



Procurement Department Bid Office
225 N. Pearl Street
Jacksonville, FL 32202

December 19, 2023

ADDENDUM NUMBER: One (1)

TITLE: Arlington East WRF Expansion Phase 2

JEA IFB NUMBER: 1411464646

PROPOSAL DUE DATE: ~~January 9, 2024~~ January 23, 2024

TIME OF RECEIPT: 12:00 PM

TIME OF OPENING: 02:00 PM

THIS ADDENDUM IS FOR THE PURPOSE OF MAKING THE FOLLOWING CHANGES OR CLARIFICATIONS:

JEA is extending the bid due date to January 23, 2024

JEA is providing the following Forms:

- 1411464646 Addendum 1 Pre-bid sign-in sheet
- 1411464646 Addendum 1 Appendix A - Drawings 1976
- 1411464646 Addendum 1 Appendix A - Drawings 1995
- 1411464646 Addendum 1 Appendix A - Drawings 2002
- 1411464646 Addendum 1 Appendix A - Drawings 2022
- 1411464646 Addendum 1 Appendix A - Drawings Combined
- 1411464646 Addendum 1 Appendix A - Technical Specifications 1995 40 75 66.13 - Optical Nitrate Analyzers
- 1411464646 Addendum 1 Appendix A - Technical Specifications 40 62 63 - Operator Interface Terminals (OIT)
- 1411464646 Addendum 1 Appendix B - Bid Workbook

1. Form 1411464646 Addendum 1 Appendix B - Bid Workbook has been added with the following corrections.
 - Line Item WD1 "Water Distribution System Improvements" has been added to address the additional scope of work. The Contractor shall insert the total dollar amount from the Appendix B unit price bid workbook amount.
2. Appendix B has been added to provide the unit-price bidding basis for the Water Distribution System Improvements work.

Specifications

Volume 1

- Section 01 11 00 Summary of Work.
 - Add the following to Section 1.03(C):
 - “13. Water distribution system improvements including abandonment of existing 6” water distribution system and construction of replacement 8” water distribution system with associated reservicing, fire hydrants, valving, and utility conflict crossings.”
 - Add the following paragraph to Section 1.08:
 - “B. The Owner will perform the existing water main tapping and water meter assembly for the North Gate water service. The Drawings depict the general limits of JEA Work. The Contactor shall coordinate with the Owner to define final construction limits and piping connection locations. All other work to be completed by the Contractor.”
- Section 01 14 00 Coordination with Owner’s Operations.
 - Add the following to Section 1.06(C):
 - “8. The replacement 8” water distribution system shall be constructed while maintaining service to the existing 6” water distribution system. The replacement system shall be constructed, tested and cleared for service before cutting over existing water services to the replacement system. The Contractor shall coordinate each tie in and service interruption with the Owner to determine limitations and timing. Night-time work may be required to limit disruptions to the facility.”
 - Add “through” after “Aeration Basins 1” to Section 1.06(F)(8)(a)
- Section 01 20 00 Measurement and Payment.
 - Add “and WD1” after “B32” to Section 1.04(D)(2)(a)
 - Add the following to Section 1.04(D)(2):
 - “b. The Water Distribution System Improvements, line WD1 in the Bid form and Appendix B.1 - Bid Item WD1 Workbook, work will utilize JEA’s Water and Wastewater Standards (Updated 09-22-23) Section 801 – Measurement and Payment to the fullest extent possible. The Appendix B.1 Bid Form utilizes JEA’s Pay Item Designation that references Section 801. The Contractor’s unit price shall be based on JEA’s measurement and payment standards, unless the bid form has an “SC” designation for special conditions. The SC items have the following measurement and payment criteria:
 - 1) S.C. 1 Abandon Existing 6” Water Distribution System
 - a) Measurement: The quantity for payment shall be on a lump sum basis and shall include all work required to abandon the existing 6” Water Distribution System as shown on the Drawings and/or specified including but not limited to: Abandonment of the South Gate water service including but not limited to: a) coordination with JEA meter services to remove existing meter, closure/abandonment of existing service valve; b) cutting of existing 6” piping for plugged dead-end assembly downstream of valve; c) removal of existing 6” RPZ assembly; d) cutting existing piping; e) plugging existing piping at point of disconnections for service replacements, etc.
 - b) Payment: Payment of the lump sum price shall be full compensation for furnishing all labor, equipment and materials to abandon the existing 6” water distribution system, restoration, grassing, and incidentals thereto.
 - 2) S.C. 2 ≤ 2” Modified JEA Water Service

