# **INDIVIDUAL PROJECT ORDER NUMBER 16**

Describing a specific agreement between Kimley-Horn and Associates, Inc. (the "Engineer" or "Kimley-Horn"), and the City of Avon Park (the "City") in accordance with the terms of the Master Agreement for Engineering Services dated October 14th, 2019 which is incorporated herein by reference.

# Identification of Project:

Project: Avon Park's AC Water Main Replacement and Treatment Plant Improvements

Client: City of Avon Park, FL

Kimley-Horn Project Manager: Jamison Tondreault, PE

## **Project Understanding**

The City of Avon Park received a Department of Economic Opportunity (DEO) grant (B-18-DP-12-002) to replace a portion of AC water main, install/modify chlorine skid packages, and update two water treatment plants (Glenwood and Crystal Lake) to modify Control Panel and include VT Scada to better monitor and control the treatment plants. Kimley-Horn and team was selected through RFP process to work on the design, permitting, bid, and construction phase services for this project. GuardianCRM was selected to administer the grant, provide Davis Bacon compliance, and conduct environmental review/assessment. It is assumed that the project will be broken up into three smaller projects to help reduce construction fees and schedule. It is assumed that no wetlands or environmental species will be impacted within the public right of way. It is assumed no easements will be required. It is assumed that a Maintenance of Traffic Plan and NPDES permit for AC Water Main Replacement project will be required and provided by the Contractor.

The AC water main replacement project includes replacement of approximately 5,000 linear feet of 3-inch AC water main along N Pamelo Road, N Avocado Road, N Mulberry Road, and W Allamanda Blvd between Pomelo Avenue and Mulberry Road. It is assumed the proposed water main will be within the City or County right of way and no easements will be required. It is assumed the proposed water main will be 6-inch in diameter. It is assumed the existing 3-inch AC water main can be capped and abandoned in place or grouted in place.

The Control Panel and SCADA project includes replacement of Variable Frequency Drives (VFDs) and the Programming Logic Control (PLC) at Glenwood and installation of a PLC and replacement VFDs in an enclosure at Crystal Lake Water Treatment Plant. Improvements at the treatment plants also include eliminating data flow SCADA system and replacing with VT SCADA Software monitoring.

The Chlorine Skid Modifications project includes replacement of the Chlorine Skid System at Glenwood and Crystal Lake Water Treatment Plants. At Glenwood, it is assumed the City desires two new double walled storage chlorine tanks, new Chlorine Skid System, new Vega Radar Level Sensors, new Post injection, relocated pre injection, and new concrete pad and containment area. At Crystal Lake, it is assumed the City desires chlorine analyzer, new Chlorine Storage Tank, new Chlorine Pumps, Pre and Post Chlorine Injection, and a new Corrosion Inhibitor System.

The detailed scope of services for Kimley-Horn are described below.

## Specific Scope of Basic Services:

Task 1 – Site Visit, Data Collection, Survey, SUE, and Meetings

- A. Kimley-Horn will prepare for and attend one Kick Off Meeting with City Staff to discuss the project.
- B. Kimley-Horn will set up a virtual meeting with FDEP and Highlands County to discuss the project and permit requirements.
- C. Kimley-Horn will call 811 to create a design ticket and notify utilities of the project and request utility drawings and record information for aid in the design of the proposed mains.

- D. Kimley-Horn will subcontract with a Florida professional surveyor to provide a topographic survey for the AC water main replacement project. In addition, they will provide utility designates along the proposed water main route. Survey area does not include the water treatment plant.
- E. Kimley-Horn will review existing utility information, existing plans, survey, SUE and perform up to two site visits.
- F. Kimley-Horn will attend up to ten (10) virtual grant progress meetings with DEO and the City (Assumed 30 minutes per meeting).

## Task 2 - Control Panel and SCADA Modifications - Design Phase

- A. Kimley-Horn will contract with an electrical engineer to:
  - 1. Visit the project site and take measurements and pictures of the existing PLC and control panel.
  - 2. Develop drawings for the modifications required to the Water Treatment Plant control panel and SCADA system (Glenwood and Crystal Lake)
  - 3. Develop specifications for the modifications required to the Water Treatment Plant control panel.
  - It is assumed that only 90% and 100% submittals will be required for this project due to the size.

## Task 3 – Chlorine System Improvements – Design Phase

## A. Kimley-Horn will:

- Develop construction drawings for the Chlorine System improvements at Glenwood Water Treatment Plant and Crystal Lake Water Treatment Plant.
  - i. The drawings will consist of cover sheet, general notes, aerial site plan (each plant), simple layout of Chlorine System improvements (each plant), utility details, and structural details of concrete pad and containment area.
- 2. Develop specifications to be included within the plans for the Chlorine System improvements.
- 3. Develop opinion of probable construction costs.
- 4. It is assumed that this project will submit 60% and 90% drawings and opinion of probable construction costs.

