

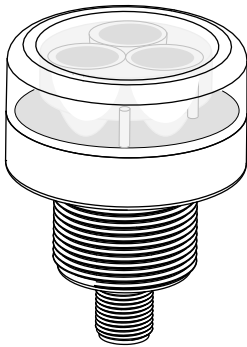
# WL50S High-Intensity Work Spot Light



## Datasheet

General-purpose LED work lighting

To view or download the latest technical information about this product, including specifications, dimensions, accessories, and wiring, see <http://www.bannerengineering.com>.



- Three lens options, depending on model, to vary spot size
- Illuminates a large area with an even pattern of light and no shadows
- 12 to 30 V dc operation
- Cabled and quick-disconnect models available
- 50 mm diameter with flat profile and 30 mm mounting base
- Rugged sealed housing rated to IP69K



### WARNING: Not To Be Used for Personnel Protection

Never use this device as a sensing device for personnel protection. Doing so could lead to serious injury or death. This device does not include the self-checking redundant circuitry necessary to allow its use in personnel safety applications. A sensor failure or malfunction can cause either an energized or de-energized sensor output condition.

## Models

Model <sup>1</sup>	LED Color	Lumens	Lux		Lens Angle	Connection
			0.5 m	1 m		
WL50SWL5Q	White, 5000-8300 K	295	13780	3445	± 5° (smaller, more focused spot; see graph)	5 pin Euro integral QD connector (use with a 4-wire mating cordset; only 2 wires used for connection)
WL50SRL5Q	Red, 620-630 nm	110	8000	2000		
WL50SGL5Q	Green, 520-535 nm	210	13000	3250		
WL50SWL11Q	White, 5000-8300 K	285	5460	1365	± 11° (larger spot; see graph)	
WL50SRL11Q	Red, 620-630 nm	105	2500	625		
WL50SGL11Q	Green, 520-535 nm	200	3900	975		
WL50SWL20Q	White, 5000-8300 K	270	2000	500	± 20° (largest spot; see graph)	
WL50SRL20Q	Red, 620-630 nm	100	1040	260		
WL50SGL20Q	Green, 520-535 nm	190	1700	425		

<sup>1</sup> Integral QD models only are listed. For integral 2 m (6.5') PVC cable, omit suffix Q from model number (example, WL50SWL5). A model with a QD requires a mating cordset (see [4-Pin Euro-Style Cordsets](#) on page 3).



## Specifications

### Supply Voltage and Current

Operating voltage: 12 V to 30 V dc  
Current draw: 400 mA maximum

### Supply Protection Circuitry

Protected against reverse polarity and transient voltages

### Light Source

Three high-intensity LEDs; see models table for color temperature or wavelengths

### Useful Life

When operating within specifications, output will decrease less than 30% after 50,000 hours.

### Construction

Black anodized aluminum housing; polycarbonate window; nickel-plated QD connector or PVC-jacketed cable; black zinc-plated steel mounting nut

### Mounting:

30 x 1.5 mm thread base mount

### Connections

Integral 5-pin M12 quick disconnect fitting or 2 m (6.5 ft) integral cable, depending on model; 4-pin connecting cordset required for quick disconnect fitting models; only 2 wires used

### Environmental Rating

IEC IP67, IP69K per DIN 40050-9



**NOTE:** Do not spray the cable with a high-pressure sprayer or cable damage will result.

### Operating Conditions

-20 °C to +50 °C (-4 °F to +122 °F)  
95% maximum relative humidity (non-condensing)

### Vibration and Mechanical Shock

All models meet Mil. Std. 202F requirements method 201A (vibration: 10 to 60 Hz max., double amplitude 0.06", maximum acceleration 10G). Also meets IEC 947-5-2; 30G 11 ms duration, half sine wave.

