Decorative Streetlight and Pad-mount Transformer Painting Technical Specifications

1. SCOPE OF WORK

- This JEA specification sets requirements necessary for the furnishing of labor, equipment, tools, expendables, and miscellaneous supplies to properly apply paint to JEA 14' to 18' decorative street light poles and light-heads, pad-mounted & three phase transformers, and switch cabinets in the JEA service territory and to be accomplished on a unit price basis.
- 2. JEA emphasizes that work on this project has a tendency to be hazardous. Bidders must understand, that to complete this project their personnel would be required to work with energized current devices and often in high vehicle traffic areas of the JEA service territory. Respondents shall be required to submit the Minimum Qualifications Form as set forth in the specification.
- **3.** Services outlined in this specification will take place throughout the year and assigned as requests are received from JEA customers via Customer Service. If the awarded contractor, cannot accommodate this schedule, the contract will be cancelled and awarded to the next responsible lowest bidder.

2. GENERAL REQUIREMENTS

The contractor selected for this project shall provide all labor and equipment, including all materials as specified, required to accomplish this project within the time spans allocated by JEA.

1. The contractor shall:

- Take action to protect any equipment which may be damaged by corrosion through the treatment process and/or application of protective coatings. Equipment nameplates, which are not removable, shall be masked for protection during the sanding, stripping, or painting processes. Where nameplates are found to have been painted over in the past, significant effort shall be made to remove this paint. Pad-mounted, three –phase transformers, and switch cabinets, shall be masked to keep sanding debris from entering and damaging electrical circuits and components.
- Prep the surface by either solvent cleaning or high-pressure wash, followed by mechanical tool cleaning, or Commercial blast cleaning as necessary to remove all oil, dirt, glass, chalk, contaminants and corrosion from the equipment.
- Neutralize any solvents or cleaners to prevent further corrosion.
- Prime and coat body of the unit as required, to provide a long lasting protective coating which will impede corrosion and present a smooth appearance.

2. Materials required:

- A list of approved coatings suppliers and their approved products is found at the end of this document.
- The contractor will select which supplier they will utilize for the work described in this specification.

- The contractor is permitted to change suppliers during the course of the contract.
- Each unit of JEA equipment shall be cleaned, prepped, coated, and finished with materials from a single supplier.
- The contractor is responsible for the warranty of the work and materials outlined in this specification.

3. PRIOR TO COMMENCEMENT OF WORK

The Contractor shall take action to protect all existing property, utilities, and other structures or items either public or private which must be preserved in place or items to be relocated shall be protected from damage by the Contractor. The Contractor shall take action to become informed with the location of any existing utilities, pipes, poles, wires, fences, gates, curbing, paving, property line markers, trees, shrubs, landscaping, traffic signs and signals, and structures of every type below and above ground which may interfere with Contractor's operations. Should any of the aforementioned items be damaged as a result of the contractor's operations they shall be restored by the Contractor, at no additional cost and satisfaction of the Owner.

- 1. Prior to the application of paint to any decorative street light pole the contractor will assess the structural soundness of any light pole that requires painting. If a light pole is not firmly affixed to the ground or the structural integrity and soundness of a light pole is of concern, the following steps must be performed:
- 2. Secure the identification number of the decorative street light pole. The identification number can be located on the base of the light-head of the street light pole. If an identification number can't be located, provide an address with a reference to the location of the light pole within the property, i.e., 123 Main Street, Jacksonville, FL 32202, S.W. Corner of Property
- 3. Take pictures that capture the full length of the light pole from top of the light-head to the base of the light pole. Also take close-up pictures of the light pole that capture the specific area where the identified structural integrity and soundness issue can be clearly identified.
- 4. Contact the JEA Representative via e-mail at and submit the identification number of the decorative street light pole, an explanation of the identified structural integrity and soundness issue, and required pictures that capture the structural integrity and soundness issue identified.
- 5. Remove vegetation from around the base of the unit. Similarly any shrubs and brushes that block access to a unit should be tied back or trimmed. Before leaving the worksite all cuttings are to be removed and properly disposed of in accordance with local ordinance and laws that relate to vegetation waste disposal.
- **6.** The contractor will take all steps necessary to prevent any application of paint on a unit's concrete pad. This requirement applies to decorative street light poles, padmounted transformers, three phase transformers, and switch cabinets.

7. All JEA decals and unit identification numbers shall remain in place when a unit is painted. Before painting, mask exterior JEA decals and unit identification numbers. JEA decals and unit identification numbers that are damaged or in need of replacement must be removed and replaced using new JEA decals and/or unit identification numbers as needed. Contractor will be furnished with replacement decals and numbers. All decals and numbers must be in accordance with established JEA standards.

