

# Memorandum



Date: March 25, 2014

To: Lester Sola, Director  
Internal Services Department

From: John W. Renfrow, P.E., Director  
Miami-Dade Water and Sewer Department

Subject: Review Item: Professional Engineering and Geological Services for Water, Wastewater and Reclaimed Water Planning Services - Project No. E14-WASD-01

The Miami-Dade Water and Sewer Department (WASD) is requesting that the subject project be reviewed for Community Business Enterprise (CBE) measures, in order to proceed with the advertisement and subsequent consultant selection for this project.

WASD is seeking professional engineering and geological services from a qualified consultant in the areas of water, wastewater and reclaimed water for WASD's Planning Division. The term of the non-exclusive Professional Services Agreement (PSA) is three (3) years with a two (2) year option-to-renew. Maximum compensation is five million (\$5,000,000.00) for the term of the PSA, plus contingency in accordance with Ordinance 00-65. No minimum amount of work or compensation will be assured to the retained consultant.

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

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

- 6.01 Water Distribution and Sanitary Sewage Collection and Transmission Systems
- 6.02 Major Water and Sanitary Sewage Pumping Facilities
- 6.03 Water and Sanitary Sewage Treatment Plants

### **Prime and/or Subconsultants**

- 10.02 Geology Services
- 10.09 Wellfield, Groundwater and Surface Water Protection and Management

### **Breakdown**

Technical Categories	Description	Percentage	
		Category	CBE %
6.01 PRIME	Water Distribution and Sanitary Sewage Collection and Transmission Systems	30	10
6.02 PRIME	Major Water and Sanitary Sewage Pumping Facilities	25	8
6.03 PRIME	Water and Sanitary Sewage Treatment Facilities	20	4
10.02	Geology Services	15	2
10.09	Wellfield, Groundwater and Surface Water Protection and Management	10	1
	Totals	100%	25%

### Minimum Experience and Qualifications

1. Completion of at least two (2) water and two (2) wastewater master plans for utilities with total projected average flow of over ten (10) million gallons per day (mgd) within the last seven (7) years.
2. Completion of the development of reclaimed water system master plans of over 250,000 gallons per day (gpd) in the last five (5) years.
3. Experience with Innovyse Infoworks CS wastewater hydraulic modeling software with a minimum of fifty (50) pump stations, one thousand (1,000) pressure links, three thousand (3,000) gravity links, and Innovyse Infowater software with fifty thousand (50,000) links minimum. Experience is defined for hydraulic models described as original model construction, model calibration and/or operation of model for the analysis of networks associated master plans for at least two (2) water and two (2) wastewater models of the sizes indicated.
4. Experience with groundwater numerical modeling including MODFLOW and pre- and post-MODFLOW processors; experience with supervision and geological evaluations of drilling water supply production wells, monitoring wells, and deep injection wells; water quality sampling and analysis.

WASD is recommending a twenty five percent (25%) CBE goal participation for this PSA. Attached is WASD's Departmental Input Worksheet and the Notice to Professional Consultants for your review and approval. Should you have any questions, please contact Patty David, Chief, Intergovernmental Affairs Section at [pattyd@miamidade.gov](mailto:pattyd@miamidade.gov) or (786) 552-8040.

Attachments

**MIAMI-DADE COUNTY  
NOTICE TO PROFESSIONAL CONSULTANTS  
MIAMI-DADE WATER AND SEWER DEPARTMENT  
ENGINEERING AND GEOLOGICAL SERVICES  
WATER, WASTEWATER AND RECLAIMED WATER  
PLANNING SERVICES  
PROJECT NO. E14-WASD-01**

The County Mayor, Miami-Dade County, pursuant to Chapter 287.055, Florida Statutes, Sections 2-8.1 and 2-10.4 of the Miami-Dade County Code, Implementing Order 3-34, and Administrative Order 3-39, announces that the Miami-Dade Water and Sewer Department (WASD) will require one (1) qualified consultant to provide engineering and geological services in the areas of water, wastewater and reclaimed water for the WASD Planning Division.

Planning services are anticipated to include, but are not be limited to, development of water and wastewater flow projections; hydraulic modeling of the water transmission/distribution and wastewater collection/transmission system including model updates with new facilities, flow projections, calibration and the development and analysis of alternatives for proposed piping/pump station facilities necessary for future conditions including the review of present operations and identification of facilities for improvements, including energy reductions; establishment of water quality objectives for the distribution system; reclaimed water master planning; preparation of master plan documents; master plan financial analysis, assisting WASD staff in responding to regulatory agency Request for Information; preparation of Basis of Design Reports for facilities identified in master plans and other WASD projects; conducting evaluations to ensure that adequate capacity exists for new development projects and the determination of design conditions for new facilities; assistance in interfacing with the developer community regarding areas with high development activity; operational studies; hydrogeological evaluations including groundwater and the identification of future water supplies; supervision and geological evaluations of drilling water supply production, monitoring, reclaimed water and deep injection wells; water quality sampling and analysis; treatment process identification and evaluation as it relates to master planning and process optimization; cost estimating including life cycle costs (operation, maintenance, replacement) and scheduling; assistance in the implementation and managing of WASD Water Supply Certification program including calculating and tracking the required water for development activities to ensure that adequate water is available and that the total system allocation in WASD twenty (20) year permit is not exceeded; assistance in the management of Planning functions which are part of WASD Project Control and Tracking System using Proliance software, and assistance with Comprehensive Planning reviews for Comprehensive Development Master Plan, Development Impact Committees, Water Supply Plans, Florida Department of Transportation and Comprehensive Plan Amendments; and assistance in updating flows in Chapter 24 of the Miami-Dade County Code.

