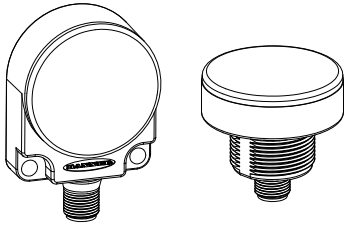


# WL50-2 LED Work Light - PWM Dimmable



## Datasheet



- Intensity can be controlled from 15 to 95% using Pulse Width Modulation (PWM) on an input control wire
- Designed for enclosure or area lighting
- Use with an optional flex arm mount for adjustable, industrial task lighting
- Illuminates a large area with an even pattern of light
- Standard or push-button models available
- Flat-mount or 30 mm base-mount models available
- Rugged, sealed polycarbonate housing rated to IP69K (standard models) or IP67 (push-button models)
- Low-profile design with several mounting options
- 12 to 30 V dc operation
- Cabled and quick-disconnect models available
- Low power consumption; less than 3 watts

## Models

Flat-mount models include a 48 mm (1.9 in) circular velcro mounting kit for easy mounting with no additional hardware.

Model <sup>1</sup>	Push-Button	Mounting Style	Input
WL50F-2PWM	Standard (no push-button)	Flat-mount	12 to 30 V dc
WL50-2PWM		30 mm base-mount	

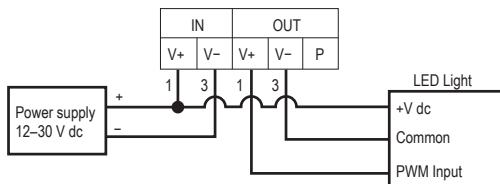


For PWM dimming, use with the LC65 Dimmer Module. For more information, refer to the LC65 LED Dimmer Module datasheet, p/n [177086](#).

For more information about using the dimmer module, refer to [Wiring](#) on page 1.

## Wiring

	Plns	Color	Connection
	1	brown	12 to 30 V dc
3	blue	dc common	
4	black	Pulse width modulation (PWM) input; for maximum intensity, connect the black wire to 12 to 30 V dc	
2	white	Not used	



For standard polarity PWM dimming, use with the LC65P2T dimming module. Use the LC65P1T or LC65P1Q5 dimming modules for opposite polarity dimming.

<sup>1</sup> Only standard 2 m (6.5 ft) cable models are listed.

- To order the 9 m (30 ft) cable models, add the suffix **W/30** to the model number, for example, **WL50F-2PWM W/30**.
- To order the 4-pin Euro-style Integral QD connector models, add the suffix **Q** to the model number, for example, **WL50F-2PWMQ**.
- To order the 150 mm (6 in) 4-pin Euro pigtail QD models, add the suffix **QP** to the model number, for example, **WL50F-2PWMQP**.
- A model with a QD requires a mating cordset.



## Specifications

### Supply Voltage and Current

12 V to 30 V dc (Use only with suitable Class 2 power supply)  
 Max. current at -40 °C (-40 °F):  
 233 mA at 12 V dc  
 110 mA at 24 V dc  
 90 mA at 30 V dc  
 Max. Input Power: 2.8 watts

### Pulse Width Modulation (PWM)

Frequency: Up to 300 Hz  
 Voltage: 12 V to 30 V dc  
 Current: 3 mA max.

### Power-Up Response Time

Light On: 1 ms (max.) for models without push-button

### Construction

Polycarbonate housing; nickel-plated QD connector or PVC-jacketed cable

### Environmental Rating

Standard models: IEC IP67, IP69K per DIN 40050  
 Push-Button Models: IEC IP67

### Operating Conditions

-40 °C to +50 °C (-40 °F to +122 °F)

### Light Characteristics

Color temperature (CCT): 6000-7000K  
 Color: Cool white  
 Lumen output at 25 °C (77 °F) typical: 185 lumens  
 Luminous efficacy at 25 °C (77 °F) typical: 72 lumens per watt  
 Lux (typical):  
 at 0.5 m (1.6 ft): 350 lux  
 at 1.0 m (3.3 ft): 88 lux  
 at 2.0 m (6.6 ft): 22 lux