4. PREPARATION OF SURFACE FOR PAINTING

- When painted, all surfaces shall be dry and free of dirt, dust, sand, grit, mud, oil, grease, rust, loose mill scale, or other objectionable substance. Cleaning and painting shall be done in a manner which will prevent dust or other airborne particles from contaminating freshly painted surfaces. Areas of heavy oil or grease shall be washed with clean rags.
- Clean cloths and clean fluids shall be used to avoid leaving a film of greasy residue on the surface being cleaned. Surfaces not intended to be painted shall be adequately protected from contamination, discoloration, or other damage resulting from cleaning or painting operations.
 - Surfaces shall be free of cracks, pits, projections, or other imperfections, which
 would prevent the formation of a smooth, unbroken paint film. On equipment
 where extreme deterioration of the metal or fiberglass surface has occurred,
 the Contractor shall notify the JEA Representative for further direction as to the
 course of action to be followed.
- 3. <u>Leaking or damaged equipment will be reported to the JEA Representative</u> immediately so repairs may be performed by JEA.

5. CLEANING

Metal surfaces shall be cleaned as follows:

- 1. All metal surfaces shall be solvent, or pressure washed, as required to loosen old paint and rust using a brush-off blast cleaning
- 2. The stripping will be done using the flow coat method of application. The stripping solution shall be heated to 160 degrees F to insure total removal of the paint. DOT approved drums shall be used for reclaiming and disposal of the stripper and paint sludge. Drums shall be disposed by the contractor.
- **3.** After all paint and residue is removed, metal surfaces shall be rinsed down with water to remove any residual caustic solutions. A final rinse, with a 5% solution of phosphoric acid shall be used to neutralize any remaining caustic solution and help to protect the metal until the surface is painted.
- 4. Where the existing coating is damaged or corrosion is evident, metal surfaces shall be sandblasted, power sanded or hand sanded to remove damaged paint or corrosion and expose clean bare metal. All sand blasted metal will be primed within four hours of sandblasting. No sandblasted metal may be left unprimed overnight without re-blasting.

6. PAINT APPLICATION

Surfaces to be painted shall be at a temperature not less than the minimum surface temperature recommended by the paint manufacturer. In no case shall paint be applied under any of the following conditions:

- 1. When the surface temperature or air temperature is below 45 degrees F.
- 2. When insects or windblown dust, dirt, or debris would adhere to the freshly applied paint.
- **3.** When atmospheric conditions are causing condensation on the surface, or air temperatures that are not 5 degrees higher than the dew point.
- **4.** When exterior surfaces are wet or damp.
- **5.** All painting materials shall be applied in accordance with the manufacturer's recommendations by competent and experienced painters.

7. MIXING

Paint shall be thoroughly mixed each time any is withdrawn from the container. Paint containers shall be kept tightly closed at all times, except while paint is being withdrawn.

8. TINTING

Job site tinting of finish coats shall be done only when acceptable to the JEA representative. All tinting colors shall be of a type recommended by the manufacturer of the paint being used.

9. <u>THINNING</u>

Paint shall not be thinned except as recommended by the manufacturer of the paint. Paint shall not be thinned for the fiberglass poles, only for the switch cabinets, three phase and pad mounted transformers that will be painted with a spray gun.

10. APPLYING

Paint shall be flow coated or spray applied except as otherwise specified or as otherwise acceptable to the JEA representative. Application of paint shall continue without interruption to all surfaces between corners, seams, or other surface breaks. No laps will be permitted except at such surface breaks.

11. CURING

All paint in any one paint coat shall be hard and dry throughout the entire paint film before the next coat is applied. In no case shall the elapsed time between the applications of successive coats of paint to any surface be less than that recommended by the paint manufacturer. In order to assure that all layers of the paint are dry when repainted, all paint shall be applied in a film of uniform thickness at all points. In no case shall paint be applied at a rate of coverage per gallon which is greater than the maximum rate recommended for that paint by its manufacturer.

12. DEFECTS

Newly applied paint films, which show sags, checks, blisters, teardrops, or fat edges, will not be accepted and any final coat of paint, which shows any of these defects, shall be entirely removed from the member or unit involved and the surface repainted. If the defects occur in any of the undercoats, they shall be repaired to the satisfaction of the JEA representative before additional paint coats are applied. Dry film thickness must comply with the maximum and minimum requirements.

13. PROTECTION OF SURFACES

- 1. Throughout the work, the Contractor shall provide and use proper drop cloths, masking tapes, and other protective measures necessary to protect surfaces, customer homes, vehicles, lawns, and other items from overspray or paint splashes, from accidental spraying, spattering, or spilling of paint, or spray, mists or vapors of material such as strippers. Surfaces that have been accidentally sprayed or spattered shall be thoroughly cleaned and all residues removed. The Contractor shall be responsible for, and shall correct and repair, any damaged condition resulting from his operations or from the operations of those who are responsible to him. Any paint deposited on surfaces, which are not being painted at the time, shall be immediately removed at the contractor's expense.
- 2. Any exposed concrete or masonry not specified to be painted which is damaged by paint shall be either removed and rebuilt or, where so authorized by JEA representative, painted at the Contractor's expense with a complete paint system as recommended by the paint manufacturer.