## Task 4 - AC Water Main Replacement - Design Phase

Based on the survey, SUE, and project location, Kimley-Horn will begin preparing engineering design plans, prepared to the level of detail required by the permitting agencies, of the proposed water main improvements. Specifications will be per the City and County standards and details.

These plans will consist of the following:

- A. Cover Sheet
- B. General Notes
- C. Overall Project Key Sheet
- D. Plan and Profile Sheets (1'=20' horizontal) and (1=2' vertical) on 22"x34" Plans
- E. Utility Details
- F. Erosion and Control Details

Kimley-Horn will present the plans, technical specifications and Opinion of Probable Costs to the City Utility Department for review at 30%, 60%, and 90% completion. Kimley-Horn will attend up to one (1) review meeting per submittal and address up to one (1) round of comments. Submittals will be electronic in PDF format.

## Task 5- Permitting

Kimley-Horn will prepare permit application packages to the following agencies:

- A. City of Avon Park
- B. Florida Department of Environmental Protection (FDEP)/ Department of Health Drinking Water Permit (AC Water Main Project Only)
- C. Highlands County Right of Way Permit (AC Water Main Project Only)
- D. FDEP Water Treatment Plant Improvements (If required)
- E. FDEP ERP General Permit (If required)

Kimley-Horn will coordinate with the agencies listed above, with regards to the application submittal packages and will respond up to two (2) rounds of comments that are reasonable and relevant to the current City, County, FDEP, and DOH rules. Additional responses beyond those outlined above may be considered Additional Services.

## Task 6 - Bidding and Award

- A. Kimley-Horn will prepare three bid packages consisting of plans and specifications to be included in the City's bid packages.
- B. The City will prepare and advertise the Bid Notification. Kimley-Horn will provide the technical information required for the notification language.
- C. Kimley-Horn will attend three pre-bid meetings with prospective bidders.
- D. Kimley-Horn will administer distribution of the bid packages and maintain a log of the issued bid packages.
- E. Kimley-Horn will respond to Requests for Information (RFIs) and prepare bid addendums as necessary during the bid process.
- F. Kimley-Horn will review the bid responses and tabulate the results. Kimley-Horn will provide the City with a written bid tabulation record along with a selection recommendation.

## Task 7 - Construction Phase Services

## **Pre-Construction Meeting**

Kimley-Horn will attend one on-site Pre-Construction Conference for each project (Assume 3 projects) with the Construction Manager and City representatives prior to commencement of work at the site.

#### Visits to Site and Observation of Construction

Kimley-Horn will provide on-site construction observation services during the construction phase. Kimley-Horn will make as requested by the Client and/or visits at intervals appropriate in order to observe the progress of the Work. Site visits to observe construction of site improvements related to the certification of completion for applicable agencies are as listed below:

• Up to Four (4) site visits at three (3) hours per visit to observe construction of the Water Main and Treatment Plant Improvements including connection to existing pipes;

- Up to Three (3) site visits for four (4) hours to observe a pressure test;
- Attend one (1) punch list evaluation meeting for three (3) hours for each project;

Such visits and observations by Kimley-Horn are not intended to be exhaustive or to extend to every aspect of Contractor's work in progress. Observations are to be limited to spot checking, selective measurement, and similar methods of general observation of the Work based on Kimley-Horn's exercise of professional judgment. Based on information obtained during such visits and such observations, Kimley-Horn will evaluate whether Contractor's work is generally proceeding in accordance with the Contract Documents, and Kimley-Horn will keep Client informed of the general progress of the Work by writing a brief description of the site visit and forwarding it, along with photographs, if applicable, to the Client.

The purpose of Kimley-Horn's site visits will be to enable Kimley-Horn to better carry out the duties and responsibilities specifically assigned in this Agreement to Kimley-Horn, and to provide Client a greater degree of confidence that the completed Work will conform in general to the Contract Documents. Kimley-Horn shall not, during such visits or as a result of such observations of Contractor's work in progress, supervise, direct, or have control over Contractor's work, nor shall Kimley-Horn have authority over or responsibility for the means, methods, techniques, equipment choice and usage, sequences, schedules, or procedures of construction selected by Contractor, for safety precautions and programs incident to Contractor's work, nor for any failure of Contractor to comply with laws and regulations applicable to Contractor's furnishing and performing the Work. Kimley-Horn shall not have the authority to stop the Contractor's work. Accordingly, Kimley-Horn neither guarantees the performance of any Contractor nor assumes responsibility for any Contractor's failure to furnish and perform its work in accordance with the Contract Documents.

