

PGK0014F

LASER SENSORS • FORK LIGHT BARRIERS

Special design of through-beam sensor. Transmitter and receiver are located in the fork or angular limbs and are perfectly aligned to each other.



MECHANICAL DATA

Ambient temperature	-10 °C 50 °C
Diameter detection	Yes
Fork depth	100 mm
Fork light barrier design	Furcate
Fork width	100 mm
Housing design	Cuboid
Housing material	Aluminium
Material of optical surface	Glass
Reflector included in the scope of delivery	No
Sensor height	150 mm
Sensor length	24 mm
Sensor width	160 mm

ELECTRICAL DATA	
Analogue output 0 mA 20 mA	No
Analogue output 0 V 10 V	No
Analogue output -10 V +10 V	No
Analogue output 4 mA 20 mA	Yes
Max. output current	100 mA
Max. switching distance	100 mm
Measurement of light beam coverage	Yes
No-load current	200 mA
Number of pins	8
Number of pins of the communication interface	4
Operating voltage	21.6 V 26.4 V
Pre-failure message	No
Rated control supply voltage Us at DC	21.6 V 26.4 V
Repeatability +/-	8 μm
Scanning function	Light-/dark-on mode
Short-circuit-proof	Yes
Suitable for safety functions	No



ELECTRICAL DATA

LLLCTRICAL DATA	
Type of communication interface	Connector M5
Type of electrical connection	Plug-in connection
Type of plug-in contact, communication interface	Female (socket)
Type of switching function	Normally closed contact/normally open contact
Type of switching output	PNP/NPN
Type of the forked light barrier	Standard
Voltage type	DC
With communication interface, analog	No
With communication interface, AS-Interface	No
With communication interface, CANOpen	No
With communication interface, DeviceNet	No
With communication interface, Ethernet	No
With communication interface, INTERBUS	No
With communication interface, PROFIBUS	No
With communication interface, RS-232	Yes
With communication interface, RS-422	No
With communication interface, RS-485	No
With communication interface, SSD	No
With communication interface, SSI	No
With monitoring function of downstream devices	No
With other analog output	No
With restart lock	No
With time function	No

OPTICAL DATA

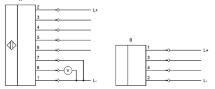
Aperture length	1 mm
Aperture width	16 mm
Laser protection class	Class 1
Light source	Infrared light clocked
Min. object size	0.08 mm
Resolution	8 μm
Wavelength of the sensor	670 nm

OTHER DATA

Edge control	Yes
Feeding technology	Yes



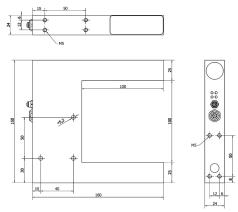
CONNECTION



Colors: A: 1 = WH (white), 2 = BN (brown), 3 = GN (green), 4 = YE (yellow), 5 = GY (gray), 6 = PK (pink), 7 = BU (blue), 8 = RD (red)

Functions: A: 1 = L-, 2 = L+, 3 = in 0 (ext. trigger), 4 = in 1 (teach/reset), 5 = out 0, 6 = out 1, 7 = GND, 8 = 0-10V B: 1 = L+, 2 = L-, 3 = RxD, 4 = TxD

DIMENSIONAL DRAWING



INSTALLATION



Mounting / Installation may only be carried out by a qualified electrician!

DISPOSAL



SAFETY WARNINGS

Before initial operation, please make sure to follow all safety instructions that may be provided in the product information!