# **APPENDIX A - TECHNICAL SPECIFICATIONS**

#### JEA ELECTRIC PLANT HVAC INSPECTION & MAINTENANCE SERVICES

#### 1.0 SCOPE OF WORK

1.1 The purpose of this solicitation is to establish pricing for furnishing HVAC inspection and maintenance services for package systems and split systems located at JEA's electric generating stations. In addition, the services could potentially include capital replacement of some of these systems. The work to be performed by the successful Contractor consists of furnishing all labor, parts, tools, equipment, and subcontracts, as necessary, to provide full service repairs and installation.

#### 2.0 CODES, STANDARDS, AND REGULATIONS

- 2.1 Contractor shall perform all work in accordance with established federal standards and regulations, local codes and regulations, and the current issues of the following codes and regulations.
  - 2.1.1 American National Standards Institute (ANSI)
  - 2.1.2 Air Conditioning and Refrigeration Institute (ARI)
  - 2.1.3 American Society of Heating, Refrigeration, and Air Conditioning Engineers (ASHRAE)
  - 2.1.4 American Society of Mechanical Engineers (ASME)
  - 2.1.5 American Society for Testing and Materials (ASTM)
  - 2.1.6 National Fire Protection Association (NFPA)
  - 2.1.7 Occupational Safety and Health Administration (OSHA)
  - 2.1.8 Manufacturer's Operations and Maintenance Manuals
  - 2.1.9 State/Local Codes
  - 2.1.10 Applicable Industry Standards

In case of a conflict between the above codes and regulations, Contractor will perform all work in accordance with the Authority Having Jurisdiction (AHJ).

# 3.0 FACILITY LOCATIONS AND CONTACTS

3.1 The JEA Representative or their designee shall be the primary contact and authorization for all work performed at the electric plants during normal work hours. In order to facilitate "Contractor Responsibilities", the Company shall, upon award, provide a contact to the respective JEA Representatives responsible for implementation.

#### Contacts During Normal Work Hours

Contacts After Hours

3.2 Northside Generating Station (NGS) 904-665-6701 or 904-665-6703 4433 William Ostner Road, Jacksonville, FL 32226 Eric Runyon

Email: runyee@jea.com (904) 665-6203 Office

Brandy Branch Generating Station (BBGS) 904-665-6602

15701 West Beaver Street, Jacksonville, FL 32234

Keith Gillean

Email: gillkl@jea.com (904) 665-6841 Office

Kennedy Generating Station (KGS) 904-665-6602

4215 Talleyrand Ave, Jacksonville, FL 32206

Keith Gillean

Email: gillkl@jea.com (904) 665-6841 Office

Greenland Energy Center (GEC) 904-665-6602 6850 Energy Center Drive, Jacksonville, FL 32256

Larry Guevarra

Email: guevl@jea.com (904) 665-6332 Office

#### 4.0 **GENERAL REQUIREMENTS**

- Contractor shall provide labor, parts, equipment, and subcontracts on an "as needed" basis for HVAC inspection and maintenance services.
- 4.2 The Contractor shall be qualified to perform all aspects of HVAC inspection and maintenance services, including, but not limited to, the work scope listed herein.
- 4.3 All HVAC inspection and maintenance services shall be accomplished utilizing standard industry procedures and practices. Workmanship will be performed in accordance with all applicable Federal and State regulations and per the conditions set forth within these guidelines.
- Contractor shall comply with all Federal, State, and Local industrial safety rules, regulations, codes, and standards. Contractor shall also abide by all JEA Safety and Security Policies and Procedures, as a minimum requirement.
- Contractor shall employ certified technicians capable of performing the kind of work assigned. All workers employed by the Contractor shall have thorough knowledge of their craft and have experience in an industrial environment. Any worker employed by the Contractor who exhibits inadequate experience, or inability in their field, shall be discharged at the discretion of the JEA Representative. Contractor shall maintain documentation verifying employees' skills in the form of resumes, certifications, training, etc., which will document an employee's ability in their field(s). Documentation will be made available to the JEA Representative upon request. See Paragraph 21.3 for additional information concerning the minimum requirements for each Labor Classification.
- Contractor shall not initiate 'out of scope' services without obtaining prior authorization from the JEA Representative. For example, if during the course of the Work, a potential problem or issue is identified by the Contractor, the JEA Representative shall be notified immediately of the problem/issue and may then initiate an authorization to the Contractor for 'out of scope' services.
- 4.7 Pricing of all work shall be based on the Fixed Price Inspection Rates and Labor and Parts unit prices and markups submitted in the Respondent Rates Workbook.
- Estimates for all HVAC inspection and maintenance services shall be submitted in writing 4.8 to JEA Representative and must, at a minimum, include the estimated labor hours, parts,

- equipment, and subcontract costs associated with the Work. Unless otherwise directed, the cost proposal shall include all items necessary to perform a turnkey job.
- 4.9 The Contractor is advised that other projects may be in progress at the various plant sites during this agreement period. Coordination and cooperation with other Contractors, JEA personnel and others working in the plant area will be required to insure the work will be completed safely and on schedule.
- 4.10 All materials and workmanship supplied by the Contractor shall be first quality in every respect in accordance with the best modern practice. Whenever there is a reasonable doubt about what is permissible and when the quality of any work is not stated, the interpretation which requires the best quality work is to be followed. All final decisions will be the responsibility of the JEA Representative.
- 4.11 Contractor shall be responsible for all labor and material costs associated with the replacement of any existing plant equipment, etc. components that may be damaged by the Contractor during the course of the Work.
- 4.12 JEA will supply 110V and 220V power, and may supply 80 PSI plant service air for the Contractor's use, when and where available.
- 4.13 JEA, upon request, will provide general arrangement drawings for the Contractor to use for the purpose of this contract.

# 5.0 SPECIAL REQUIREMENTS

- 5.1 Contractor's scope shall be directed by the JEA Representative so that HVAC inspection and maintenance services are coordinated with other contractors performing work so that impacts to plant operations or construction progress is minimized.
- 5.2 Contractor shall, if needed, visit the site of the Work and become thoroughly informed of all conditions and factors which would affect the execution and completion of such Work. It is understood and agreed that all conditions and factors pertaining to the work sites have been properly investigated and considered in the preparation of the Contractor's quotation.
- 5.3 JEA may request, at any time, the Contractor to provide an electronic copy of the Contractor's corporate Quality Control Manual for review and verification.
- 5.4 Contractor shall provide a Primary Contact to be assigned to the contract that will be accessible twenty-four (24) hours per day, seven (7) days per week, inclusive of Holidays. This person shall act as the primary interface between JEA and the Contractor. Should there be a change in employment for the Primary Contact (i.e., promotion, resignation, termination, etc.) the Contractor shall notify the JEA Representative within twenty-four (24) hours of the event.
- 5.5 Contractor shall provide a Secondary Contact in the event the Primary Contact is <u>not</u> available for any reason.
- 5.6 Contractor shall provide around the clock on-site / off-site communication capabilities.
- 5.7 Upon arrival at the plant site, the Contractor shall <a href="check-in">check-in</a> with the JEA Representative who will provide a description and location of the required inspection and/or maintenance services. Upon <a href="check-out">check-out</a> from the plant site, the Contractor shall provide the JEA Representative with a daily briefing of the work activities and a written Field Service Report.
- 5.8 Contractor's employees shall have the Contractors' name and an employee number on their hard hat.

- 5.9 Contractor shall verify existing conditions and dimensions prior to starting work. Any discrepancies must be brought to the attention of the JEA Representative.
- 5.10 All HVAC units noted as being located on roof tops should be accessible by ladder or maintenance platform. For those roof top HVAC units that require removal/replacement, special equipment, such as a crane, may be utilized by the Contractor upon approval by the JEA Representative. Payment for equipment rented by the Contractor will be reimbursed at the Equipment Rental Rates stated in the Respondent Rates Workbook.
- 5.11 Contractor shall be solely responsible and assume all liability for the disposal of all waste products (such as chemicals, industrial waste water, general trash, and sanitary waste) that are generated by the Contractor, unless prior arrangements are made with the JEA Representative.
- 5.12 In the event that any service performed under this specification is deemed unacceptable by JEA or any regulatory agency to which JEA is subject, for reasons which are reasonably under the control of the Contractor, all fines and/or penalties assessed against the JEA by any regulatory agency which are due to actions/inactions fully attributable to the Contractor shall be paid in full by the Contractor.
- 5.13 Good communications foster good relationships and benefit all parties. The Contractor may be required to attend and actively participate in pre-construction meetings as well as weekly or daily status meetings. The Contractor shall provide a knowledgeable person for in-person or teleconference meetings. Labor or service charges related to meeting attendance will be permitted upon prior approval by the JEA Representative.

