LETTER REPORT FOR ENVIRONMENTAL INFRASTRUCTURE ASSISTANCE PROGRAM SECTION 219 OF WRDA 1992

# DESIGN AND CONSTRUCTION ASSISTANCE JACKSON COUNTY, MISSISSIPPI CITY OF OCEAN SPRINGS WATER DISTRIBUTION SYSTEM IMPROVEMENTS PROJECT



December 2020

# Letter Report for Environmental Infrastructure Assistance Program Section 219 of WRDA 1992

Design and Construction Assistance for Jackson County, Mississippi Ocean Springs Water Distribution System Improvements Project

**PROJECT AUTHORIZATION.** The project is authorized by Section 219(c)(5) of the Water Resources Development Act (WRDA) of 1992, as amended by technical corrections in Public Law 106-109; Section 331 of WRDA 1999; and Section 5158 of WRDA 2007, as follows: "JACKSON COUNTY, MISSISSIPPI. – Provision of an alternative water supply and projects for the design, installation, enhancement, or repair of sewer systems for Jackson County, Mississippi."

The authorization of appropriations for construction assistance is provided in Section 219(e)(1), as amended by Section 504 of WRDA 1996; technical corrections in Public Law 106-109; and Section 5158, as follows: "AUTHORIZATION OF APPROPRIATIONS FOR CONSTRUCTION ASSISTANCE. – There are authorized to be appropriated for providing construction assistance under this section – (1) \$32,500,000 for the project described in subsection (c)(5)."

Section 331 of WRDA 1999, as amended by Section 3103 of WRDA 2007, directed the Secretary to provide a credit, not to exceed \$9,000,000, toward the non-Federal share of the cost of the project for the costs incurred by the Jackson County Board of Supervisors during the period beginning on 8 February 1994 and ending on 8 November 2007 (date of enactment of WRDA 2007) for projects authorized by Section 219(c)(5) of WRDA 1992 – if the Secretary determines that the work is compatible with and integral to the project.

A compilation of the above cited WRDA provisions is provided in Appendix A.

**EXPENDITURE HISTORY.** Federal and Non-Federal expenditure history and the remaining Federal amount available before the authorized Federal appropriations limit is reached is shown in Table 1.



Cost Share (CS)	Federal Allocations	Non- Federal Cash	Non- Federal WIK & LERRDs	Unexpended Balance (Federal)	Unexpended Balance (Non-Federal)
CS #498 Big Hill Acres (closed)	\$12,970,695	\$3,772,814	\$551,885	\$0	\$0
CS #535 Water Reclamation	\$3,200,000	\$1,066,667	\$0	\$1,506,618	\$461,506
Ocean Springs (future work)	\$4,000,000 (\$25K is outside the CS)	\$0	\$0	\$3,991,148	N/A (no non-Federal funds received to date; awaiting CS agreement)
Gautier (future work)	\$2,500,000 (\$25K is outside the CS)	\$0	\$0	\$2,489,401	N/A (no non-Federal funds received to date; awaiting CS agreement)
Total as of 16 Nov 2020:	\$22,670,695	\$5,390,232	\$551,885	\$7,987,167	\$461,506
	\$9,829,305	Remaining of \$32.5M	Amount o	f Authorized F	ederal Appropriations

Table 1. Expenditure History

**NON-FEDERAL SPONSOR.** The Jackson County Utility Authority (JCUA) is the non-Federal Sponsor for this project. The JCUA has requested assistance from the U.S. Army Corps of Engineers (USACE) for the design and construction work for the Ocean Springs Water Distribution System Improvements Project, which is to increase the Distribution System for Jackson County Regional Water Supply – West.

The Jackson County Regional Water Supply System is a Class "D" system operating as Mississippi Public Water System (PWS) 0300164. The system currently includes six active groundwater supply wells with the capacity to withdraw 5,600 gallons per minute and 2,400,000 gallons of elevated storage capacity with a supply yield of 16,785 connections in total capacity. All groundwater wells in service are located in the northern half of Jackson County to allow effective treatment to be accomplished with simple disinfection. Improvements are needed to the Distribution System to serve the potable water demands in the southern half of the county, which includes the residents of the City of Ocean Springs, MS.

