Statement of Work
Building Automation System (BAS) Upgrade R2 to AX
July 2012

I. INTRODUCTION. The U.S. Department of State requires a site visit by a qualified specialist technician to our U.S. Embassy to perform BAS Upgrade for the **Network Managers**-based building automation systems (BAS) software suite version 2.301.515. The main BAS controls the operations of the heating, ventilation and air conditioning (HVAC) system throughout the embassy. It senses air flows and temperatures and controls the operations of the chillers, fans, pumps, louvers and other HVAC components in response to preset instructions and parameters. It also monitors potable water and the fuel supply systems. A separate, smaller BAS accomplishes a similar and more limited function for the Controlled Access Area (CAA). The embassy location is as follows:

**American Consulate General Cd Juarez**

II. SCOPE. The purpose of this SOW is to secure materials and qualified technical labor required for successful Upgrade of the BAS at the U.S. Embassy compound. At a minimum the BAS service shall include the following for both the main BAS and the PCC BAS:

1. Preventive Maintenance Site Visit. This on-site visit to post shall be for approximately 10 working days, with coordination performed prior to arrival, and shall consist of the following:

   a. Conduct pre-trip coordination of up to 8 hours with the post via telephone and e-mail, to accomplish the following:

      i. Obtain all possible information from the BAS that will facilitate accomplishment of the preventive maintenance tasks required under this SOW.

      ii. Advise the post on what preparations will need to be made for the visit and what data the post should collect and make available to the BAS technician.

   b. The contractor shall work side by side with post technicians in performing all the tasks at site. These shall include:

      i. Assess, and report on, the operational condition of the BAS components throughout the building, including air handling units, variable air volume boxes, air supply conduit, return air conduit, building exhaust fans, system pressure, temperature and air flow sensors, damper and valve actuators, network controllers and communications lines and devices, and other components. Perform required maintenance and make all possible repairs. Note all activities, corrective actions and remaining deficiencies in the trip report.
ii. Modify software operating instructions to incorporate all heating, ventilation and air conditioning (HVAC) equipment and components installations and changes.

iii. Modify programming instructions to system controllers and other components to ensure their proper, effective, operation.

iv. Confirm the proper response of all air handling units, to include their fans and dampers, to commands from the BAS.

v. Operationally test the smoke purge system and verify the operation of all fans and dampers in the system.

vi. Review system reports, alarms and error logs, and resolve system alarms and errors.

vii. Identify all system components, to include controllers, actuators, sensors and communications devices that need repair, modification or replacement.

viii. Check the functionality of all variable air volume (VAV) boxes throughout the system, and identify boxes that must be adjusted to the Facility Manager and assist the HVAC crew in making the needed repairs and adjustments for optimum performance.

ix. Ensure all components that require a license for access are licensed to “The United States Department of State”.

x. Provide information to post personnel on operation and trouble shooting of the BAS system.

xi. Installation, setup and verification of proper function of MSDE.

xii. Upgrade of Network Managers from R2 to AX. Including CAA area.

2. On completion of the assignment, the specialist shall submit a trip report covering the items specified below providing the information specified, below.

III. CONTRACTOR’S PROPOSAL

The contractor shall include in their proposal:

1. Cost of travel, to include airfare, to the site for the on-site assessment.

2. Cost of hotel and meals at the site for the on-site assessment.

3. Cost of on-site assessment, not including travel, hotel and meals.

IV. QUALIFICATIONS OF BAS CONTRACTOR AND TECHNICIAN. The contractor shall confirm in writing their preparedness to meet each of the requirements of this SOW each of the following qualification requirements, to include the specific hardware and software tools the contractor shall provide. This submission shall include a resume of the technician. These requirements include:


2. The contractor’s specialist technician shall be experienced in servicing BAS.

3. The contractor shall be able to provide software updates to the system, if requested by the COR.

4. In the event that the contractor employees a sub-contractor, the contractor will provide a list of facilities that the sub-contractor successfully installed or serviced BAS in, as well as at least two customer reviews of the performance of the sub-contractor.

5. The BAS technician shall be capable of executing all software programming and adjustments required to complete this SOW.

6. The BAS technician shall have all tools, both software and hardware, WITH ADAPTORS AND CABLES, required to effect repairs to this specific BAS system and its components, to include special software programs, licenses, administrative passwords and tools required to access and update instructions to system controllers, actuators, sensors and all other components.

V. DELIVERABLES. The contractor shall provide the following items to post as part of this statement of work:

1. Licenses and Password/Permissions. All required licenses passwords, and permissions to access the BAS and its operating components. The licensee shall be, “The U.S. Department of State”.

