

# Memorandum



Date: November 19, 2015  
To: Tara C. Smith, Director  
Internal Services Department

From: Lester Sola, Director  
Miami-Dade Water and Sewer Department

Subject: Review Item: Engineering Design and Related Services for the Improvement, Renewal and Replacement of the Hialeah and John E. Preston Water Treatment Plants, and Associated Water Distribution System, Pipelines, Wellfields, Re-Pumping Facilities, Remote Storage and its Appurtenant Water Facilities – Project No. E15-WASD-18

The Miami-Dade Water and Sewer Department (WASD) is requesting that the subject project be reviewed for Small Business Enterprises (SBE) measures for Architectural and Engineering (A/E) and Goods and Services (G/S), in order to proceed with the advertisement and subsequent consultant selection for this project.

WASD intends to retain one (1) qualified firm under one (1) Non-Exclusive Professional Services Agreement (PSA) for this project. The term for this PSA is for an eight (8) year period. Maximum compensation is \$10,000,000, plus a ten percent (10%) contingency allowance in accordance with Ordinance 00-65. No minimum amount of work or compensation will be assured to the retained Consultant.

The Consultant providing engineering services must be certified in the following technical categories and the respective percentages of the disciplines as indicated below:

Technical Category (TC)	Description	TC Percentage	SBE %
6.03 Prime	Water and Sanitary Sewer Systems – Water and Sanitary Sewage Treatment Plants	20%	
11.00 Prime	General Structural Engineering	12%	2%
12.00 Prime	General Mechanical Engineering	15%	2%
13.00 Prime	General Electrical Engineering	15%	2%
16.00 Prime	General Civil Engineering	10%	2%
17.00 Prime	Engineering Construction Management	14%	2%
6.01 Other	Water and Sanitary Sewer Systems – Water Distribution and Sanitary Sewage Collection and Transmission	4%	2%
6.02 Other	Water and Sanitary Sewer Systems – Water and Sanitary Sewage Pumping Facilities	4%	2%
9.02 Other	Soils, Foundations and Materials Testing – Geotechnical and Materials Engineering Services	1%	1%

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10.09 Other	Environmental Engineering – Wellfield, Groundwater and Surface Water Protection and Management	3%	3%
15.01 Other	Survey and Mapping – Land Surveying	2%	2%
<b>Total</b>		<b>100%</b>	<b>20%</b>

Attached are WASD's Departmental Input Worksheet and the Notice to Professional Consultants for your review and approval. Should you have any questions, please contact Patty Palomo, Chief, Intergovernmental Affairs Section at [pattyd@miamidade.gov](mailto:pattyd@miamidade.gov) or (786) 552-8040.

#### Attachments

c: Gary Hartfield, Assistant Director, Small Business Development

**MIAMI-DADE COUNTY, FLORIDA  
NOTICE TO PROFESSIONAL CONSULTANTS  
MIAMI-DADE WATER AND SEWER DEPARTMENT  
ENGINEERING DESIGN AND RELATED SERVICES FOR THE IMPROVEMENT, RENEWAL  
AND REPLACEMENT OF THE HIALEAH AND JOHN E. PRESTON WATER TREATMENT  
PLANTS, AND ASSOCIATED WATER DISTRIBUTION SYSTEM, PIPELINES, WELLFIELDS,  
RE-PUMPING FACILITIES, REMOTE STORAGE AND  
APPURTENANT WATER FACILITIES  
PROJECT NO. E15-WASD-18**

The County Mayor, Miami-Dade County, pursuant to the Miami-Dade Water and Sewer Department (WASD) Consent Decree and Capital Improvement Programs Acceleration Ordinance Section 2-8.2.12 of the County Code, Chapter 287.055, Florida Statutes, and Administrative Order 3-39, announces that WASD will require professional engineering and construction management services from one (1) qualified Consultant to provide comprehensive engineering services to evaluate, rehabilitate and upgrade the infrastructure and operations of WASD's Hialeah and John E. Preston Water Treatment Plants and its appurtenant facilities related to capital improvement needs identified in the Multi-year Capital Improvement Plan.

The water treatment plant projects noted below will be procured concurrently, and the Prime Consultant may submit proposals for both projects which shall be evaluated as set forth below. These projects are:

1. Project No. E15-WASD-18  
Proposed Upgrades to the Hialeah and John E. Preston Water Treatment Plants and its appurtenant facilities.
2. Project No. E15-WASD-19  
Proposed Upgrades to the Alexander Orr Water Treatment Plant, inclusive of the South Miami-Dade Water Supply System, which includes the following plants: Leisure City, Naranja, Elevated Water Tank, Everglades Labor Camp, and Newton Water Treatment Plants; and ancillary facilities to those plants; as well as well fields, re-pumping facilities, remote storage and its appurtenant facilities.