- a) Modify JEA's Pay Item 801.12.9 as follows: The quantity to be paid will be the actual number of service connections installed as detailed on Plate W-1, W-2 and W-5. on the Drawings. Payment for the work will be made at the contract unit price for each size of long or short side service type and shall be full compensation for the items of work including furnishing and installing the service piping; connection to water main and plugging to new service termination in meter box; corporation stop (standard or HDPE type); curb stop; locate wiring; boring (if required); flushing and disinfection; all required removal of grassing; excavation; de-watering; native soil backfill; furnishing and placing a steel decking over excavations; all sheeting, shoring, and bracing required to maintain excavations in a safe condition; protecting existing structures, utilities and property both public and private; placing and removing all traffic signs and barriers and maintaining traffic; as-builts; cleaning up the site; installing silt fence and other erosion, sedimentation protection and control devices; furnishing all material, labor, tools and equipment and all incidental and related work to complete the item. Payment for a "double 1-inch water service" shall include 2-inch connections to main, 2-inch poly pipe, Y-fitting, 1-inch poly to meter boxes, two curb stops, other items as listed above to complete the water service installation to two customers (excluding meter boxes). Payment for a "Gang water service for 3 services" and a "Gang water service for 4 services" shall be based upon a unit price each and include 2" saddle, 2" poly tubing, multi-Y with pack joint couplings, 1" poly line to all associated meter boxes, all curb stops and other items as listed above to complete the water service installation to 3 or 4 customers (excluding meter boxes).
- 3) S.C. 3 Subsurface Utility Engineering (SUE) Allowance
 - a) Upon approval by the Owner, the Contractor may use the allowance to procure additional services to assist with locating existing utilities in advance of trenching activities by use of ground penetrating radar (GPR) and/or vacuum excavations. The Contractor shall utilize every effort to locate utilities through conventional means during construction of the improvements. The intent of this allowance is to address areas where there may be conflicts at depth and/or congested corridors that are difficult to trench via conventional means.
- 4) S.C. 4 Grassing
 - a) All non-paved areas disturbed by the construction of the potable water distribution system improvements shall be seeded and mulched per JEA Water and Wastewater Standard 441.3 unless indicated on the Drawings to be sodded per Standard 441.5. Payment of the lump sum price shall be full compensation for furnishing all labor, equipment, and materials to restore and grass the areas impacted by the construction.

Volume 2

- Section 40 05 00 Basic Mechanical Requirements.
 - Add Section 1.04 as follows:

- **"1.04 REPLACEMENT OF POTABLE WATER DISTRIBUTION SYSTEM**

A. Unless noted otherwise in the Drawings, the potable water distribution system replacement work is specified in the JEA Water and Wastewater Standards (Updated 09-22-23) Sections 350 and 351. Any items not specified by the JEA standards and required to complete the Work shall be addressed via Division 40 specification sections."

- Section 40 62 63 Operator Interface Terminals (OIT).
 - Specification Section 40 62 63 (2 pages) added.
- Section 40 63 43 Programmable Logic Controllers (PLC)

- Add the following to 1.02 RELATED WORK SPECIFIED ELSEWHERE
 - D. Section 40 62 63 – Operator Interface Units
- Section 40 75 66.13 Optical Nitrate Analyzers
 - Replace 40 75 66.13 with updated 40 75 66.13 (1411464646 Addendum 1 Appendix A - Technical Specifications 1995 40 75 66.13 - Optical Nitrate Analyzers).
- Section 46 61 41 Disk Filter System.
 - Add the following to 1.03(K).
 - 10. Control modifications for remote control and monitoring as specified in Section 40 61 96J.
 - Add the following to 2.15(H):
 - 8. In lieu of pilot lights, indicators and manual switches, the filter control panel manufacturer may provide an Operator Interface Unit in accordance with Section 40 62 43.
 - 9. The filter control panel manufacturer shall provide a complete list of all PLC register addresses for all status inputs, setpoints, calculated values, and command outputs as needed to allow remote monitoring and control of the screen cycle process via the Ethernet link.
 - Modify 2.15(J)(3), to the following:
 - Delete the following text: “The operator interface for control of each filter system shall be performed by local Operator Interface Terminal OIT). The OIT shall be configured to display all PLC I/O, setpoints, and parameters. All equipment failures shall be alarmed. PLC I/O values and operator-entered setpoints shall be displayed with associated units and service descriptions. Menus shall be provided to navigate between screens of different equipment items. Displays shall be arranged in a hierarchical structure with displays for specific equipment items grouped together. The OIT shall be minimum 10-inch protected by a type NEMA 4X hinged window kits which provide protection for the OIT, visibility, and easy access to the OIT installed behind the viewing window.”, Replace with “The operator interface for local manual control of each filter system shall be performed by an operator interface terminal or local panel-mounted devices on the Filter Control Panel. The filter manufacturer shall provide the following panel-mounted devices at a minimum if an operator interface terminal is not provided:”
 - Add the following text after 2.15(J)(3)
 - a. One main Filter Local (Manual)/Off/Remote three-position hand switch that will place the filter drive, the backwash pump, and all motorized valves under one of the three operating conditions.
 - b. On/Off two-position hand switch for the filter drive
 - c. On/Off two-position hand switch for the backwash pump
 - d. Open/Stop/Close hand switch for each motorized valve.
 - e. Red mushroom-head Emergency Stop push button.
 - f. Running indicator lights for the filter drive and the backwash pump
 - g. Common Fail indicator lights for the filter drive and the backwash pump
 - h. Common Fail indicator lights for each motorized valve
 - i. Open/Closed indicator lights for each motorized valve
 - j. If an Operator Interface Terminal (OIT) is provided on the Filter Control Panel, the filter provider shall coordinate with the Contractor and System Integrator for the System Integrator to provide control and displays to the HMI/SCADA. The System Integrator shall configure the HMI/SCADA to access and display all filter PLC I/O, setpoints, and parameters. All equipment failures shall be alarmed at the HMI/SCADA. PLC I/O values and operator-entered setpoints shall be displayed with associated units and service descriptions. The System Integrator shall provide menus at HMI/SCADA to navigate between HMI screens of different filter system equipment items, arranged in a hierarchical structure so that displays for specific equipment items are grouped together.”

