EZ-LIGHT™ 2- or 3-Color General-Purpose Indicators



Datasheet

To view or download the latest technical information about this product, including specifications, dimensions, accessories, and wiring, go to www.bannerengineering.com.



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

Models ¹¹			LED Colors — 2 or 3 Lights, Independently Selected			Construction	
	PNP Input	NPN Input	Color 1	Color 2	Color 3	_	
	T8LGRXPQP	T8LGRXNQP	Green	Red	_		
	T8LGXYPQP	T8LGXYNQP	Green	_	Yellow	Polycarbonate/ABS alloy housing,	
	T8LXRYPQP	T8LXRYNQP	_	Red	Yellow	thermoplastic diffuser	
- Cinn	M18GRXPQ	M18GRXNQ	Green	Red	_	1	
	M18GXYPQ	M18GXYNQ	Green	_	Yellow	Nickel-plated brass housing, thermoplastic diffuser	
	M18XRYPQ	M18XRYNQ	_	Red	Yellow	Fully encapsulated	
	M18GRYPQ	M18GRYNQ	Green	Red	Yellow	IP67	
	K30LGRXPQ	K30LGRXNQ	Green	Red	_		
	K30LGXYPQ	K30LGXYNQ	Green	_	Yellow	22 mm threaded polycarbonate	
	K30LXRYPQ	K30LXRYNQ	_	Red	Yellow	base, translucent polycarbonate	
	K30LGRYPQ	K30LGRYNQ	Green	Red	Yellow	dome Fully encapsulated IP67, IP69K per DIN 40050-9	
	K50LGRXPQ	K50LGRXNQ	Green	Red	_		
	K50LGXYPQ	K50LGXYNQ	Green	_	Yellow	30 mm polycarbonate base,	
	K50LXRYPQ	K50LXRYNQ	_	Red	Yellow	translucent polycarbonate dome Fully encapsulated	
	K50LGRYPQ	K50LGRYNQ	Green	Red	Yellow	IP67, IP69K per DIN 40050-9	
	K50FLGRXPQ	K50FLGRXNQ	Green	Red	_		
	K50FLGXYPQ	K50FLGXYNQ	Green	_	Yellow	ABS base, translucent	
	K50FLXRYPQ	K50FLXRYNQ	_	Red	Yellow	polycarbonate dome Fully encapsulated	
	K50FLGRYPQ	K50FLGRYNQ	Green	Red	Yellow	IP67, IP69K per DIN 40050-9	
	K80LGRXPQ	K80LGRXNQ	Green	Red	_		
	K80LGXYPQ	K80LGXYNQ	Green	_	Yellow	Polycarbonate base, translucent	
	K80LXRYPQ	K80LXRYNQ	_	Red	Yellow	polycarbonate dome	
	K80LGRYPQ	K80LGRYNQ	Green	Red	Yellow	Electronics fully encapsulated IP67	

[•] T8L Models: Standard 150 mm (6 in) PVC-jacketed cable with 4-pin M12 quick-disconnect connector models are listed. For integral 4-wire cabled model, omit suffix QP. For example, T8LGRXP.

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K30L Models: Standard integral 4-pin M12 quick-disconnect connector models are listed. For 2 m (6.5 ft) integral 4-wire cabled model, omit suffix Q. For example, K30LGRXP. For 150 mm (6 in) PVC-jacketed cable with 4-pin M12 quick-disconnect connector, replace suffix Q with QP. For example, K30LGRXPQP. For terminal model, replace suffix Q with T. For example, K30LGRXPT.

K80L Models: Standard integral 4-pin M12 quick-disconnect connector models are listed. For terminal-wired model, omit suffix Q. For example, K80LGRXP.

Other Models: Standard integral 4-pin M12 quick-disconnect connector models are listed. For 2 m (6.5 ft) integral 4-wire cabled model, omit suffix Q. For example, M18GRXP. For 150 mm (6 in) PVC-jacketed cable with 4-pin M12 quick-disconnect connector, replace suffix Q with QP. For example, M18GRXPQP.