# 6.0 ADDITIONAL REQUIREMENTS

- 6.1 The Contractor may, from time to time, be asked to provide a Lump Sum cost proposal for the replacement of an existing HVAC unit, which would include installation of the new unit.
- 6.2 Upon request, the Contractor shall provide a Lump Sum cost proposal in writing to the JEA Representative for approval. Solicitation of a Lump Sum cost proposal from the Contractor shall not preclude the JEA Representative from seeking alternate cost proposals from other sources.
- 6.3 Upon receipt of a Lump Sum cost proposal, the JEA Representative may request the Contractor's Lump Sum cost proposal be broken down into a Schedule of Values to include, but not be limited to, Labor, Material, and Equipment costs. The Contractor shall comply with this request.
- 6.4 In the event an HVAC unit, any other equipment covered under this service, or any related HVAC equipment/supplies are removed/replaced, it is the responsibility of the Contractor to remove the old equipment and dispose of in a proper manner. JEA does not have disposal facilities for such equipment.

# 7.0 SPECIFIC REQUIREMENTS – HVAC INSPECTION SCHEDULE

Within 30 days of commencement of services, Contractor shall provide the JEA Representative with a complete inspection schedule of all HVAC facilities for each electric generating station to include the (4) Quarterly HVAC Inspections and (1) Annual Condenser Coil Cleaning. At a minimum, the Contractor shall perform the following inspection checks on all HVAC units.

#### 7.1 Quarterly HVAC Inspection Checklist

1. Change ALL air filters. Remove and discard old filters.

- 2. Check ALL belts for adjustment, belt tension and wear; replace, if needed.
- 3. Check pulley alignment.
- 4. Inspect and clean blower wheel, housing, and motor, if applicable.
- 5. Check condition of evaporator pans and drains. Add anti-microbial tablets, as required.
- 6. Measure refrigerant level and fill, as needed.
- 7. Clean and flush condensate drain lines and traps.
- 8. Check condition of evaporator and condenser coils.
- 9. Check unit for noise, leaks, and vibration.
- 10. Check unit for proper operation.
- 11. Inspect and lubricate all motors and fan bearings.
- 12. Check and record all motor amperages and ratings.
- 13. Check set screws on motors, fans sheaves and fan wheels for tightness.
- 14. Inspect fans, shafts and drives for wear and alignment.
- 15. Inspect all wiring for chafing, burning, and deteriorated of insulation.
- 16. Inspect liquid line sight glass and filter drier for proper operation.
- 17. Check and record refrigerant pressures
- 18. Check equipment for proper refrigerant and oil charge.
- 19. Check refrigerant circuit for expansion valve operation, super heat system.
- 20. Check operation of compressor unloader and hot gas by-pass systems.
- 21. Check operation of head pressure controls system.
- 22. Check condensate pan, trap, drain and safety mechanisms.
- 23. Check operation of reversing valve.
- 24. Check accuracy of all temperature and humidity controls. Calibrate, as needed.
- 25. Check thermostat batteries. Replace, as needed.
- 26. Record equipment readings:

•	Compressor voltage
•	Compressor amperage
•	Operating suction pressure
•	Operating head pressure
•	Operating superheat
•	Operating oil level
•	Operating oil pressure
•	Other relevant equipment metrics, as needed

# 7.2 Annual Condenser Coil Cleaning

- 1. Inspect the condenser coil and perform a low pressure water wash using an environmentally sensitive chemical cleaning solution. It is important that care be taken so as to not damage coated coils on certain units.
- 2. Clean the condensate pan and drain.
- 3. The annual condenser cleaning will be perform at the same time as one of the scheduled quarterly HVAC inspections.

# 8.0 CONTRACTOR SAFETY

- 8.1 IT IS EXTREMELY IMPORTANT THAT THE CONTRACTOR AND JEA WORK TOGETHER TO ADDRESS ANY SAFETY CONCERNS SUCH THAT POTENTIAL ACCIDENTS ARE AVOIDED.
- 8.2 All employees of the Contractor, who perform work on JEA property, shall be JEA Safety Qualified. Contractor Supervisors/Foremen will be required to attend the Safety Leadership Development program offered through the Northeast Florida Safety Council (NEFSC) or an equivalent program as required by the JEA Contractor Safety Program.
- 8.3 Site specific training shall be required to work at each electric plant location. The JEA Safety Department or JEA Representatives will provide a PowerPoint Training module for the site location. Contractor is responsible for ensuring <u>ALL</u> personnel have received the appropriate safety training, as required by JEA Contractor Safety Program, and shall submit a roster of the employees who received the training.
- 8.4 Contractors are required to wear Personal Protective Equipment (**PPE**) at all times while on all JEA electric plant sites. **PPE** shall include, but not be limited to, the following; safety glasses, hard hats, hearing protection, safety-toed boots, all types of work gloves, etc. **The cost of all PPE shall be included in the Hourly Labor Rates.**
- 8.5 Hearing protection is required while working in electric plant power block areas and when operating machinery or equipment (including saws).
- 8.6 Contractor employees are not permitted to wear ripped jeans, shorts, tennis shoes, sleeveless shirts, or shirts with offensive logos or messages.
- 8.7 Contractor shall provide warning signs and barricade tape at all approaches when HVAC inspection and maintenance services are being performed in the plant areas.
- 8.8 Contractor shall maintain a safe work environment at all times. Contractor shall keep their work areas free of trip hazards/overhead hazards daily and shall maintain excellent housekeeping through the completion date of each task.
- 8.9 Contractor shall utilize barricades or other processes necessary to keep the job site clean and isolated from JEA employees or other workers.
- 8.10 JEA utilizes numerous chemicals, industrial gases, and fuel types in the electric production process. During the course of work, the Contractor may encounter or come in close proximity with these hazardous elements. The Contractor and JEA Representative shall work closely to identify these hazards prior to entering a work area through the use of Safety Task Assignment, Job Hazard Analysis, or similar template. Should the Contractor detect a gas leak or chemical spill in the work area, the JEA Representative shall be notified immediately and all Contractor employees relocated to a safe distance upwind of the leak or spill.
- 8.11 Contractor shall abide by the JEA Hot Work Permit Program, Lock Out/Tag Out Procedure and the Confined Space Entry Procedure.
- 8.12 Contractor shall abide by the JEA Contractor's Safe Work Practices Manual.

# 9.0 ENVIRONMENTAL

9.1 JEA is under strict environmental standards with respect to all construction activities, including purchasing, delivery, erection, and operation / maintenance of equipment.

- 9.2 Violations of standards may result in fines against and/or imprisonment of the guilty parties. The Contractor's work shall be in compliance with all applicable environmental standards. The Contractor is liable for breeches of permit conditions instigated by its personnel.
- 9.3 JEA shall assist the Contractor in environmental compliance by providing information upon request and monitoring the work. Environmental standards are contained in permits, permit application materials, Conditions of Certification, stipulations, and compliance documents. Copies of these documents are available for inspection at the JEA Environmental Compliance office. The Contractor shall cooperate fully with JEA in insuring compliance, including participating in meetings, implementing the JEA Contract Administrator's instructions, and performing other actions as requested.
- 9.4 Contractor shall be responsible for the control and disposal of any hazardous materials. Contractor shall supply JEA with Safety Data Sheets (SDS) for all hazardous materials that are utilized during the execution of the work.
- 9.5 Asbestos or other toxic materials are prohibited and are not to be brought on any JEA site. Should the Contractor encounter materials within the plant sites that are suspected to contain asbestos, the Contractor shall immediately notify the JEA Representative for appropriate action.

# 10.0 SECURITY

- 10.1 Contractor shall supply a list of names of the personnel they will be using for HVAC inspection and maintenance services to the JEA Representative one (1) week prior to start of a task so that they can secure their access into the plant. **Photo ID's are required for all personnel that will be working on JEA property.**
- 10.2 Only authorized Contractor personnel shall have drive-on plant access. Contractor shall be responsible for transporting their personnel from the JEA designated parking area to their work area.
- 10.3 A JEA issued security badge shall be visible at all times while on JEA property.
- 10.4 Background checks and mandatory training may be required for entry to NERC regulated spaces.
- 10.5 Parking on JEA property shall be approved through the JEA Representative. Parking for Company vehicles and Company personnel vehicles is limited to four (4) vehicles within the NGS facility. All Company vehicles driven onto plant sites must be properly identified with Company placards and emergency contact information placed on the dashboard when vehicle is parked or left unattended. Additional parking for personnel is available off-site in the designated Contractor parking area.
- 10.6 JEA requires the Contractor to notify the JEA Representative when any material, tooling, equipment, etc., is required to leave JEA property so that a Property Custody Pass can be issued. JEA policy states that whenever their tools and/or equipment leave the plant site a "Gate Pass" shall be issued.
- 10.7 Certain work for JEA may entail entering maritime facilities, such as the fuel loading docks and/or the adjoining JAXPORT properties, all of which are governed by the Transportation Security Administration (TSA). In order to gain access these facilities, the Contractor must obtain, in advance and at their own cost, a Transportation Worker Identification Credential (TWIC). The estimated cost is \$125.00 and is valid for five (5) years. Eligibility for a

TWIC is subject to certain immigration and criminal background check requirements. Additional details may be found at www.TSA.gov.