- Delete 2.15(J) 3.b, 3.c, and 3.d.

Drawings

Volume 1

- G-00-001. REVISED to include drawings added to the bid set. (1411464646 Addendum 1 Appendix A - Drawings Combined)

INSERT sheet to show pavement details. (1411464646 Addendum 1 Appendix A - Drawings Combined)

- C-05-207. REVISED to show revised mill and overlay plan. (1411464646 Addendum 1 Appendix A - Drawings Combined)
- C-05-211 through C-05-215. INSERT sheets to show modified parking and sidewalk information. (1411464646 Addendum 1 Appendix A - Drawings Combined)
- CD1, CD2, and CD3. REVISED tracer wire requirement on details and modified pavement details. ADDED standard detail W-16 and W-17. (1411464646 Addendum 1 Appendix A - Drawings Combined)
- The existing 6" potable water distribution system will be abandoned in place (14 sheets included). The existing system will be replaced with a 10" water service from Millcoe Road to an 8" water meter, 8" Reduced Pressure Zone backflow preventor assembly, and 8" PVC water distribution loop. The following drawings have been added to Volume 1 to define the required water distribution system improvements:
 - C-05-300 WATER DISTRIBUTION DEMOLITION KEY PLAN
 - C-05-301 WATER DISTRIBUTION DEMOLITION PLAN
 - C-05-302 WATER DISTRIBUTION DEMOLITION PLAN
 - C-05-303 WATER DISTRIBUTION DEMOLITION PLAN
 - C-05-304 WATER DISTRIBUTION DEMOLITION PLAN
 - C-05-400 WATER DISTRIBUTION REPLACEMENT KEY PLAN
 - C-05-401 WATER DISTRIBUTION REPLACEMENT PLAN
 - C-05-402 WATER DISTRIBUTION REPLACEMENT PLAN
 - C-05-403 WATER DISTRIBUTION REPLACEMENT PLAN
 - C-05-404 WATER DISTRIBUTION REPLACEMENT PLAN
 - C-05-405 WATER DISTRIBUTION FITTING TABLES
 - C-05-406 WATER SERVICE SEQUENCING PLAN
 - C-05-407 WATER DISTRIBUTION RESURFACING PLAN
 - C-05-408 WATER DISTRIBUTION REPLACEMENT DETAILS

- S-15-201. ADD notes to drawing as follows (0 sheets included):

4. MANDATORY VERTICAL CONSTRUCTION JOINTS SHALL BE PROVIDED IN THE EXTERIOR TANK WALL PER STANDARD DETAIL S-03-206, 10 EQ SPACED, FULL HEIGHT OF THE WALL.

5. LOCATION OF CONC WALL HORIZONTAL REINFORCEMENT LAP SPLICES SHALL BE STAGGERED BY NOT LESS THAN ONE LAP LENGTH OR 3'-0". SPLICES FOR EACH FACE OF WALL MAY OCCUR AT THE SAME LOCATION.

