Features



QPMA Contact Factory for more information

- Intense levels of light output for outdoor applications
- Controlled field of view for signage and narrow lane use
- May also be used for low-cost vision sensor illumination
- Rugged, cost-effective, and easy to install
- Compact devices are completely self-contained, no controller needed
- Up to three colors in one housing
- Immune to ambient light, EMI, and RFI interference
- 50 mm (2 in) diameter with flat profile and 30 mm (1.2 in) mounting base
- PNP or NPN input type, depending on model
- 15 V DC to 30 V DC operation

WARNING:

- **Do not use this device for personnel protection**
- Using this device for personnel protection could result in serious injury or death.
- This device does not include the self-checking redundant circuitry necessary to allow its use in personnel safety applications. A device failure or malfunction can cause either an energized (on) or de-energized (off) output condition.

Models

NOTE: Optional sun shield model K50DS is available for enhanced visibility in desert sun brightness levels (see Sun Shields).

Model[1]	LED Function[2]	Inputs[3]
K50LDGRYPQ	3 Color: Green, Red, Yellow	PNP
K50LDGRYNQ		NPN
K50LDGRBPQ	3 Color: Green, Red, Blue	PNP
K50LDGRBNQ		NPN

Model[1]	LED Function[2]	Inputs[3]
K50LDXGXPQ	1 Color: Green	PNP/NPN
K50LDXRXPQ	1 Color: Red	PNP/NPN
K50LDXYXPQ	1 Color: Yellow	PNP/NPN
K50LDXWXPQ	1 Color: White	PNP/NPN
K50LDXBXPQ	1 Color: Blue	PNP/NPN

Contact factory for other colors and color combinations.

[1] Integral quick-disconnect connector models are listed.
- To order the 150 mm (6 in) PVC-jacketed cable with quick-disconnect connector model, replace **Q** with **QP** in model number (example, **K50LDGRYPQP**).
- To order the 2 m (6.5 ft) cable model, omit suffix **Q** from model number (example, **K50LDGRYP**).
- A model with a quick-disconnect connector requires a mating cordset (see Accessories).

[2] 3-color models: 6 LEDs per color; 1-color models: 18 LEDs per color
[3] 1-color models are PNP/NPN selectable, depending on wiring.

Original Instructions
30-Jun-25

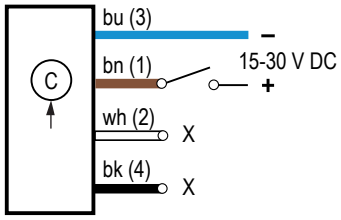
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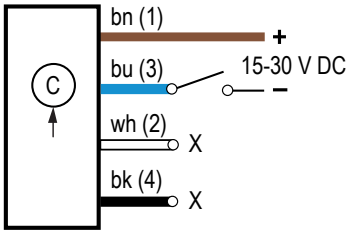
ПРОМЭЛЕКТРОНИКА/ sales@prom-elec.com

Wiring – 1-Color Models

PNP



NPN Input



Key

1 = Brown

2 = White

3 = Blue

4 = Black

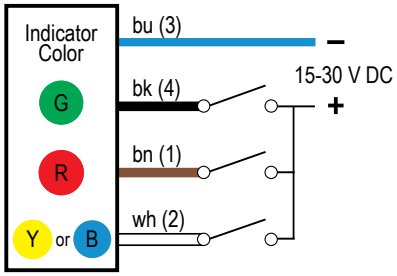
C = Indicator Color (Green, Red, Yellow, White or Blue)

X = Not Used

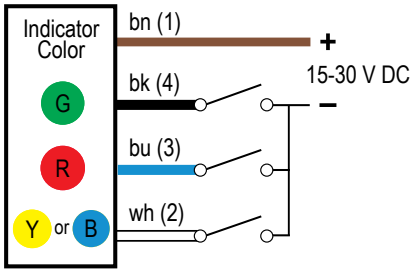
NOTE: 1-color models are PNP/NPN selectable.

Wiring – 3-Color Models

PNP



NPN



Key

1 = Brown

2 = White

3 = Blue

4 = Black

G = Green

R = Red

Y = Yellow

B = Blue

Specifications

Supply Voltage and Current

15 V DC to 30 V DC at 120 mA maximum (1-color models)

15 V DC to 30 V DC at 40 mA maximum per LED color (3-color models)

12 V DC minimum voltage to –20 °C for both models

Supply Protection Circuitry

Protected against reverse polarity and transient voltages

Indicators

LED colors are independently selected, depending on mode

Input Response Time

Indicator ON/OFF: 1 ms maximum

Environmental Rating

Fully encapsulated, rated IP67

Construction

Base and covers: polycarbonate

Connections

Integral 4-pin M12 male quick-disconnect connector, 150 mm (6 in) PVC-jacketed cable with a 4-pin M12 male quick-disconnect connector, or 2 m (6.5 ft) integral PVC-jacketed cable, depending on model