# 11.0 TOOLS AND EQUIPMENT

- 11.1 Contractor shall provide their own tools and equipment necessary to perform HVAC inspection and maintenance services, as directed by JEA. The cost of tools and equipment shall be included in the rates identified in the Respondent Rates Workbook. No additional compensation will provided for specialty tools or equipment, unless specifically authorized by the JEA Representative.
- 11.2 Contractors are responsible for ensuring all tools and equipment used in JEA facilities and job sites are in safe operating condition.
- 11.3 Tools should be inspected before use to identify and repair any damage.
- 11.4 Tools should not be left in aisles, corridors or on ladders or other walkway surfaces.
- 11.5 Tools used on raised platforms should be secured with a safety line, or other method to prevent them from falling.
- 11.6 Use of tools or equipment, which produces dust or other particulate, must have adequate controls in place to minimize/prevent particulate fallout.
- 11.7 Non-sparking or explosion-proof tools/equipment must be used in flammable liquid storage areas or where concentrations of flammable vapors or combustible dusts may exist.

# 12.0 ACTIVATION OF FIRE ALARM (SMOKE, HEAT OR WATER FLOW):

The nature of work to be performed may produce heat, smoke, steam, dust or vapors, which may result in the activation of an alarm. To avoid Contractor caused alarms, the Contractor will notify the JEA Representative who will issue a hot work permit (permit valid for one shift only) before any procedure. After such procedures are concluded, Contractor shall notify the JEA Representative who will inspect and re-arm the alarm system

- 12.1 **Fire Alarms:** Cutting, sanding and general work will generate dust, smoke and vapors that may activate the Fire Alarm system. The Contractor must check in with the JEA Representative and have the fire alarm system turned off before beginning work or temporarily deactivate the smoke/heat detectors in the work area.
- 12.2 **Clean Agent:** If the Contractor's negligence results in a release of the Clean Agent (e.g. FM 200), the Contractor will be responsible for all costs incurred to refill and restore the suppression system.

# 13.0 ASSET TRACKING, SERVICE TRACKING AND REPORTS

- 13.1 The Contractor shall maintain a detailed record of all maintenance and repairs relating to the equipment included in this agreement. Service reports are to be submitted to the JEA Representative upon completion of each inspection as long as the equipment checks out satisfactorily. If a problem is found that has the potential to be a major problem, or if it may be the cause for shutdown repairs, this problem must be directly brought to the attention of the JEA Representative so that a plan of action can be formulated for the timeliest repair to the equipment.
- 13.2 Within 90 days of commencement of services, the Contractor shall conduct a complete survey of all electric generating station HVAC equipment listed in Appendix A. The Contractor shall verify the HVAC asset inventory information by verifying the

- manufacturer's name, model number, serial number, cooling capacity, filter size(s), building location, and unit location. Contractor shall notify the JEA Representative of any updates to the HVAC Asset Inventory list.
- 13.3 In the event a unit is replaced by the Contractor during the term of the contract, the Contractor shall provide the new asset information, described above, to the JEA Representative. Likewise, JEA will provide asset information for a new unit should a different Contractor install the new unit.
- 13.4 The Contractor shall possess the capabilities to track and report all services performed. Reporting shall include date of service, unit serviced, JEA provided PWO number, location, faults found and repairs / service performed, technicians performing services, and parts / materials required to perform services.
- 13.5 JEA may request, at any time, the Contractor to provide an electronic copy of the Service Reports for review and verification. Contractor shall furnish the reports to the JEA Representative within seventy-two (72) hours of the request.

# 14.0 WORK HOURS

- 14.1 Straight Time (ST) hours are performed from eight (8) to twelve (12) hours per day (the "Normal Work Day"), not to exceed forty (40) hours per week (the "Work Week"). A Normal Work Day may take place during the day, afternoon, or night shift.
- 14.2 Overtime (OT) hours are performed outside of a Normal Work Day or Work Week, including weekends and holidays. Overtime shall be approved in advance by the JEA Representative and shall be paid after an employee has worked forty (40) hours for the Work Week or worked more than the Normal Work Day.
- 14.3 Contractor shall not be permitted to perform overtime work without prior approval of the JEA Representative.

# 15.0 RESPONSE TIME

- 15.1 Contractor shall provide a monitored 24 hours a day, 7 days a week telephone number, in the event the Company's primary contact is <u>not</u> available for any reason.
- 15.2 The Contractor agrees to a maximum of a thirty (30) minute call back.
- 15.3 The Contractor shall have a technician on-site within two (2) hours for an Emergency Service Call and within eight (8) hours for a Standard Service Call.

# 16.0 STANDARD SERVICE CALL

- 16.1 All service requests performed during a Normal Work Day will be defined as a "Standard Service Call" and shall be invoiced at the Straight Time Hourly Rates indicated in the Respondent Rates Workbook. Upon notice of a Standard Service Call, the Contractor shall be on-site within eight (8) hours of the request. The service request by JEA will typically be made by phone call, by email, or by both.
- 16.2 In some instances, a service request may be mutually scheduled between the JEA Representative and the Contractor. In the event, the Contractor is not able to fulfill the scheduled appointment time, the Contractor shall notify the JEA Representative as soon as they are aware of the change.
- 16.3 Upon arrival at the plant site, the Contractor shall check-in with the JEA Representative who will provide a description and location of the problem, to the extent possible. Upon troubleshooting the problem, the Contractor will either place the system back into normal

operation or provide the JEA Representative with a detailed explanation of the problem and verbal estimate to complete to the repair. Upon check-out from the plant site, the Contractor shall provide a Field Service Report to the JEA Representative. The Contractor shall follow up the verbal estimate with a written estimate to the JEA Representative within 24 hours.

# 17.0 EMERGENCY SERVICE CALL

- 17.1 Contractor shall be required to respond within two (2) hours for an emergency call-out. An "Emergency Service Call" is defined as a call-out which occurs outside of (before or after) normal work hours (i.e. after 5 PM), Monday through Friday, excluding Holidays as defined herein.
- 17.2 An Emergency Service Call shall be invoiced at the Overtime Hourly Rates indicated in the Respondent Rates Workbook. The minimum billable hours for an Emergency Service Call shall be four (4) hours. The Contractor shall demonstrate that they have capable personnel and established procedures in place to respond to an Emergency Service Call 24 hours per day, 7 days per week, inclusive of all holidays.
  - 17.2.1 JEA may request, and the Contractor shall provide within 48 hours, a local roster of personnel, emergency contact list (on-call list) and communication plan with an hourly work schedule.
- 17.3 When emergency repair services are requested, the JEA employee making the request must be able to obtain voice contact with a person capable of assuring that the request has been received and that an appropriate response will be initiated. The Contractor shall provide a telephone response to the JEA employee making the request within 30 minutes. Contractor personnel must be on-site ready to perform required services within two (2) hours, after the 30 minute call back of the initial request. JEA retains the right to assess the Contractor for any damages caused by the Contractor's failure to respond within the specified time limitations. Company may be excused for not meeting a Response Time if the delay was due to Force Majeure evenest as defined in the Contract Documents. Conditions such as employee illness, vehicle problems or similar situations are not acceptable reasons for an untimely response.
- 17.4 If the Contractor receives a request for an Emergency Service Call due to an issue that could have reasonably been detected during the periodic inspections, but was not reported by the Contractor, the Contractor shall be required to bear the full cost to resolve the emergency repair services.

# 18.0 FIELD SERVICE REPORTS

- 18.1 Field Service Reports shall be submitted to the JEA Representative upon completion of a maintenance service call.
- 18.2 Upon check-out, the Contractor shall submit a legible Field Service Report describing, at a minimum, the work performed, parts replaced, hours worked, date worked, time-in, time-out, and Technician's name. Upon approval by the JEA Representative will sign and date the acceptance of the Field Service Report.
- 18.3 The Field Service Report shall serve as part of the backup documentation for payment invoicing and shall be submitted with the invoice.
- 18.4 If the Field Service Report uncovers a problem that has the potential to be a major problem, or if it may be the cause for plant shutdown repairs, this problem must be immediately

brought directly to the attention of the JEA Representative so that a plan of action can be formulated for the timeliest repair to the equipment or system.

