

CITY OF PALM BAY, FL

**LIFT STATION NO. 12 & 13 CONVERSION TO SUBMERSIBLE WET WELL
FINAL DESIGN AND PERMITTING**

**In accordance with City Master Contract #36-0-2020/JG
FEBRUARY 26, 2024
TASK ORDER NO. 24-04-IS**

SECTION I. BACKGROUND

The City of Palm Bay Utilities Department, hereinafter referred to as "City", desires to convert Lift Station Nos. 12 & 13 from a dry well to a wet well type configuration. The existing square wet well will be converted into a submersible lift station configuration in accordance with the City's staff direction.

Lift Station No. 12 located at 1461 Salem St NE currently has two dry pit type pumps rated at 250 gpm at 43 ft TDH, 15 HP motors. The existing square wet well will be converted into a submersible lift station configuration in accordance with the City's staff direction. The dry pit will be abandoned in place.

Lift Station No. 13 located at 1601 Riveria Dr NE currently has two dry pit type pumps rated at 250 gpm at 43 ft TDH, 15 HP motors. The existing wet well and dry well will be abandoned in place. A new circular wet well will be constructed to be used as a traditional submersible lift station. It is assumed the existing lift station site has sufficient space to accommodate the proposed circular wet well.

The City requested Infrastructure Solution Services (ISS), hereinafter referred to as "Consultant", to provide final engineering design services consisting of the preparation of Contract Documents to convert Lift Station Nos. 12 & 13 into submersible wet well lift stations.

The following are the details of the scope:

SECTION II. SCOPE OF WORK

Infrastructure Solution Services agrees to perform the following tasks:

TASK A: FINAL ENGINEERING SERVICES

- a) Perform engineering data collection of the the existing lift station site areas and points of connection. Field verify Record Drawings of the existing station.
- b) Review Lift Station No. 12 & 13 wastewater model representation, performance, and operation. Use wastewater model to verify pump design duty points.
- c) Prepare 60% design documents package including site plan, demolition plans, bypass pumping plan, preliminary submersible pump selections with calculations, electrical one-line diagram, opinion of probable cost, and a technical design memorandum. Submit a 60% design documents package to the City.
- d) Attend a 60% design review meeting with the City.
- e) Perform a specific purpose engineering survey of the proposed project locations to locate the approximate location of certain existing underground utilities using Sunshine 811 call out

services and Ground Penetrating Radar per American Society of Civil Engineering Standard 38-02, Quality Level B. Locations of utilities will be collected via aerial drone and/or GPS coordinates.

- f) Coordinate and perform geotechnical investigation.
- g) Prepare 90% design documents, including technical specifications, incorporating comments from the 60% design review.
- h) Attend a 90% design review meeting with the City.
- i) Submit final design drawings and specifications incorporating comments from the 90% design review.
- j) Submit an engineer's opinion of probable cost with the final design submittal.

TASK B: PERMITTING SERVICES

- a) Prepare FDEP Notification/ Application for Constructing a Domestic Wastewater Collection/ Transmission System with attachments/ exhibits, duly signed and sealed by the engineer-of-record. Submit to the City for signatures. The Consultant will submit permitting documentation to FDEP. Two FDEP submittals are anticipated.
- b) Address comments received as Request for Additional Information (RAI) from the permitting agencies. Response to one RAI is anticipated from each permitting jurisdiction and is included in this task order.

SECTION III: PROJECT REPRESENTATIVES

City of Palm Bay Utilities: Dan Perez, PE
321-952-3410
Daniel.Perez@palmbayflorida.org

Infrastructure Solution Services Clayton E. McCormack, PE
321-622-4646
cmccormack@infrastructures.com

SECTION IV: PERMITTING

The following permitting is included in this Task Order:

- 1) Wastewater Collection / Transmission System permit through FDEP

SECTION V: CITY'S RESPONSIBILITY

The following items are required from the CITY to complete the Task Order as mentioned above:

- a) Reasonable access to the site.
- b) Reasonable access to operations, maintenance, and engineering staff.
- c) Copies of available Record Drawings.
- d) Payment of permit fees.
- e) Available SCADA system information relative to pump run times if available.
- f) Lift Station No. 12 & 13 measured force main discharge pressures.
- g) Most recent pump drawdown test for each pump for Lift Station No. 12 & 13.
- h) Coordination with other City offices and federal and state regulatory agencies.
- i) Review of Final Engineering design documents.
- j) Coordination with FPL if a new power feed is required.

SECTION VI: CONSULTANT SERVICES SPECIFICALLY NOT INCLUDED

- a) Environmental services related to unknown threatened and endangered species, wetlands, or regulated solid wastes encountered on the site.
- b) Services related to the acquisition of real property, easements, or rights-of-way.
- c) Revisions to the City's wastewater collection system model.
- d) Bidding and Engineering during Construction Services.

SECTION VII: DELIVERABLES

The following results shall be delivered by the Consultant:

All deliverables shall be provided only in electronic PDF format unless otherwise noted.

Generally –

- a) Monthly activity reports.
- b) Meeting minutes from meetings and conferences with City staff and regulatory agencies.
- c) Timely invoices concurrent with the work.

Task A – Final Engineering Services

- a) Design drawings and technical specifications.
- b) Final design drawings in PDF and AutoCAD format with X-refs and plot styles.
- c) One hard copy and one half sized signed and sealed Final Design Drawings.
- d) Technical Specifications (as required) in PDF format.
- e) Engineer's Opinion of Probable Cost at 60% and final design.

Task B – Permitting Services

- a) FDEP Wastewater Collection / Transmission System General Permit application with supporting information.

SECTION VIII: SCHEDULE

Milestone	Calendar Days to Complete	Sum of Days from NTP
Mobilization	7	7
60% Design Package	75	82
City review of 60% Design Package	21	103
90% Design Package (Including permit applications)	30	133
City review of 90% Design Package	21	154
Permitting	14	168
Final Design Package (100% plans and technical specifications)	14	182

SECTION IX: BASIS OF COMPENSATION

The fee for the scope of work described in Section II shall not exceed a total of **\$129,200.00** and shall not exceed the amounts shown in the table below for each specific task. The subconsultant fee is estimated and shall be billed on a cost not to exceed basis. The City shall periodically compensate the Consultant a portion of the task fee based on mutually agreed-upon percentages of completion of each task.

TASK	DESCRIPTION	FEE
A	Final Engineering Services	\$118,320.00
B	Permitting Services	\$4,880.00
	Subconsultant Allowance	\$6,000.00
	TOTAL	\$129,200.00

At the direction of the City, ISS may be requested to provide additional services. These additional services will be billed at ISS standard rates.

SECTION X: ESTIMATED COST OF CONSTRUCTION

Based upon the design and construction services experience of Infrastructure Solution Services in Brevard County during the past several years, the estimated construction cost of the Lift Station No. 12 & 13 Conversion project being undertaken under this Task Order is approximately \$1,500,000.

SECTION XI: ACCEPTANCE

If the above scope and feed meet your approval, please indicate by your signature in the space provided below and return one signed copy, which will constitute an "Agreement and Notice to Proceed" for the accomplishment of this work.

INFRASTRUCTURE SOLUTION SERVICES, LLC.

CITY OF PALM BAY, FLORIDA



Brian M. Stahl, PE
Managing Member

George Barber, CPPO, CPPB
Chief Procurement Officer

02/26/24

Date

Date