

**UCF Campus Infrastructure & Utility Production Facility  
Continuing Contract  
Medium Voltage Electrical Services and Control Circuitry  
Project Fact Sheet**

**PROJECT DESCRIPTION**

The University of Central Florida announces services are required of qualified commercial and industrial speciality trade medium voltage contractors to perform corrective, predicative and preventive maintenance in accordance with “*Attachment A*” for pumps, switchgear, generators, and variable frequency drives under \$2,000,000 for scopes of work that include alternations, repairs, and construction costs. The selected firms’ minimum bonding capacity shall be \$2,000,000.

The initial term of the agreement will be one (1) year, with the option to extend the agreement for four (4) additional one-year terms, upon satisfactory performance, for at total of five (5) years. All firms applying must be licensed contractors in the State of Florida by the Florida Department of Business and Professional Regulation at the time of application and, if a Corporation, registered to operate in the State of Florida by the Department of State, Division of Corporations.

**The Utility buildings and equipment to be serviced** under each specialty contract may include any one of the facility’s ancillary or auxiliary equipment related to “*Attachment A.*”

- **Downtown Campus Central Energy Plant** – 1100 RT of 480V electrical driven screw and scroll driven chillers
  - Scope shall include associated distribution infrastructure
- **District Energy Plant I (BLDG 003)** – 8000 RT of electrical driven centrifugal chillers
  - Scope shall include associated distribution infrastructure
- **District Energy Plant II & III (BLDG 072 Plant 1 & 2)** - 8000 RT of electrical driven centrifugal chillers coupled to a three-million-gallon thermal energy storage tank (TES)
  - Scope shall include associated distribution infrastructure with the plant and TES
- **District Energy Plant IV (BLDG 143)** - 4000 RT of electrical driven centrifugal chillers with four million Btu/hr. capacity of heat recovery
  - Scope shall include associated distribution infrastructure with the plant
- **Water Plant (BLDG 47)** - Water production plant supplying demand for all potable water to the main campus, and for Research Park during emergency conditions.

- Includes distribution infrastructure, isolated booster stations, master lift stations, ancillary pumps and motors, drives, controls, electrical panels, and backup generators.
- **Wastewater Collection**
  - Includes all lift stations, gravity, collection system, force mains ancillary pumps and motors, drives, SCADA, electrical panels, and backup generators.
- **Reclaimed Booster Stations**
  - Includes distribution system up to the reclaimed water booster stations, ancillary pumps, and motors, drives, controls, and electrical panels.
- **Campus Booster Station (BLDG 307)** - Provides pressure regulation between UCF and Orange County during emergencies for potable water needs. Includes (4) 40HP pumps and switchgear.
- **Combined Heat & Power Plant (BLDG 354)** - Natural gas-fired prime mover coupled to a 5.5-megawatt generator; waste heat is then repurposed to fuel a vapor absorption machine that is capable of producing up to 1000 RT's of chilled water to the district cooling loop.
  - Excludes 1000 RT absorption chiller, generator, reciprocating engine, and engine ancillary skids.
- **UCF Sub-metering Infrastructure** – including, but not limited, to radio transmitters, validation and accuracy testing of meters, regulators, enclosures, power transformers, voltage transformers, circuit transmitters, and valve replacement maintenance for the following utilities: natural gas, water, waste water, chilled water, reclaim water, and electric.
- **Campus Distribution and Transmission Infrastructure**
  - Chilled water – pipes, vaults, manholes, valves
  - Potable water – wells, pipes, valves, groundwater and elevated storage tanks
  - Electrical – transformers, conductors, cable
  - Sanitary sewer – pipes, force mains, gravity lines, lift stations, manholes
  - Stormwater – pipes, outfalls, collection, distribution, retention and detention ponds

## **SELECTION CRITERIA**

Companies will be evaluated on the following:

1. Information provided on the Contractor Form and responses to the Notice to Contractors and Suppliers.

2. **Past Performance.** Provide information on five (5) projects, including those on college campuses, that are similar in size, complexity, and scope to what may be performed hereunder. Clearly articulate within each of the 5 projects information regarding:
  - a) similarity in size and complexity;
  - b) similarity in function;
  - c) initially scheduled completion dates and actual completion dates;
  - d) original budget and final budget;
  - e) owner's contact information;
  - f) date completed; and
  - g) names of proposed team members who worked on each project and roles that the proposed team members played.
  
3. **Ability to Take on Additional Work.**
  - a) Reflect your current workload and staffing.
  - b) Describe how UCF's workload will be fulfilled.
  