# 19.0 <u>INSPECTION REPORTS</u>

- 19.1 Inspection Reports shall be submitted to the JEA Representative after the completion of each inspection. The report shall be in sufficient detail describing all work that was performed and all corrective work necessary to be performed
- 19.2 The Contractor shall indicate on the first page of the report, the frequency period (i.e., Quarterly, Annual, etc.) the date of the inspection, the Technician's Name, the HVAC unit #, the plant location, model #, serial #, etc.
- 19.3 The Inspection Report shall be submitted electronically to the JEA Representative and shall serve as part of the backup documentation for payment invoicing.
- 19.4 If a problem is found that has the potential to be a major problem, or if it may be the cause for plant shutdown repairs, this problem must be immediately brought directly to the attention of the JEA Representative so that a plan of action can be formulated for the timeliest repair to the equipment or system.

#### **20.0 FIXED RATES (INSPECTIONS)**

# 20.1 Inspections – also refer to the Respondent Rates Workbook

- 20.1.1 HVAC inspections shall be performed annually at a Fixed Rate. Compensation will be made for each inspection that is performed per the bid costs indicated in the Respondent Rates Workbook.
- 20.1.2 The rates of all HVAC inspections shall remain fixed during the entire contract duration. Any adjustments to the pricing, due for example, to system expansions, errors in the estimated quantities, etc., shall be negotiated with the JEA Representative before the inspections are initiated.
- 20.1.3 The Inspection Report shall serve as part of the backup documentation for payment invoicing and shall be itemized as a line item on the invoice.
- 20.1.4 Any inspections not covered by a Fixed Rate under this contract must be approved by the JEA Contract Administrator prior to the start of Work.
- 20.1.5 Maintenance and repairs determined to be over and above the industry requirements for routine inspections will be invoiced utilizing the T&M rates established in the Respondent Rates Workbook.

#### 21.0 TIME & MATERIAL (T&M) COST METHOD

#### 21.1 Payment

21.1.1 JEA will pay the Contractor for T&M work in the manner set forth below and the compensation provided shall constitute full payment for the work.

#### 21.2 **Invoicing**

- 21.2.1 On a monthly basis, the Contractor shall submit a <u>preliminary</u> invoice to the JEA Representative for approval. The preliminary invoice shall contain, at a minimum, the following backup documentation:
  - 21.2.1.1 JEA Purchase Order number.
  - 21.2.1.2 Invoice number.

- 21.2.1.3 Task Title.
- 21.2.1.4 Invoice billing period.
- 21.2.1.5 JEA Representative.
- 21.2.1.6 JEA electric plant and generating unit #.
- 21.2.1.7 Task Order description, to include HVAC units serviced.
- 21.2.1.8 Invoice summary for each task order to include line item expenses for labor and materials with totals for each. (See Attachment A).
- 21.2.1.9 Field Service Report approved by the JEA Representative that indicates the number of labor hours worked each day.
- 21.2.1.10 Per Diem & Travel expense will not be permitted under this contract.
- 21.2.1.11 Receipts for Materials/Parts purchases.
- 21.2.1.12 Receipts for Equipment Rentals.
- 21.2.1.13 Receipts for Subcontracts.
- 21.2.1.14 Other backup documentation, as deemed necessary to verify accuracy of billing.
- 21.2.2 Any markups for equipment or third party services not covered under this contract must be submitted and approved by the JEA Contract Administrator prior to the start of Work.
- 21.2.3 Upon approval by the JEA Representative, a <u>final</u> invoice shall be submitted per the JEA Purchase Order instructions.
- 21.2.4 Final invoicing shall be submitted within sixty (60) days of project task completion.

#### 21.3 Labor Classifications

- 21.3.1 <u>Key Personnel Minimum Requirements</u>
  - 21.3.1.1 <a href="https://docs.org/html/HVAC">HVAC</a> Technician</a> Journeymen Technicians perform inspections and maintenance repairs on various HVAC systems as well as new installations and/or commissioning. Technicians shall have a minimum of 4 years of field experience, including training and certifications that are compliant with applicable industry standards. All Journeymen must possess an EPA CFC608 Universal Certification.
  - 21.3.1.2 <u>HVAC Technician Helper (Apprentice)</u> Apprentice Technicians assist Journeyman Technicians to perform inspections and maintenance repairs on various HVAC systems. Duties are restricted to those who have received training that is compliant with industry standards. Apprentice Technicians shall possess 1-2 years of field experience, preferably in an industrial plant environment.

#### 21.4 Hourly Labor Rates

21.4.1 HVAC inspection and maintenance services will be performed on a per-hour basis with a minimum of one (1) hour. Hourly Labor Rates shall be provided in the Respondent Rates Workbook and will begin when the Technician arrives at the job site.

- 21.4.2 Hourly Labor Rates shall be <u>all-inclusive</u> such that each job classification shall include wages, taxes, benefits, workers compensation, general & administrative costs, profit and overhead, mileage to and from the JEA plant sites (unless Per Diem is applicable) and any other salary burdens for the worker's employment.
- 21.4.3 Hourly Labor Rates shall be quoted inclusive of <u>ALL</u> Personal Protective Equipment (**PPE**). See Paragraph 8.4 of this specification for additional details.
- 21.4.4 Hourly Labor Rates shall be quoted inclusive of <u>ALL</u> applicable training, certifications, and approvals required to operate vehicles and/or equipment and to safely perform the Work at the specified job sites in an environmentally responsible manner.
- 21.4.5 Hourly Labor Rates shall remain fixed for the three (3) year contract duration. Thereafter, the Contractor may request a Consumer Price Index (CPI) adjustment annually per the Contract Terms & Conditions.
- 21.4.6 Contractor shall make arrangements to allow all work as defined in this specification to be completed during Straight Time work hours.
- 21.4.7 Contractor will be paid at the "Hourly Labor Rate" indicated in the Respondent Rates Workbook for all classifications of labor that are engaged in the Work.
- 21.4.8 The Overtime Hourly Rate shall not exceed 1.5 times the Straight Time Hourly Rate for work performed after normal work hours, including weekends and holidays. Double time will not be paid.
- 21.4.9 Contractor's employees shall be assigned a single job classification and shall be invoiced at that Labor Rate. In no instance shall an employee be invoiced at a higher paying job classification, unless a promotion has taken place. In this instance, the JEA Contract Administrator and JEA Representative shall be informed of the change within 48 hours.
- 21.4.10 Any Labor Classifications not covered by Fixed Rates under this contract must be approved by the JEA Contract Administrator prior to the start of Work.

#### 21.5 Replacement Parts

- 21.5.1 For replacement parts purchased by the Contractor and used in the execution of the work, the Contractor shall be paid the actual cost of such parts, including sales taxes if required, and freight and delivery charges as shown by original receipted bills. A mark-up amount shall be added to the parts cost, but shall not be added to applicable sales tax, expedite charges, delivery or freight charges. The mark-up amount shall equal the "Parts Mark Up" as stated in the Respondent Rates Workbook. The "Parts Mark Up" shall not exceed 15%.
- 21.5.2 The calculation for "Parts Mark Up" shall be expressed as follows:

Example: Cost of Replacement Part = \$200.00 "Parts Mark Up" = 10% Total Parts Cost plus Mark Up = \$200.00 x 1.10 = \$220.00

21.5.3 JEA reserves the right to select and approve, or to reject the parts/materials to be used and the sources of supply of any parts/materials furnished by the Contractor. OEM replacement parts are not mandatory if approved by the JEA Representative.

#### 21.6 Equipment Rentals

- 21.6.1 For those instances in which equipment rental is necessary for maintenance repairs, JEA will pay the actual equipment rental cost of such equipment, including sales taxes if required, and freight and delivery charges as shown by original receipted invoices. A mark-up amount shall be added to the equipment rental cost, but shall not be added to applicable sales tax, expedite charges, delivery or freight charges. The mark-up amount shall equal the "Equipment Rental Mark Up" as stated in the Respondent Rates Workbook. The "Equipment Rental Mark Up" shall not exceed 10%.
- 21.6.2 The calculation for "Equipment Rental Mark Up" shall be expressed as follows:

```
Example: Cost of Equipment Rental = $1,000.00

"Equipment Rental Mark Up" = 10%

Total Equipment Rental plus Mark Up = $1,000.00 x 1.10 = $1,100.00
```

21.6.3 JEA reserves the right to select and approve, or to reject the equipment to be used and the sources of supply of any equipment furnished by the Contractor.

