# PALM BEACH COUNTY BOARD OF COUNTY COMMISSIONERS AGENDA ITEM SUMMARY

**Meeting Date:** 

August 18, 2015

Consent [X]

Public Hearing [ ]

Regular [ ]

**Department:** 

**Water Utilities Department** 

### I. EXECUTIVE BRIEF

**Motion and Title: Staff recommends motion to approve:** Consultant Services Authorization (CSA) No. 7 for the GL09 Glades Infiltration and Inflow Projects Phase I with Hazen and Sawyer, P.C. in the amount of \$180,800.

**Summary:** On June 3, 2014, the Board of County Commissioners approved the Water Utilities Department (WUD) Engineering/Professional Services Contract with Hazen and Sawyer, P.C. (R2014-0821). CSA No. 7 provides for services relating to the manhole inspections and smoke testing of sewer main lines for the Sanitary Sewer Evaluation Survey (SSES) in the cities of Belle Glade, Pahokee and South Bay. The Small Business Enterprise (SBE) participation goal established by the SBE Ordinance (R2002-0064) is 15% overall. The contract with Hazen and Sawyer, P.C. provides for SBE participation of 22%. CSA No. 7 includes 37.66% overall participation. The cumulative SBE participation is 36.95% overall. Hazen and Sawyer, P.C. is a local Palm Beach County Company. (WUD Project No. 15-024) <u>District 6</u> (MRE)

Background and Justification: The WUD operates and maintains sewer collection system service in the cities of Belle Glade, Pahokee and South Bay. The existing collection system in this area shows signs of infiltration and inflow (I&I). This I&I is evident due to the increase in flow in the sewer collection system during rain events and times of high water tables, and results in decreased system capacity and higher treatment costs. The scope of the project is to complete the first phase of a SSES by performing an inspection and assessment of the manholes, and smoke testing of gravity sewer networks in areas with the greatest I&I to identify breaks in the collection system. Subsequent phases of the SSES will involve a thorough inspection of the gravity sewer pipes, identification of specific defects, and development of recommendations to rehabilitate or repair severe defects identified during the inspection. This work is needed to restore the service life, efficiency and effectiveness of the gravity sewer collection system in Belle Glade, Pahokee, and South Bay.

### Attachments:

1. Location Map

2. Two (2) Original Consultant Services Authorization No. 7

Recommended By:

**Department Director** 

Date

Approved By:

Assistant County Administrator

Date

### II. FISCAL IMPACT ANALYSIS

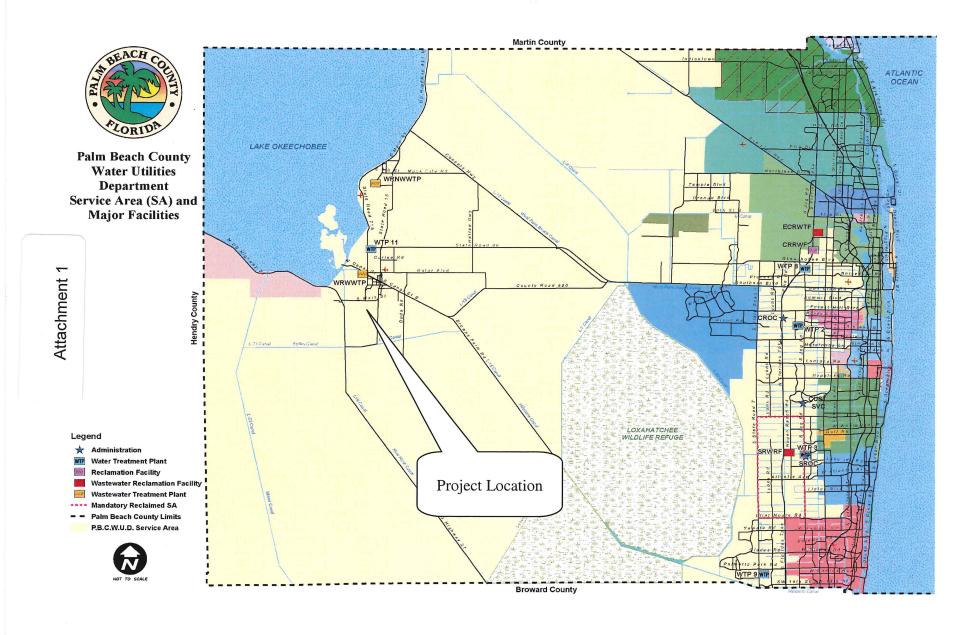
# A. Five Year Summary of Fiscal Impact:

A. Five real Summary of Fiscal impact.							
Fisc	al Years	2015	2010	6 2017	2018	2019	
Exte Prog In-Ki CCR	tal Expenditures rnal Revenues ram Income (Coun nd Match County T Funds FISCAL IMPACT	\$180,800 \$0 ty)	<u>0</u> <u>0</u> <u>0</u>	0 0 0 0 0	<u>0</u> <u>0</u> <u>0</u> <u>0</u> <u>0</u>	0 0 0 0 0	
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is ite	in included in Cum	ent budget?	Yes _>	4, 4, 4, 4, 4, 4, 4, 4, 4, 4, 4, 4, 4, 4	<del></del>		
_				Category <u>N/A</u>			
B.	Recommended	Sources of Fu	ınds/Summa	ary of Fiscal I	mpact:		
	One (1) time exp forward.	enditure from ບ				ice brought	
C.	Department Fisc	cal Review: _	dell	ra myre	ut	<del></del>	
		III. <u>I</u>	REVIEW CO	<u>MMENTS</u>			
A.	OFMB Fiscal an	d/or Contract	Developme	nt and Contro	ol Comme	nts:	
B.	Legal Sufficience  Assistant of	MB  V: County Attorney	- <u>-7/16/15</u> y	Contract 7-10-1	Developm 5 Bu	Joelow 7/10//2 nent and Control	
C.	Other Departme	nt Review:					

This summary is not to be used as a basis for payment.

Department Director

## **Location Map**



# CONSULTANT SERVICES AUTHORIZATION NO. $\underline{7}$

alos diades inilitation/ filliow i lojects
Project No. WUD 15-024
Budget Line Item No. 4011-721-W031-6547
District No.: 6
THIS AUTHORIZATION No. 7 to the Contract for Consulting/Professional Services dated <u>June 3, 2014</u> (R2014-0821), by and between Palm Beach County and the Consultant identified herein, is for the Consultant Services described in Item 3 of this Authorization. The Contract provides for <u>22.00%</u> SBE participation overall. This Consultant Services Authorization includes <u>37.66</u> % overall participation: The cumulative SBE participation, including this authorization is <u>36.95</u> % overall. Additional authorizations will be utilized to meet or exceed the stated overall participation goal.
CONSULTANT: _ Hazen and Sawyer
2. ADDRESS: 2101 N.W. Corporate Boulevard, Suite 301, Boca Raton, FL 33431
3. Description of Services to be provided by the Consultant: Gravity lines will be smoke tested using a high volume blower and smoke canisters or liquid smoke to generate the smoke which will be non-toxic, odorless and non-staining. In addition to smoke testing, manhole inspections will be performed pursuant to National Association of Sewer Service Companies guidelines. Results from these tasks will be submitted to Palm Beach County in a report / export format.
See ATTACHMENT A.
4. Services completed by the Consultant to date (Summary and Status of Authorizations):
See ATTACHMENT E.
5. Consultant shall begin work promptly on the requested services.
6. The compensation to be paid to the Consultant for providing the requested services shall be
A. Computation of time charges plus expenses, not to exceed \$180,800.00
B. Fixed price of \$
7. This Authorization may be terminated by the County without cause or prior notice. In the event of termination not the fault of the Consultant, the Consultant shall be compensated for all services performed through the date of termination, together with reimbursable expenses (if applicable) then due.

Project No. WUD 15-0	)24 <b>Consu</b> l	tant Services Authorization No.	
Project Title GL09 GI	ades Infiltration / Infl	ow Projects	
Schedule 1 define	s the SBE applied to	chment D under this Authorization. The this Authorization and Schedule 2 estab Iltant (Letter of Intent to perform as an SB	lishes the
		CHANGED OR MODIFIED, all other ract dated <u>June 3, 2014</u> remain in full	
IN WITNESS WHEREOF obligations of the aforement		is accepted, subject to the terms, condi	tions and
PALM BEACH COUNTY,	A POLITICAL SUBD	IVISION OF THE STATE OF FLORIDA	
Sharon R. Bock, Clerk & Palm Beach County ATTEST:	Comptroller,	Palm Beach County, Board of County Commissioners	
Signed:		Signed: Shelley Vana, Mayor	_
Typed Name:		Date	<del></del>
Deputy Cit	ei K	Jes	
Approved as to Form and Sufficiency	l Legal		
Signed:			
Typed Name:County	Attorney	CONSULTANT: Hazen and Sawye	<u>r</u>
ATTEST: Witness		Selet My (Signature)	
Robert B. Taylor, Vice Pro (Name and Title)	<u>esident</u>	Albert Muniz, Vice President (Name and Title)  June 8, 2015	
		Date	
Rev. 5-27-15			

### LIST OF ATTACHMENTS

Project No. WUD 15-	Consultant Services Authorization No. 7
Project Title GL09 G	lades Infiltration / Inflow Projects
ATTACHMENT – A	Scope of Work
ATTACHMENT - B	Budget Summary
ATTACHMENT – C	Project Schedule
ATTACHMENT – D	SBE Schedule 1, 2, 3a, and 4
ATTACHMENT – E	Authorization Status Report – Summary and Status of Authorizations
ATTACHMENT - F	Authorization Status Report – Summary of SBE Tracking
ATTACHMENT – G	Location Map

