements: The gopher tortoise (*Gopherus polyphemus*) ranges from South Carolina all through Florida and west into the four most eastern parishes of Louisiana. Gopher tortoises favor dry, sandy ridges with broad open stands of turkey oak and long leaf pine along with other scrub species. They have also been documented in frequently edge habitats around roads, fence lines, and pipeline ROWs. Habitats much have well drained sandy soils with a relatively shallow water table. Burrows will be dug up to 30' long and 9 feet deep. Burrows are typically dug to the water table so that the end chamber can maintain a constant level of humidity.

Potential gopher tortoise habitat was first located by examining aerial imagery. Large areas that were indicative of classic gopher tortoise habitat such as sand hills, open pine and turkey oak savannahs, and existing linear line ROW were selected for ground-truthing. It is important to note that due to constant habitat alterations, identifying natural gopher tortoise habitat has become problematic (Ashton and Ashton, 2008). These animals are rather adaptive and will flourish in edge habitat (Ashton and Ashton, 2008).

The on-ground gopher tortoise survey protocol was adapted from the Florida Fish and Wildlife Conservation Commission Gopher Tortoise Management Plan (2007) and from Ashton and Ashton (2008). No actual linear line survey protocol currently exists. SWCA adapted the standard survey protocol used for large tracts of land to fit to a 200-foot-wide linear corridor. In the 200-foot-wide corridor, SWCA established three equally-spaced transects that traversed the entire length of the area to be surveyed. A team of three biologists (one biologist per transect) walked the 200-foot-wide corridor looking for burrows or other signs of gopher tortoises. To increase survey success and total area surveyed within the 200-foot corridor, perpendicular transects were added every 100 feet. SWCA adapted the survey to fit a 100% survey model.

Once gopher tortoise burrows were found, the state of the burrow was determined. Burrows were identified as active, inactive, abandoned or impacted, depending on the state of the burrow entrance (Ashton and Ashton, 2008), and as defined below:

- An **active** burrow has a defined shape and a clear mouth and apron; recent tracks and feces may be present in or around the burrow; and active feeding "lanes" may be visible in thicker vegetation.

- An **inactive** burrow has a defined shape but may have leaves and other debris blocking the mouth and apron; no fresh tracks or feces are found in the immediate area; could be a secondary burrow for a tortoise or one that is used intermittently by many tortoises in the pod.

- An **abandoned** burrow has lost its defined shape, and the entrance may be collapsed or clogged with debris or plant roots.

- An **impacted** burrow may be active, inactive, or abandoned. The entrance to the burrow has been damaged, possibly by a potential predator (such as dog or coyote) or by human activity. Impacted burrows are not identified on any of the attached maps, as they transcend active, inactive and abandoned categories.

GPS locations were taken for all burrows regardless of their state. The burrows' distance and bearing to the nearest transect was also taken (Florida Fish and Wildlife Conservation Commission Gopher Tortoise Management Plan 2007; Ashton and Ashton, 2008). Each burrow was photographed; between two to four photos of the apron and the entrance were taken to document the state of the burrow and to document possible tortoise activity.

Using this methodology resulted in the vast majority of the 200-foot-wide corridor being surveyed. It is highly unlikely that gopher tortoise burrows or activity within the survey corridor went undetected during the field survey.

