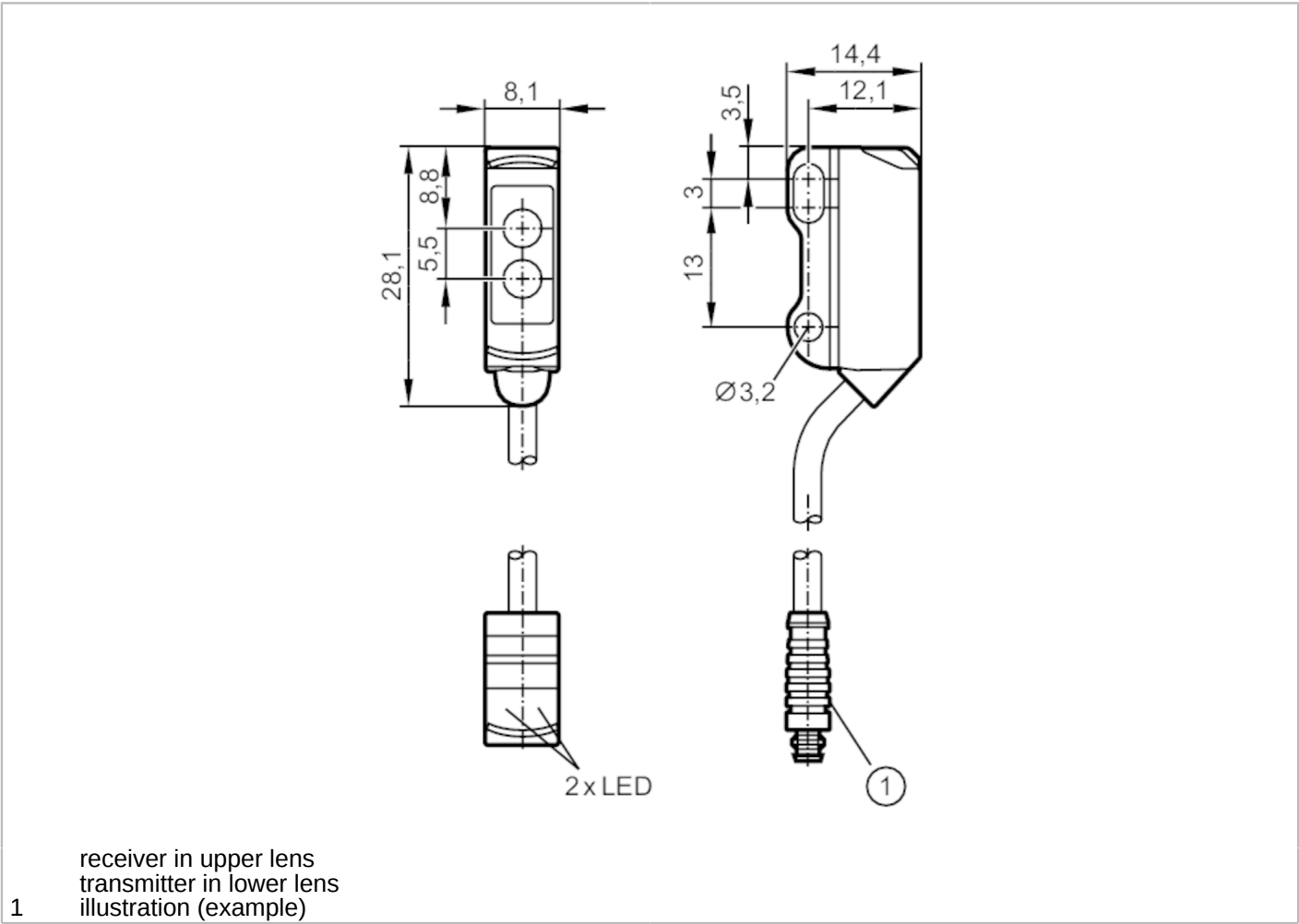


O8H208



Diffuse reflection sensor with background suppression

O8H-HPKG/IO-Link/0,30M/AS/3P



CE ENEC IO-Link

Application

Function principle

Diffuse reflection sensor

Electrical data

Operating voltage [V]

