1. **GENERAL**
   1. **SECTION INCLUDES**
      1. Aluminum flagpoles.
         1. Ground Mounted
      2. Halyards, accessories and flag.
      3. Related Sections
         1. Section 03 30 00 Sitework Concrete.
   2. **REFERENCES**
      1. AASHTO M-36 - Corrugated Steel Pipe, Metallic Coated, for Sewers and Drains.
      2. ASTM B241 - Aluminum and Aluminum-Alloy Seamless Pipe and Seamless Extruded Tube.
   3. **SYSTEM DESCRIPTION**
      1. Performance: Pole With Flag Flying: Resistant without permanent deformation, 100 miles/hour wind velocity, non-resonant.
      2. Conform to City of San Bernardino High Wind requirements.
      3. Pole Design: Cone tapered, one piece.
      4. Ground Mounted
         1. Type: Cam Cleat, external Halyard System, with ground sleeve.
         2. Nominal Height: 30 feet measured from top of base.
   4. **SUBMITTALS**
      1. Shop drawings showing, detailed dimensions, base attachment details, anchor requirements and imposed loads.
      2. Product data on pole, accessories and configurations.
      3. Three samples illustrating shaft material, color and finish.
      4. Manufacturer's installation instructions.
   5. **DELIVERY, STORAGE AND HANDLING**
      1. Store and protect products.
      2. Spiral wrap flagpole with protective covering and pack in protective shipping tubes or containers.
      3. Protect flagpole and accessories on site from damage or moisture.
2. **PRODUCTS**
   1. **ACCEPTABLE MANUFACTURERS**
      1. Products of following manufacturers form basis for design and quality intended.
         1. American Flagpole, Abingdon, VA.
         2. Concord Industries, Inc., Addison, TX.
         3. Morgan - Francis Div., Rushville, IN.
         4. Eder Flagpole Co., Oak Creek, WI.
         5. Pole Tech, Inc., Holbrook, NY.
      2. Or equal as approved in accordance with Division 1, General Requirements for substitutions.
   2. **POLE MATERIALS**
      1. Aluminum: ASTM B241; 6063 alloy, T6 temper.
   3. **COMPONENTS AND ACCESSORIES**
      1. Finial: Aluminum ball, 6 inch diameter.
      2. Flags: USA design and State of California Design Size: 5 by 8 feet nylon fabric.
      3. Halyard: No. 10 multi-filament polypropylene, braided, white, with snap hooks.
      4. Truck Assembly
         1. Ground Mounted: Cast aluminum; single stationary.
      5. Cleat:
         1. Ground Mounted: Cam Cleat manually operated with flush access door, cylinder lock, keyed to building standard.
   4. **MOUNTING COMPONENTS**
      1. Lightning Ground Rod: 18 inch long copper rod, 3/4 inch.
      2. Ground Mounted:
         1. Foundation Tube Sleeve: AASHTO M-36, corrugated 16 gage steel, galvanized, with base plate and centering wedges.
         2. Flash collar: Spun aluminum base.
   5. **POLE FABRICATION**
      1. Outside Butt Diameter: 6 inches.
      2. Outside Tip Diameter: 3-1/2 inches.
      3. Nominal Thickness:
         1. Butt: .188 inches.
         2. Tip: .188 inches.
   6. **FINISHES**
      1. Concealed Steel Surfaces: Galvanized to 1.25 ounces per square feet.
      2. Ball: Gold anodized to 0.7 mil thickness.
      3. Pole and Flash Collar: Clear anodized to 0.7 mil thickness.
3. **EXECUTION**
   1. **INSPECTION**
      1. Verify that concrete foundation is ready to receive work and dimensions are as indicated on shop drawings.
      2. Beginning of installation means acceptance of existing conditions.
   2. **INSTALLATION**
      1. Install flagpole as indicated on Drawings and in accordance with manufacturer's instructions.
   3. **TOLERANCES**
      1. Maximum Variation From Plumb: One inch.
   4. **ADJUSTING AND CLEANING**
      1. Clean surfaces.
      2. Adjust operating devices so that halyard and flag function smoothly.

**END OF SECTION**