#### 21.7 Subcontracts

- 21.7.1 The Contractor will be permitted to utilize approved Subcontracts to assist with the execution of the work. JEA will pay the actual Subcontractor's cost as shown by copies of original receipted invoices. A mark-up amount shall be added to the Subcontractor cost. The mark-up amount shall equal the "Subcontract Mark Up" as stated in the Respondent Rates Workbook. The "Subcontract Mark Up" shall not exceed 10%.
- 21.7.2 The calculation for "Subcontract Mark Up" shall be expressed as follows:

```
Example: Cost of Subcontract = $500.00
"Subcontract Mark Up" = 10%
Total Subcontract plus Mark Up = $500.00 x 1.10 = $550.00
```

- 21.7.3 In no instance shall the value of the Subcontractor's work exceed that of the Contractor, unless prior approval is permitted by the JEA Representative.
- 21.7.4 JEA reserves the right to select and approve, or to reject Subcontractors to be utilized by the Contractor.

#### 21.8 Administrative Costs

- 21.8.1 Administrative costs will not be permitted as a separate billable cost. These costs must be included in the Hourly Labor Rates bid.
- 21.8.2 Time spent by the Contractor developing an estimate for a job will not be permitted as a separate billable cost. These costs must be included in the Hourly Labor Rates bid.

# **Brandy Branch Generating Station Process-related HVAC Units**

Plant In S	Service Dat	te: 2001
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Brandy Branch Generating	ig Station Process-relati	ea H	VAC Units					Plant In Service Date: 200				
Building #/Description	Unit Location	Unit#	Unit Brand	Capacity	Refrigerant	Filter Size	Model Number	Serial Number	Install Date			
BBGS Common												
PDC - Building 8	East Wall (#1)	27	Bard (wall mount)	6 Ton	410A	1 - 20x30x2	W70A2-CO9BPXXXJ	405D153220648-02	5/2015			
PDC - Building 8	West Wall South unit (#2)	28	Bard (wall mount)	6 Ton	410A	1 - 20x30x2	W70A2-CO9BPXXXJ	405F153233900-02	5/2015			
PDC - Building 8	South Wall West unit (#3)	29	Bard (wall mount)	6 Ton	410A	1 - 20x30x2	W70A2-CO9BPXXXJ	405D153220646-02	5/2015			
PDC - Building 8	South Wall East unit (#4)	22	Bard (wall mount)	6 Ton	410A	1 - 20x30x2	W70A2-CO9BPXXXJ	405D153220647-02	5/2015			
PDC - Building 8	North Wall East unit (#5)	23	Bard (wall mount)	5 Ton	410A	1 - 20x30x2	W60L2-C09BPXXXJ	326F153220673-02	5/2015			
PDC - Building 8	North Wall West unit (#6)	24	Bard (wall mount)	5 Ton	410A	1 - 20x30x2	W60L2-C09BPXXXJ	326D153230202-02	5/2015			
PDC - Building 8	West Wall North unit (#7)	25	Bard (wall mount)	2.5 Ton	410A	1 -16x30x2	W30A2-C06BPXXXJ	300D153220535-00	5/2015			
PDC - Building 8	West Wall Middle unit (#8)	26	Bard (wall mount)	2.5 Ton	410A	1 -16x30x2	W30A2-C06BPXXXJ	300D153220536-02	5/2015			
Building 20 - Cooling Tower MCC	South Wall West unit	34	Bard (wall mount)	2.5 Ton	410A	1 - 16x30x2	W30A2-CO6BPXXXJ	300D153220538-02	5/2015			
Building 20 - Cooling Tower MCC	South Wall East unit	33	Bard (wall mount)	6 Ton	410A	1 - 20x30x2	W70A2-CO9BPXXXJ	405D153220649-02	5/2015			
Building 20 - Cooling Tower MCC	North Wall East unit	35	Bard (wall mount)	2.5 Ton	410A	1 - 20x30x2	W70A2-CO9BPXXXJ	405D153220650-02	7/2014			
Building 20 - Cooling Tower MCC	North Wall West unit	36	Bard (wall mount)	2.5 Ton	410A	1 - 16x30x2	W30A2-CO9BPXXXJ	300J143137864-02	5/2015			
Building 20 - Cooling Tower MCC	North Wall Center unit	37	Bard (wall mount)	2.5 Ton	410A	1 - 16x30x2	W30A2-CO9BPXXXJ	300J143137865-02	7/2014			
Building 16 (Garajmahal)	Air Handler - Inside ground floor	39	Carrier	6 Ton	410A	2 - 20x20x1	FB4CNP060	0515A82435	5/2015			
Building 16 (Garajmahal)	Condensing unit - outside N wall	39	Carrier	6 Ton	410A		25HCD448A300	4714E16090	5/2015			
Water Lab Bldg 6 (East unit)	Outside East wall	30	Trane Package	3 Ton	410A	2 - 20x30x2	WSCO36E4ROA1H000000000000000000000000000000000000	151410598L	4/2015			
Water Lab Bldg 6 (West unit)	Outside Fast wall	21	Trano Backago	2 Ton	4104	2 20/20/2	WSCO25E4BO &1 H00000000000000000000000000000000000	1514105661	4/2015			
• • • • • • • • • • • • • • • • • • • •	Outside East wall north of combined cycle	31	Trane Package	3 Ton	410A	2 - 20x30x2	WSC036E4ROA1H0000000000000000B0000000000	131410300L	4/2015			
Misc. Service Bldg.  BBGS 1	north of combined cycle	32	GCI Ice Wagon									
U1 GEC	North Roof	12	Carrier (package)	6 Ton	410A	4 - 16x16x2	50TC-A07A2B6A0A0A0	4413C84004	7/2014			
U1 GEC	South Roof	13		6 Ton	410A 410A	4 - 16x16x2 4 - 16x16x2	50TC-A07A2B6A0A0A0	4514C79886	4/2015			
	East side near stack	2	Carrier (package) Bard	3 Ton	410A 410A	1 - 16x30x2	W36A2-A10XP4XXJ0	309D153220572-02	5/2015			
U1 Natural Gas House - White Bldg . U1 PEC- Bldg 17	Outside West wall	11	Carrier Package	7.5 Ton	410A 410A	4 - 16x20x2	50TCD08A2B6A0A0A0	3611G20239	9/2011			
CO <sub>2</sub> Refrigeration System	CO <sub>2</sub> Skid	38	Ansul	6 Ton	410A 404A	4 - 10x20x2	510C9033S-N461P1-1	297378	2000			
CO <sub>2</sub> Condensing Unit	CO <sub>2</sub> Skid	14	Copeland	6 Ton	404A		FJAL-A101-CAV-001	257570	Original			
BBGS 2	00201110	1	Сорсіана	0 1011	40471		13/12/1201 0/14 001		Original			
	North Wall East unit	5	Bard (wall mount)	2 Ton	410A	1 - 16x25x2	W24A2-C06XPXXXJ	316D153220522-02	4/2015			
Building 12 U-2 MCC/CEMS Building 12 U-2 MCC/CEMS	North Wall West unit	6	Bard (wall mount)	2 Ton	410A 410A	1 - 16x25x2	W24A2-C06XPXXXJ	316D153220522-02	4/2015			
	South Wall East unit	3	Bard (wall mount)	3 Ton	410A 410A	1 - 16x30x2	W36A2-C06XPXXXJ	311D153220591-02	4/2015			
Building 12 U-2 MCC/CEMS	South Wall West unit	4	Bard (wall mount)	3 Ton	410A 410A	1 - 16x30x2	W36A2-C06XPXXXJ	311D153220591-02	4/2015			
Building 12 U-2 MCC/CEMS								İ				
U2 GEC	North Roof South Roof	16 17	Carrier (package)	6 Ton	410A	4 - 16x16x2 4 - 16x16x2	50TC-A07A2B6A0A0A0 50TC-A07A2B6A0A0A0	0514C78267 3512C82384	7/2014			
		1	Carrier (package)	6 Ton	410A				Original			
U2 PEC- Bldg 14	Outside West wall	15 1	Carrier Package	7.5 Ton	410A	4 - 16x20x2	50TCD08A2B6A0A0A0	3611G20228	9/2011			
U2 Natural Gas House - White Bldg . CO <sub>2</sub> Refrigeration System	East side near stack CO <sub>2</sub> Skid	1	Bard Ansul	3 Ton 6 Ton	410A 404A	1 - 16x30x2	W36A2-A10XP4XXJ 510C9033S-N461P1-2	309D153220571-02 237373	5/2015 2000			
BBGS 3	CO <sub>2</sub> Skiu		Alisui	0 1011	404A		310030333-144017 1-2	23/3/3	2000			
	North Moll Foot with	-	David (cortlane cort)	2.7	4404	4. 45:25:2	W2442 COCVENOVA	24.504.52220522.02	5/2045			
Building 11 U-3 MCC/CEMS	North Wall Wast unit	1	Bard (wall mount)	2 Ton	410A	1 - 16x25x2	W24A2-C06XPXXXJ	316D153220523-02	5/2015			
Building 11 U-3 MCC/CEMS	North Wall West unit	8	Bard (wall mount)	2 Ton	410A	1 - 16x25x2	W24A2-C06XPXXXJ	316D153220521-02	5/2015			
Building 11 U-3 MCC/CEMS	South Wall Wast unit	9	Bard (wall mount)	3 Ton	410A	1 - 16x30x2	W36A2-C06XPXXXJ	311D153220590-02	5/2015			
Building 11 U-3 MCC/CEMS	South Wall West unit	10	Bard (wall mount)	3 Ton	410A	1 - 16x30x2	W36A2-C06XPXXXJ	311D153220592-02	5/2015			
U3 GEC	North Roof	20	Carrier (package)	6 Ton	410A	4 - 16x16x2	50TC-A07A2B6A0A0A0	0415C84954	5/2015			
U3 GEC	South Roof	21	Carrier (package)	6 Ton	410A	4 - 16x16x2	50TC-A07A2B6A0A0A0	4514C80105	5/2015			
U3 PEC- Bldg 9	Outside West wall	19 18	Carrier Package	7.5 Ton	410A 404A	4 - 16x20x2	50TCD08A2B6A0A0A0	3611G20231	9/2011			
CO <sub>2</sub> Refrigeration System	CO <sub>2</sub> Skid	19	Ansul	6 Ton	404A	l	510C9033S-N461P1-3	9038-3	2001			