Results of Gopher Tortoise Survey

Mr. Eric Munscher (Florida-certified Gopher Tortoise Agent-permit # GTA-09-00286A), Mr. Matt Gagnon, Mrs. Lynne Ray, Mrs. Michelle Wood-Ramirez, and Mrs. Kristal Schneider surveyed over 18 miles of potential habitat along the proposed pipeline corridor in February 14th-21th, April 18th-26th, and May 20th-June 2nd, 2012. The remaining 23 miles of line was also surveyed for the presence of absence of gopher tortoises during the wetland delineation. A total of 19 pods (tortoise concentrations, possibly family units) were found along the route on various properties (**Appendix B**). Of the 19 pods a total of 254 burrows were identified and mapped. Of the 254 burrows identified, 185 were considered to be active and showed signs of tortoise movement (tracks, trails in vegetation, or fresh scat) or displayed defined burrow shape and clean entrance, 27 were considered inactive, largely due to no evidence of recent tortoise movement and the degree of debris in the entrance to the burrow, and 42 were considered abandoned (**Appendix B**). The abandoned burrows all suffered from partially or fully collapsed burrow entrances, vegetation growing within burrow or apron, and other obstructions. Of the 254 burrows located, 10 were impacted in some manner. The most common form of impact observed was the result of an animal (i.e., a dog or coyote) digging at the entrance of the burrow (see photos in **Appendix D**). SWCA observed numerous dogs in the vicinity of some of the active tortoise pods.

SWCA indentified 6 active burrows within the proposed 50-foot-wide construction corridor. An additional 103 active burrows are located within the 200-foot-wide survey corridor (see **Appendix B**).

Bucket pit fall traps will be set at the entrance to all active burrows within the construction ROW, and tortoises found will have to be relocated to adequate acceptable habitat. Relocation habitat will be decided by the USFWS and Alabama / Mississippi state agencies. If adequate habitat remains on site tortoises should be able to remain within their breeding pod to keep adequate genetic flow available within the pod.

Tortoise removal will be conducted by certified gopher tortoise agents to assure proper compliance with federal and state regulations concerning the animals' welfare.

Certified gopher tortoise agents as well as environmental inspectors will be present during the construction aspect of this project and will be able monitor the presence of tortoises within the area. Heavy reinforced silt fencing will be placed at the edge of the construction ROW to deter gopher tortoises from entering the construction area.

3.4.7 Alabama Red-Bellied Turtle

Current Federal Status: Endangered throughout its range.

This highly endangered turtle prefers broad, vegetated expanses of shallow water (3 to 6 feet in depth) in backwater bays, lakes, and along river channels (USFWS, 1990). It has been suggested by Dobie (1985a) that snags and dense beds of submersed and emergent aquatic vegetation provide food and cover for this species. Current distribution is thought to be contained to Mobile Bay and its tributary streams. One of the only known major nesting sites is located on a dredged material disposal area known as Gravine Island (Dobie, 1985a).

The only area along the proposed route that offers potential habitat for this species is the Escatawpa River marshes. However, populations of this species are not known to occur within this area (USFWS, 1990).

Determination of Impact: Due to the extremely low population numbers and limited known nesting areas, SWCA believes that the proposed project would likely not adversely affect this species.

3.4.8 Yellow-Blotched Map Turtle

Current Federal Status: Threatened

Habitat and Range Requirements: This species is endemic to Mississippi and the Pascagoula River drainage system including the Escatawpa River (MDWFP, 2001). The largest viable current population is located in the lower Pascagoula River. This species requires waterbodies with strong, consistent current and large sandbars. As with most of this genus this species spends a great amount of time basking on vegetated debris (fallen down trees) (MDWFP, 2001).

Potential for Occurrence: This species may occur in the project area. The project crosses the Escatawpa River twice and numerous smaller tributaries of the river system. This turtle could find suitable habitat within these waterways.

Determination of Impact: It is highly unlikely that this project would have any adverse affects to this species. Several major waterbodies, including the two crossings of the Escatawpa River will be horizontally directional drilled (HDD) and as such will not have any direct impact to associated wildlife.

3.4.9 Eastern Indigo Snake

Current Federal Status: Threatened

Habitat and Range Requirements: This very large diurnal snake's habitat preference appears to vary with season and perhaps with latitude; it favors dry xeric habitats in winter and more mesic habitats in summer. Seasonal movements between these habitat types occur during fall and spring. In areas where the eastern indigo snakes occur sympatrically with gopher tortoises, they rely heavily on tortoise burrows (both active and abandoned) for denning and nesting sites (USFWS, 1982; Stevenson et al., 2003; Ashton and Ashton, 2008). Eastern indigo snakes have very large home ranges (>100 hectares or 250 acres). Although eastern indigo snakes remain active throughout much of the winter, their home ranges in winter are smaller. Breeding occurs November-April. Females lay clutches of 5 to12 eggs between March and July. Eggs hatch 90 - 120 days later. Males are territorial and male-male combat is known to occur (USFWS, 1982; Stevenson et al., 2003; Ashton and Ashton, 2008).

