



Photoelectric sensors

WL14-2P430



Model Name > [WL14-2P430](#)

Part No. > [1026049](#)



At a glance

- Emitter LED with visible red light
- Polarizing filter
- Insensitivity to ambient light
- Rugged plastic housing

Your benefits

- Universal application possibilities and fast installation due to visible red light
- Reliable object detection with precise background suppression
- Comfortable and fast scanning distance setting due to 4-speed potentiometer
- No interference from ambient light or devices mounted opposite one another
- High availability in the field



Features

Dimensions (W x H x D):	17.6 mm x 75.5 mm x 33.5 mm
Sensing range max.:	0.15 m ... 6 m ¹⁾
Sensing range:	0.15 m ... 4 m ²⁾
Housing desig (light emission):	Slim
Light source:	LED ³⁾
Type of light:	visible red light
Wave length:	645 nm
Adjustment:	no/fix
Sensitivity adjustment:	No/fix
Sensor/detection principle:	Photoelectric retro-reflective sensor, Standard optics
Light spot (distance):	140 mm (4 m)

^{1) 2)} PL80A ³⁾ Average service life 100,000 h at Ta = +25 °C

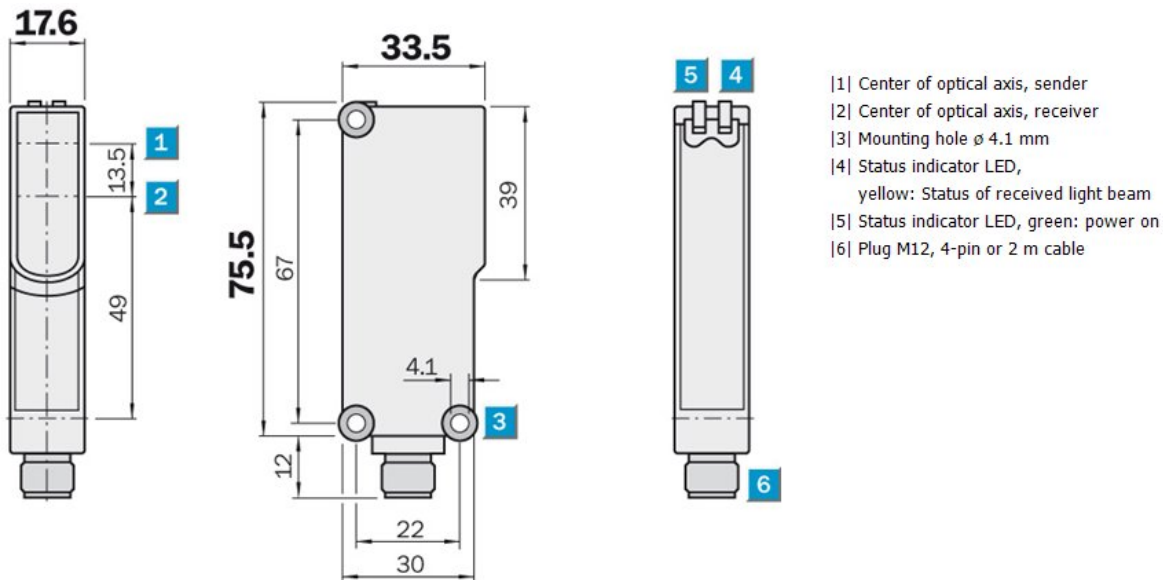
Mechanics/electronics

Enclosure rating:	IP 67
Supply voltage:	10 V DC ... 30 V DC ¹⁾
Residual ripple:	5 Vpp ²⁾
Power consumption:	≤ 35 mA ³⁾
Switching output:	PNP, light/dark-switching, Complementary
Output current I _{max} :	≤ 100 mA
Response time:	≤ 2.5 ms ⁴⁾
Switching frequency:	200 Hz with light/dark ratio 1:1

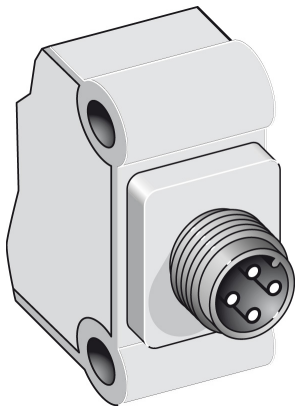
Connection type:	Connector M12, 4-pin
Number of cores:	4
Circuit protection:::	A C 5) 6) 7) D
Weight:	40 g
Housing material:	ABS
Optics material:	PMMA
Ambient temperature, operation:	-25 °C ... 60 °C
Ambient temperature, storage:	-40 °C ... 70 °C
Polarisation filter:	✓
Voltage supply-LED:	✓
Output state-LED:	✓
Angle of dispersion:	2 °

