



AGENDA REPORT
SAN CLEMENTE CITY COUNCIL MEETING
Meeting Date: June 19, 2012

Agenda Item 60
Approvals:
City Manager [Signature]
Dept. Head [Signature]
Attorney _____
Finance _____

Department: Public Works / Engineering Division
Prepared By: Michael Fakhar, Contract Civil Engineer *MBF*

Subject: ***APPROVE FIRST AMENDMENT TO PROFESSIONAL SERVICES AGREEMENT WITH DELTA FOR THE SEWER AND WATER SCADA SYSTEM INTEGRATION SERVICES, PROJECT NOS. 12605 AND 13501.***

Summary: The City is in the process of upgrading its Supervisory Control and Data Acquisition (SCADA) System to remotely control water and sewer facilities from the City's Water Reclamation Plant (WRP). SCADA is an essential part of operating the water and sewer systems to maintain water delivery, treat wastewater and prevent sewer spills. On December 4, 2007, the City Council authorized a Professional Services Agreement with DLT&V Systems Engineering, Inc. in the amount of \$250,985 to provide programming services for integration of City's water and sewer facilities into the City's SCADA System. In 2011, DLT&V Systems Engineering, Inc. changed its name to Delta Systems Engineering, Inc.

The system integration, programming and equipment installation process is substantially complete. As part of the original scope of work, Delta set up the SCADA equipment at the WRP, installed Wonderware software, set up the computer servers, set up PC's, monitors, laptops, conducted programming, connected communication hardware and prepared the WRP for recording and controlling data generated from SCADA.

During integration of the remote sewer and water facilities into the SCADA System, it has become evident that the SCADA radio network throughput is limited. Additional programming and equipment reconfiguration to improve system control and operation efficiency is required. To further improve system reliability and reduce staff time in the field, additional programming will allow staff to remotely control turnout set points and flow as needed.

The following additional services are recommended:

1. Configure the Cisco switches to both accommodate the SCADA network traffic, and allow only SCADA traffic on the SCADA network.
2. Monitor for system stability and log network traffic.
3. Install data server software (FSGateway) on Server 1 and Server 2 and configure alarm application (Win911) for data access.
4. Install alarm application (Win911) on the 2 available servers to use a control object (ActiveX) in Intouch to perform schedule changes.
5. Implement the alarm application (Win911) redundancy scripts.
6. Develop and implement Programmable Logic Controller (PLC), Operator Interface Terminal (OIT) and Human Machine Interface (HMI) programming for existing valve

control equipment (VC-131) to remotely adjust set-points and control flow in the City's Water system.

To perform these additional services, staff negotiated with Delta in the amount of \$33,875. There is adequate funding within the project budget for this expenditure.

Recommended Action:

STAFF RECOMMENDS THAT the City Council authorize the Mayor to execute a First Amendment to Professional Services Agreement with Delta in the amount of \$33,875 for additional programming and integration services for the Sewer and Water SCADA System Integration Services, Project Nos. 12605 and 13501.

Fiscal Impact:

There is sufficient funding within the project for this phase of work.

Attachments:

Location Map
First Amendment

Notification:

None.

FIRST AMENDMENT TO
PROFESSIONAL SERVICES AGREEMENT FOR
SEWER AND WATER SCADA SYSTEM INTEGRATION SERVICES
Project Nos. 12605 and 13501

This First Amendment ("First Amendment") to the Professional Services Agreement for Sewer & Water SCADA System Integration Services Project No. 12605 & 13501, (the "Agreement") is made and entered into on this _____ day of June, 2012, by and between the CITY OF SAN CLEMENTE, a municipal corporation ("City"), and Delta (formerly DLT&V) Systems Engineering, Inc. ("Consultant").

R E C I T A L S:

- A. City and Consultant entered into the Professional Services Agreement for Sewer & Water SCADA System Integration Services on December 4, 2007
- B. In 2011, DLT&V Systems Engineering, Inc. changed its name to Delta Systems Engineering, Inc.
- C. City and Consultant desire to amend the Agreement in the manner provided herein.

C O V E N A N T S:

Section 1: Section 3.1 of the Agreement is hereby amended by increasing the project budget listed in Section 3.1 of the Agreement from Two Hundred Fifty Thousand Nine Hundred Eighty Five Dollars (\$250,985) to Two Hundred Eighty Four Thousand Eight Hundred Sixty Dollars (\$284,860). In addition to the services to be performed by Consultant as referenced in Exhibit A to the original Agreement and First Amendment, Consultant shall also perform those services described in Exhibit "A" attached hereto.

Section 2: Except as expressly amended by this First Amendment, the remaining portions of the Agreement shall remain in full force and effect.

End of Text

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IN WITNESS WHEREOF, the parties hereto have caused this First Amendment to be duly executed on the respective dates set forth opposite their signatures.