### Connections

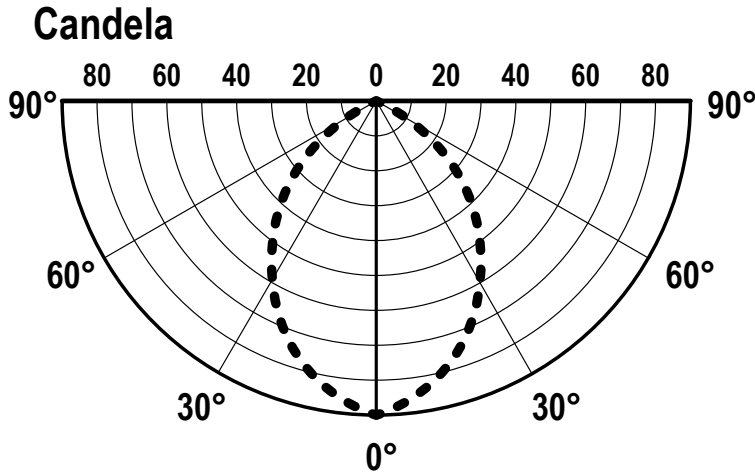
Integral 4-pin Euro-style QD, 150 mm (5.9 in) PVC pigtail with QD, or 2 m (6.5 ft) integral cable, depending on model

