

retro-reflective sensor with polarizing filter

dimensions 31.5 x 12 x 20mm

operating range 0.1 ... 4.5m

- ✓ plastic housing, compact design
- ✓ visible red light
- ✓ switching output no/nc switchable
- ✓ M8-connector 4-pin



low-cost retro-reflective sensor with polarizing filter



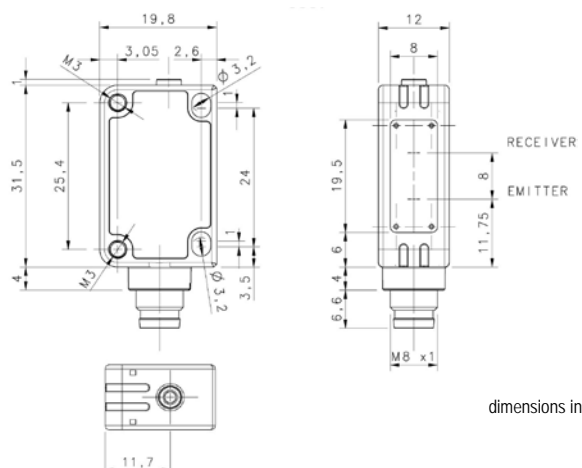
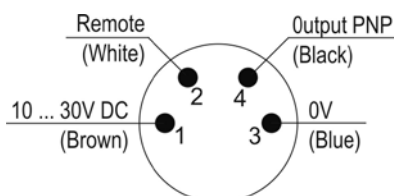
Technical Data

OR310370

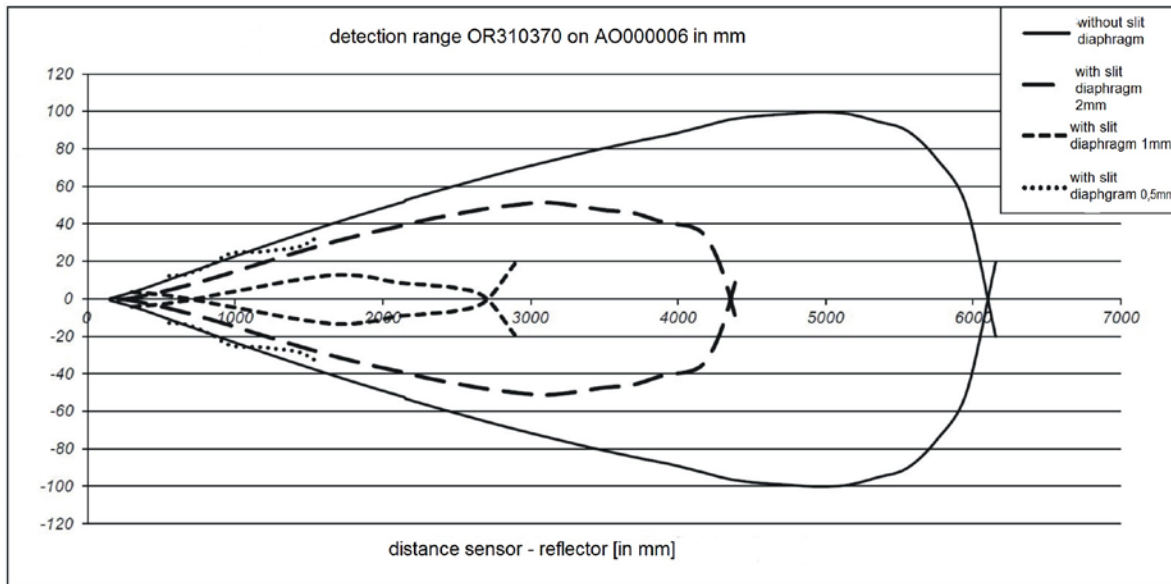
function	retro-reflective sensor with polarizing filter
operating range on reflector AO000006	≤ 0.1 ... 4.5m (range limit 6m)
residual ripple	< 10%
current consumption (w/o load)	≤ 20mA
output current (max. load)	≤ 100mA
output signal	NO / NC programmable
voltage drop	≤ 2V DC
response / decay time	≤ 1 ms
switching frequency	500Hz
transmitting element (pulsed)	LED, red light
wavelength	632nm
short-circuit protection	+
reverse polarity protection	+
display (signal)	LED yellow
material (housing)	plastic (ABS)
material (front screen)	PMMA
system of protection (EN60529)	IP 67
temperature (operating)	-20 ... +55°C
temperature (storage)	-20 ... +70°C
connection	M8-connector 4-pin

connection

dimensional drawing



dimensions in mm



Alignment

Position the transmitter and receiver in a way that they face each other. The light beam of the sensor should fall on the reflector in a right angle.

Move the sensor both in horizontal and vertical way in order to determine the switch-on and switch-off points. Fix the sensor exactly in the middle between these points.

Operating range

The operating range depends on the used reflector. The operating range indicated in the technical data refers to reflector AO000006. When using smaller reflectors not only the operating range, but also the lateral detection range decreases.

Setting of switching output

If you connect the „Remote“-wire (white) with the operating voltage (brown), the switching output operates in a light-on mode (NC).

If you do not connect the „Remote“-wire (white) or connect it with 0V (blue), the switching output operates in a dark-on mode (NO).

Article no: **OR310370**

Connection accessories: e.g. **VK200375**

Accessories

Article no.	Description	Material
AO000006	reflector 82 round internal hole Ø7mm	plastic
AO000473	bracket for lateral mounting	steel chrome-plated
AO000474	bracket L-shaped mounting	steel chrome-plated
AO000475	slit diaphragm 0.5x19mm for design 31	steel chrome-plated
AO000476	slit diaphragm 1x19mm for design 31	steel chrome-plated
AO000477	slit diaphragm 2x19mm for design 31	steel chrome-plated
AY000118	fastening-parts for sensors design 09/16/26/31/33	steel

Warning: Never use these devices in applications where the safety of a person depends on their functionality.