### ATTACHMENT - A

### CONSULTANT SERVICES AUTHORIZATION NO. 7

# PALM BEACH COUNTY WATER UTILITIES DEPARTMENT ENGINEERING/PROFESSIONAL SERVICES

### SCOPE OF WORK FOR

### INTRODUCTION

Palm Beach County (COUNTY) entered into an agreement entitled Contract for Engineering/ Professional Services - Palm Beach County Utilities Department Project No. WUD 14-002 (CONTRACT) with Hazen and Sawyer (CONSULTANT) to provide engineering services for various general activities on (Reference Document R2014-0821). This Consultant Service Authorization will be performed under that CONTRACT.

This Consultant Services Authorization encompasses providing services related to the smoke testing and manhole inspections within the Western Region wastewater service area.

### **BACKGROUND**

The Palm Beach County Water Utilities Department (PBCWUD) presently owns and operates the Western Region Wastewater Treatment Facility. This area commonly known as the Glades Region encompasses the Cities of Belle Glade, Pahokee, and South Bay. A Wastewater Master Plan was recently completed (September 2014) for this area which identified infiltration and inflow (I&I) concerns. This project has been established to address excess flows from I&I in critical areas as defined by the County and identified in the Master Plan. The I&I program will be implemented in a phased approach as described below.

- Phase 1 I-I Analysis Analysis of dry and wet weather flows both for the overall system and for individual pump station collection areas (basins). System-level analysis allows an overall characterization of the system to illustrate the approximate proportions of infiltration, inflow, and wastewater. Basin-level analysis allows the prioritization of individual pump station collection areas by I-I severity so that follow-up inspection work can be focused on those areas where the greatest I-I reduction potential exists.
- Phase 2 Sanitary Sewer Evaluation Survey (SSES) Detailed investigation to develop a gravity sewer rehabilitation plan. Such investigation is designed to permit the identification of specific system defects to be repaired in Phase 3, and typically involves such activities as night flow isolation, closed-circuit television inspection of sewer mains and laterals, manhole inspection, and smoke testing to identify sources of inflow.

Phase 3 – Rehabilitation – Implementation of the rehabilitation plan. This phase typically includes procurement and oversight of specialty sewer contractors to perform repair of mains, laterals, and manholes. Repairs would include traditional excavated repairs as well as "trenchless" repairs such as lining and chemical grouting where warranted. Phase 3 may also include post-rehabilitation flow monitoring to document the flow reductions achieved.

Phase 1 was completed as part of the Master Plan project. At this time, the PBCWUD has elected to initiate Phase 2 activities in those pump station collection areas (basins) identified as priorities in Phase 1. To facilitate implementation of the work, Phase 2 will be divided into three Consultant Services Authorizations (CSAs). The scope of work for this CSA will consist of gravity collection system smoke testing and manhole inspection. Future CSAs will address video inspection and development of a final report including a prioritized rehabilitation plan.

The scope of work outlined herein allows for the performance of the following tasks:

- Task 1 Smoke Testing
- Task 2 Manhole Inspection

### **SCOPE OF SERVICES**

CONSULTANT shall perform the engineering Scope of Services as described herein.

### Task 1 - Smoke Testing

The following sub-tasks will be performed by the CONSULTANT:

- Place door hangers in advance of the smoke testing to advise local residents (in English and Spanish) of the tests.
- Provide adequate notification to the fire department and police department of the anticipated smoke testing schedule.
- Train and brief operators who participate in the smoke testing in the handling of residents and business owners who discover smoke in their buildings or in their yards.
- Smoke test gravity sewer mains using a high volume blower, along with smoke canisters
  or liquid smoke to generate the smoke, which will be non-toxic, odorless, and nonstaining.
- Document each case of smoke coming out of the ground, catch basins, pipes and other sources during the test and record the following information:
  - ✓ Date and personnel (observing)
  - ✓ Street address
  - ✓ GPS coordinates of the smoke source
  - ✓ Area and type of surface drained by the leak

- ✓ Designation as to whether defect is located on public (utility) property or private (customer) property, pursuant to guidance to be provided by the PBCWUD
- ✓ Description of the defect to facilitate follow-up location and repair
- ✓ Digital photograph of smoke coming out of the ground, catch basins, pipes and other sources during the test. To the extent possible, photographs will show the smoke from the leak, the source of smoke, and the location of the smoke with reference to some recognizable topographic feature such as a building
- Provide a letter report for each basin including smoke inspection forms and the following additional information:
  - ✓ A location map showing the location of each smoke source with respect to streets. The location map shall be of a scale suitable to allow the PBCWUD to find the approximate location of the smoke source
  - ✓ A photograph showing the location of the smoke source along with the date, address, GPS coordinates, description of the smoke source, and indication as to whether the smoke source is on private or public property
  - ✓ A summary table for the basin including, for each smoke source, the street address, longitude and latitude, description, public/private designation, and page number of associated photo in report. This summary table shall also be provided in electronic format (Microsoft Excel)