The existing and planned primary Distribution System for PWS 0300164 are illustrated in Figure 1. The JCUA is the system owner and operator. The project area rests within Congressional District No. 4.

**BACKGROUND.** Initial authorization was provided by Section 219(c)(5) of WRDA 1992. In 1998 initial funds were appropriated. The first project for Jackson County (Big Hill Acres) was design assistance that was provided under an agreement for the Environmental Evaluation of the Jackson County Industrial Water Supply, which was executed with the County in October 2001 at a total cost of \$178,697.

Design and construction assistance was provided for the Big Hill Acres Water and Sewer System under an agreement that was executed with Jackson County in December 2012. The

project was completed in March of 2017 at a total cost of \$17,295,394.

Design assistance for the Jackson County Water Reclamation Project was provided under an agreement executed with the JCUA in June 2018. The project is active and will continue design efforts during FY2021.

The FY20 allocation for projects under Section 219(c)(5) for Jackson County is \$6,500,000, of which \$4,000,000 is for the Ocean Springs Water Distribution System Improvements Project.

Under the General Conditions of the Gulf Coast Disaster Recovery Community Block Grant (CDBG-DR), administered by the U.S. Department of Housing and Urban Development, the JCUA seeks to build and construct a regional water supply system to provide clean and safe drinking water to Jackson County, Mississippi. The CDBG-DR portion, referred to as the "system backbone", was completed on June 26, 2017. Concurrently and subsequently, the JCUA has operated and expanded the regional water supply system.

**DESCRIPTION OF PROJECT (Increment of Work).** The Ocean Springs Water Distribution System Improvements Project consists of the design and construction of a 12-inch potable water distribution line in four distribution sections. All are shown in yellow highlight on Figure 1 and identified in the map legend as USACE 219 Program. The first distribution section is identified as HWY 90 to Hanshaw Road. The second distribution section is identified as Hanshaw Road South (from Hwy 90 to Old Spanish Trail). The third distribution section is identified as Old Spanish Trail East to Fountainbleau Road South to Point Aux Chenes. The fourth distribution section is identified as Point Aux Chenes to Peabody Road South to Jean Lane.



Figure 1. Location Map – Southern Jackson County

This project includes design plans and analysis, construction cost estimates, and Mississippi permit coordination documents as provided by the JCUA, and environmental compliance to include NEPA documentation, agency coordination, and identification of state permits. USACE will use the design plans and design analysis provided by the JCUA as the basis for design-bid-build contract scope development and project construction. All construction will occur within public rights-of-way of public property already owned by the JCUA or Jackson County, Mississippi.

**BENEFITS OF THE PROJECT.** Immediate benefits of this project will be increased distribution of the existing Jackson County Regional Water Supply System – West. This will be accomplished by direct "retail service" to available homes outside of incorporated and certificated areas and by "wholesale service" to incorporated and certificated areas in need of additional and improved supply.

**FINANCIAL CAPABILITY OF THE NON-FEDERAL SPONSOR.** The JCUA is a public utility charged with the daily management, operation, and maintenance of countywide water and sewer systems in Jackson County, Mississippi. JCUA's cost share of the project funding will be cash sourced from the utility's capital expenditures program. In accordance with Section 219 of WRDA 1992, as amended, cost sharing is a maximum of 75% Federal and a minimum of 25% non-Federal. The JCUA's share of the project cost is estimated to be \$1,381,576, which is slightly more than 25% of the estimated total project cost.