WASD intends to retain one (1) qualified Consultant under a non-exclusive Professional Services Agreement with a three (3) year term with a two (2) year option-to-renew at the County's sole discretion will be awarded under this solicitation. Maximum compensation for the five (5) year term is five million (\$5,000,000.00), plus contingency in accordance with Ordinance 00-65. No minimum amount of work or compensation will be assured to the retained consultant(s). 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. The consultant coordinator for this project is \_\_\_\_\_ who may be contacted via e-mail at \_\_\_\_\_ or fax at \_\_\_\_\_ with copy to the Clerk of the Board.

## TECHNICAL CERTIFICATION REQUIREMENTS

### Prime

- 6.01 Water Distribution and Sanitary Sewage Collection and Transmission Systems
- 6.02 Major Water and Sanitary Sewage Pumping Facilities
- 6.03 Water and Sanitary Sewage Treatment Plants

### Prime and/or Subconsultants

- 10.02 Geology Services
- 10.09 Wellfield, Groundwater and Surface Water Protection and Management

### Breakdown List

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10.02	Geology Services	15	2
10.09	Wellfield, Groundwater and Surface Water Protection and Management	10	1
Totals		100%	25%

### **Minimum Experience and Qualifications**

The Prime Consultant must demonstrate completion of at least two (2) water and two (2) wastewater master plans for utilities with total projected average flow of over ten (10) million gallons per day (mgd) within the last ten (10) years from the date of this solicitation.

The Prime Consultant must also demonstrate completion of the development of a reclaimed water system master plans of over two-hundred thousand fifty thousand (250,000) gpd in the last ten (10) years from the date of this solicitation.

The Prime Consultant is requested to demonstrate experience with Innovyse Infoworks CS wastewater hydraulic modeling software with a minimum of fifty (50) pump stations, one thousand (1,000) pressure links, three thousand (3,000) gravity links, and Innovyse Infowater software with fifty thousand (50,000) links minimum. Experience is defined for hydraulic models described as original model construction, model calibration and/or operation of model for the analysis of networks associated master plans for at least two (2) water and two (2) wastewater models of the sizes indicated.

**Failure to demonstrate requested experience may result in the Competitive Selection Committee not considering the proposal.**

### **Prime and/or Subconsultants**

The Prime and/or Subconsultant is requested to demonstrate experience with groundwater numerical modeling including MODFLOW and pre- and post-MODFLOW processors; experience with supervision and geological evaluations of drilling water supply production wells, monitoring wells, and deep injection wells; water quality sampling and analysis.

**Failure to demonstrate requested experience may result in the Competitive Selection Committee not considering the proposal.**

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

**Contract/Project Title:** Engineering and Geological Services for Water, Wastewater and Reclaimed Water Planning Services for the Miami-Dade Water & Sewer Department's Planning Division

**Contract/Project No.** E14-WASD-01

**Description:** Engineering and Geological Services for Water, Wastewater and Reclaimed Water for the Miami-Dade Water & Sewer Department's Planning Division

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

**Estimated Cost:** Five million dollars (\$5,500,000.00) including 10% contingency allowance.

**Funding Sources:** Operating Revenues

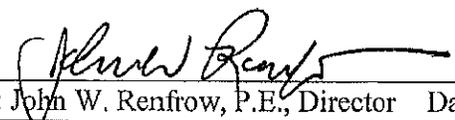
**ANALYSIS**

Commodity/Service No. _____	SIC: _____	<u>Trade/Commodity/Service Opportunities</u>	
<b>Contract/Project History of Previous Purchases for Previous Three (3) Years</b>			
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>CBE GOAL</u> 25 %	<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>	<u>Availability</u>
_____	\$ _____	_____	_____
_____	\$ _____	_____	_____
_____	\$ _____	_____	_____
Total:	\$ _____	_____	_____

**Basis for Recommendation:** WASD proposes that the goal can be achieved with CBE firms assisting with 6.01 – 10%, 6.02 – 8%, 6.03 – 4%, 10.02 – 2%, 10.09 – 1%

By:       Date: \_\_\_\_\_  
Internal Services Department      Date: \_\_\_\_\_