Models with a quick disconnect require a mating cordset.

² Contact Banner Engineering for other colors and color combinations.

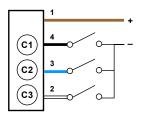
The following models are no longer available for order, but are still covered by the information in this document.

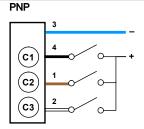
	Models ¹		LED Colors — 2 or 3 Lights, Independently Selected			Construction	
	PNP Input	NPN Input	Color 1	Color 2	Color 3	_	
•	T18GRXPQ	T18GRXNQ	Green	Red	_	Th	
	T18GXYPQ	T18GXYNQ	Green	_	Yellow	Thermoplastic polyester housing, thermoplastic diffuser	
	T18XRYPQ	T18XRYNQ	_	Red	Yellow	Fully encapsulated	
	T18GRYPQ	T18GRYNQ	Green	Red	Yellow	IP67	
	T30GRXPQ	T30GRXNQ	Green	Red	_		
	T30GXYPQ	T30GXYNQ	Green	_	Yellow		
	T30XRYPQ	T30XRYNQ	_	Red	Yellow	Thermoplastic polyester housing,	
	T30GRYPQ 3	T30GRYNQ	Green	Red	Yellow	thermoplastic diffuser	
	T30GRBPQ	_	Green	Red	Blue	Fully encapsulated	
	T30GROPQ	_	Green	Red	Orange	IP67	
	_	T30RGR5PNQ	Red	Green	Red		
	T30RGXPQ	_	Red	Green	_		

Wiring Diagrams

Multi Color Wiring

NPN





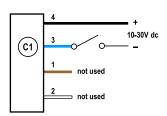
1 = Brown	C1 = Color 1
2 = White	C2 = Color 2
3 = Blue	C3 = Color 3
4 = Black	

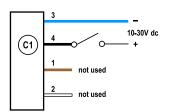
Gray Wire not used in K30 Terminal models

5 = Gray

Single Color Wiring

NPN PNP





Specifications

Supply Voltage and Current

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781. models: 10 V DC to 30 V DC at 20 mA maximum
718, M18, and K301. models: 10 V DC to 30 V DC at 25 mA maximum per LED color
730 models: 10 V DC to 30 V DC at 40 mA maximum per LED color
K501., K50F1., and K801. models: 18 V DC to 30 V DC at 40 mA maximum per LED

Indicators

Entire translucent diffuser or dome provides indication. Green and yellow, when connected to discrete output of 3-wire or 4-wire sensors. For other colors, contact factory for availability.

Input Response Time

Indicator ON/OFF: 1 ms max.

Connections

onnections
T8L models: 150 mm (6 in) PVC-jacketed cable with a 4-pin M12 male quick-disconnect connector (QP) or 2 m (6.5 ft) unterminated 4-wire integral cable, depending on model
K80L models: Integral 4-pin M12 male quick-disconnect connector (QP), 150 mm (6 in)
PVC-jacketed cable with a 4-pin M12 male quick-disconnect connector (QP), 2 m (6.5 ft) unterminated 4-wire integral cable, or 5 color-coded screw terminal for up to 16
AWG wire, depending on model. Screw terminal max torque: 0.11 N·m (1.0 lbFin).
K80L models: Integral 4-pin M12 male quick-disconnect connector (Q) standard; terminal-wired models available for use with bulk cable; compression fitting optional.
Contact Factory for cable information.
Other models: Integral 4-pin M12 male quick-disconnect connector (Q), 150 mm (6 in)
PVC-jacketed cable with a 4-pin M12 male quick-disconnect connector (QP), or 2 m
(6.5 ft) unterminated 4-wire integral cable, depending on model

Construction

See Models lists

Standard integral 4-pin M12 quick-disconnect connector models are listed. To order the 9 m (30 ft) PVC cable model, replace the suffix "Q" with "W/30" in the model number. For example, T30GRYP W/30. To order the 150 mm (6 in) PUR cable model with a M12 quick disconnect, replace the suffix "Q" with "QPMA" in the model number. For example, T30GRYPQPMA.