**ENVIRONMENTAL COMPLIANCE.** In accordance with the National Environmental Policy Act (NEPA), impacts to the environment from the proposed action and alternatives will be considered. It is expected that the JCUA would provide enough detail of studies and design to facilitate the Mobile District's development of an Environmental Assessment (EA). Interagency coordination will be conducted by the Mobile District with public involvement solicited as a required part of the NEPA process. A permit pursuant to Section 404 of the Clean Water Act will not be required, as determined by the Mobile District (File Number SAM-2020-00088-RCV). Any other required permits shall be in place before the design is accepted and construction is initiated.

**COST.** The total project cost is estimated to be \$5,381,576. Of this amount, \$4,000,000 in Federal funds have been appropriated in FY2020 and are available for this project. The non-Federal sponsor is estimated to be paying slightly more than 25% of the project cost share. Table 2 provides a breakdown of estimated expenditures and cost for this project.

	Section 219 WRDA 1992 Cost Share (75/25)	FY20 Appropriation Cost Share
Federal Cash:	\$4,036,182	\$4,000,000
Non-Federal Cash:	\$1,345,394	\$1,381,576
Total Project Cost	\$5,381,576	\$5,381,576

**Table 2: Estimated Expenditures and Costs** 

**REAL ESTATE.** The non-Federal sponsor has the responsibility to provide Land, Easements, Rights-Of-Way, Relocation, and Disposal Areas (LERRD), and the value of any LERRD is included in the total project cost and credited against the required non-Federal share. All lands provided by the non-Federal sponsor for implementation of the project shall be valued for crediting purposes in accordance with the applicable rules of just compensation, as specified by the Government.

The planned design will, to the fullest extent possible, incorporate existing utility rights-ofway, easements, and public lands. The non-Federal sponsor shall not receive credit for the value of lands, easements, or rights-of-way that are part of the land on which the facility or structure to be improved is located, but any new or additional real estate interest that must be acquired for the project may be credited. At this time, no real estate or permanent easements have been identified for this project.

# **OPERATION, MAINTENANCE, REPAIR, REPLACEMENT, AND REHABILITATION (OMRR&R).** OMRR&R is a 100 percent non-Federal responsibility.

**SCHEDULE.** The basic execution schedule for this work is provided below.

21 January 2021	Execute Agreement for Design and Construction			
	Assistance (CW130)			
19 March 2021	Ready to Advertise (CW400)			
21 July 2021	Contract Award (CC800)			
12 April 2022	Project Physical Completion (CW450)			
23 December 2022	Project Financial Completion (CW470)			

#### APPENDIX A

Compiled Authorization Language – Sec 219 Environmental Infrastructure, Jackson County, Mississippi

# 1. SECTION 219 AUTHORIZATION, WRDA 1992

SEC. 219. ENVIRONMENTAL INFRASTRUCTURE.

(a) IN GENERAL.--The Secretary is authorized to provide assistance to non-Federal interests for carrying out water-related environmental infrastructure and resource protection and development projects described in subsection (c), including waste water treatment and related facilities and water supply, storage, treatment, and distribution facilities. Such assistance may be in the form of technical and planning and design assistance. If the Secretary is to provide any design or engineering assistance to carry out a project under this section, the Secretary shall obtain by procurement from private sources all services necessary for the Secretary to provide such assistance, unless the Secretary finds that--

(1) the service would require the use of a new technology unavailable in the private sector; or(2) a solicitation or request for proposal has failed to

attract 2 or more bids or proposals.

(b) NON-FEDERAL SHARE.--The non-Federal share of the cost of projects for which assistance is provided under this section shall not be less than 25 percent, except that such share shall be subject to the ability of the non-Federal interest to pay, including the procedures and regulations relating to ability to pay established under section 103(m) of the Water Resources Development Act of 1986.
(c) PROJECT DESCRIPTIONS.--The projects for which the Secretary is authorized to provide assistance under subsection (a) are as follows:...

... (5) JACKSON COUNTY, MISSISSIPPI.--Provision of an alternative water supply for Jackson County, Mississippi.

