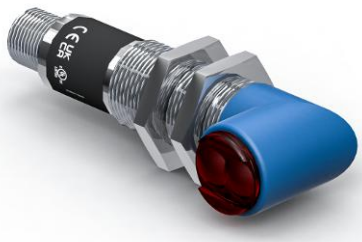
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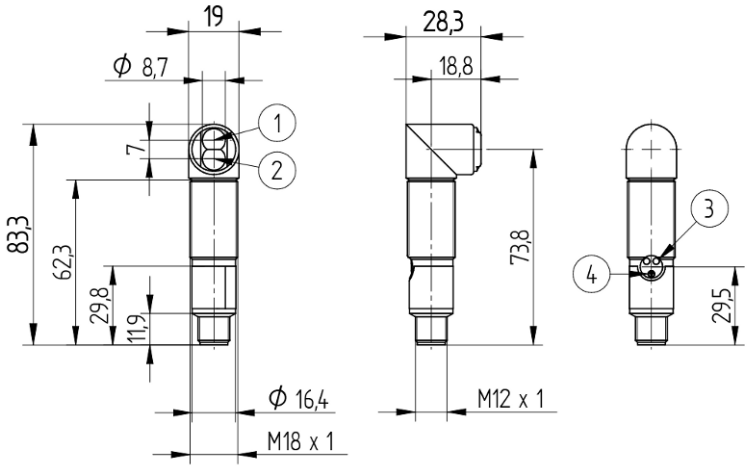
Technical Data

LW86PA3

Retro-Reflex Sensor

Universal





Symbol	Key
1	Emitter diode
2	Receiver diode
3	Switching status indicator/contamination warning
4	Switching distance adjuster

EN

Dimensions in mm
Subject to change without notice
Version 0
www.wenglor.com

Technical data

Optical Data	
Range	6000 mm
Reference Reflector/Reflector Foil	RQ100BA
Switching Hysteresis	< 15 %
Light Source	LED, red
Polarization Filter	yes
Service Life (T = +25 °C)	100000 h
Max. Ambient Light	10000 Lux
Opening Angle	5 °
Optics	Two-Lens Optic

Electrical Data	
Supply Voltage	10...30 V DC
Current Consumption (Ub = 24 V)	< 40 mA
Switching Frequency	1 kHz
Response Time	500 µs
Temperature Drift	< 10 %
Temperature Range	-10...60 °C
Switching Output Voltage Drop	< 2.5 V
PNP Switching Output/Switching Current	200 mA
Residual Current Switching Output	< 50 µA
Short Circuit Protection	yes
Reverse Polarity Protection	yes
Overload Protection	yes
Protection Class	III

Mechanical Data	
Setting Method	Potentiometer
Housing Material	Stainless steel, V2A (1.4305/303) Plastic, PBT
Full Encapsulation	yes
Degree of Protection	IP67
Connection Type	Plug variant
Connection	M12 × 1; 4-pin

Safety-relevant Data	
MTTFd (EN ISO 13849-1)	2987.86 a

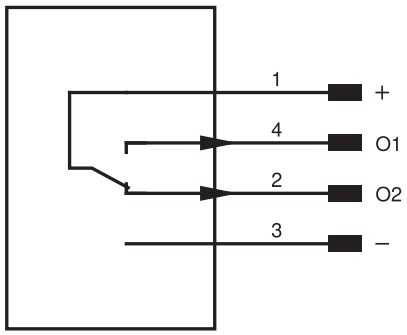
General Data	
Scope of delivery	1 × initial start-up instructions 1 × MUTTER-M18-E003 hex nut 1 × sensor

Adjustable parameters	
Circuit	NC NC+NO NO

All other parameters can be found in the product documentation.

BMECat data	
eCl@ss 5.1.4	27-27-09-02 Reflection light barrier
eCl@ss 6.x	27-27-09-02 Reflection light barrier
eCl@ss 7.0	27-27-09-02 Reflection light barrier
eCl@ss 7.1	27-27-09-02 Reflection light barrier
eCl@ss 8.x	27-27-09-02 Reflection light barrier
eCl@ss 10.0.1	27-27-09-02 Reflection light barrier

Technical illustrations



Pin	Pin function	Polarity	Circuit
1	Supply Voltage +		
2	Switching Output 2	PNP	Antivalent
3	Supply voltage 0 V		
4	Switching Output 1	PNP	NO

Reflector data	
RQ100BA	0.02...6 m
RE18040BA	0.02...3.3 m
RQ84BA	0.01...4.5 m
RR84BA	0.02...4.5 m
RE9538BA	0.02...1.5 m
RE6151BM	0.01...4.5 m
RE6151BA	0.02...4.5 m
RR50_A	0.02...4 m
RE6040BA	0.02...4 m
RE8222BA	0.01...2 m
RR34_M	0.01...2.4 m
RE3220BM	0.01...1.6 m
RE6210BM	0.01...1.6 m
RR25_M	0.02...1.6 m
RR25KP	0.02...1.4 m
RR21_M	0.01...1.6 m
ZRAE02B01	0.02...3 m

Reflector data	
ZRME01B01	0.02...1 m
ZRME03B01	0.02...2.8 m
ZRMR02K01	0.02...1.1 m
ZRMS02_01	0.01...1.5 m
RF505	0.06...1.6 m
RF255	0.06...1.2 m
RF508	0.06...1.6 m
RF258	0.06...1.2 m
ZRDF__K01	0.06...4 m

Reflector type, mounting distance