as of March 2019 APPENDIX A

# **Brandy Branch Generating Station Process-related HVAC Units**

Brandy Branch Generating	Plant In Service Date: 2	2001							
Building #/Description	Unit Location	Unit#	Unit Brand	Capacity	Refrigerant	Filter Size	Model Number	Serial Number	Install Date

Filter List 24 - 16 x 16 x 2

12 - 16 x 20 x 2

4 - 16 x 25 x 2

11 - 16 x 30 x 2 2 - 20 x 20 x 1

12 - 20 x 30 x 2

#### as of March 2019 APPENDIX A

# 

CO<sub>2</sub> Skid

01

Copeland

<b>Greenland Energy Center Proces</b>	s-related HVAC	CUnit	ts					Plant In Service Date: 2	2011
Building #/Description	Unit Location	Unit #	Unit Brand	Capacity	Refrigerant	Filter Size	Model Number	Serial Number	Install Date
GEC Common									
PDC (Power Distribution Center)	East Wall - Unit 4	4	Bard (wall mount)	6 Ton	410A	1 - 16x30x1	W70A1-C09BXAXXJ	339C102689400-02	Original Equipment
PDC (Power Distribution Center)	East Wall - Unit 5	5	Bard (wall mount)	6 Ton	410A	1 - 16x30x1	W70A1-C09BXAXXJ	339C102689399-02	Original Equipment
PDC (Power Distribution Center)	North Wall - Unit 8	8	Bard (wall mount)	3 Ton	410A	1 - 14x28x1	W36A1-C09BXAXXJ	311C102689731-02	Original Equipment
PDC (Power Distribution Center)	North Wall - Unit 1	1	Bard (wall mount)	6 Ton	410A	1 - 16x30x1	W70A1-C09BXAXXJ	339C102689401-02	Original Equipment
PDC (Power Distribution Center)	North Wall - Unit 2	2	Bard (wall mount)	6 Ton	410A	1 - 16x30x1	W70A1-C09BXAXXJ	339C102689403-02	Original Equipment
PDC (Power Distribution Center)	North Wall - Unit 3	3	Bard (wall mount)	6 Ton	410A	1 - 16x30x1	W70A1-C09BXAXXJ	339C102689402-02	Original Equipment
PDC (Power Distribution Center)	West Wall - Unit 9	9	Bard (wall mount)	2 Ton	410A	1 - 12x20x1	W24A1-C06BXAXXJ	316C102688668-02	Original Equipment
PDC (Power Distribution Center)	West Wall - Unit 10	10	Bard (wall mount)	2 Ton	410A	1 - 12x20x1	W24A1-C06BXAXXJ	316C102688667-02	Original Equipment
PDC (Power Distribution Center)	South Wall - Unit 7	7	Bard (wall mount)	3 Ton	410A	1 - 14x28x1	W36A1-C09BXAXXJ	311C102689730-02	Original Equipment
PDC (Power Distribution Center)	South Wall - Unit 6	6	Bard (wall mount)	6 Ton	410A	1 - 16x30x1	W70A1-C09BXAXXJ	339C102689398-02	Original Equipment
Natural Gas House	South Wall	-	LG Window Unit	7000 BTU	410A	1 - washable	LW7010HR	103TAKK01765	Original Equipment
GEC 1									
PEECC Packaged Electrical Electronic Control Center	South Wall - Left	5B	Bard (wall mount)	5 Ton	410A	1 - 20x30x1	WA602-C15XX5XXJ	155J082534704-02	Original Equipment
PEECC Packaged Electrical Electronic Control Center	South Wall - Right	5A	Bard (wall mount)	5 Ton	410A	1 - 20x30x1	WA602-C15XX5XXJ	155J092641375-02	Original Equipment
CEM'S Shelter #1	North Wall	4A	Bard (wall mount)	2 Ton	410A	1 - 16x25x2	W24A1-A05XP4XXJ	314B102685893-02	Original Equipment
CEM'S Shelter #2	South Wall	4B	Bard (wall mount)	2 Ton	410A	1 - 16x25x2	W24A1-A05XP4XXJ	314B102685895-02	Original Equipment
LCI/Excitation Compartment (LEC)	North Wall	6B	Bard (wall mount)	5 Ton	410A	1 - 16x30x1	WA602-C15XX5XXJ	155D092621376-02	Original Equipment
LCI/Excitation Compartment (LEC)	South Wall	6A	Bard (wall mount)	5 Ton	410A	1 - 16x30x1	WA602-C15XX5XXJ	155D092621375-02	Original Equipment
CO <sub>2</sub> Condensing Unit	CO <sub>2</sub> Skid	02	Copeland	6 Ton	404A	none	CJAL-0200-TAD-160		Original Equipment
GEC 2									
PEECC Packaged Electrical Electronic Control Center	South Wall - Left	2B	Bard (wall mount)	5 Ton	410A	1 - 20x30x1	W60A2-C00	567B14234704-02	7/17/2015
PEECC Packaged Electrical Electronic Control Center	South Wall - Right	2A	Bard (wall mount)	5 Ton	410A	1 - 20x30x1	WA602-C15XX5XXJ	155J092641374-02	Original Equipment
CEM'S Shelter #1	North Wall	1A	Bard (wall mount)	2 Ton	410A	1 - 16x25x2	W24A1-A05XP4XXJ	314B102685894-02	Original Equipment
CEM'S Shelter #2	South Wall	1B	Bard (wall mount)	2 Ton	410A	1 - 16x25x2	W24A1-A05XP4XXJ	314C102690239-02	Original Equipment
LCI/Excitation Compartment (LEC)	North Wall	3B	Bard (wall mount)	5 Ton	410A	1 - 16x30x1	WA602-C15XX5XXJ	155P072442608-02	Original Equipment
LCI/Excitation Compartment (LEC)	South Wall	3A	Bard (wall mount)	5 Ton	410A	1 - 16x30x1	WA602-C15XX5XXJ	155B082466021-02	Original Equipment