### The following sub-tasks will be performed by PBCWUD:

- Review and approve the door hangars prior to use
- Appoint one contact person, and one backup person, for coordination of activities and for specific assistance as may be required to CONSULTANT including:
  - ✓ Identify areas to be tested and provide a sewer atlas showing manhole numbers
  - ✓ Notify and coordinate with local police and fire departments
  - ✓ Communicate with traffic authorities
  - ✓ Assist with providing access to the work site and all right-of-ways with sufficient area for the placement of personnel and equipment
  - ✓ Locate and expose any manhole
  - ✓ Relieve system surcharging, if required, in advance of smoke testing activities

### Deliverable(s):

1.1 - A smoke test report for each pump station collection area tested (two bound, printed copies and one CD containing a PDF version of the report plus a MS Excel version of the summary table).

### Schedule:

Field work will be completed and deliverables submitted within 100 calendar days from Notice to Proceed.

### Assumptions:

The fee and schedule are based on the testing of up to 125,000 linear feet of gravity mains.

### Task 2 – Manhole Inspection

The following sub-tasks will be performed by the CONSULTANT:

- Prepare field laptops configured with GIS shape files and Manhole Assessment and Certification Program (MACP) compliant manhole inspection software.
- Conduct a Level 2 inspection of manholes in priority areas, pursuant to National Association of Sewer Service Companies (NASSCO) guidelines under the MACP. Whereas the level 1 inspection provides basic condition assessment information to evaluate the general condition of a manhole, the purpose of the level 2 inspection is to gather detailed information to fully document defects, determine condition of the manhole, and provide the specific information needed to recommend corrective action.
- Collect the following optional Level 2 field data in addition to the required Level 2 field data:
  - √ Field 3 Owner
  - ✓ Field 5 Drainage Area
  - √ Field 9 Time
  - ✓ Field 31 Northing
  - √ Field 32 Easting
  - ✓ Field 33 Elevation
  - √ Field 34 Coordinate System
  - √ Field 35 GPS Accuracy
- Provide a MACP compliant electronic deliverable possessing the NASSCO export option using the latest version of NASSCO.

The following sub-tasks will be performed by PBCWUD:

- Appoint one contact person, and one backup person, for coordination of activities and for specific assistance as may be required to CONSULTANT including:
  - ✓ Identify areas to be tested and provide GIS shape files of the sewer atlas showing unique manhole numbers
  - ✓ Notify and coordinate with local police and traffic authorities as required.
  - ✓ Assist with providing access to the work site and all right-of-ways with sufficient area for the placement of personnel and equipment
  - ✓ Locate, expose, and open manholes for inspection. Provide traffic control as required

- ✓ Relieve system surcharging, if required, in advance of manhole inspection
- Assist in coordinating the export of the MACP compliant database to the PBCWUD software

### Deliverable(s):

2.1 - A MACP compliant electronic file possessing the NASSCO export option for export into the PBCWUD software.

### Schedule:

Field work will be completed and deliverables submitted within 150 calendar days from Notice to Proceed

### Assumptions:

- Fee and schedule are based on the inspection of up to 500 manholes
- GPS accuracy will be as achievable under field conditions using a Trimble Geo 7x
- MACP certified personnel will perform quality assurance review of field data

### **COMPENSATION**

Compensation will be on a computation of time charges plus expenses, not to exceed a total amount of \$180,800.00 (See Attachment B).

### **SBE PARTICIPATION**

### 1. SCHEDULE 3(A) - Professional Services Activity Report

This form shall be submitted by the prime contractor with each payment application when SBE and/or M/WBE sub-consultants are utilized in the performance of the contract. This form shall contain the names of all SBE and M/WBE sub-consultants, specify the sub-consultants dollar amount for each sub-consultants and show amount drawn and payments to date issued to sub-consultants.

### 2. SCHEDULE 4 - SBE-M/WBE Payment Certification

A schedule 4 for each SBE and/or M/WBE sub-consultant shall be completed and signed by the proposed SBE and/or M/WBE after receipt of payment from the prime. When applicable, the prime shall submit this form with each application submitted to the county for payment to document payment issued to a sub-consultant in the performance of the contract.

SBE participation is included in the **ATTACHMENT F** under this authorization. The attached Schedule 1 defines the SBE applied to this CSA/Contract and Schedule 2 establishes the SBE contribution from each subcontractor (Letter of Intent to perform as an SBE).