Potential for Occurrence: This species may occur in the project area. The majority of habitat which was surveyed for the presence of gopher tortoise would be adequate habitat for this species. Since this species has such a large home range and spends much time within animal burrows, we cannot confirm its presence or absence within the proposed project area. It is assumed that this species may likely be found within the project area.

Determination of Impact: Due to the amount of suitable habitat due to the presence of gopher tortoises throughout the proposed project route it is likely that this species would occur within the project area. Gopher tortoises found within the proposed project construction ROW will trapped using bucket traps beginning April 1, 2013. All tortoises trapped will be relocated to suitable habitat out of the construction corridor. The potential for an eastern indigo snake to be living in one of these burrows is likely. Certified gopher tortoise agents and environmental inspectors will be on hand during the tortoise extractions and construction phase of this project to ensure threatened and endangered species safety. If an indigo snake is observed it will be taken out of the construction zone and moved to suitable habitat. Based on these precautions, it is SWCA's opinion that the proposed project may affect, but is likely to not adversely affect this species. Also due to Plains ability to narrow the ROW foot print, the majority of gopher tortoise burrows within the survey area have been avoided. Only six active burrows occur within the construction ROW, limiting the available habitat or this species.

3.4.10 Black Pine Snake

Current Federal Status: Candidate species.

Habitat and Range Requirements: This large snake species inhabitats similar habitat to the eastern indigo snake and the gopher tortoise. They require long leaf pine forest with well drained sandy soils, open canopy, thin midstory with a thick herbaceous layer. The habitat should be maintained by frequent burning. They are believed to spend a great deal of time inside abandoned gopher tortoise burrows (MDWFP, 2001).

Potential for Occurrence: Habitat that meets this species needs is abundant throughout the project vicinity. The gopher tortoise is found throughout the region and numerous abandoned burrows were located. It is possible that black pine snakes occur within this area but no recent evidence has shown this to be true. All known occurrences of this snake in Mississippi are from the northwest of Jackson County, Mississippi.

Determination of Impact: Due to the amount of suitable habitat due to the presence of gopher tortoises throughout the proposed project route it is likely that this species would occur within the project area. Gopher tortoise burrows that are within the proposed projects construction ROW will be dug up with the tortoises being relocated to suitable habitat out of the project corridor. The potential for an black pine snake to be living in one of these burrows is likely. Certified gopher tortoise agents and environmental inspectors will be on hand during the tortoise extractions and the construction phase of this project to ensure threatened and endangered species safety. If an indigo snake is observed it will be taken out of the construction zone and moved to suitable habitat. Based on these precautions, it is SWCA's opinion that the proposed project may affect, but is likely to not adversely affect this species. Also due to Plains ability to narrow the ROW foot print, the majority of gopher tortoise burrows within the project survey corridor have been avoided. Only six active burrows occur within the construction ROW, limiting the available habitat or this species.

3.4.11 Gulf Sturgeon

Current Federal Status: Endangered throughout its range.

Habitat and Range Requirements: Gulf sturgeon can be found in coastal rivers of the Gulf of Mexico from the Suwannee River in Florida, to the Pearl River in Louisiana. The rivers which support sturgeons contain high levels of tannic acid that make the water appear dark in color. Sturgeons spawn near the headwaters of rivers, and spend the summer in the middle to lower portions of rivers. The most viable population of Gulf sturgeon in Alabama is located in the Choctawhatchee River near Geneva where over two dozen individuals were observed from 1991-1994 (Fox et al. 2000).

Potential for Occurrence: The project does cross the Escatawpa River twice along with large tributaries such as Big Creek. It is unlikely but not impossible that this species could be found within the project vicinity.