

SECTION 16670
LIGHTNING PROTECTION SYSTEMS

PART 1 GENERAL

1.1 SECTION INCLUDES

- A. Grounding and bonding for lightning protection.
- B. Air terminals and interconnecting conductors.

1.2 RELATED SECTIONS

- A. Section 7500: Roofing systems.

1.3 REFERENCES

- A. LPI-175 - Lightning Protection Installation Standard
- B. LPI-176 - Lightning Protection System Material and Components Standard
- C. LPI-177 – Inspection Guide for LPI Certified Systems
- D. NFPA 780 – Lightning Protection Code
- E. UL 96 – Lightning Protection Code
- F. UL 96A – Installation Requirements for Lightning Protection Systems.

1.4 SYSTEM DESCRIPTION

- A. Lightning Protection systems: Conductor system protecting roofs consisting of air terminals on roofs, roof-mounted mechanical equipment, chimneys, stacks, steeple, parapets, and penthouse roofs; bonding of structure and other metal objects; grounding electrodes; interconnecting conductors, and irrigation pumps and structure.

1.5 SUBMITTALS

- A. Section 01300 – Submittals: Procedures for submittals.
- B. Shop Drawings: Indicate layout of air terminals, grounding electrodes, and bonding connections to structure and other metal objects. Include terminal, electrode, and conductor sizes and connection and termination details.
- C. Product Data: Provide dimensions and materials of each component, and include indication of listing in accordance with UL 96.

1.6 PROJECT RECORD DOCUMENTS

- A. Submit under Provisions of Section 01300.
- B. Record actual locations of air terminals, grounding electrodes, bonding connections, and routing of system conductors in project record documents.

1.7 QUALITY ASSURANCE

- A. Perform work in accordance with NFPA 780.
- B. Perform work in accordance with UL 96A and provide master label.
- C. Perform work in accordance with LPI-175 and provide LPI certification.
- D. Maintain one copy of each document on site.

1.8 QUALIFICATIONS

- A. Manufacturer: Company specializing in lightning protection equipment with minimum five years documented experience and member of the Lightning Protection Institute.
- B. Installer: Authorized installer of manufacturer with minimum five years documented experience and certified by the Lightning Protection Institute.

1.9 FIELD MEASUREMENTS

A. Verify that field measurements are as indicated on shop drawings.

1.10 COORDINATION

A. Coordinate work with roofing and exterior and interior finish installations.

PART 2 PRODUCTS

2.1 COMPONENTS

A. Air Terminals: Cooper solid with adhesive bases for single-