# ATTACHMENT – B Budget Summary

			BUDGET SUMMARY for CSA-7								
Task No.	Description	VP	Senior Associate	Associate	Senior Principal Engineer	Principal Engineer	Field Coordinator	Designer	Office Support	Total Labor	Sub- Consultant
1.0	Smoke Testing	8	64	0	0	40	100	0	60	272	
				*							\$22,900.00
2.0	Manhole Inspection	12	80	0	0	60	136	0	36	324	
											\$45,200.00
						·					
	SUB-TOTAL Hours	20	144	0	0	100	236	0	96	596	\$68,100.00
100											
	Labor Raw Costs	\$70	\$63	\$54	\$50	\$43	\$37	\$30	\$22		
	Labor Multiplier	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0		See
	Labor Sub-Total	\$4,200	\$27,216	\$0	\$0	\$12,900	\$26,196	\$0	\$6,336		
	Labor Total									\$76,848	
	Sub-consultant Labor Total			त्रात्रे के क्षेत्रकार के क्षेत्रकार के अपने क्षेत्रकार विकास के कि		<u> </u>			er en		\$68,100
	Sub-consultant Multiplier										1.0
	Sub-consultant Total			T. 64036 T. C.	SASSERINE FOLOURA						\$68,100
	Reimbursable Expenses										\$35,852
	Project Total										\$180,800

# C Solutions Scope of Services Hazen and Sawyer Palm Beach County Utilities Department (H&S CSA7) Glades SSES Smoke Testing and Manhole Inspections

### **Scope of Services**

### I. BACKGROUND

The Palm Beach County Water Utilities Department (PBCWUD) presently owns and operates the Western Region Wastewater Treatment Facility. This area commonly known as the Glades Region encompasses the Cities of Belle Glade, Pahokee, and South Bay. A Wastewater Master Plan was recently completed (September 2014) for this area which identified infiltration and inflow (I&I) concerns. This project has been established to address excess flows from I&I in critical areas as defined by the County and identified in the Master Plan. The I&I program will be implemented in a phased approach as described below.

- Phase 1 I-I Analysis Analysis of dry and wet weather flows both for the overall system and for individual pump station collection areas (basins). System-level analysis allows an overall characterization of the system to illustrate the approximate proportions of infiltration, inflow, and wastewater. Basin-level analysis allows the prioritization of individual pump station collection areas by I-I severity so that follow-up inspection work can be focused on those areas where the greatest I-I reduction potential exists.
- Phase 2 Sanitary Sewer Evaluation Survey (SSES) Detailed investigation to develop a gravity sewer rehabilitation plan. Such investigation is designed to permit the identification of specific system defects to be repaired in Phase 3, and typically involves such activities as night flow isolation, closed-circuit television inspection of sewer mains and laterals, manhole inspection, and smoke testing to identify sources of inflow.
- Phase 3 Rehabilitation Implementation of the rehabilitation plan. This phase typically includes procurement and oversight of specialty sewer contractors to perform repair of mains, laterals, and manholes. Repairs would include traditional excavated repairs as well as "trenchless" repairs such as lining and chemical grouting where warranted. Phase 3 may also include post-rehabilitation flow monitoring to document the flow reductions achieved.

Phase 1 was completed as part of the Master Plan project. At this time, the PBCWUD has elected to initiate Phase 2 activities in those pump station collection areas (basins) identified as priorities in Phase 1. To facilitate implementation of the Phase 2 work, Phase 2 will be divided into multiple Consultant Services Authorizations (CSAs). The scope of work for this CSA will consist of gravity collection system smoke testing and manhole inspection. A future CSA will address video inspection and development of a final report including a prioritized rehabilitation plan.

The scope of work outlined herein allows for the performance of the following tasks:

Task 1. Smoke Testing
Task 2. Manhole Inspection



.A-1

Palm Beach County (COUNTY) entered into an agreement entitled Contract for Engineering/ Professional Services - Palm Beach County Utilities Department Project No.: WUD 14-002 (CONTRACT) with Hazen and Sawyer (CONSULTANT) to provide engineering services for various general activities on (Reference Document R2014-0821). This Consultant Service Authorization will be performed under that CONTRACT.

C Solutions, Inc. will assist the CONSULTANT in the providing the following services for Consultant Services Authorization No. 7 (CSA No. 7).

### II. SCOPE OF SERVICES

C Solutions shall assist the CONSULTANT shall provide engineering services to conduct a phased SSES as described herein. In an effort to minimize the total cost of the work, CONSULTANT has developed a collaborative approach that relies on the performance of some subtasks by COUNTY staff.