14. EQUIPMENT

- 1. All equipment for the completion of the work shall be provided by the Contractor. Equipment shall be in optimal operating condition and shall comply with recommendations of the manufacturer. Any equipment that has frequent downtime or requires excessive maintenance shall be removed from service and replaced with fully operating equipment.
- 2. The Contractor shall provide a hydraulic bucket/platform truck and/or boom man-lift to perform the required work in this contract. The hydraulic bucket/platform truck or boom man-lift shall be OSHA approved for overhead work on public roads. The reach of the bucket/platform truck or boom man-lift shall be sufficient for the Contractor's workforce to reach all portions of JEA units without additional equipment being needed. The contractor shall use the bucket/ platform truck to paint the decorative poles, using a ladder is an unacceptable practice.
- 3. The Contractor shall furnish all ladders, stages, and scaffolds required for his work; such equipment shall be maintained in safe condition, adequate to support the workload. Scaffolds and ladders, when not in daily use, shall not be left where they interfere with the work of other trades. The ladders shall only be used painting switch cabinets, three phase and pad mounted transformers. All ladders shall be made of non-conductive material.

15. CLEANUP

The Contractor shall leave all areas clean and free from rubbish and accumulated material left from his work. The Contractor will be responsible for meeting all Environmental Protection Agency (EPA) requirements in regard to disposal of cleaning solutions, rinse waters, coatings, cans, thinners, shrubs, and the like which may alter the surrounding environment, except the stripper and paint sludge as stated elsewhere in this specification. Contractor must remove all materials from the job site and may not use JEA trashcans or dumpsters.

16. WORK INSPECTION STOPS

The Contractor may be instructed to stop after each phase of the painting process (cleaning, stripping, priming, body coat, intermediate coat, finish coat, etc.) for an inspection by the JEA representative before proceeding to the next step. Failure to allow for these inspection stops will result in rejection of the entire paint job.

17. EPA REGULATED WASTES

- 1. All liquid and solid EPA Regulated Waste Materials created or generated by work on this contract shall be containerized and disposed of by the Contractor.
- **2.** Each container is to be marked on the top by the Contractor with an indelible paint marker with: Date filled, Substance within container, Contractor company name
- **3.** Although all EPA Regulated Waste Materials are to be containerized as work of this Contract, as a minimum, this will include:
 - Lead or other heavy metal, impregnated paint residue such as from sand blasting, scraping or other stripping operations.
 - Spent solvents, paint thinners, caustic stripping solutions or phosphoric acid cleaning solutions.

18. COMPENSATION AND PAYMENT

- 1. Compensation for work performed under the terms and conditions of this contract shall be firm unit prices.
- Compensation shall be at the rates bid on the Proposal Form for the time Contractor's personnel are engaged in JEA work and includes all holiday and vacation allowances, fringe benefits, overhead, housing, per diem, employee contributions required, law and taxes based on the wages of employees performing the work, worker's compensation and comprehensive general liability insurance premium, supplies, and all associated expenses and profits.
- **3.** Payment terms under this contract is Net 30.

19. DELAYS

- **1.** JEA intends to supply the contractor with work to fulfill customer requests. At times weather may force delays.
- **2.** JEA will not be charged for contractor downtime.

20. WORK ASSIGNMENT & RESPONSE TIME

Upon receipt of notice from a JEA Customer, the Investment Recovery Operations (IRO) representative will contact the Contractor via email and provide a printout of the location and number of items requiring service. The Contractor will be on site no later than Five (5) business days of receipt of notice, or as agreed upon with IRO

Upon completion of the assignment, the Contractor will notify the JEA IRO rep. who will inspect and approve the work within 48 hours of such notice. If no rework is required, the JEA IRO rep. will provide written approval for the Contractor to submit an invoice for payment.

Only work assigned by the JEA IRO Representative will be paid for under this contract.

SUPPLIER AND PAINT COATING REQUIREMENTS

The required paint color will be determined by the JEA Representative. Paint coats will be applied and cured per this specification and manufacturer's data sheets.

COATING SUPPLIERS:

- Sherwin Williams
- Brinton's Paint
- Home Depot
- Jacksonville Paint and Supply

COATING REQUIREMENTS:

Decorative Street Light Poles
Sherwin Williams, Steel Master™ 9500 30% Silicone Alkyd
B56T00304 Clear Tint Base, High Gloss
JEA BLACK Custom Manual Match
844 COLORANT OZ 32 64 128
LP-Lamp Black 8 32

Light-heads on Decorative Street Light Poles
Krylon® Pro Professional All Surface Enamel Aerosol 5812 Gloss Black
Rus-Kil® Rust Inhibiting Enamel Aerosol, 10-series Alkyd Gloss Black
Sherwin Williams, Steel Master™ 9500 30% Silicone Alkyd
B56T00304 Clear Tint Base, High Gloss

Pad-mounted Transformers, Three Phase Transformers, and Switch Cabinets Sherwin Williams, Steel Master™ 9500 30% Silicone Alkyd B56T00304 Clear Tint Base, High Gloss C/M PADMOUNT GREEN Custom Manual Match 844 COLORANT OZ 32 64 128

YO-Yellow Ox 54 PG-Phth Green 24 LB-Lamp Black 54 TW-White 2