CITY OF SAN CLEMENTE

By: _____

Its: _____

Dated: _____, 20__

ATTEST:

CITY CLERK of the City of
San Clemente, California

Approved as to form:
RUTAN & TUCKER, LLP

("CONTRACTOR")

City Attorney

By: _____

Its: _____

Dated: _____, 20__

Finance Authorization

EXHIBIT A

Scope of Services

PROGRAMMING SERVICES

Project Description

1.0 Win911 Autodialer Alarm Software programming services:

- a. Configure the Cisco switches to accommodate the SCADA network traffic, and allow only SCADA traffic on the SCADA network.
- a. Install FSGateway on AOS 1 and AOS 2 and configure both Win911 applications to use FSGateway for data access.
- b. Install Win911 on 2 available servers (provided by city) in the server rack and use the ActiveX object (provided by DeltaSE) for Intouch to perform schedule changes.
- c. Implement Win911 failover through object scripting.

2.0 In addition to the Win911 programming services, DeltaSE will provide additional programming for up to three (3) valve controllers. Sites included are Vera Cruz Turnout, Amancer Turnout, and La Pata Turnout. At the City's option, we will program two (2) additional sites, Blanco Pump Station, and Calle Agua (Verano) Pump Station at a per site rate.

The VC-131 work includes modifying the Wonderware screen graphics for three (3) locations to include a set point field that can be changed by an authorized operator. The OITs at the three (3) locations will be modified to support set point changes, and the PLC logic will be modified to accept the set point changes from the HMI and provide a 4-20mA analog output to the VC-131 controller. In turn, the VC-131 controller will control the flow independent of the PLC. No hardware or field wiring is included. Cost includes project management, PLC program changes and testing, Wonderware HMI changes and testing, local OIT program changes on-site and testing, travel time, and eight (8) hours of startup per site, one (1) hour of operator training, and updated PLC program documentation. VC-131 PID loop tuning is not included.

Responsibilities of Others

- 1.0 CLIENT will provide copies of the most current apps for HMI programming to DeltaSE.
- 2.0 CLIENT shall verify that all field wiring is installed and terminated at the PLC-based control panels, field instruments, and any other packaged control systems that will be integrated in to the plant SCADA system being programmed by DeltaSE, prior to scheduling DeltaSE personnel for initial system testing and startup.

Deliverables

- 1.0 Upon completion of our programming, DeltaSE will provide one (1) copy of the updated and backup HMI programming files on CD-ROM.

Exclusions and Exceptions

- 1.0 DeltaSE will not obtain any permits.
- 2.0 DeltaSE's level of effort is limited to the aforementioned scope of services. Costs incurred due to conditions beyond DeltaSE's control may result in additional charges billed on a Time and Material basis.
- 3.0 Should a condition exist, at no fault of DeltaSE, that interrupts or prevents DeltaSE from providing contracted services, DeltaSE may cease work until the condition(s) are remedied. At the client's request, DeltaSE may provide assistance to remedy the delaying condition(s), charged on a time and materials basis.
- 4.0 Excessive work interruptions by others that delay the provision of contracted services by DeltaSE may result in additional service charges billed on a time and materials basis.

Billing Rates and Payment Terms

- 1.0 This agreement will automatically terminate on the 1st day, of December, 2012, unless renewed or extended in writing by both parties.
- 2.0 The scope of services as described in this Fee Proposal will be provided on a lump sum basis. Should CLIENT request and DeltaSE agree to perform work outside the scope of work as described herein these services will be performed at additional cost to the lump sum amount. This proposal will be valid for the next ninety (90) days. We will bill you on a monthly basis for these services. Payment terms are Net 30 days.
- 3.0 The lump sum pricing quoted in this proposal will be valid for all work performed through December 31, 2012. Work performed after this date will be subject to a 5% per year escalation rate.

Accepted for Client:

Signature:

Print name:

Date:



DESIGN
CONSTRUCTION
INTEGRATION

18 TECHNOLOGY, SUITE 200, IRVINE, CALIFORNIA 92618
VOICE 949.273.8773 FAX 949.273.8775 TOLL FREE 888.893.5437

Fee Proposal

Date: 5/17/12

Attn: Mr. Mike Fakhar, PE

Client: City of San Clemente

Address: 910 Calle Negocio, Suite 100

City, State, Zip: San Clemente, CA 92673

Phone: 949 361-6115

Fax: 949 361-8316

Email: fakharm@san-clemente.org

The Client agrees that the technical methods, techniques and pricing information contained in any proposal submitted by Delta pertaining to this project or in this Agreement or any addendum thereto, are to be considered confidential and proprietary, and shall not be released or otherwise made available to any third party without the express written consent of Delta.

Fax Mail Email Courier Hand Delivery

Project Description: Win911 Upgrade and VC-131 Valve Controller Programming - Revised

Delta Reference #: 2011.11.1677

Programming Services (Task 300):

Win911 Programming	\$24,995
VC-131 Valve Controller Prog.	\$4,080 First site
VC-131 Valve Controller additional sites	\$4,800 For two additional sites
Total Programming Services:	\$33,875

Option: VC-131 Valve Controller \$2,000 Per site for two (2) additional locations

Lump Sum Fee
 Hourly, Time and Material Fee

Brian D. Downing, PE
President

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