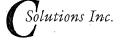
### Task 1 Smoke Testing

C Solutions will assist the CONSULTANT with the following sub-tasks:

- Place door hangers in advance of the smoke testing to advise local residents in English and Spanish of the tests.
- Provide adequate notification to the fire department and police department of the anticipated smoke testing schedule.
- Ensure that operators who participate in the smoke testing are trained and briefed in the handling of residents and business owners who discover smoke in their buildings or in their yards.
- Smoke test gravity sewer mains using a high volume blower, along with smoke canisters or liquid smoke to generate the smoke. Smoke will be non-toxic, odorless, and non-staining.
- Document each case of smoke coming out of the ground, catch basins, pipes and other sources during the test and record the following information:
  - o Date and personnel.
  - o Street address.
  - o GPS coordinates of the smoke source.
  - o Area and type of surface drained by the leak.
  - O Designation as to whether defect is located on public (utility) property or private (customer) property, pursuant to guidance to be provided by the PBCWUD.
  - o Description of the defect to facilitate follow-up location and repair.
  - Digital photograph of smoke coming out of the ground, catch basins, pipes and other sources during the test. To the extent possible, photographs will show the maximum amount of smoke from the leak, the exact source of smoke, and the location of the smoke with reference to some recognizable topographic feature such as a building.

### Schedule:

Field work will be completed as directed by CONSULTANT within 90 calendar days from Notice to Proceed.



### Task 2 Manhole Inspection

The following sub-tasks will be performed by the CONSULTANT:

- Assist CONSULTANT to conduct a Level 2 inspection of manholes in priority areas, pursuant to National Association of Sewer Service Companies (NASSCO) guidelines under the Manhole Assessment and Certification Program (MACP). Whereas the level 1 inspection provides basic condition assessment information to evaluate the general condition of a manhole, the purpose of the level 2 inspection is to gather detailed information to fully document all defects, determine condition of the manhole, and provide the specific information needed to recommend corrective action.
- Collect the following optional Level 2 fields in addition to the required Level 2 fields:
  - o Field 3 Owner.
  - o Field 5 Drainage Area.
  - Field 9 Time.
  - Field 31 Northing.
  - o Field 32 Easting.
  - o Field 33 Elevation.
  - o Field 34 Coordinate System.
  - o Field 35 GPS Accuracy.

### Schedule

 Field work will be completed as directed by CONSULTANT within 120 calendar days from Notice to Proceed.

### III. ASSUMPTIONS

The Scope of Work described herein is based upon the following assumptions:

- The COUNTY will coordinate access to all facilities and provide staff to open and close sanitary sewer manholes as required by C Solutions
- The fee and schedule are based on the smoke testing of up to 125,000 linear feet of gravity mains.
- Fee and schedule are based on the inspection of up to 500 manholes.
- GPS accuracy will be as achievable under field conditions using a Trimble Geo 7X. This could be
   +- 6-inches in the vertical.



### IV. PROPOSED COMPENSATION

C Solutions shall perform the services defined in this scope of work for a lump sum fee of \$68,100. Invoices will be submitted to the CONSULTANT monthly and define the percent complete with each of the below tasks.

Task Description	Not to Exceed Amount
Task 1 – Smoke Testing	\$22,946
Task 2 – Manhole Inspection	\$45,154
TOTAL	\$68,100



# CONSULTANT SERVICES AUTHORIZATION NO. 7

PROJECT TITLE:

GL 09 Glades Infiltration / Inflow Projects

PROJECT No. WUD

15-024

ESTIMATED EXPENSES			·	
Task 1 - Smoke Testing	QTY	Units	Unit Price	Amount
SSES van and field supplies	17	Day	\$195.00	\$3,315.00
Door hanger and liquid smoke	1	Each	\$2,800.00	\$2,800.00
Lodging and meals	17	Day	\$320.00	\$5,440.00
Sub-total		•		\$11,555.00
•				
Task 2 - Manhole Inspections	QTY	Units	Unit Price	Amount
SSES van and field supplies	33	Day	\$195.00	\$6,435.00
Trimble GPS shipping	1	Each	\$372.00	\$372.00
Trimble GPS rental	33	Day	\$210.00	\$6,930.00
Lodging and meals	33	Day ·	\$320.00	\$10,560.00
Sub-total				\$24,297.00
TOTAL EXPENSES				\$35,852.00

### ATTACHMENT - C

### PROJECT SCHEDULE

The completion dates for this work will be as follows (starting from CONSULTANT'S receipt of Notice-to-Proceed).

Engineering Services	Estimated Completion Date from Notice to Proceed
Task 1 – Smoke Testing	100 days <sup>A</sup>
Task 2 – Manhole Inspection	150 days
Total Time	150 days

A – Days are estimated and may vary depending on weather and receipt of data requests.