### **Construction Administration**

Kimley-Horn and subconsultants will respond to reasonable and appropriate Contractor requests for information, as provided to Kimley-Horn by Client, and issue clarifications and interpretations of the Contract Documents to Client as appropriate to the orderly completion of Contractor's work. Any change orders authorizing variations from the Contract Documents will be made by Client.

Kimley-Horn will provide a certification and closeout checklist associated with the specific permits applicable to the Kimley-Horn's scope of services.

### **Shop Drawings**

Kimley-Horn and subconsultants will review one (1) round of Shop Drawings and approve or take other appropriate action with respect to sewer Shop Drawings and other data which Contractor is required by agencies to submit, but only for conformance with the information given in the Contract Documents. Such review and approvals, or other action, will not extend to means, methods, techniques, equipment choice and usage, sequences, schedules, or procedures of construction, or to related safety precautions and programs and does not constitute substitution of design changes or replacement of City or County standard details.

#### **Substantial Completion & Certification**

Kimley-Horn will, promptly after notice from Kimley-Horn that it considers the entire Work ready for its intended use, in company with Client, conduct one (1) site visit to determine if the Work is substantially complete for each project. Work will be considered substantially complete following satisfactory completion of all items with the exception of those identified on a final punch list. If after considering any objections of Client, Kimley-Horn considers the Work substantially complete; Kimley-Horn will provide written notification of substantial completion to Client.

Kimley-Horn will review two (2) rounds of "as-built" drawings as prepared by a surveyor registered in the State of Florida, project observation notes and photos, and test reports. It is assumed the "as-built" drawings are prepared by the Client's surveyor.

Based on these reviews, Kimley-Horn will prepare final certification and requests for release to place utility systems into service to the following agencies:

- Florida Department of Environmental Protection (FDEP)
- Department of Health (DOH)
- City of Avon Park
- Highlands County

Kimley-Horn shall not be required to execute any certifications or other documents that might, in the judgment of the Kimley-Horn, violate professional standards, increase the Consultant's risk or affect the availability or cost of its insurance.

Kimley-Horn shall have no responsibility for any contractor's means, methods, techniques, equipment choice and usage, sequence, schedule, safety programs, or safety practices, nor shall Kimley-Horn have any authority or responsibility to stop or direct the work of any contractor. The Kimley-Horn's visits will be for the purpose of endeavoring to provide the Owner a greater degree of confidence that the completed work of its contractors will generally conform to the construction documents prepared by the Kimley-Horn. Kimley-Horn neither guarantees the performance of contractors, nor assumes responsibility for any contractor's failure to perform its work in accordance with contract documents.

#### Additional Services

If requested by the Client, any services not specifically provided for in the above scope will be considered additional services and will be performed at our then current hourly rates upon receiving written authorization from the Client. Additional Services may include:

- Survey at Treatment Plants
- Design, Survey, SUE, and Geotech for design of 12-inch bore under US HWY 27
- Geotechnical Investigation/Report
- Sizing of water main and flow calculations
- Maintenance of Traffic Plans
- Davis Bacon Compliance (Review Payrolls and Performing Interviews)
- Environmental Permitting and Studies
- Meeting beyond those identified in the Scope of Services
- Additional plans beyond those identified in the Scope of Services
- Sketch and Legal for Easement

## Schedule

Kimley-Horn will provide the services described in the scope of services in an expeditious manner based upon a mutually agreed upon schedule.

## **Method of Compensation**

Kimley-Horn will complete the services in Tasks 1-6 of the Scope of Services for a lump sum fee of \$146,000 inclusive of expenses. Kimley-Horn will perform the services described in Task 7 for a labor fee plus expense basis not to exceed \$30,000. Labor fee will be billed according to the rate schedule in the master agreement. A breakdown of fee by task is shown below.

Description	Lump Sum Fee
Task 1 – Site Visit, Data Collection, Survey, SUE, and Meetings	\$ 40,500
Task 2 – Control Panel and SCADA Modifications – Design Phase	\$ 13,000
Task 3 – Chlorine System Improvements – Design Phase	\$ 23,000
Task 4 – AC Water Main Replacement – Design Phase	\$ 45,000
Task 5 – <u>Permitting</u>	\$ 9,500
Task 6 – <u>Bidding and Award</u>	\$ 15,000
Design, Permitting, and Bid Total	\$146,000
Task 7 – Construction Phase Services (Hourly Not to Exceed)	\$ 30,000
Project Total	\$176,000

ACCEPTED BY:	
THE CITY OF AVON PARK	KIMLEY-HORN AND ASSOCIATES, INC.
BY:	BY:
	Mark E. Wilson, PE
TITLE:	TITLE: Senior Vice President
DATE:	DATE: <u>January 26, 2023</u>