Operating Conditions

–40 °C to +50 °C (–40 °F to +122 °F)

90% at +55 °C maximum relative humidity (non-condensing)

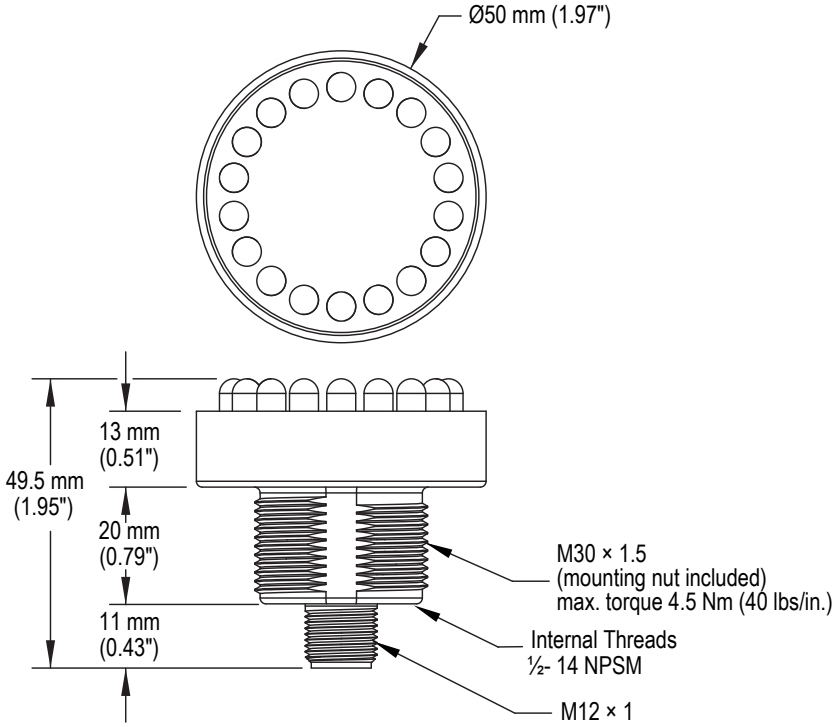
Certifications

Banner Engineering BV
Park Lane, Culliganlaan 2F bus 3
1831 Diegem, BELGIUM

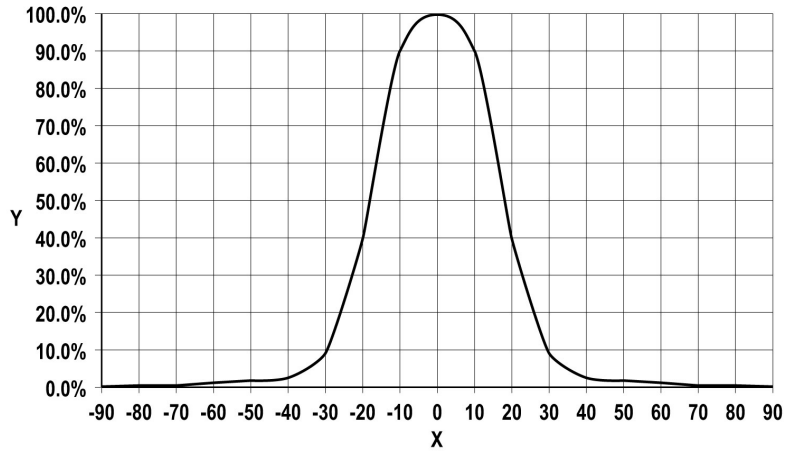
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Dimensions

All measurements are listed in millimeters [inches], unless noted otherwise. The measurements provided are subject to change.



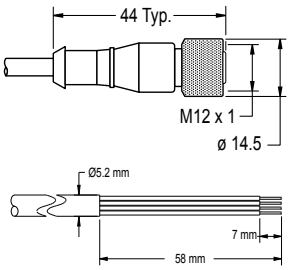
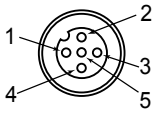
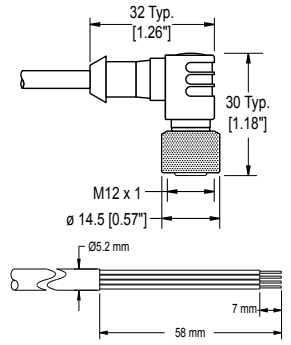
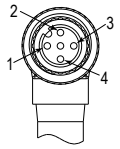
Percent of Maximum Intensity vs Viewing Angle