# Attachment – D Schedule 1 LIST OF PROPOSED SBE-M/WBE CONSULTANT/SUB-CONSULTANTS

PROJECT NAME:	GL09 Glades Ir	GL09 Glades Infiltration / Inflow Projects				TNO.:	WUD 15-02	4	
NAME OF PRIME CO	NSULTANT:	Hazen and Sav	vyer ADDRE	SS: 2101 NW	— Corporate Blv	d., Suite 301,	Boca Raton, l	FL 33431	
CONTACT PERSON:	Albert Muniz	, P.E. / Vice Pres	ident		Phone No	: (561) 997	-8070 F	ax No.: (	561) 997-8129
DESCRIPTION OF SE	ERVICES: Ass	sistance with smo	ke testing and ma	nhole inspection	3				
PLEASE LIST PLEASE ALSO LI	ST THE DOLL	AR AMOUNT	ND PERCENTA AND PERCENT L APPLICALBI	AGE OF WORI	TO BE CO	MPLETED B	Y ALL SUB	-CONSULT	-
			(Check one or b	oth Categories)	Consultant	/ Sub-consulta	nt Dollar Am	ount and Pero	entage of Services
Name, Address and Pho	one Number		M/WBE Minority Business	SBE Small Business	Black	Hispanic	Women	Caucasian	Other (Please Specify)
1. C Solutions, Inc. ( 1201 Tangelo Isle		e, FL 33315			\$68,100				
2.				. 🔲					
3.									
4.									
5.									
(Please use additional s Total SBE-M/WBE Pa		37.67 %		Total	\$68,100		-		
_	_		t be supported by t County as an SBE a		included on S	Schedule 2 in or	der to be cou	nted toward go	al attainment.

# OSBA SCHEDULE 2 LETTER OF INTENT TO PERFORM AS AN SBE-M/WBE CONSULTANT/SUBCONSULTANT

This document must be completed by <u>ALL</u> SBE-M/WBE's and submitted with this CSA. Specify in detail, the particular consulting services to be performed and the dollar amount and/or percentage for each services. SBE credit will only be given for services which the SBE-M/WBE's is certified to perform. Failure to properly complete Schedule 2 will result in your SBE participation not being counted.

PROJECT NUMBER: WUD 15-024	PROJECT NAME: GLOS	9 Glades Infiltration / Inflo	w Projects				
TO: HAZEN	AND SAWYER						
(Name o	f Prime Consultant)						
The undersigned is certified by Palm Beach County as a - (check one or more, as applicable):							
Small Business Enterprise	Min	ority Business Enterprise _	X				
Black X Hispanic Wome	Other (Please Specify)						
Date of Palm Beach County Certification:							
The undersigned is prepared to perform project and will enter into a formal agreen Beach County.							
Additional Sheets May Be Used As Necess	ary						
(Specify in detail the particular consulting	g services thereof to be per	formed)					
Assistance with smoke testing of gravity lin	es and manhole inspections		· · · · · · · · · · · · · · · · · · ·				
		·					
Total SBE-M/WBE Participation	37.67%						
If undersigned intends to sub-subcontrac consultant, please list the name of that su			a non-SBE sub-				
Price or Percentage \$68,100.00		C Solutions, Inc.					
		(Name of Sub-consultant)					
The Prime Consultant affirms that it will monitor the SBE-M/WBE listed to ensure the SBE-M/WBE perform the services with their own work force. The undersigned SBE-M/WBE Prime or SBE-M/WBE sub-consultant affirms that it has the resources necessary to perform the work listed without subcontracting to a non-certified SBE or any other certified SBE sub-consultants except as noted above.							
The undersigned sub-consultant understands that the provision of this form to the Prime Consultant does not prevent sub-consultant from providing quotations to other.							
		Mark Drummond, P.E. / Pro	esident				
		Print name of					
	Bv·						
	By:	Print name of SBE-M/WBE Sub-consu					
	By:	Print name of					

# OSBA Schedule 3(A) PROFESSIONAL SERVICES ACTIVITY REPORT

	Project No.:	WUD 15-024
	Task Authorization No.:	7
	REPORTING PERIOD:	
Prime Consultant Address: 2101 NW Corpo	orate Boulevard., Suite 301	
City / State Boca Raton, FL	nate Boulevard., Suite 301	Zip 33431
Contact Person: Albert Muniz, P.E. / Vice	President Phone	*
Contract Name: GL09 Glades Infiltration / In		
Contract Term: Not to exceed	Contract Amount:	\$180,800.00
Total Percentage performed by Prime's Firm:	62.33% SBE-M/WBE Firm	n: 37.67%
Service Type: Architectural	Engineering X S	Surveying
Other (Specify)		
Have Sub-Consultants completed work with it	s own workforce for this application	n?
Yes X No		
		e.
Note: If yes, complete below:	-CONSULTANTS	
SUD	-CONSULTANTS	÷
1. Firm's Name: C Solutions, Inc.		
Address / Tel: 1201 Tangelo Isle, Fort	Lauderdale, FL 33315	
Estimated Start Date: 09/01/15		\$68,100.00
SCOPE OF WORK: Smoke testing a	nd manhole inspection assistance	*
Percentage / Hrs Completed: 09		\$0.00
2. Firm's Name:		
Address / Tel:		
Estimated Start Date:	Contract Amount:	
SCOPE OF WORK:		*
Percentage / Hrs Completed:	Amount Paid to Date:	\$
3. Firm's Name:		•
Address / Tel:		
Estimated Start Date:	Contract Amount:	
SCOPE OF WORK:		
Percentage / Hrs Completed:	Amount Paid to Date:	\$
	I certify that the above is true to the	a hast of my knowledge
		ice President
_	Signature / Ti	
	Signature / 11	.uc

