



**QM42 series  
dc operation**

**Wave length**

IR (infrared) 880 nm  
Red 660 nm

**Adjustment**

sensitivity

**Supply**

Supply voltage 10...30 V dc  
Ripple  $V_{pp}$   $\leq 10\%$   
No load current  $\leq 30$  mA  
Delay upon power up 100 ms

**Protection**

reverse polarity  
short-circuit (pulsed)

**Output**

Complementary light and dark operate  
Continuous load current  $\leq 100$  mA  
Overload trip point  $\geq 150$  mA typical at 20 °C  
Switching frequency 500 Hz  
2 kHz (fibre versions)

**Material**

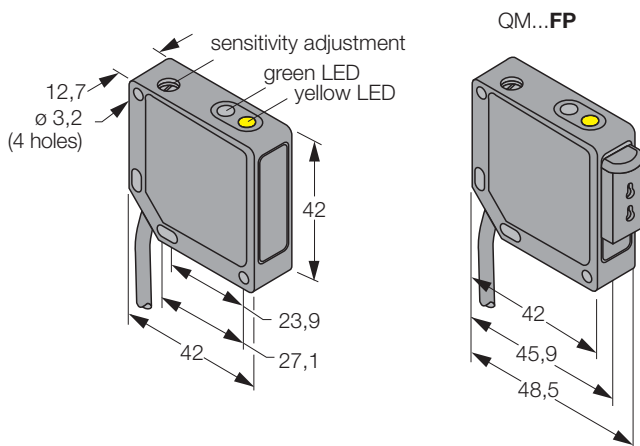
Housing zinc die-cast (black finish)  
Lens acrylic  
Protection class IP67  
(IEC 60529/EN 60529)  
Temperature range -20...+70 °C  
Cable 2 m, PVC, 4 x 0,5 mm<sup>2</sup>  
Connector eurocon (M12 x 1)

**Indicator LED's**

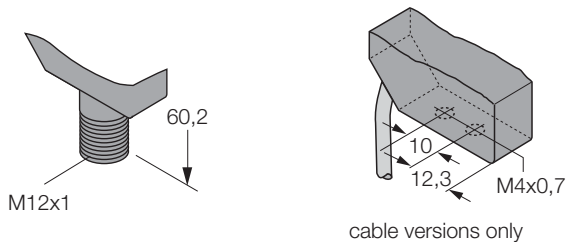
Yellow light sensed  
Green supply voltage  
Yellow flashing low gain  
Green flashing output overload

**Dimensions [mm]**

● Cable



● Connector

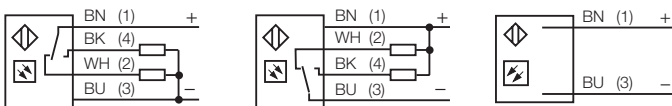


**Wiring**

pnp complementary

nnp complementary

emitter



**Accessories**

**Brackets**

SMB46L 30 487 47 protective bracket  
SMB46S 30 487 48 protective bracket  
SMB46U 30 487 46 protective bracket  
SMB30SK 30 525 23 swivel mount bracket

**Connectors**

WAK4-2/P00 80 070 46 straight type  
WWAK4-2/P00 80 071 48 right-angled type

# QM42 series

## dc operation

Excess gain curve:  
Excess gain in relation to the distance

	Max. range/Fibre type	Light source	Output function	Connection	Type	Ident number
<b>Retro-reflective</b> 	3 m	red	pnp	cable	with polarising filter <b>QM42VP6LP</b>	30 449 01
	3 m	red	pnp	connector	<b>QM42VP6LPQ</b>	30 449 03
	3 m	red	nnp	cable	<b>QM42VN6LP</b>	30 449 02
	3 m	red	nnp	connector	<b>QM42VN6LPQ</b>	30 449 04
<b>Diffuse</b> 	40 cm	IR	pnnp	cable	<b>QM42VP6D</b>	30 443 33
	40 cm	IR	pnnp	connector	<b>QM42VP6DQ</b>	30 443 36
	40 cm	IR	nnp	cable	<b>QM42VN6D</b>	30 443 38
	40 cm	IR	nnp	connector	<b>QM42VN6DQ</b>	30 443 40
<b>Opposed</b> 	10 m	IR	(emitter)	cable	<b>QM426E</b>	30 443 31
		IR	pnnp	cable	<b>QM42VP6R</b>	30 443 32
		IR	nnp	cable	<b>QM42VN6R</b>	30 443 37
	10 m	IR	(emitter)	connector	<b>QM426EQ</b>	30 443 34
		IR	pnnp	connector	<b>QM42VP6RQ</b>	30 443 35
	IR	nnp	connector	<b>QM42VN6RQ</b>	30 443 39	
<b>Fibre-optic</b> 	plastic	red	pnnp	cable	<b>QM42VP6FP</b>	30 457 83
	plastic	red	pnnp	connector	<b>QM42VP6FPQ</b>	30 457 84
	plastic	red	nnp	cable	<b>QM42VN6FP</b>	30 457 85
	plastic	red	nnp	connector	<b>QM42VN6FPQ</b>	30 457 88

Subject to changes without notice • Edition 02.02 • P/N ED029 – excerpt from EC001/0102



These sensors do not include the self-checking redundant circuitry necessary to allow their use in personnel safety applications. A sensor failure or malfunction can result in either an energised or de-energised output condition. These products should not be used as sensing devices for personnel safety.