**ULTRA-BEAM™: Low cost AC & DC, long range sensors**

**Rugged construction.**
Electrostatic transducer with metal mesh protective screen. Housing is molded VALOX® with epoxy-encapsulated circuitry, meeting many sensing requirements, rated NEMA 1, 3, and 12.

**Switched electromechanical or analog outputs.**
Switched unit has simple range adjustment to limit response to background objects. Analog units offer 0 to +10V dc sourcing and 0 to 20mA dc sinking outputs, positive or negative slope, and are easily interfaced to variable speed DC drives, microprocessors and PLCs.

**AC & DC Voltage inputs.**
Choose models for 18-30V dc, 105-130V ac, or 210-260V ac operation. All models utilize mini-style quick disconnect cables.

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**Long 0.5 to 6 m range.**
(20” to 20’)
Electrostatic transducer provides economical, reliable, close or long-distance sensing independent of color or texture of the target object. Adjustable sensing window in analog output units can be 300 mm to 5.6 m (12” to 18’) wide and adjusted using NULL and SPAN adjustments on top of the unit.
**ULTRA-BEAM™ Model Selection**

### ULTRA-BEAM Sensor Models

<table>
<thead>
<tr>
<th>Models</th>
<th>Range</th>
<th>Cable*</th>
<th>Supply Voltage</th>
<th>Output Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>SU925QD-24</td>
<td>500 mm to 6 m (20&quot; to 20')</td>
<td>5-pin Mini QD</td>
<td>18 to 30V dc</td>
<td>SPDT</td>
</tr>
<tr>
<td>SU925QD</td>
<td></td>
<td></td>
<td>105 to 130V ac</td>
<td>E/M Relay</td>
</tr>
<tr>
<td>SUB925QD</td>
<td></td>
<td></td>
<td>210 to 250V ac</td>
<td></td>
</tr>
<tr>
<td>SU923QD</td>
<td></td>
<td>4-pin Mini QD</td>
<td>18 to 30V dc</td>
<td>Analog</td>
</tr>
<tr>
<td>SUB923QD</td>
<td></td>
<td></td>
<td>105 to 130V ac</td>
<td>0-10V dc</td>
</tr>
<tr>
<td>SU925QD-24</td>
<td></td>
<td>5-pin Mini QD</td>
<td>210 to 250V ac</td>
<td>0-20 mA</td>
</tr>
</tbody>
</table>

* Models with a QD connector require a mating cable (page 36).

### ULTRA-BEAM Specifications

<table>
<thead>
<tr>
<th>Specification</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Analog resolution or discrete repeatability</td>
<td>0.5% of sensing distance</td>
</tr>
<tr>
<td>Linearity</td>
<td>1% of full scale range</td>
</tr>
<tr>
<td>Response speed</td>
<td>100 ms</td>
</tr>
<tr>
<td>Temperature effect</td>
<td>0.2% of sensing distance/ deg. C</td>
</tr>
<tr>
<td>Environmental rating</td>
<td>IP54, NEMA 12</td>
</tr>
<tr>
<td>Data sheet reference</td>
<td>Download at <a href="http://www.baneng.com">www.baneng.com</a></td>
</tr>
<tr>
<td>Discrete AC</td>
<td>03420</td>
</tr>
<tr>
<td>Discrete DC</td>
<td>03535</td>
</tr>
<tr>
<td>Analog</td>
<td>03488</td>
</tr>
</tbody>
</table>

### ULTRA-BEAM Sensor with Switched Output

- **Range Adjustment**: (Remove Nylon Screw for Access)
- **LED Indicator**: Mini-Style QD Connector
- **MS (x10) Screw Clearance**: 2
- **Threaded Base M30 x 1.5**: 40.1 mm (1.58 in)
- **Mini-Style QD Connector**: 50.0 mm (1.97 in)
- **40.8 mm (1.57 in)**
- **48.8 mm (1.92 in)**
- **107.4 mm (4.23 in)**
- **88.9 mm (3.5 in)**
- **64.5 mm (2.54 in)**
- **40.0 mm (1.57 in)**
- **45.0 mm (1.77 in)**
- **4.8 mm (0.19 in)**
- **14 mm (0.59 in)**

### ULTRA-BEAM Sensor with Analog Output

- **Range Adjustment**: (Remove Nylon Screw for Access)
- **LED Indicator**: Mini-Style QD Connector
- **MS (x10) Screw Clearance**: 2
- **Threaded Base M30 x 1.5**: 40.1 mm (1.58 in)
- **Mini-Style QD Connector**: 50.0 mm (1.97 in)
- **40.8 mm (1.57 in)**
- **48.8 mm (1.92 in)**
- **107.4 mm (4.23 in)**
- **88.9 mm (3.5 in)**
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