The scope of services consists of complete professional engineering and construction management services, which will include such tasks as design services for plant upgrades and expansion projects, as well as renewal and replacement projects for the plant's existing facilities and associated water distribution. Renewal and replacement services include evaluation of existing equipment condition, capacity and useful life expectancy, as well as preparation of a prioritized rehabilitation or replacement schedule.

Design services may include, but are not limited to, performing preliminary site investigations, surveying, hydraulic modeling and analysis, coordinating with other utilities, preparing design reports, preparing shop drawings, preparation of design criteria packages, and contract specifications for civil, hydro-geological services, structural, mechanical and electrical projects. Services during the permitting and procurement phases may include, obtaining dry-run permits, producing a final design and participating in obtaining final environmental and building permits. Construction management services are required to provide technical support during construction as needed, including site inspections and attending meetings, reviewing shop drawings, processing payment requisitions, responding to information requests, reviewing claims and potential change orders, reviewing contract schedules and schedule of values and

reviewing as-built drawings. Project coordination services are anticipated to include establishing a plan to implement projects, establishing and tracking project schedules, preparing budgets and deadlines, preparing status reports and attending meetings as requested.

Additional tasks are anticipated to include:

1. Evaluating and formulating plans for improving or optimizing the treatment processes including designing and conducting pilot studies and providing construction cost and operation and maintenance estimates.
2. Conducting studies and providing recommendations related to improving plant operations and efficiency including safety, staffing, energy conservation, security, residuals management, corrosion control and asset management issues. This includes site-specific staff training, preparation of operation and maintenance manuals and operational practices manuals. The site shall also include an on-site resident at the Plants.
3. Providing services for evaluating regulatory requirements including preparation of compliance documents and reports.
4. Providing technical support and assistance for computer system data integration with the programs and systems currently utilized. Provide assistance in selecting and procuring software and hardware enhancements.
5. Providing other engineering services related to the upgrades at the water treatment plants as required, including participation on a Technical Advisory Committee.

#### Experience and Qualifications

A Prime Consultant submitting a proposal should be a full service engineering firm experienced in the design, permitting and construction management of large regional water treatment plant. The Prime Consultant should also have experience with condition assessments and incorporating operational knowledge into treatment plant design. The successful experience on the above items should be demonstrated prior to the date of this solicitation. The Prime Consultant shall provide a list of members of the proposed design team, identifying the overall design manager(s), and the team leaders for key design specialties.

The Prime Consultant shall provide descriptions of at least one (1) successfully designed, constructed and operating new or upgraded water treatment plant(s), with at least one (1) being a lime softening plant, prior to the date of the solicitation. In addition, the Prime Consultant shall demonstrate past experience with other water softening technologies, such as Media Filter.

For projects which the Prime Consultant has served as the design consultant, the Prime Consultant shall provide the name and contact information for a Utility Executive with the Utility they served as the design consultant who can confirm their role. The descriptions shall include the client (i.e., municipality or agency), key project staff, the project name, a summary of the work performed, the contract amount, the schedule (to include start and completion dates), the specific role of the Prime Consultant, the achievements (e.g., projects delivered on schedule, dollars saved, innovative designs implemented, new technology utilized) and a client reference and contact information.

The Subconsultants shall provide a description of at least one (1) project(s) that is relevant to this scope of work completed prior to the date of this solicitation specific to their proposed responsibilities. The descriptions shall include the client (i.e., municipality or agency), key project staff, a summary of the work performed, the contract amount, the schedule (to include start and completion dates) the specific role of the Subconsultant firm, the project's

achievements and client reference and contact information. Failure to provide the above information or meet the experience and qualifications required by Miami-Dade County may result in the negative evaluation of the team by the Competitive Selection Committee, or disqualification of the team, at Miami-Dade County's sole discretion.

**A/E TECHNICAL CERTIFICATION REQUIREMENTS**  
**Prime**

- 6.03 Water and Sanitary Sewer Systems – Water and Sanitary Sewage Treatment Plants
- 11.00 General Structural Engineering
- 12.00 General Mechanical Engineering
- 13.00 General Electrical Engineering
- 16.00 General Civil Engineering
- 17.00 Engineering Construction Management

**Prime and/or Subconsultants**

- 6.01 Water and Sanitary Sewer Systems – Water Distribution and Sanitary Sewage Collection and Transmission
- 6.02 Water and Sanitary Sewer Systems – Major Water and Sanitary Sewage Pumping Facilities
- 9.02 Soils, Foundations and Materials Testing – Geotechnical and Materials Engineering Services
- 10.09 Environmental Engineering – Wellfield, Ground Water and Surface Water Protection and Management
- 15.01 Surveying and Mapping – Land Surveying

