Special Specification 6418
Non-Conductive Sign Assembly

1. DESCRIPTION

Furnish, fabricate, and erect non-conductive sign assemblies consisting of the signs, sign supports, and associated mounting hardware. Signs must be furnished and installed as directed and in accordance with all plans and specifications.

2. MATERIALS

Furnish all materials unless otherwise shown on the plans. Furnish only new materials. Furnish and fabricate materials that comply with the following items and details shown on the plans.

2.1. Sign Post. Unless specified otherwise, the sign post will be a recycled plastic structural post. Post must be 7-1/2 ft. in height by 6 in. in width by 6 in. in depth.

2.2. Sign Panel. Provide signs that meet TMUTCD. Unless otherwise specified, 1 set of signs will be supplied with each post. Unless required otherwise, each set of signs will include 2 custom guide signs (12 in. in diameter). Provide sign message as shown on the plans.

2.3. Mounting Hardware. Unless specified otherwise, provide sign mounting hardware as required on the plans.

2.4. Sign Post Embedment. Unless specified otherwise, the sign post must be embedded 30 in. below finished grade. Contractor must compact the backfill soil.

Use non-conductive materials, recycled plastic, or other materials shown on the plans for post, sign panel, bolts, nuts, washers, lock washers, screws, and other sign assembly hardware. When dissimilar metals are used, select or insulate metals to prevent corrosion and conduction.

3. CONSTRUCTION

3.1. Drill Holes. Drill holes, for setting post, a minimum of 1-1/2 times the area of the post base. Set the posts a minimum of 30 in. below finished grade. Backfill the holes thoroughly by tamping in 6 in. lifts. After tamping to grade, place additional backfill material in a 6 in. high cone around the pole to allow for settling. Use material equal in composition and density to the surrounding area. Repair surface where existing surfacing material is removed, such as asphalt pavement or concrete riprap, with like material to equivalent condition. Use established safety practices when working near underground or overhead utilities. Consult the appropriate utility company before beginning work.

3.2. Fabrication. Fabricate signposts as required on the plans. The sign post must be 7-1/2 ft. in height, unless otherwise shown on the plans, to meet field conditions and sign-mounting heights.

3.2.1. Sign Posts. Locate and install sign posts of the type, spacing, orientation, and projection shown on the plans. Stake sign post locations for verification by the Engineer. Remove and replace posts damaged during installation at the Contractor’s expense.

3.2.2. Sign Mounting. Connect the set of sign panels to the sign post as shown on the plans. Torque connection bolts as shown on the plans. Attach signs to supports in accordance with the plans and pertinent items.
3.2.3. **Cleaning.** Wash the entire sign after installation with a biodegradable cleaning solution, acceptable to the sign face materials manufacturer, to remove dirt, grease, oil smears, streaks, finger marks, and other foreign materials. Cleaning solution should not breakdown the recycled plastic material of the sign panel.

4. **MEASUREMENT**

This Item will be measured by each non-conductive sign assembly or custom sign panel installed.

5. **PAYMENT**

The work performed and materials furnished, in accordance with this Item and measured as provided under “Measurement,” will be paid for at the unit price bid for “Non-conductive Sign Assembly.” This price is full compensation for furnishing, fabricating, and erecting the supports; constructing foundations including concrete (when required); furnishing complete signs including sign connections and all hardware; attaching the signs to the supports; preparing and cleaning the signs; and materials, equipment, labor, tools, and incidentals.