### Storage Temperature

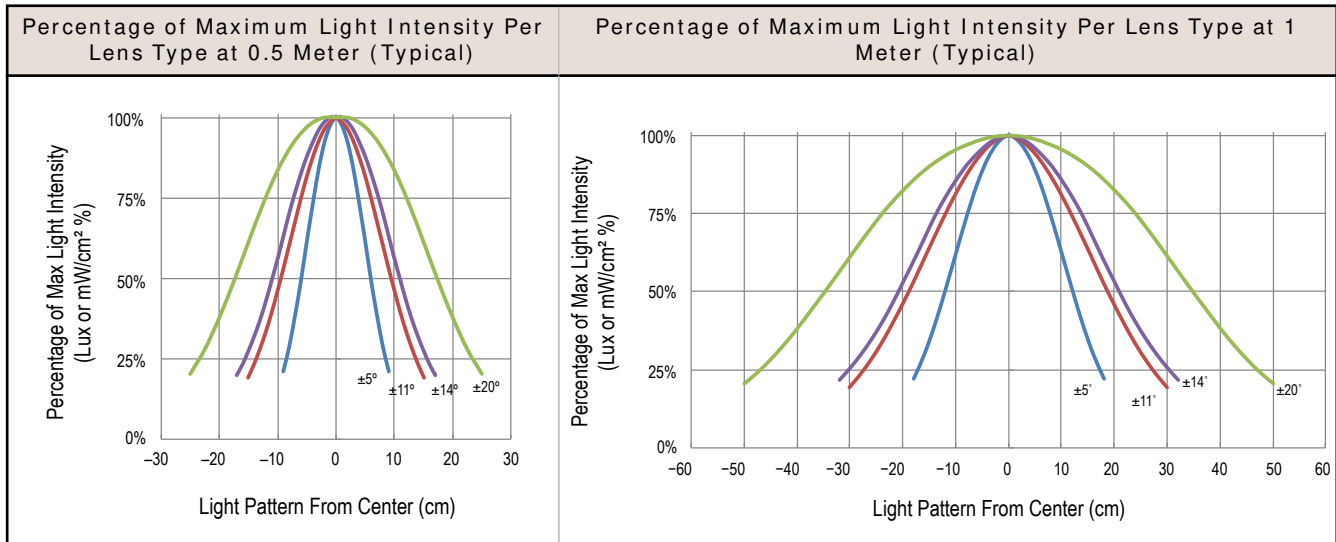
-40 °C to +70 °C (-40 °F to +158 °F)