• • •

(d) AUTHORIZATION OF APPROPRIATIONS.—There is authorized to be appropriated for providing assistance under this section
\$30,000,000. Such sums shall remain available until expended.
(e) AUTHORIZATION OF APPROPRIATIONS FOR CONSTRUCTION ASSISTANCE.—

There are authorized to be appropriated for providing construction assistance under this section—

(1) 20,000,000 for the project described in subsection (c)(5); ...

## 2. AUTHORIZATION AMENDMENTS

The project was authorized for design and construction assistance by Section 219 of the Water Resources Development Act (WRDA) of 1992 (Public Law 102-580), as amended by Section 504 of WRDA 96 (Public Law 104-303); Section 331 of WRDA 99 (Public Law 106-53); Section 1(a) of WRDA 99 technical corrections (Public Law 106-109); and Sections 3103 and 5158 of WRDA 2007 (Public Law 110–114).

## WRDA 1996 - SEC. 504. ENVIRONMENTAL INFRASTRUCTURE.

Section 219 of the Water Resources Development Act of 1992 is amended by adding at the end of the following "(e) Authorization of Appropriations for Construction Assistance. – There are authorized to be appropriated for providing construction assistance under this section - (1) \$10,000,000 for the project described in subsection (c) (5).

## WRDA 1999 - SEC. 331. JACKSON COUNTY, MISSISSIPPI

The project for environmental infrastructure, Jackson County, Mississippi, authorized by Section 219(c)(5) of the Water Resources Development Act of 1992 (106 Stat. 4835) and modified by section 505 of the Water Resources Development Act of 1996 (110 Stat. 3757), is further modified to direct the Secretary to provide a credit, not to exceed \$5,000,000, against the non-Federal share of the cost of the project for the costs incurred by the Jackson County Board of Supervisors since February 8, 1994, in constructing the project if the Secretary determines that such costs are for work that the Secretary determines is compatible with and integral to the project.

WRDA 1999 CORRECTIONS - SEC. 1(a). ENVIRONMENTAL INFRASTRUCTURE.

(1) in subsection (c), by striking paragraph (5) and inserting the following:

"(5) JACKSON COUNTY, MISSISSIPPI.—Provision of an alternative water supply and a project for the elimination or control of combined sewer overflows for Jackson County, Mississippi."; and

(2) Section 219 (e) (1) of the Water Resources Development Act of 1992 (106 Stat. 4835, 110 Stat. 3757) by striking \$10,000,000 and inserting \$15,000,000.

WRDA 2007 - SEC. 3103. JACKSON COUNTY, MISSISSIPPI.

(a) MODIFICATION.—Section 331 of the Water Resources Development Act of 1999 (113 Stat. 305) is amended by striking "\$5,000,000" and inserting "\$9,000,000".

(b) APPLICABILITY OF CREDIT.—The credit provided by section 331 of the Water Resources Development Act of 1999 (113 Stat. 305) (as amended by subsection (a) of this section) shall apply to costs incurred by the Jackson County Board of Supervisors during the period beginning on February 8, 1994, and ending on the date of enactment of this Act for projects authorized by section 219(c)(5) of the Water Resources Development Act of 1992 (106 Stat. 4835; 110 Stat. 3757; 113 Stat.1494).

WRDA 2007 – SEC. 5158(2). ADDITIONAL ASSISTANCE FOR CRITICAL PROJECTS.

Section 219 of the Water Resources Development Act of 1992 (106 Stat. 4835; 110 Stat. 3757; 113 Stat. 334; 113 Stat. 1494; 114 Stat. 2763A–219; 119 Stat. 2255) is amended—

in subsection (c)(5) by striking "a project for the elimination or control of combined sewer overflows" and inserting "projects for the design, installation, enhancement, or repair of sewer systems";
 in subsection (e)(1) by striking "\$20,000,000" and

inserting "\$32,500,000"; ...