6 Ton

404A

none

CJAL-0200-TAD-160

Original Equipment

Filter List 10 - 16 x 30 x 1

CO<sub>2</sub> Condensing Unit

2 - 14 x 28 x 1

2 - 12 x 20 x 1

4 - 20 x 30 x 1 4 - 16 x 25 x 2

as of March 2019 APPENDIX A

Kennedy Generating Sta	ation Process-related HVAC	C Unit	S					Plant In Service Date: 1	1999
Building #/Description	Unit Location	Unit #	Unit Brand	Capacity	Refrigerant	Filter Size	Model Number	Serial Number	Install Date
KS CT 7									
CT 7 Bldg. 11 PEEC, pkg unit	at North side of bldg Grd. Flr.	1	Carrier	7.5 Ton	410A	4 - 20 x 20 x 2	50HCD08A2B6A0A0	0513G30128	
CT 7 Bldg, 11 PEEC, window unit	above the Mark 6 man door	3	Whirlpool	window unit	R22	washable			1999
CT 7 Bldg, 9 LCI, pkg unit	on roof of LCI bldg, east end (1)	4	Trane 6 ton	6 Ton	410A	4 - 16 x 25 x 2	TCD075C400BC	(1)Z15101412D	1999
CT7 Bldg, 9 LCI, pkg unit	on roof of LCI bldg, west end (2)	5	Trane 6 ton	6 Ton	R22	2 - 20 x 25 x 2	TCD075C400BC		1999
CT7 CEMS Bldg.	Back Wall	2	Bard (wall mount)	2 Ton	410A	1 - 16 x 30 x 1	WA242A05	140J082536607-02	1999
CO <sub>2</sub> Refrigeration System	CO <sub>2</sub> Skid		Ansul/TOMCO2	6 Ton	404A	N/A	510C8020S-N461P1-1	297188	1999
Natural Gas House	East facing window	13	Frigidaire	window unit	R22				1999
KS CT 8									
CT8 PDC Bldg	South wall	8	Bard (wall mount)	4 Ton	R22	1 - 20 x 30 x 1	WA484 CC9M		2005
CT8 PDC Bldg	South wall	9	Bard (wall mount)	3.5 Ton	R22	1 - 20 x 30 x 1	WA423 9S		2005
CT8 PEEC Bldg	East Wall	10	Bard (wall mount)	4 Ton	R22	1 - 20 x 30 x 1	WA484 CO9		2005
CT8 PEEC Bldg	East Wall	11	Bard (wall mount)	3.5 Ton	R22	1 - 20 x 30 x 1	WA424 C15		2005
CT8 LCI Bldg	South wall	6	Bard (wall mount)	5 Ton	R22	1 - 20 x 30 x 1	WA602-C09XX4XXJ		2005
CT8 LCI Bldg	North Wall	7	Bard (wall mount)	5 Ton	R22	1 - 20 x 30 x 1	WA602-C09XX4XXJ	155L072405384-02	2005
CT8 CEMS Bldg.	Back Wall	12	Bard (wall mount)	2 Ton	R22	1 - 16 x 25 x 1	WA242-A05	140J082536607-02	2005
CO <sub>2</sub> Refrigeration System	CO <sub>2</sub> Skid		TOMCO2	6 Ton	404A	N/A	SA-612-N	07247	2007
									_

# Filter List

- 4 20 x 20 x 2 4 16 x 25 x 2
- 2 20 x 25 x 1
- 1 16 x 30 x 1 1 16 x 25 x 1
- 6 20 x 30 x 1

# **Northside Generating Station Process-related HVAC Units**

Building #/Description	Unit Location	Unit #	Unit Brand	Capacity	Refrigerant	Filter Size	Model Number	Serial Number	Install Date
NS Common									
Maintenance Facility	Tool Room	31		Window Unit	R22	N/A			
Maintenance Facility	Machine Shop Office	30	Frigidaire	Window Unit	R410A	N/A			2011
Maintenance Facility	Storeroom/Pump Shop	32	Frigidaire	Window Unit	R410A	N/A			
CWTS Equipment Cabinet Cooler	CWTS south of operating shack	39	Hoffman/McClean	1500 BTU	R134A	1 - washable	M17-0216-G009H	06026912-2	
CWTS Equipment Cabinet Cooler	CWTS north of operating shack	38	Industrial Cooling		R134A	1 - washable			
CWTS Equipment Cabinet Cooler	CWTS @ sulfuric acid tank	37	Hoffman/McClean	1500 BTU	R134A	1 - washable	M17-0216-G009H	06026918-2	
CWTS Refrigeration Unit	CWTS	36				N/A	nameplate info not ledgible		
CWTS MCC Room	CWTS	33	Frigidaire	Window Unit		1 - washable			
CO <sub>2</sub> Tank "A" Refrigeration Unit	NS CT 4	35	Ansul	6 Ton	R404A	N/A	Part No. 425899	102792	2007
CO <sub>2</sub> Tank "A" Refrigeration Unit	NS CT 4	34	Ansul	2.75 Ton	R404A	N/A	Part No. 8606	03232	2003
Combustion Turbine Conex	Next to Much House			18,500 BTU Window unit	R410A		FFRH18L2R2	KK64700449	5/2/2017
NS 1									3/2/2021
Buss Room AHU-3 (Outside Condensing Unit)	east end of Turbine Bldg - grd flr	3	Carrier Split System	30 Ton	R22		38AKS028-601	1604F28170	
Buss Room AHU-3 (Inside Air Handling Unit)	east end of Turbine Bldg - grd flr	3	Carrier Split System	30 1011	R410A	4 - 24 x 24 x 2 4 - 24 x 24 x 4 1 - 12 x 24 x 2	40RM-034-H611YC	2004F33150	Jan-19
Buss Room AHU-4 (Outside Condensing Unit)	east end of Turbine Bldg - grd flr	4	Carrier Split System	30 Ton	R410A		38AKS028-601	1604F28167	Jan-19
Buss Room AHU-4 (Inside Air Handling Unit)	east end of Turbine Bldg - grd flr	4	Carrier Split System		R22	4 - 24 x 24 x 2 4 - 24 x 24 x 4 1 - 12 x 24 x 2	40RM-034-H611YC	2004F33254	
Exciter Room (Inside Buss Room)	west unit	7	Marvair ComPac 3	6 Ton	R22	2 - 18 x 24 x 2	AVP72ACC00N3U-1000	FP-F000098050-000-001	
Exciter Room (Inside Buss Room)	east unit	6	Marvair ComPac 3	6 Ton	R22	2 - 18 x 24 x 2	AVP72ACC00N3U-1000	FP-F000098050-000-004	
CEM's Shelter (Large) - left unit	unit 1 & 2 chimney	2	Bard	5 Ton	R22	1 - 20 x 30 x 2	WA602-A05XPXXJ	153N072435416-02	
CEM's Shelter (Large) - right unit	unit 1 & 2 chimney	3	Bard	5 Ton	R22	1 - 20 x 30 x 2	WA602-A05XPXXJ	153N082453780-02	
	unit 1 & 2 chimney	1	Bard	3 Ton	R22	1 - 20 x 30 x 2 1 - 16 x 30 x 2	WA361-A10XX-4XX	125B011586416-01	
CEM's Shelter (Small) Bldg. 39	Unit 1 & 2 chimney  Unit 1 Polisher Control Room	19	Comfort Aire	Window Unit	NZZ		WA361-A10AA-4AA	1238011380410-01	
Turbine Bldg - Ground Floor		40		Willdow Offic		N/A N/A			
Boiler Island Auxiliary Bldg Bldg. 72 Boiler Elevator Cabinet Cooler	Water Sampling Room - 2nd Flr Boiler Elevator - 3rd Level	40	GCI Ice Wagon Kooltronic	4000 BTU			KNA4C4P32L	D15A1006	
NS 2	Boiler Lievator - 3rd Level		ROOILIONIC	4000 BTO		1 - washable	RIVAHCHF 32L	D13A1000	
	middle of Turbine Dldg. and flr	OP	Carrier Split System	20 Top	D22		20470020 501	1604539166	Apr 04
Buss Room AC #3 (Outside Condensing Unit)	middle of Turbine Bldg - grd flr	9B	Carrier Split System	30 Ton	R22	4 - 24 x 24 x 2	38AKS028-601	1604F28166	Apr-04
Buss Room (Inside Air Handling Unit)	middle of Turbine Bldg - grd flr	9A	Carrier Split System		R22	4 - 24 x 24 x 4 1 - 12 x 24 x 2	40RM-034-H611YC	2004F33274	
Buss Room AC #4 (Outside Condensing Unit)	middle of Turbine Bldg - grd flr	10B	Carrier Split System	30 Ton	R22		38AKS028-601	1604F28169	Apr-04
						4 - 24 x 24 x 2 4 - 24 x 24 x 4			
Buss Room (Inside Air Handling Unit)	middle of Turbine Bldg - grd flr	10A	Carrier Split System		R22	1 - 12 x 24 x 2	40RM-034-H611YC	2004F33266	
Exciter Room (Inside Buss Room)	west unit	8	Marvair ComPac 3	5 Ton	R410A	1 - 21.5 x 36.5 x 2	AVPA60ACC090NU-A2-100	FC-F133047-0-1	Jun-13
Exciter Room (Inside Buss Room)	east unit	7	Marvair ComPac 3	6 Ton	R22	2 - 18 x 24 x 2	AVP72ACC00N3U-1000	FP-F000098050-000-002	
Boiler Island Auxiliary Bldg Bldg. 72	Water Sampling Room - 2nd Flr	20	GCI Ice Wagon		R22	N/A			

