

Overview

- Automatic adjustment of exposure time for precise measurements on changing materials
- High immunity to ambient light for reliable measurements regardless of ambient conditions
- Point beam shape for a precise measurement



Picture similar



Technical data

General data

| | |
|--------------------------|-----------------------------|
| Type | Distance measuring |
| Measuring distance Sd | 16 ... 26 mm |
| Measuring range Mr | 10 mm |
| Adjustment | Teach-in: button / external |
| Power on indication | LED green |
| Output indicator | LED red |
| Ethernet link indication | LED blue |
| Repeat accuracy | 4 ... 5 µm |
| Linearity error | ± 0.13 % Mr |
| Beam type | Point |
| Temperature drift | 0,01 % Sde/K |

Light Source

| | |
|---------------------|------------------------|
| Light source | Pulsed red laser diode |
| Wave length | 660 nm |
| Laser class | 2 |
| Maximum pulse power | 1.6 mW |
| Pulse duration | 0.001 ... 1.5 ms |
| Pulse period | 0.2 ... 3.4 ms |

Electrical data

| | |
|------------------------------------|---------------|
| Response delay | 0.4 ms |
| Measuring frequency | 5000 Hz |
| Voltage supply range +Vs | 12 ... 28 VDC |
| Current consumption max. (no load) | 50 mA |

Electrical data

| | |
|-----------------------------|------------------------|
| Output circuit | Analog |
| Output signal | 4 ... 20 mA |
| Load resistance | < (+Vs - 9 V) / 0.02 A |
| Short circuit protection | Yes |
| Reverse polarity protection | Yes, Vs to GND |

Mechanical data

| | |
|------------------|-------------------------|
| Width / diameter | 13 mm |
| Height / length | 37 mm |
| Depth | 34.5 mm |
| Type | Rectangular, front view |
| Housing material | Die-cast zinc |
| Front (optics) | Glass |
| Connection types | Connector M8 4 pin |
| Weight | 41 g |

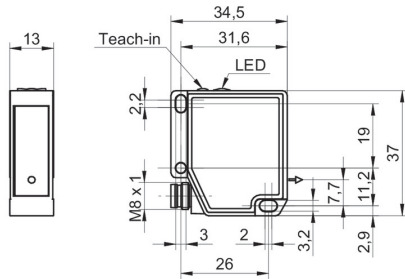
Ambient conditions

| | |
|-------------------------|---|
| Ambient light immunity | < 100 kLux |
| Protection class | IP 67 |
| Operating temperature | -10 ... +50 °C |
| Storage temperature | -20 ... +60 °C |
| Vibration (sinusoidal) | IEC 60068-2-6:2008 1 mm p-p at f = 10 - 55 Hz, duration 5 min per axis 30 min endurance at f = 55 Hz per axis |
| Shock (semi-sinusoidal) | IEC 60068-2-27:2009 30 g / 11 ms, 6 jolts per axis and direction |

Remarks

- Measurement with Baumer standardized measuring equipment and targets (Measurement on 90% remission (white)).

Dimension drawing



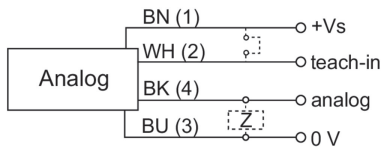
Laser warning



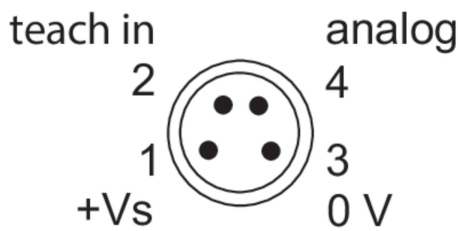
LASER RADIATION
DO NOT STARE INTO BEAM
Wavelength: 640...670nm
IEC 60825-1, Ed. 3, 2014
CLASS 2 LASER PRODUCT

IEC 60825-1/2014 Complies with 21 CFR 1040.10 and 1040.11 except for conformance with IEC 60825-1 Ed. 3., as described in Laser Notice No. 56, dated May 8, 2019

Connection diagram



Pin assignment



Beam characteristic (typically)