X: Viewing Angle (Deg)
Y: Intensity (Percent)

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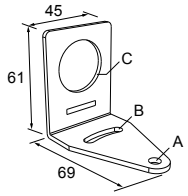
Accessories

4-Pin Single-Ended M12 Female Cordsets					
Model	**Length**	**Style**	**Dimensions**	**Pinout (Female)**	
MQDC-406	2 m (6.56 ft)	Straight			1 = Brown 2 = White 3 = Blue 4 = Black 5 = Not used
MQDC-415	5 m (16.4 ft)				
MQDC-430	9 m (29.5 ft)				
MQDC-450	15 m (49.2 ft)				
MQDC-406RA	2 m (6.56 ft)	Right-Angle			
MQDC-415RA	5 m (16.4 ft)				
MQDC-430RA	9 m (29.5 ft)				
MQDC-450RA	15 m (49.2 ft)				

Mounting Brackets

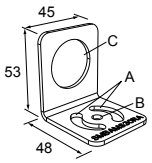
SMB30A
- Right-angle bracket with curved slot for versatile orientation
- Clearance for M6 (¼ in) hardware
- Mounting hole for 30 mm sensor
- 12-gauge stainless steel

Hole center spacing: A to B=40
Hole size: A=ø 6.3, B= 27.1 × 6.3, C=ø 30.5



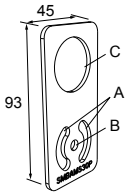
SMBAMS30RA
- Right-angle SMBAMS series bracket
- 30 mm hole for mounting sensors
- Articulation slots for 90°+ rotation
- 12-gauge (2.6 mm) cold-rolled steel

Hole center spacing: A=26.0, A to B=13.0
Hole size: A=26.8 × 7.0, B=ø 6.5, C=ø 31.0



SMBAMS30P
- Flat SMBAMS series bracket
- 30 mm hole for mounting sensors
- Articulation slots for 90°+ rotation
- 12-gauge 300 series stainless steel

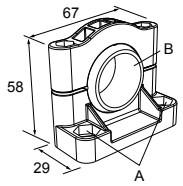
Hole center spacing: A=26.0, A to B=13.0
Hole size: A=26.8 × 7.0, B=ø 6.5, C=ø 31.0



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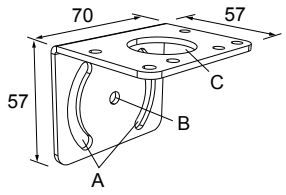
SMB30SC
- Swivel bracket with 30 mm mounting hole for sensor
- Black reinforced thermoplastic polyester
- Stainless steel mounting and swivel locking hardware included

Hole center spacing: A=ø 50.8
Hole size: A=ø 7.0, B=ø 30.0



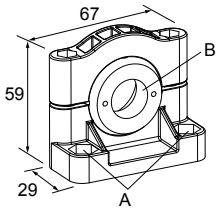
SMB30MM
- 12-gauge stainless steel bracket with curved mounting slots for versatile orientation
- Clearance for M6 (¼ in) hardware
- Mounting hole for 30 mm sensor

Hole center spacing: A = 51, A to B = 25.4
Hole size: A = 42.6 × 7, B = ø 6.4, C = ø 30.1



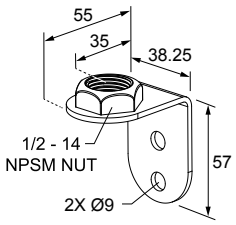
SMB3018SC
- 18 mm swivel side or barrel-mount bracket
- Black reinforced thermoplastic polyester
- Stainless steel swivel locking hardware included

Hole center spacing: A = 50.8
Hole size: A = ø 7.0, B = ø 18.0



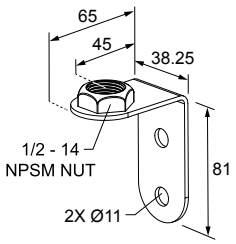
LMBE12RA35
- Direct mounting of stand-off pipe, with common bracket type
- Zinc-plated steel
- 1/2-14 NPSM nut
- Mounting distance from the wall to the center of the 1/2-14 NPSM nut is 35 mm

Hole center spacing: 20.0



LMBE12RA45
- Direct mounting of stand-off pipe, with common bracket type
- Zinc-plated steel
- 1/2-14 NPSM nut
- Mounting distance from the wall to the center of the 1/2-14 NPSM nut is 45 mm

Hole center spacing: 35.0

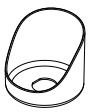


Sun Shields

K50DS
- Use for enhanced visibility in desert sun brightness levels
- Thermoplastic polyester



K90DS
- Use for enhanced visibility in direct sunlight conditions
- Polycarbonate



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