# Northside Generating Station Process-related HVAC Units

Building #/Description	Unit Location	Unit#	Unit Brand	Capacity	Refrigerant	Filter Size	Model Number	Serial Number	Install Date
Turbine Bldg - Ground Floor	Unit 2 Polisher Control Room		Frigidaire	Window Unit	R410A	N/A			2018
Black Box Room	Mezzanine Floor	13	First Co.	4 Ton	R22	1 - 12 x 24 x 1	16VMB	S09A927069	2010
Black Box Room	Mezzanine Floor	14	First Co.	4 Ton	R22	1 - 12 x 24 x 1	16VMB	S09A927074	2010
Black Box Room	Mezzanine Floor	15	First Co.	3 Ton	R22	1 - 12 x 24 x 1	12VMB	S01A838402	2010
Black Box Room	Mezzanine Floor	16	First Co.	3 Ton	R22	1 - 12 x 24 x 1	12VMB	S01A838403	2010
Black Box Room	Mezzanine Floor	17	First Co.	3 Ton	R22	1 - 12 x 24 x 1	12VMB	S01A838404	2010
Black Box Room	Mezzanine Floor	18	First Co.	3 Ton	R22	1 - 12 x 24 x 1	12VMB	S01A838401	2010
Unit 2 Water Rack	Ground Floor		Sentry Equipment			N/A	NQW03C1A11G111N-SN	19867011308	
Unit 2 Water Rack	Ground Floor		GCI Ice Wagon			N/A			
Boiler Elevator Cabinet Cooler	Boiler Elevator - 3rd Level		Kooltronic	4000 BTU		1 - washable	KNA4C4P32R	K06A5069	
NS 3									
Buss Room (west Outside Unit)	west end of Turbine Bldg - grd flr	11B	Trane	20 Ton	R410A		TTA240B400FA	5321PW5AD	2005
Buss Room (west Inside Unit)	west end of Turbine Bldg - grd flr	11A	Trane		R410A	4 - 16 x 20 x 2 4 - 16 x 25 x 2	TWE240B400EL	5394LF3HD	12/28/2005
Buss Room (east Outside Unit)	west end of Turbine Bldg - grd flr	1	Trane	20 Ton	R410A		TTA240B400FA	5312TLKAD	2005
Buss Room (east Inside Unit)	west end of Turbine Bldg - grd flr	12A	Trane		R410A	4 - 16 x 20 x 2 4 - 16 x 25 x 2	TWE240B400EL	5394LGEHD	12/28/2005
Exciter Shelter - left unit	west end of Turbine Deck		Bard	6 Ton	R410A	1 - 20 x 30 x 2	WA701-C09BPXXXJ	190M021770465-02	
Exciter Shelter - right unit	west end of Turbine Deck	25	Bard	6 Ton	R410A	1 - 20 x 30 x 2	WA701-C09BPXXXJ	190M021770466-02	
CEM's Shelter - west unit	unit 3 chimney	22	Sun	5 Ton		1 - 20 x 30 x 2	nameplate info not ledgible		
CEM's Shelter - east unit	unit 3 chimney	23	Sun	5 Ton		1 - 20 x 30 x 2	nameplate info not ledgible		
Turbine Bldg - Ground Floor	Unit 3 Polisher Control Room	21	Frigidaire	Window Unit	R410A	N/A			
Unit 3 Water Rack	Ground Floor		GCI Ice Wagon	Window Unit		N/A			
NS Material Handling									
Transfer Bldg. 6	Ground Floor outside	41	Friedrich	Window Unit		N/A			
Fuel Tank Farm Shelter	Brown Bldg in tank farm	28	Marvair ComPac I		R22	2 - 18 x 24 x 2	nameplate info not ledgible		
						1 - 12 x 24 x 2 1 - 12 x 24 x 4			
Fuel Dome A	2nd level stacker/reclaimer	26	Birdwell	3 Ton		1 - 12 x 24 x 4 1 - 20 x 25 x 4	BTB36X10C4-6		wall mount, hazardous duty
						1 - 12 x 24 x 2 1 - 12 x 24 x 4			
Fuel Dome B	2nd level stacker/reclaimer	27	Birdwell	3 Ton		1 - 20 x 25 x 4	BTB36X10C4-6		wall mount, hazardous duty
Continuous Ship Unloader	crane cab	+							
Fuel Dock Shack	end of fuel dock	29	Friedrich	window unit	R410A	N/A			
Limestone Crusher Bldg. 73	Ground Floor outside - west side	42	American Standard	10 Ton		4 - 20 x 25 x 2	TSC120A4R0A0000	708101396L	

#### Filter Lis

6 - 12 x 24 x 1

6 - 12 x 24 x 2

2 - 12 x 24 x 4

# Northside Generating Station Process-related HVAC Units

2 - 20 x 25 x 4 6 - 20 x 30 x 2 1 - 21.5 x 36.5 x 2 16 - 24 x 24 x 2 16 - 24 x 24 x 4

Building #/Description	Unit Location	Unit #	Unit Brand	Capacity	Refrigerant	Filter Size	Model Number	Serial Number	Install Date
8 - 16 x 20 x 2									
8 - 16 x 25 x 2									
1 - 16 x 30 x 2									
6 - 18 x 24 x 2									
4 - 20 x 25 x 2									

# APPENDIX B PROPOSAL FORM 080-19 JEA ELECTRIC PLANT HVAC INSPECTION & MAINTENANCE SERVICES

The Proposer shall submit one (1) original Proposal, three (3) duplicates (hardcopies), and one (1) CD or Flash Drive. The electronic version shall have the word tracked changes version of any terms and conditions comments and excel quotation of rates workbook. If there is a discrepancy between the electronic copy and hard copy, the hard copy will prevail. JEA will not accept Proposals transmitted via email.

PROPOSER INFORMATION:	
COMPANY NAME:	
BUSINESS ADDRESS:	
CITY, STATE, ZIP CODE:	
TELEPHONE:	
FAX:	
EMAIL ADDRESS:	
Address of Proposed Office:	
The address above will be utiliz HVAC License Number / Mechanical Contractor's Lic	zed to verify Minimum Qualifications cense Number:
Will be utilized to ver	rify Minimum Qualifications
Proposer	's Certification
this ITN and agrees to abide by the terms and conditions sauthorized representative of the Respondent, and (3) that the	the Respondent is legally authorized to do business and pondent certifies that its recent, current, and projected workload
other credentials required by law, contract or practice to p	holds all licenses, permits, certifications, insurances, bonds, and erform the Work. The Respondent also certifies that, upon the , permits, certifications, insurances, bonds or other credentials, ange.
Quotation	n of Rates Totals
Total From Quotation of Rates Workbook	\$
We have received addendathrough	
Signature of Authorize Officer of Respondent or Agent	Date
Printed Name & Title	Phone Number

# APPENDIX B MINIMUM QUALIFICATION FORM 080-19 JEA ELECTRIC PLANT HVAC INSPECTION & MAINTENANCE SERVICES

The minimum qualifications shall be submitted in the format attached. The references shall be presented in the order described below. In order to be considered a qualified supplier by JEA you must meet all the criteria listed and be able to provide all the services listed in this specification. Submit with Bid or Proposal in accordance with the requirements of the solicitation.

Company shall ensure listed references can be contacted to verify minimum qualifications compliance. If JEA cannot contact the submitted reference, JEA may request an additional point of contact from the same reference, however, will not allow the Company to change references. If the reference cannot be verified, JEA may reject the submitted Bid or Proposal.

COMPANY NAME:	
BUSINESS ADDRESS:	
CITY, STATE, ZIP CODE:	
TELEPHONE:	
FAX:	

RESPONDENT INFORMATION

E-MAIL:

- o Respondent must have a valid Certified Air Conditioning Contractor License or Mechanical Contractor License with the State of Florida. Enter license number on the Response Form.
- o Respondent must supply the address of the office where the administration of the Contract will be located. The address must reside within the JEA Service Territory (Duval, Clay, Nassau or St Johns counties) for the life of contract. Enter address on the Response Form.
- o Respondent must have successfully completed at least three (3) similar HVAC Preventative Maintenance service contracts in a Commercial or Industrial Plant environment. The three (3) service contracts <a href="EACH"><u>EACH</u></a> must be valued at \$50,000.00 or greater per year during any of the last five (5) years ending March 31, 2019. Additionally, each service contract shall have been at least one (1) year long.

Reference of	
Primary Nature of Service Provided:	
Location:	
Customer:	
Reference Name:	
Reference Phone Number:	
Email Address:	
Project Value:	
Description of Project:	