

## SCOPE OF WORK

### INTENT

This annual requirement contract is for routine preventive maintenance and repair of power generators. The generators are located at various City facilities including the fire stations, administration buildings and the Convention Center. The contract provides for annual and quarterly maintenance.

#### 1. PRICING

Pricing should include all parts, labor, third-party vendors and/or subcontractors needed to complete maintenance and repairs.

#### 2. ANNUAL GENERATOR MAINTENANCE

Generators listed for annual maintenance (once per year) shall have the following included:

Replacement of oil and oil filter, fuel filter, air filter. Check and adjust fan belts, coolant level, battery water level. Check, clean and tighten terminals if necessary. Start and run generator, transfer load to generator. Log output voltage, output current, oil pressure, battery voltage, engine water temperature (if available). Remove and dispose of all used oil, filters and other used parts unless otherwise directed by the city.

#### 3. QUARTERLY MAINTENANCE SCHEDULE

Generators listed for quarterly maintenance (every three months) shall have the following maintenance performed:

- a. **First Quarter Maintenance:** To be performed in April. All of the maintenance listed under the "Annual Maintenance" requirements shall be performed.
- b. **Second Quarter Maintenance:** To be performed in July. Check and adjust, if necessary, oil level, water level, battery fluid level, adjust fan belt tension, check water and crankcase heater operation. Check, clean and tighten electrical terminals if necessary. Start generator and test to verify that units maintain load condition. Load bank generator to full capacity according to manufacturer's recommendations, minimum of two hours. Log output voltage, output current, engine temperature, oil pressure and battery voltage.
- c. **Third Quarter Maintenance:** To be performed in October. Replace oil, oil filter, fuel filter and air filter. Check and adjust, if necessary, coolant level, battery fluid level, fan belt tension, and check crankcase heater operation. Check, clean and tighten electrical terminals if necessary. Start generator and test to verify that unit maintains loaded condition. Log output voltage, output current, engine oil pressure and battery voltage.
- d. **Fourth Quarter Maintenance:** To be performed in January. Check and adjust, if necessary, oil level, coolant level, battery fluid level, fan belt tension and check crankcase heater operation. Check, clean and tighten electrical terminals if necessary. Start generator and test to verify that unit maintains loaded condition. Log output voltage, output current, engine temperature, oil pressure and battery voltage.

#### 4. ALL INSPECTIONS

In addition to the items previously listed, each maintenance visit will include the following:

##### Engine

- 1) Check carburetor / fuel injection adjustments.
- 2) Check engine speed during loaded condition.
- 3) Check anti-freeze level in coolant system and adjust to insure freeze protection.
- 4) Run unit and check engine safeties for correct operation.

##### Generator

- 1) Check brushes for seating and wear.
- 2) Check condition of slip rings.
- 3) Check and adjust frequency and voltage.

##### Transfer Switch

- 1) Check switch by transferring load where practical.
- 2) Check operation of automatic time clock and adjust where applicable.
- 3) Check battery charger and adjust.
- 4) Set unit in standby mode.

##### General Check Points

- 1) Inspect fuel system internal and external of engine.
- 2) Inspect exhaust system.
- 3) Functional test of engine generator control including shutdown, alarms and cranking cycle.
- 4) Adjustment of engine governor and voltage regulator, if necessary.

#### 5. LABOR HOURS

All maintenance is to be performed between regular City of Arlington working hours of 8:00 a.m. to 5:00 p.m., Monday through Friday (unless otherwise authorized by the city).

#### 6. REPORTING

A written report shall be provided to the City of Arlington of each generator and operational check following the maintenance period when it was performed. **This report must accompany and/or be included on the invoice. If a report is not submitted, the invoice will not be paid until receipt of the report.**

A service repair call report shall be signed by a representative of the City of Arlington (if available) when work has been completed. **This report must accompany and/or be included on the invoice. If a report is not submitted, the invoice will not be paid until receipt of the report.**

#### 7. CONTRACTOR RESPONSIBILITIES

**Supervision** - The Contractor shall, during all periods of contract performance, provide competent supervision of his employees to assure complete and satisfactory fulfillment of the work and the terms of this Contract. The Contractor or a capable, fully authorized representative must be immediately available during all work activities to receive any and all special instructions from the Contract Manager or designee.

**Safety** - Industry approved safety standards and equipment shall be used at all times.

The Contractor must be thoroughly familiar with all prevailing safety measures pertinent to its operations. This shall include, but not necessarily be limited to Environmental Health Agency (EPA) regulations, Arlington City Ordinances, and Occupational Safety and Health Agency (OSHA) regulations. In addition, the Contractor shall be wholly responsible for instructing its employees in these safety measures and seeing that they are fully complied with in every respect.

**Hazards** - The Contractor shall at no time permit placing or use of equipment in such manner as to block traffic lanes or to create safety hazards. Contractor personnel shall provide appropriate warning devices when necessary and cooperate in the fullest in allowing through passage of other vehicles and personnel, even to the point of interrupting their own work, if necessary.

**Defective Work and Damages** - The Contractor shall be wholly responsible for and shall promptly correct or restore all defective work or damages to any/all City facilities caused by its activities. Restoration and correction shall be to the complete satisfaction of the City. This shall apply to any part of a building, its appurtenances, the adjacent grounds, or any other tangible damage incurred in the performance of the Contract. Failure by the Contractor to proceed promptly with corrective actions may be cause for cancellation of this Contract with amount(s) necessary to correct defective work and/or damage being withheld from payments due or to become due to the Contractor.

## **8. GENERATOR LOCATIONS FOR ANNUAL MAINTENANCE**

Please refer to attached "Exhibit A"