4. **Experience and Ability.** Describe your firm's experience and ability:
  - a) working with public, higher education clients and their Standards and processes;
  - b) applying building codes;
  - c) with cost estimating;
  - d) with cost control, including methods employed;
  - e) managing and performing numerous projects at the same time;
  - f) completing projects and repairs on time and within budget.
  - g) work in a High-Energy System Environment (PPE, training, onsite supervision), which includes, Voltages, Lubricants, Air and Water. Provide a narrative to address this ability.
  
5. **Bonding Capacity.** Provide a letter from your bonding company reflecting your current bonding capacity and rating.
  
6. **Personnel.** Provide bios for each of your firm's management, supervisors, line employees, and any other personnel that you believe are critical to the success of the work to be performed hereunder.
  - Line Employee / Crew Member
  - Supervisor / Project Manager
  - Field Engineer / Specialty Technician
  
7. **References.** Provide three (3) letters of reference and recommendation prepared by your firm's client(s) for each specialty trade you are applying for hereunder.

8. **Location.** Provide the address of your main office, and any regional/local offices you have, and provide details of what services and technical personnel you have at those locations.
9. **Safety and Security.** Describe your policies, planning, and practices related to safety and security. **Note:** Criminal background checks and E-verification must be provided for all employees and sub-contractors. Proper PPE and Picture ID cards will be worn at all times workers are on the job.
10. **Quality Assurance/Quality Control.** Work shall be completed in accordance with the latest ANSI standards, original equipment manufacturer (OEM), and applicable codes, in addition to the University's standards. Describe your firm's approach to QA/QC and commissioning.
11. **SDVOSB and MWBE.** Describe how your firm employs and uses SDVOSB and MWBE and whether your firm is certified and by what agency.
12. **Conflict Avoidance and Resolution.** Describe your firm's practices to avoid and resolve conflict. Describe three (3) occasions when conflict occurred and discuss how it was resolved.
13. **Change Order Avoidance.** All change orders will be received in writing and must be approved by UCF prior to execution. Describe your experiences with eliminating scope creep and approach to cost estimating.
14. **Approach to Effective Supply Chain Management for capital replacement.** Describe your company's approach to ensuring consistent supply chain management.
15. **Ability to respond to Disaster Relief Work during campus and state emergencies.**
  - Include labor and equipment rates for disaster relief work requests.
  - Normal working hours
  - After hours (define times)
  - Weekends and holidays
  - Quantity of shifts vendor can support in one calendar day. (i.e. 1, 2 or 3)
  - Margin for material and equipment labor
  - Guaranteed response time

## **GENERAL INFORMATION**

1. All applicants will be notified of the results of the short listing in writing. Finalists will be informed of the interview dates and times and will be provided with additional project information, if available.

2. The Selection Committee will make a recommendation to the university president. All finalists will be notified in writing of the president's action. Upon approval by the president, negotiations will be conducted in accordance with Section 287.055, Florida Statutes.
3. Selection Committee Team Members have elected to not meet with firms prior to interviews

## Attachment “A”

**Specialty Trade:** Commercial and Industrial Medium Voltage Electrical Services & Control Circuitry

**Scope:** Preventative maintenance, corrective action, troubleshooting, predictive maintenance. Must be available 24/7 – 365 days.

**Typical Voltages:** Terminating and splicing of high voltage and troubleshooting 12,470VAC, 4,160VAC, 480VAC, 277VAC, 120VAC, 110VAC, 125VDC, and 24VDC circuits

- Troubleshooting and repairs
- Disaster Recovery
- Installation and programming of new equipment
- Lightning / grounding protection
- UPS systems
- SCADA systems
- Temporary power systems
- Large conductor placing
- Emergency generator repairs
- Calibrating and balancing
- Industrial 12,470VAC and 4160VAC cables, 1000kVA station transformers, switchgear, chiller starters, HI Pot testing, VFD’s, and motor control centers
- Circuit transformer testing
- Service meter and instrument transformer installations (revenue-grade)
- Service meter and instrument transformer accuracy testing and reporting (revenue-grade)
- Assist OEM with performing 5.5-Megawatt generator housing inspections and testing under a Professional Engineer’s supervision
  - Perform MEGGER testing of the:
    - Main rotor
    - Main stator
    - Exciter field
    - Armature
    - PMG armature
- Assist OEM with performing dye penetrant testing for 5.5-megawatt generator’s main rotor shaft as required
- Provide field calibration certificate to UCF of all testing equipment used.

All visits will be documented and report(s) sent to the appropriate UCF plant operator for record retention