#### **Opinion of Probable Cost** Jackson County Utility Authority USACE 219 Program West Regional Water System Expansion to O.S. Area HWY 90 to Hanshaw Road Item Description Unit Qty Unit Cost **Total Cost** 1.0 Mobilization/ Demobilization \$15,000.00 LS 1 \$15,000.00 2.0 Traffic Control LS \$5,000.00 \$5,000.00 1 \$1.600.00 \$0.00 3.0 Clearing & Grubbing AC 0 \$600.00 4.0 Erosion Control (Silt Fencing) LF 1500 \$0.40 5.0 Erosion Control (Seeding & Mulching - 10' Wide) AC 0.3 \$1,500.00 \$516.53 6.0 Driveway Repair (Asph/Conc) EΑ 8 \$800.00 \$6.400.00 7.0 12" C900 PVC Water Main, Open Cut LF 1500 \$75.00 \$112,500.00 8.0 20" Steel Casing, Jack & Bore \$275.00 \$0.00 LF 0 \$0.00 9.0 12" HDPE Pipe - Horizontal Directional Drill LF 0 \$150.00 10.0 Fire Hydrant Assembly, 3-way, 12" Main \$3,500.00 \$10,500.00 EΑ 3 11.0 12" In-line Resilient Seated Gate Valve, w Box EΑ 8 \$1,800.00 \$14,400.00 12.0 Ductile Iron Fittings, All Sizes \$8.00 \$12,000.00 LB 1500 **Construction Subtotal:** \$176,916.53 Hanshaw Road South (From HWY 90 to Old Spanish Trail) Item Description Unit Qty Unit Cost Total Cost 1.0 Mobilization/ Demobilization \$60,000.00 LS \$60,000.00 1 2.0 Traffic Control LS 1 \$20,000.00 \$20,000.00 3.0 Clearing & Grubbing AC 0 \$1,600.00 \$0.00 4.0 Erosion Control (Silt Fencing) LF 4000 \$0.40 \$1,600.00 5.0 Erosion Control (Seeding & Mulching - 10' Wide) 0.9 \$1,500.00 \$1,377.41 AC 6 \$800.00 \$4.800.00 6.0 Driveway Repair (Asph/Conc) EΑ 7.0 12" C900 PVC Water Main, Open Cut LF 4000 \$75.00 \$300,000.00 8.0 20" Steel Casing, Jack & Bore LF 1000 \$275.00 \$275,000.00 9.0 12" HDPE Pipe - Horizontal Directional Drill LF 0 \$150.00 \$0.00 \$42,000.00 10.0 Fire Hydrant Assembly, 3-way, 12" Main \$3,500.00 ΕA 12