2. Controller Programs and Instructions. All non-proprietary programs and instructions installed on all components of the BAS.

3. Site Visit Trip Report. The specialist shall furnish a trip report within 14 calendar days after return from the Preventive Maintenance site visit. 16 hours for post-trip report preparation is estimated. The specialist shall deliver (3) three electronic copies of trip report in Microsoft Word 2007-compatible file. The report shall:
   a. Identify findings of deficiencies, recommendations and suggestions for improvement.

   b. Make observations regarding training and proficiency of post personnel to operate the BAS.
c. Provide a listing and description of all modifications made to the system software and hardware.

d. Provide a listing of recommended repairs and spare parts to be installed or maintained by the post. This list shall include the following:

   i. Manufacturer’s name.

   ii. Parts number.

   iii. Estimated price.

4. Updated BAS software for the BAS controls stations in the latest version compatible with the version installed.

VI. PRODUCTS USED. Use of U.S. manufactured products is preferred when not required. All provided material must be compatible in size rating and quality to the part it is replacing.

VII. SECURITY AND CLEARANCE REQUIREMENTS.

1. The BAS technician shall possess a security clearance issued by Defense Security Service prior to deployment to any DoS location/site. A favorable DS name check will be required prior to travel to China, and should be requested from DS/IS/IND 14 days in advance of travel. See instructions in Paragraph 7.0, below.

2. The contractor’s laptop shall have its hard drive encrypted using any product on the IT CCB list, or any NIST approved product. Currently, PointSec 4.1 with 3Des or McAfee Endpoint Encryption for PCs Client (formerly SafeBoot Client) Version: 4.2. are DS authorized hard drive encryption products. An overwrite utility software must be used to remove all previous data in the following manner: A first overwrite pass using the number '1'; A second overwrite pass using the number '0'; and a third overwrite pass using ANY character. PDAs used to store and transport project related data must also be encrypted using NIST approved encryption.

3. SPECIAL NOTE: Any loss or compromise of electronic media devices containing DoS information must be reported to the RSO, COR and DS/IS/IND immediately.

VIII. REQUIREMENTS FOR TRAVEL TO SITE AND WORK


2. The contractor shall submit a Visit Authorization Request (VAR), together with a Joint Personnel Adjudication System (JPAS) summary, for the BAS technician traveling to post, to Bureau of Diplomatic Security point of contact at the following address:
Statement of Work for Building Automation System (BAS) Preventive Maintenance
July 2012

Bureau of Diplomatic Security, DS/IS/IND,
e-mail: DSINDOBOVARS@state.gov
fax: 571-345-3000

3. 14 days in advance of travel, the contractor shall furnish the BAS technician’s flight itinerary and security information for a Department of State Country Clearance, which will be submitted thru the COR at post, thru the Bureau of Diplomatic Security to the post for approval, before travel will be allowed. The following information must be provided to the COR:

- full name, date and place of birth,
- Passport type, number and expiration date,
- name of employer,
- position/discipline,
- clearance level,
- date of arrival and expected departure, together with airline flight number and arrival and departure times.

When possible, the COR will provide a copy of the post/site eCC approval response and the country travel information from the eCC website to the contractor. The contractor is responsible for the traveler’s passport, visa, inoculations, and travel arrangements.

4. The contractor shall under no circumstances incur any travel or other costs, or begin the travel to the work site or work at the site until they receive the following:

a. notice to proceed (NTP) from the Contracting Officer (CO),
b. site visit permission from Diplomatic Security,
c. “country clearance” from post.

Once all needed material is on site, visit dates will be coordinated between embassy personnel, contract COR and the contractor.

IX. SERVICE INTERRUPTIONS. The BAS technician shall plan, coordinate, and schedule all BAS site work with the post Facility Manager. Any and all service interruptions shall be subject to approval by the post Facility Manager.

X. DEFECTIVE EQUIPMENT. The BAS technician shall identify to the Facility Manager any defective parts or equipment in the BAS that require replacement. These will be procured at U.S. Government expense.
XI. SITE RESTORATION. The BAS technician shall ensure that all facilities receiving this work shall be left in a condition acceptable to the Facility Manager at post, upon completion of the work.

XII. SAFETY. Safety is the highest priority on this project. The BAS technician shall bring any safety concerns immediately to the attention of the Facility Manager.

XIII. TRAVEL AND PER DIEM. The contractor shall comply with Department of State rules and guidelines prior to incurring any costs. Costs incurred in violation of established travel rules and guidelines of the Department of State shall not be paid. Required passport and visa are a responsibility of the contractor.