1) Limit values, operation in short-circuit protected network max. 8 A 2) May not exceed or fall short of V_S tolerances 3) Without load 4) Signal transit time with resistive load 5) A = VS connections reverse-polarity protected 6) C = interference suppression 7) D = outputs overcurrent and short-circuit protected

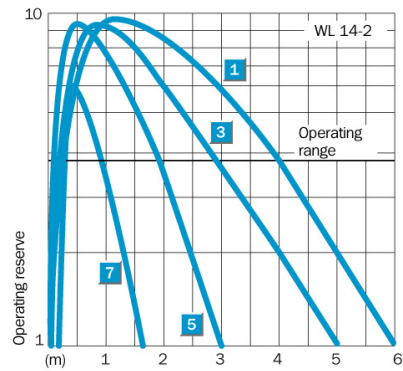
Dimensional drawing



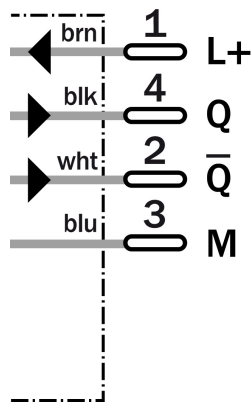
Connection type



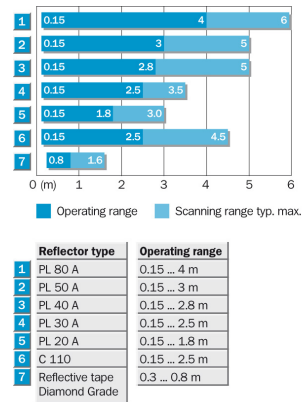
Characteristic curve



Connection diagram



Sensing range diagram



Australia

Phone +61 3 9497 4100
1800 334 802 – tollfree
E-Mail sales@sick.com.au

Belgium/Luxembourg

Phone +32 (0)2 466 55 66
E-Mail info@sick.be

Brasil

Phone +55 11 3215-4900
E-Mail sac@sick.com.br

Canada

Phone +1(952) 941-6780
1 800-325-7425 – tollfree
E-Mail info@sickusa.com

Ceská Republika

Phone +420 2 57 91 18 50
E-Mail sick@sick.cz

China

Phone +852-2763 6966
E-Mail ghk@sick.com.hk

Danmark

Phone +45 45 82 64 00
E-Mail sick@sick.dk

Deutschland

Phone +49 211 5301-301
E-Mail kundenservice@sick.de

España

Phone +34 93 480 31 00
E-Mail info@sick.es

France

Phone +33 1 64 62 35 00
E-Mail info@sick.fr

Great Britain

Phone +44 (0)1727 831121
E-Mail info@sick.co.uk

India

Phone +91-22-4033 8333
E-Mail info@sick-india.com

Israel

Phone +972-4-999-0590
E-Mail info@sick-sensors.com

Italia

Phone +39 02 27 43 41
E-Mail info@sick.it

Japan

Phone +81 (0)3 3358 1341
E-Mail support@sick.jp

Magyarország

Phone +36 1 371 2680
E-Mail office@sick.hu

Nederlands

Phone +31 (0)30 229 25 44
E-Mail info@sick.nl

Norge

Phone +47 67 81 50 00
E-Mail austefjord@sick.no

Österreich

Phone +43 (0)22 36 62 28 8-0
E-Mail office@sick.at

Polska

Phone +48 22 837 40 50
E-Mail info@sick.pl

România

Phone +40 356 171 120
E-Mail office@sick.ro

Russia

Phone +7 495 775 05 30
E-Mail info@sick.ru

Schweiz

Phone +41 41 619 29 39
E-Mail contact@sick.ch

Singapore

Phone +65 6744 3732
E-Mail admin@sicksgp.com.sg

South Africa

Phone +27 11 472 3733
E-Mail info@sickautomation.co.za

South Korea

Phone +82-2 786 6321/4
E-Mail info@sickkorea.net

Slovenija

Phone +386 (0)1-47 69 990
E-Mail office@sick.si

Suomi

Phone +358-9-25 15 800
E-Mail sick@sick.fi

Sverige

Phone +46 10 110 10 00
E-Mail info@sick.se

Taiwan

Phone +886 2 2375-6288
E-Mail sales@sick.com.tw

Türkiye

Phone +90 216 528 50 00
E-Mail info@sick.com.tr

United Arab Emirates

Phone +971 4 8865 878
E-Mail info@sick.ae

USA/México

Phone +1(952) 941-6780
1 800-325-7425 – tollfree
E-Mail info@sickusa.com

More representatives and agencies
at www.sick.com