**BREAKDOWN LIST**

Technical Category (TC)	Description	Percentage (%)	TC SBE %
6.03 Prime	Water and Sanitary Sewer Systems – Water and Sanitary Sewage Treatment Plants	20%	
11.00 Prime	General Structural Engineering	12%	2%
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6.01 Other	Water and Sanitary Sewer Systems – Water Distribution and Sanitary Sewage Collection and Transmission	4%	2%
6.02 Other	Water and Sanitary Sewer Systems – Major Water and Sanitary Sewage Pumping Facilities	4%	2%
9.02	Soils, Foundations and Materials Testing – Geotechnical	1%	1%

Other	and Materials Engineering Services		
10.09 Other	Environmental Engineering – Wellfield, Ground Water and Surface Water Protection and Management	3%	3%
15.01 Other	Survey and Mapping – Land Surveying	2%	2%
	<b>TOTAL</b>	<b>100%</b>	<b>20%</b>

WASD intends to retain one (1) qualified firm under one (1) Non-Exclusive Professional Services Agreement (PSA) for this project. The proposals received for this project will be reviewed and ranked by the Competitive Selection Committee (CSC) members along with the other project listed above. The CSC shall report to the County Mayor or Mayor's designee the recommended ranking of the firms. In the event that the same Prime Consultant is the highest ranked firm on more than one of the two (2) projects noted above, the County Mayor or Mayor's designee shall determine the final ranking of the firms for the two (2) projects based on the CSC recommendation and the firm's capacity to perform the required services.

The term for this PSA is for an eight (8) year period. Maximum compensation is \$10,000,000, plus a ten percent (10%) contingency allowance in accordance with Ordinance 00-65. No minimum amount of work or compensation will be assured to the retained Consultant. The County reserves the right to re-use the work products of the retained Consultant and to retain other Consultants to provide the same or similar services at its sole discretion.

**DEPARTMENTAL INPUT  
CONTRACT/PROJECT MEASURE ANALYSIS AND RECOMMENDATION**

**Contract/Project Title:** Engineering Design and Related Services for the Improvement, Renewal and Replacement of the Hialeah and John E. Preston Water Treatment Plants, and Associated Water Distribution System, Pipelines, Wellfields, Re-Pumping Facilities, Remote Storage and its Appurtenant Water Facilities

**Contract/Project No.** E15-WASD-18

**Description:** Engineering Design and Related Services for the Improvement, Renewal and Replacement of the Hialeah and John E. Preston Water Treatment Plants, and Associated Water Distribution System, Pipelines, Wellfields, Re-Pumping Facilities, Remote Storage and its Appurtenant Water Facilities

**DEPARTMENT:** Miami-Dade Water and Sewer Department (WASD)      **CONTACT:** Patty Palomo  
**PHONE:** (786) 552-8040

**Estimated Cost:** One (1) contract at \$10,000,000, plus a 10% contingency allowance in accordance with Ordinance 00-65.

**Funding Sources:** Future WASD Revenue Bonds, WASD Revenue Bonds Sold, Water Renewal and Replacement Fund; WASD Revenue Bonds, Rock Mining Mitigation Fees, and Water Construction Fund

**ANALYSIS**

Commodity/Service No. \_\_\_\_\_ SIC: \_\_\_\_\_  
Trade/Commodity/Service Opportunities \_\_\_\_\_

**Contract/Project History of Previous Purchases for Previous Three (3) Years**  
**Check Here if this is a New Contract/Purchase with no Previous History**

	<u>Existing</u>	<u>2<sup>nd</sup> Year</u>	<u>1<sup>st</sup> Year</u>
Contractor _____	_____	_____	_____
Ethnicity/Race _____	_____	_____	_____
Gender _____	_____	_____	_____
Contract Value _____	_____	_____	_____

COMMENTS: \_\_\_\_\_

**RECOMMENDATIONS**

<u>SBE GOAL</u> 20 %	<u>BID PREFERENCE</u>	<u>NO MEASURE</u>
	<u>Analysis for Goal Recommendation</u>	
<u>Sub-Trade</u>	<u>Est. Cost</u> \$ _____	<u>% of Item to Base Bid</u> _____
	\$ _____	_____
	\$ _____	_____
	\$ _____	_____
	Total: \$ _____	_____
		<u>Availability</u> _____

**Basis for Recommendation:** WASD proposes that the goal of 20% can be achieved with SBE Firms assisting with 6.01-2%; 6.02-2%; 9.02-1%; 10.09-3%; 11.00-2%; 12.00-2%; 13.00-2%; 15.01-2%; 16.00-2%; and 17.00-2%.

By: Lester Sola, Director      Date: 11/19/15      Internal Services Department      Date: \_\_\_\_\_