1

EΑ

LB

20

3000

**Construction Subtotal:** 

\$1,800.00

\$8.00

\$36,000.00

\$24,000.00

\$764,777.41

11.0 12" In-line Resilient Seated Gate Valve, w Box

12.0 Ductile Iron Fittings, All Sizes

Old S	Old Spanish Trail East to Fountainbleau Rd South to Point Aux Chenes					
Item		Description	Unit	Qtv	Unit Cost	Total Cost
	1.0	Mobilization/ Demobilization	LS	<u></u> 1	\$80,000.00	\$80,000.00
	2.0	Traffic Control	LS	1	\$30,000.00	\$30,000.00
	3.0	Clearing & Grubbing	AC	0	\$1,600.00	\$0.00
	4.0	Erosion Control (Silt Fencing)	LF	10000	\$0.40	\$4,000.00
	5.0	Erosion Control (Seeding & Mulching - 10' Wide)	AC	2.3	\$1,500.00	\$3,443.53
	6.0	Driveway Repair (Asph/Conc)	EA	30	\$800.00	\$24,000.00
	7.0	12" C900 PVC Water Main, Open Cut	LF	10000	\$75.00	\$750,000.00
	8.0	20" Steel Casing, Jack & Bore	LF	300	\$275.00	\$82,500.00
	9.0	12" HDPE Pipe - Horizontal Directional Drill	LF	1000	\$150.00	\$150,000.00
	10.0	Fire Hydrant Assembly, 3-way, 12" Main	EA	30	\$3,500.00	\$105,000.00
	11.0	12" In-line Resilient Seated Gate Valve, w Box	EA	40	\$1,800.00	\$72,000.00
	12.0	Ductile Iron Fittings, All Sizes	LB	6000	\$8.00	\$48,000.00
			Construction Subtotal:		\$1,348,943.53	
Point	Aux	Chenes South to Peabody Road South to Jean Lane				
Item		Description	<u>Unit</u>	<u>Qty</u>	<u>Unit Cost</u>	Total Cost
	1.0	Mobilization/ Demobilization	LS	1	\$15,000.00	\$15,000.00
	2.0	Traffic Control	LS	1	\$5,000.00	\$5,000.00
	3.0	Clearing & Grubbing	AC	0	\$1,600.00	\$0.00
	4.0	Erosion Control (Silt Fencing)	LF	6500	\$0.40	\$2,600.00
	5.0	Erosion Control (Seeding & Mulching - 10' Wide)	AC	1.5	\$1,500.00	\$2,238.29
	6.0	Driveway Repair (Asph/Conc)	EA	30	\$800.00	\$24,000.00
	7.0	12" C900 PVC Water Main, Open Cut	LF	6500	\$75.00	\$487,500.00
	8.0	20" Steel Casing, Jack & Bore	LF	200	\$275.00	\$55,000.00
	9.0	12" HDPE Pipe - Horizontal Directional Drill	LF	500	\$150.00	\$75,000.00
	10.0	Fire Hydrant Assembly, 3-way, 12" Main	EA	16	\$3,500.00	\$56 <i>,</i> 000.00
	11.0	12" In-line Resilient Seated Gate Valve, w Box	EA	30	\$1,800.00	\$54,000.00
	12.0	Ductile Iron Fittings, All Sizes	LB	3000	\$8.00	\$24,000.00
			Construction Subtotal:		\$800,338.29	
Point	Aux	Chenes South to Noble Road				
ltem		Description	<u>Unit</u>	<u>Qty</u>	<u>Unit Cost</u>	T <u>otal Cost</u>
	1.0	Mobilization/ Demobilization	LS	1	\$8,000.00	\$8,000.00
	2.0	Traffic Control	LS	1	\$3,000.00	\$3,000.00
	3.0	Clearing & Grubbing	AC	0	\$1,600.00	\$0.00
	4.0	Erosion Control (Silt Fencing)	LF	3000	\$0.40	\$1,200.00
	5.0	Erosion Control (Seeding & Mulching - 10' Wide)	AC	0.7	\$1,500.00	\$1,033.06
	6.0	Driveway Repair (Asph/Conc)	EA	15	\$800.00	\$12,000.00

7.0 12" C900 PVC Water Main, Ope	n Cut	LF	3200	\$75.00	\$240,000.00
8.0 20" Steel Casing, Jack & Bore		LF	0	\$275.00	\$0.00
9.0 12" HDPE Pipe - Horizontal Dire	9.0 12" HDPE Pipe - Horizontal Directional Drill		0	\$150.00	\$0.00
10.0 Fire Hydrant Assembly, 3-way,	12" Main	EA	8	\$3,500.00	\$28,000.00
11.0 12" In-line Resilient Seated Gat	11.0 12" In-line Resilient Seated Gate Valve, w Box		20	\$1,800.00	\$36,000.00
12.0 Ductile Iron Fittings, All Sizes		LB	3000	\$8.00	\$24,000.00
		Construct	ion Subtota	l:	\$353,233.06
	All Phases Subtotal:				\$3,444,208.82
	Estimated Budget for Engineering Design (9%):				\$309,978.79
	Estimated Budget for Construction Phase Services (6%): \$206,65				
	Project Management (10%):				<u>\$344,420.88</u>
Sub-total Project Cost:				\$4,305,261.02	
Contingency (25%):				\$1 <u>,076,315.25</u>	
	Total Project Cost:				\$5,381,576.25
Alternate Alignments for Consideration:					
Poticaw Bayou Road					
Add Wholesale Meter Station					

