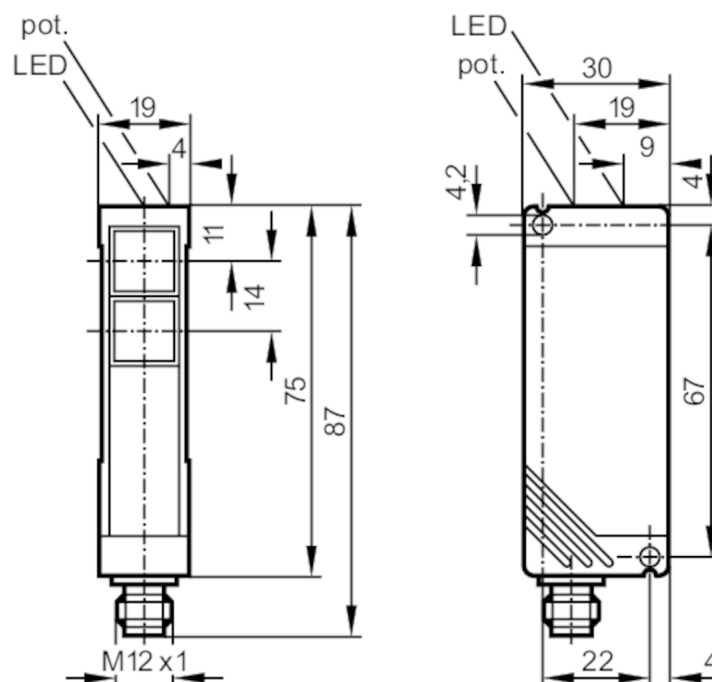


Diffuse reflection sensor

OTT-FPKG/US-100-IPF



receiver in lower lens
transmitter in upper lens



Application

Function principle Diffuse reflection sensor

Electrical data

Operating voltage	[V]	10...50 DC
Current consumption	[mA]	40; ((24 V))
Protection class		II
Reverse polarity protection		yes
Type of light		infrared light
Wave length	[nm]	880

Outputs

Electrical design		PNP
Output function		light-on/dark-on mode; (programmable)
Max. voltage drop switching output DC	[V]	2.5
Permanent current rating of switching output DC	[mA]	250
Switching frequency DC	[Hz]	150
Short-circuit protection		yes
Type of short-circuit protection		pulsed
Overload protection		yes

OT5003



Diffuse reflection sensor

OTT-FPKG/US-100-IPF

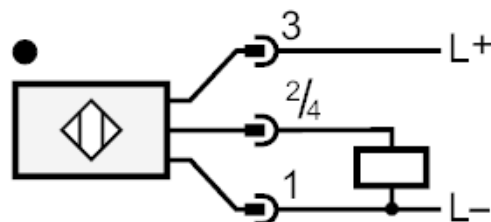
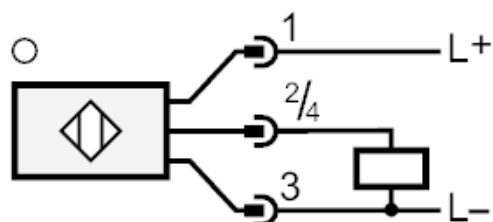
Detection zone		
Range	[mm]	4...200; (white paper 200 x 200 mm)
Range adjustable		yes
Max. light spot diameter	[mm]	187
Light spot dimensions refer to		at maximum range
Operating conditions		
Ambient temperature	[°C]	-25...60
Protection		IP 65
Tests / approvals		
EMC		EN 60947-5-2
MTTF	[years]	583
Mechanical data		
Weight	[g]	161
Housing		rectangular
Dimensions	[mm]	75 x 19 x 30
Materials		PBT
Lens material		PMMA
Lens alignment		side lens
Displays / operating elements		
Display	switching status	1 x LED, yellow
	operation	1 x LED, green
Accessories		
Accessories (supplied)		Angle bracket: 1 x, E20461 screwdrivers
Remarks		
Pack quantity		1 pcs.
Electrical connection		
Connector: 1 x M12		



Diffuse reflection sensor

OTT-FPKG/US-100-IPF

Connection



Diagrams and graphs

excess gain graph