### Certifications

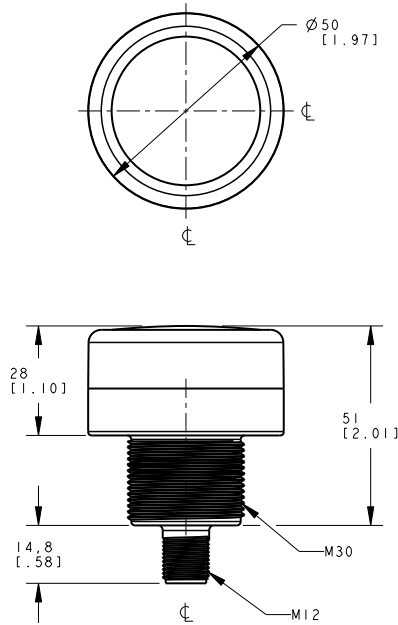


UL Recognized for easy installation in control cabinets

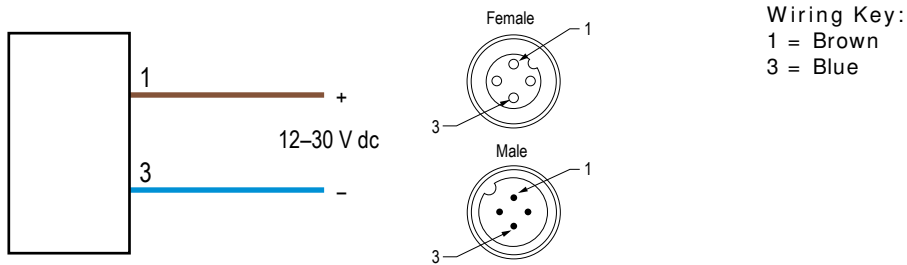
## Beam Patterns



## Dimensions



## Wiring



## 4-Pin Euro-Style Cordsets

4-Pin Threaded M12/ Euro-Style Cordsets				
Model	Length	Style	Dimensions	Pinout (Female)
MQDC-406	1.83 m (6 ft)	Straight		<p>1 = Brown                  2 = White                  3 = Blue                  4 = Black</p>
MQDC-415	4.57 m (15 ft)			
MQDC-430	9.14 m (30 ft)			
MQDC-450	15.2 m (50 ft)			

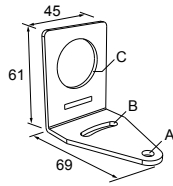
4-Pin Threaded M12/ Euro-Style Cordsets				
Model	Length	Style	Dimensions	Pinout (Female)
MQDC-406RA	1.83 m (6 ft)	Right-Angle		
MQDC-415RA	4.57 m (15 ft)			
MQDC-430RA	9.14 m (30 ft)			
MQDC-450RA	15.2 m (50 ft)			

## Mounting Brackets

All measurements are in mm

### SMB30A

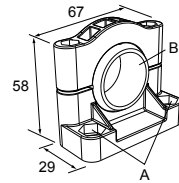
- Right-angle bracket with curved slot for versatile orientation
- Clearance for M6 (¼ in) hardware
- Mounting hole for 30 mm sensor
- 12-ga. stainless steel



Hole center spacing: A to B= 40  
Hole size: A=  $\phi$  6.3, B= 27.1 x 6.3, C=  $\phi$  30.5

### SMB30SC

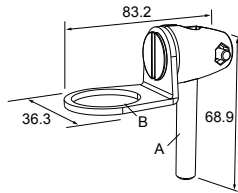
- Swivel bracket with 30 mm mounting hole for sensor
- Black reinforced thermoplastic polyester
- Stainless steel mounting and swivel locking hardware included



Hole center spacing: A=  $\phi$  50.8  
Hole size: A=  $\phi$  7.0, B=  $\phi$  30.0

### SMB30FA

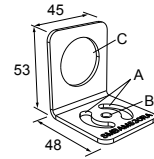
- Swivel bracket with tilt and pan movement for precise adjustment
- Mounting hole for 30 mm sensor
- 12-ga. 304 stainless steel
- Easy sensor mounting to extrude rail T-slot
- Metric and inch size bolt available



Bolt thread: SMB30FA, A= 3/8 - 16 x 2 in; SMB30FAM10, A= M10 - 1.5 x 50  
Hole size: B=  $\phi$  30.1

### SMBAMS30RA

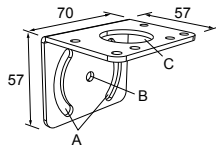
- Right-angle SMBAMS series bracket
- 30 mm hole for mounting sensors
- Articulation slots for 90°+ rotation
- 12-ga. (2.6 mm) cold-rolled steel



Hole center spacing: A= 26.0, A to B= 13.0  
Hole size: A= 26.8 x 7.0, B=  $\phi$  6.5, C=  $\phi$  31.0

### SMB30MM

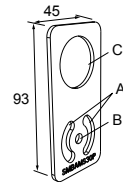
- 12-ga. stainless steel bracket with curved mounting slots for versatile orientation
- Clearance for M6 (¼ in) hardware
- Mounting hole for 30 mm sensor



Hole center spacing: A = 51, A to B = 25.4  
Hole size: A = 42.6 x 7, B =  $\phi$  6.4, C =  $\phi$  30.1

### SMBAMS30P

- Flat SMBAMS series bracket
- 30 mm hole for mounting sensors
- Articulation slots for 90°+ rotation
- 12-ga. 300 series stainless steel



Hole center spacing: A= 26.0, A to B= 13.0  
Hole size: A= 26.8 x 7.0, B=  $\phi$  6.5, C=  $\phi$  31.0

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