### Certifications

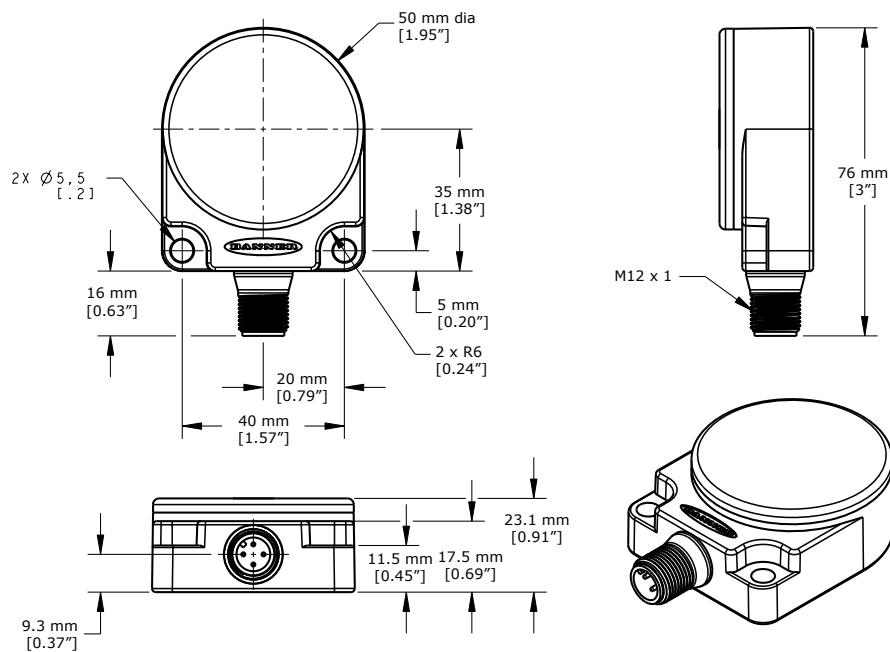


UL Recognized for easy installation in control cabinets

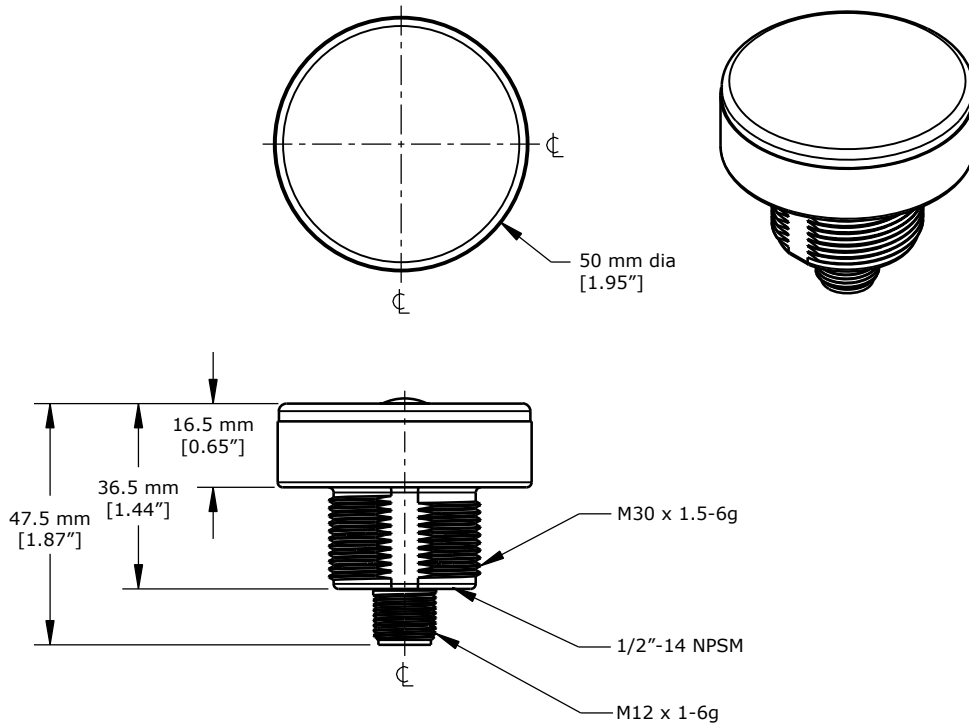
## Intensity Distribution



## Dimensions - Flat Mount Models



Dimensions - 30 mm Base Mount Models

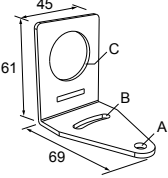
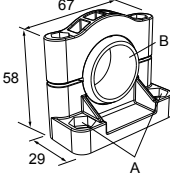
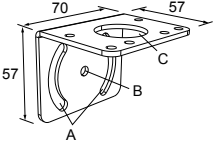
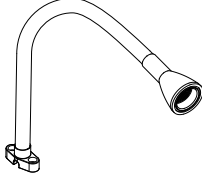


Accessories

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)	Right-Angle		
MQDC-406RA	1.83 m (6 ft)			
MQDC-415RA	4.57 m (15 ft)			
MQDC-430RA	9.14 m (30 ft)			
MQDC-450RA	15.2 m (50 ft)			

## Mounting Accessories

<p><b>SMB30A</b></p> <ul style="list-style-type: none"> <li>• Right-angle bracket with curved slot for versatile orientation</li> <li>• Clearance for M6 (¼ in) hardware</li> <li>• Mounting hole for 30 mm sensor</li> <li>• 12-ga. stainless steel</li> </ul>  <p><b>Hole center spacing:</b> A to B=40  <b>Hole size:</b> A=ø 6.3, B= 27.1 x 6.3, C=ø 30.5</p>	<p><b>SMB30SC</b></p> <ul style="list-style-type: none"> <li>• Swivel bracket with 30 mm mounting hole for sensor</li> <li>• Black reinforced thermoplastic polyester</li> <li>• Stainless steel mounting and swivel locking hardware included</li> </ul>  <p><b>Hole center spacing:</b> A=ø 50.8  <b>Hole size:</b> A=ø 7.0, B=ø 30.0</p>
<p><b>SMB30MM</b></p> <ul style="list-style-type: none"> <li>• 12-ga. stainless steel bracket with curved mounting slots for versatile orientation</li> <li>• Clearance for M6 (¼ in) hardware</li> <li>• Mounting hole for 30 mm sensor</li> </ul>  <p><b>Hole center spacing:</b> A = 51, A to B = 25.4  <b>Hole size:</b> A = 42.6 x 7, B = ø 6.4, C = ø 30.1</p>	<p><b>Flex Arm Mounts</b></p> <ul style="list-style-type: none"> <li>• For cabled and QD models</li> <li>• 457 mm (18 in) long, vinyl coated</li> </ul> <p><b>FLX18-1212</b>  <b>FLX18-F12</b>  <b>FLX18-12M30</b>  <b>FLX18-DM30</b>  <b>FLX18-FM30</b></p>  <p>For base connection measurements, visit <a href="http://www.bannerengineering.com">www.bannerengineering.com</a> and search for p/n 170238.</p>

## Banner Engineering Corp. Limited Warranty

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For patent information, see [www.bannerengineering.com/patents](http://www.bannerengineering.com/patents).

## FCC Part 15 and CAN ICES-3 (B)/NMB-3(B)

This device complies with part 15 of the FCC Rules and CAN ICES-3 (B)/NMB-3(B). Operation is subject to the following two conditions:

1. This device may not cause harmful interference, and
2. This device must accept any interference received, including interference that may cause undesired operation.

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules and CAN ICES-3 (B)/NMB-3(B). These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the manufacturer.