
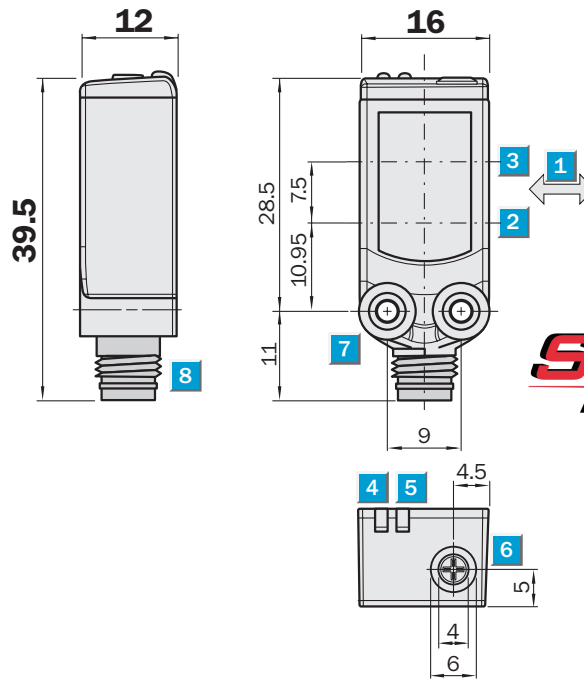


Photoelectric proximity switch, WTB4-3, BGS, red light, line


Scanning distance
 4 ... 150 mm
Photoelectric proximity switch

- Wide-angle light spot with an aperture of 30°
- Reliable detection of objects with slots and holes
- Reliable detection of grid structures

Dimensional drawing



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Adjustments possible

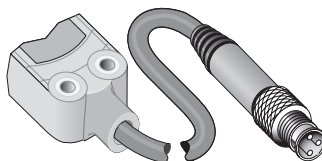


- 1 Direction of the sender light line
- 2 Optical axis, sender
- 3 Optical axis, receiver
- 4 LED indicator yellow, status of received light beam
- 5 LED indicator green, power on
- 6 Potentiometer
- 7 Mounting hole M3
- 8 Connector

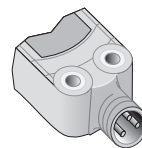
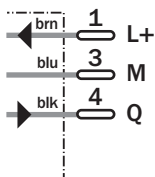


Connection type

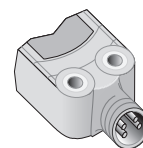
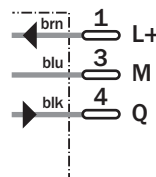
WTB4-3N3171	WTB4-3N2171	WTB4-3P2271	WTB4-3N1371
WTB4-3P3171	WTB4-3P2171		WTB4-3P1371



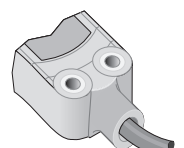
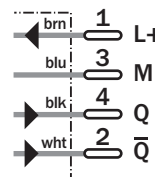
M8, 3-pin



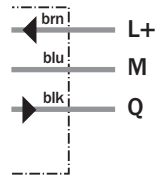
M8, 3-pin



M8, 4-pin



3 x 0.14 mm²



See Accessories chapter

- Connector, M8, 3-pin
- Connector, M8, 4-pin
- Mounting systems

WTB4-3		N1371	N2171	N3171	P1371	P2171	P2271	P3171			
Scanning distance typ. max.	4 ... 150 mm										
Operating distance	15 ... 150 mm										
Adjustment of operating distance	Potentiometer, 5 revolutions										
Light source, light type	Pinpoint LED, red light, 650 nm ¹⁾										
Light spot diameter	5 x 28 mm at 50 mm distance										
Supply voltage V _s	DC 10 ... 30 V ²⁾										
Ripple	< 5 V _{ss} ³⁾										
Power consumption	≤ 30 mA ⁴⁾										
Switching outputs	NPN, Q										
	PNP, Q										
	PNP antivalent										
Switching mode	Light-switching										
	Complementary										
Output current I _a max	≤ 100 mA										
Response time	< 0.5 ms ⁵⁾										
Switching frequency	1,000 Hz ⁶⁾										
Connection type	Cable, PVC, 2 m ⁷⁾										
	Connector, M8, 3-pin										
	Cable with plug, M8, 3-pin, PVC, 100 mm ⁷⁾										
	Connector, M8, 4-pin										
VDE protection class	⊠										
Circuit protection	V _s connections reverse-polarity protected / Output Q and Q not short-circuit protected / Interference suppression										
Enclosure rating	IP 66, IP 67										
Ambient temperature operation	-40 °C ... +60 °C										
Ambient temperature storage	-40 °C ... +75 °C										
Weight	Ca. 20 g										
Housing material	Bayblend, PMMA										

¹⁾ Average service life 100,000 h at Ta = +25 °C

²⁾ Limit values

³⁾ May not exceed or fall short of V_s tolerances

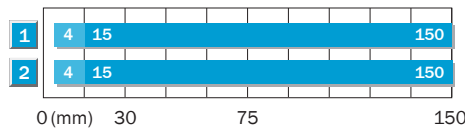
⁴⁾ Without load

⁵⁾ Signal transit time with resistive load

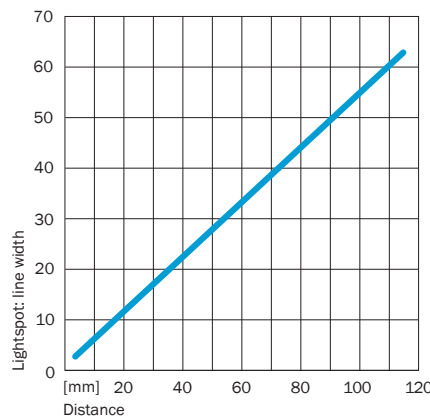
⁶⁾ With light/dark ratio 1:1

⁷⁾ Do not bend below 0 °C

Scanning distance and light spot width



- 1 Scanning range on white, 90 % reflectance
- 2 Scanning range on black, 6 % reflectance



Ordering information

Type	Order no.
WTB4-3N1371	1028125
WTB4-3N2171	1028126
WTB4-3N3171	1041717
WTB4-3P1371	1028121
WTB4-3P2171	1028123
WTB4-3P2271	1042190
WTB4-3P3171	1028122

Minimum detectable object

