

**DIVISION 26 00 00**  
SECTION 26 50 00  
SECTION 26 56 00

**ELECTRICAL**  
LIGHTING  
EXTERIOR LIGHTING  
**HELIO BOLLARD, SERIES 900**

## **Part 1 General**

### 01. Summary

#### A. Section Includes:

1. Helio Bollard, Series 900, 9.25" diameter column, illuminated
2. Helio Bollard, Series 900, 9.25" diameter column, non-illuminated

### 02. Submittals

#### A. Provide submittals in accordance with Section 01 33 00 – Submittal Procedures.

#### B. Product data: Manufacturer's standard data sheets on each product to be used, including:

1. Manufacturer's standard product literature.
2. Shop drawings.
3. Installation instructions.
4. Maintenance instructions.

#### C. Submit finish samples for approval.

### 03. Quality Assurance

#### A. Manufacturer Qualifications:

1. Minimum 15 years experience in the manufacture of outdoor lighting.
2. Provide reference list of at least ten major transportation authorities, municipalities, universities, or other high-use public environments currently using outdoor lighting fabricated by the manufacturer.

### 04. Delivery, Storage and Handling

#### A. Handle products in accordance with manufacturer's instructions.

#### B. Store products in manufacturer's original packaging until ready for installation.

#### C. Protect products from impacts and abrasion during storage.

### 05. Warranty

#### A. Provide manufacturer's standard warranty:

1. Warranty terms: one year from date of invoice against defects in materials and workmanship.

## **Part 2 Products**

### 01. Manufacturer

#### A. Basis-of-design product: provide bollards based on the product named.

1. Helio Bollard, Series 900 by Forms+Surfaces

#### 2. Manufacturer Contact:

Forms+Surfaces  
30 Pine Street  
Pittsburgh, PA 15223  
phone: 800-451-0410

fax: 412-385-4715  
email: sales@forms-surfaces.com  
website: www.forms-surfaces.com

## B. Bollards

### 1. Materials:

- a. Body: Stainless steel.
- b. Base: Aluminum.
- c. Head Cap: Stainless steel casting.
- d. Lens: .118" thick frosted acrylic.
- e. LED Driver: Input voltage is 120-277 VAC nominal. Includes constant output current, with over-voltage, short circuit, overload protection, and has forward-phase, reverse-phase, and 0-10V dimming capabilities. Certifications include: IP64 enclosure, and Class 2 rated output (UL8750).
- f. LED Light Engine (for illuminated bollards) (select color temperature below):
  - 1) 360° Light Distribution:
    - A) 40W custom LED light engine.
    - B) Luminaire lumens: 604.
    - C) Color temperature (Select one color temperature below):
      - a. 3,000K.
      - b. 4,000K.
  - 2) 180° Light Distribution:
    - A) 20W custom LED light engine.
    - B) Luminaire lumens: 224.
    - C) Color temperature (Select one color temperature below):
      - a. 3,000K.
      - b. 4,000K.

### 2. Finishes:

- a. Body and Head Cap:
  - 1) Satin.
  - 2) Polyester powdercoat (Select one option below):
    - A) Standard Texture/Gloss from Forms+Surfaces Powdercoat Chart.
    - B) Custom RAL powdercoat color.
- b. Base: Custom powdercoat.

3. Dimensions: 40" high x 9.25" diameter.

### 4. Mounting:

- a. Surface mount with J-bolts. Templates available upon request.

## Part 3 Execution

### 01. Examination

- A. Verify that substrates are stable and capable of supporting the weight of items covered under this

section.

- B. Verify that substrates have been adequately prepared to securely anchor those items that will be surface mounted.

02. Installation

- A. Install according to the manufacturer's installation instructions.
- B. Install in conformance to applicable ADA guidelines and End User's established accessibility policies.

**END OF SECTION**