6. EACH CONCRETE WALL PLACEMENT SHALL NOT BE CAST UNTIL A MINIMUM OF SEVEN DAYS HAS PASSED BETWEEN ADJACENT PLACEMENTS.

- S-15-202. ADD notes to drawing as follows (0 sheets included):

1. THE ELEVATED SLAB AT EL 40.25 SHALL BE PLACED IN 22 EQUALLY SPACED, CIRCUMFERENTIAL PLACEMENTS WITH CONSTRUCTION JOINTS BETWEEN PLACEMENTS. RING REINFORCEMENT CROSSING THE CONSTRUCTION JOINTS SHALL BE REDUCED BY HALF.
2. THE LAUNDER WALL AND SLAB EACH SHALL BE PLACED IN 22 EQUALLY SPACED, CIRCUMFERENTIAL PLACEMENTS WITH CONSTRUCTION JOINTS BETWEEN PLACEMENTS.

Volume 2

- E-05-207, E-05-208, E-10-220, and E-13-202. REVISE sheet with ductbanks DB-E1008, DB-E1301, DB-C1003 and DB-C1301 shall have a spare conduit for JEA use. (4 sheets attached)

JEA is responding to the following questions as shown below:

1. Question:

Please advise if we are to remove any sludge from the existing clarifiers. If possible, please quantify and provide a unit rate-based allowance on the bid form.

Answer:

The Contractor will be responsible for sludge removal from the existing Primary Clarifiers #1 and #2 to a local landfill. It is estimated two truckloads of sludge, approximately 2% solids, will need to be removed from Primary Clarifiers #1 and #2. Include these costs as part of lump sum Item B5 on the Bid Form.

2. Question:

Has an asbestos survey been conducted for all the existing structures we are to demo.

Answer:

JEA is conducting an asbestos survey. The survey results will be provided when available. We do not anticipate any asbestos in the existing structures to be demolished.

3. Question:

Please provide as built drawings of all the structures we are demoing.

Answer:

Please see Appendix D in Technical Specification Volume 3 for partial record drawings containing the Aerated Grit Building, which is proposed for demolition. Additional, complete, drawing sets are included with this addendum to provide additional information on the structures to be demolished, as noted below:

- 1976
 - Screening structure and grit removal
 - Aerated Grit Building
- 1995
 - Primary Clarifiers 1 and 2
 - Splitter Box 1
 - Splitter Box 2
- 2002
 - Abandoned Odor Control 1
- 2022
 - Odor Control 2

4. Question:

Please confirm that a delayed NTP will be provided to the selected bidder. Per the pre-bid meeting, we will receive a PO from JEA that will allow procurement and submittal coordination and approvals with Hazen to commence. The NTP for construction will come at a later date mutually agreed upon between JEA and the Contractor.

Answer:

Confirmed.

5. Question:

Please consider simplifying the bid form. This is a substantial project, and the amount of bid items is not typical. The majority of the numbers on a hard bid project come together in the last hour so it will not be possible to provide an accurate breakdown that will be beneficial to JEA for construction use. We are able to turn in an accurate breakdown similar to the bid form within 48 hours after submission of the bid.

Answer:

Bid Form will not be simplified at this time.

6. Question:

The Engineer of Record indicated that they are still unsure of the location of all the existing lines on site. Will additional site utility exploration be performed prior to mobilization? We recommend that a SUE allowance is provided so additional locates can be performed between the award and NTP/mobilization to ensure that the project is not delayed due to unknown conflicts.

Answer:

Extensive SUE and survey have been performed for this project. See Appendices E and F for survey and SUE, respectively. No additional SUE will be performed by Engineer or JEA. Contractor may perform additional SUE during construction. A separate allowance will not be created. Contractor is advised to include SUE within general conditions on the Bid Form, Items A2 and B2.

7. Question:

Please indicate on the drawings what areas of the plant we can use for trailers, laydown and parking. We anticipate multiple trailers, parking for 60-80 cars, and enough lay down for all the large diameter pipe material and valves.

Answer:

Laydown area is indicated on Drawing C-05-011. Parking can be outside the WRF fence and can occur along Millco Rd, north of the Tempool property. Offsite laydown area should be considered if onsite laydown is not considered adequate.

8. Question:

Please confirm that we are to keep the plant loop road open at all times. This may require sheeting by the BNR extension.

Answer:

Plant loop road shall remain open with exceptions noted in C-05-200 Note 1 and C-05-210 MOT PLAN Note 1. Contractor is advised to include costs for sheeting, shoring, etc. in base bid costs.

9. Question:

Regarding specification section 40.05.57 Valve Operators and Electric Valve Actuators, please consider Auma Actuators as an acceptable manufacturer. Auma Actuators are fully compliant with the specification as written. Auma Actuators are accepted in JEA facilities including JEA District II WWTP, Blacks Ford WRF, Southwest WRF, and multiple pump stations.

Answer:

Limitorque is the only approved motor actuator on this project.