### OSBA SCHEDULE 4 – SBE-M/WBE PAYMENT CERTIFICATION

The Prime Contractor is to submit Schedule 4 with its Monthly Payment Request to Palm Beach County to reflect actual payments made to the SBE-M/WBE Sub-contractor. The Prime Contractor is not to request signature from an SBE-M/WBE Sub-contractor unless it has made a payment to the SBE-M/WBE Sub-contractor. The SBE-M/WBE Sub-contractor is not to complete and sign this form unless it has received a payment from the Prime Contractor for services actually performed by the SBE-M/WBE Sub-contractor. A separate Schedule 4 is required for each SBE-M/WBE Sub-contractor payment.

This is to certify that		•	received
<del></del>	(SBE or	M/WBE Sub-contractor Name)	
(Monthly) or (Final) payment of §	0.00		
On 2	2015 from		
MM DD	YYYY	(Prime Cor	ntractor Name)
For labor and/or material used o	n		. /
To haser and of material assess	··	(Project Name)	(Work Order)
DEPT.: WUD		PROJECT NO.:	
PRIME CONTRACTOR VENDO	R CODE:		
SBE OR M/WBE SUB-CONTRA	CTOR VENDOR	CODE:	
If the SBE Sub-contractor intend for labor provided on this projec			ment to any Sub-contractor
*Sub-contractor Name:		Amount	to be paid:
*Note: If the sub-contractor listed verify payment.	d in this section is	s an SBE or M/WBE a separate	e Schedule 4 is required to
Ву:			
(Signature of Sub-cor	ntractor)	(Print Name & Title of Persor Subcontractor)	executing on behalf of
STATE OF FLORIDA COUNTY OF			
Sworn to and subscribed before By:		day of	2015
		Notary Public,	State of Florida
		Print, Type or Stamp Com	missioned Name of Notary
Personally Known OF	R Produced Ident	ification Type of Id	entification

# ATTACHMENT – E

### **AUTHORIZATION STATUS REPORT**

# SUMMARY AND STATUS OF REQUESTS FOR AUTHORIZATIONS

Auth.			Project	SBE Total	SBE	Approved	Date	WUD No.	Consultant's
No.	Description	Status	Total Amount	Amount	Participation %	Ву	Approved	Assigned	Project No.
1	SRWRF Pretreatment Screenings	Approved	\$98,418.00	\$27,500.00	27.94%	PBCWUD	07/23/14	14-036	45008-001
2	Western Region WWTF Clarifier PDR	Approved	\$97,782.00	\$48,394.60	49.49%	PBCWUD	07/23/14	14-060	45008-002
3	Challenge Grant Application	Approved	\$19,600.00	\$0.00	0.00%	PBCWUD	09/05/14	14-101	45008-003
4	Digester Biogas	Approved	\$19,810.00	\$0.00	0.00%	PBCWUD	12/18/14	14-030	45008-004
5	Sanitary Sewer Evaluation Survey	Pending	\$60,404.00	\$39,266.00	65.01%	PBCWUD	05/13/15	15-024	45008-005
6	Glades Master Plan Cont'd. Assist.	Pending	\$19,045.00	\$0.00	0.00%	PBCWUD	05/21/15	14-101	45008-006
7	Smoke Testing and Manhole Insp.	Pending	\$180,800.00	\$68,100.00	37.67%			15-024	45008-007
-	-								
					;				
Total			\$495,859.00	183,260.60	36.95%				

## ATTACHMENT - F

### AUTHORIZATION STATUS REPORT

### SUMMARY OF STATUS OF SMALL BUSINESS TRACKING SYSTEM

	Total	SBE	
Current Proposal			
Value of this Authorization	\$180,800.00	\$68,100.00	
Value of SBE Letters of Intent	\$68,100.00	\$68,100.00	
Actual Percentage	37.66%	100.00%	
Signed Authorizations			
Total Value of Authorizations	\$315,059.00	\$115,160.60	
Total Value of SBE Signed Subcontracts	\$115,160.60	\$115,160.60	
Actual Percentages	36.55%	100.00%	
Signed Authorizations Plus Current Proposals			
Total Value of Authorizations	\$495,859.00	\$183,260.60	
Total Value of SBE Signed Subcontracts & Letters of Intent	\$183,260.60	\$183,260.60	
Actual Percentages	36.95%	100.00%	
Goal	22.00%	22.00%	

## **ATTACHMENT G – Location Map**