Environmental Rating
Rated IP67. T8L not encapsulated; K80L has encapsulated electronics only; other models fully encapsulated.
K30L, K50L, and K50FL QD models meet IP69K per DIN 40050-9.
Cabled models also meet IP69K if the cable and cable entrance are protected from high-pressure spray.

Operating Conditions

Temperature: -40 °C to +50 °C (-40 °F to +122 °F)

Certifications

All models:



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

K50L, K50FL, T18, and T30 models only:



Turck Banner LTD Blenheim House, Blenheim Court, Wickford, Essex SS11 8YT, Great Britain

K30L and K50L models only:



Required Overcurrent Protection



WARNING: Electrical connections must be made by qualified personnel in accordance with local and national electrical codes and regulations.

Overcurrent protection is required to be provided by end product application per the supplied table.

Overcurrent protection may be provided with external fusing or via Current Limiting, Class 2 Power Supply.

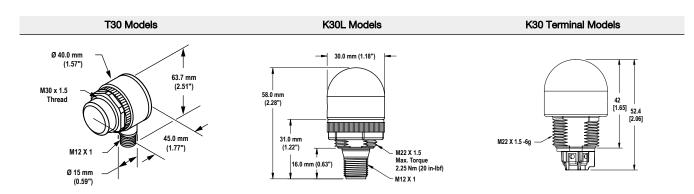
Supply wiring leads < 24 AWG shall not be spliced.

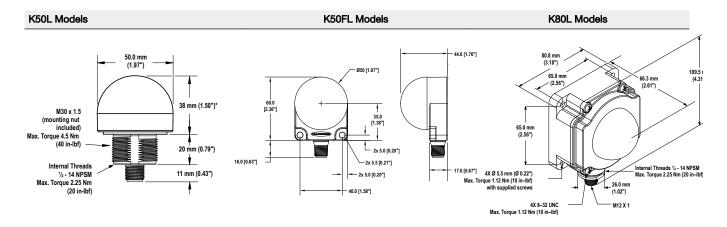
For additional product support, go to www.bannerengineering.com.

Supply Wiring (AWG)	Required Overcurrent Protection (Amps)		
20	5.0		
22	3.0		
24	2.0		
26	1.0		
28	0.8		
30	0.5		

Dimensions

T8L Models T18 Models M18 Models - 15. 8 mm (0.62") 8.8 mm (0.35") ï16.5 mm (0.65") 53 6 mm M18 x 1 (2.11") Thread 19.1 mm (0.75") 61 mm (2.4") 33.0 mm M8 X 1 (1.3") ø16.3 mm (0.64")Ø 15 mm M12 X 1 (0.59") 23 mm (0.9") 150 mm (6") PVC cable with M12 quick-disconnect connector





Accessories

Cordsets

4-Pin Threaded M12 Cordsets—Single Ended							
Model	Length	Style	Dimensions	Pinout (Female)			
MQDC-406	2 m (6.56 ft)						
MQDC-415	5 m (16.4 ft)		M12 x 1	1 2 3 3 5			
MQDC-430	9 m (29.5 ft)	Ctroight			- 1 = Brown 2 = White 3 = Blue 4 = Black 5 = Unused		
MQDC-450	15 m (49.2 ft)	Straight					
MQDC-406RA	2 m (6.56 ft)	Right-Angle	32 Typ. [1.26"] 30 Typ. [1.18"] M12 x 1 ø 14.5 [0.57"]	1 3			
MQDC-415RA	5 m (16.4 ft)						
MQDC-430RA	9 m (29.5 ft)						
MQDC-450RA	15 m (49.2 ft)						

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