10...30 DC

Current consumption [mA]

20; ((24 V))

Protection class

III

Reverse polarity protection

yes

Type of light

red light

Wave length [nm]

633



Diffuse reflection sensor with background suppression

O8H-HPKG/IO-Link/0,30M/AS/3P

Outputs		
Electrical design		PNP
Output function		light-on mode
Max. voltage drop switching output DC [V]		2.5
Permanent current rating of switching output DC [mA]		100
Switching frequency DC [Hz]		1000
Short-circuit protection		yes
Type of short-circuit protection		pulsed
Detection zone		
Range [mm]		1...30; (white paper 200 x 200 mm)
Range on white object (90 % remission) [mm]		1...30
Range on grey object (18 % remission) [mm]		5...30
Range on black object (6 % remission) [mm]		5...29
Range adjustable		yes
Max. light spot diameter [mm]		4
Light spot dimensions refer to		at maximum range
Monitoring range final value [mm]		10...80
Background suppression available		yes
Interfaces		
Communication interface		IO-Link
Transmission type		COM2 (38.4 kBaud)
IO-Link revision		1.1
SDCI standard		IEC 61131-9
IO-Link device ID		535 d / 00 02 17 h
Profiles		Smart Sensor: Device Identification; Device Diagnosis; Teach Channel; Binary Data Channel
SIO mode		yes
Required master port type		A
Operating conditions		
Ambient temperature [°C]		-25...60
Protection		IP 65; IP 67
Tests / approvals		
EMC	EN 60947-5-2	
MTTF [years]		757

O8H208



Diffuse reflection sensor with background suppression

O8H-HPKG/IO-Link/0,30M/AS/3P

Mechanical data		
Weight	[g]	23
Housing		rectangular
Dimensions	[mm]	28.1 x 8.1 x 14.4
Materials		housing: ABS; stainless steel (1.4404 / 316L)
Lens material		PMMA
Lens alignment		side lens

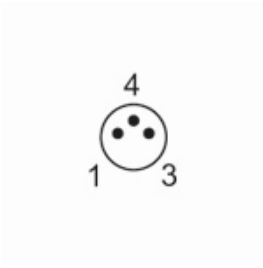
Displays / operating elements		
Display	switching status	1 x LED, yellow
	operation	1 x LED, green

Remarks	
Pack quantity	1 pcs.

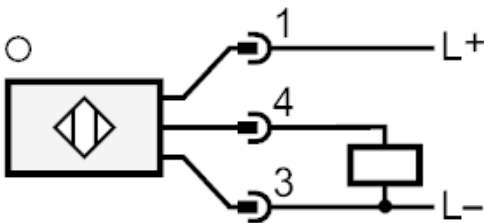
Electrical connection

Cable: 0.3 m, PVC; 3 x 0.08 mm²

Connector: 1 x M8



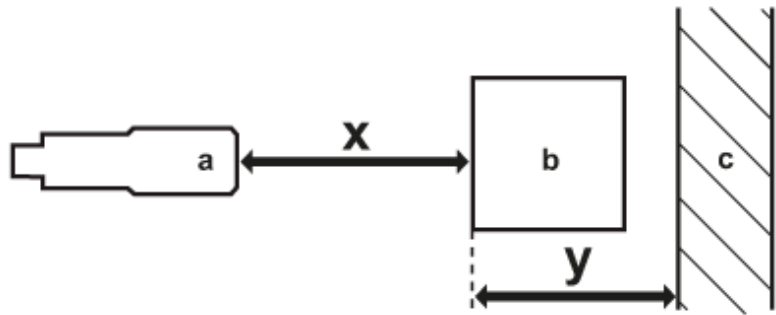
Connection



Diffuse reflection sensor with background suppression

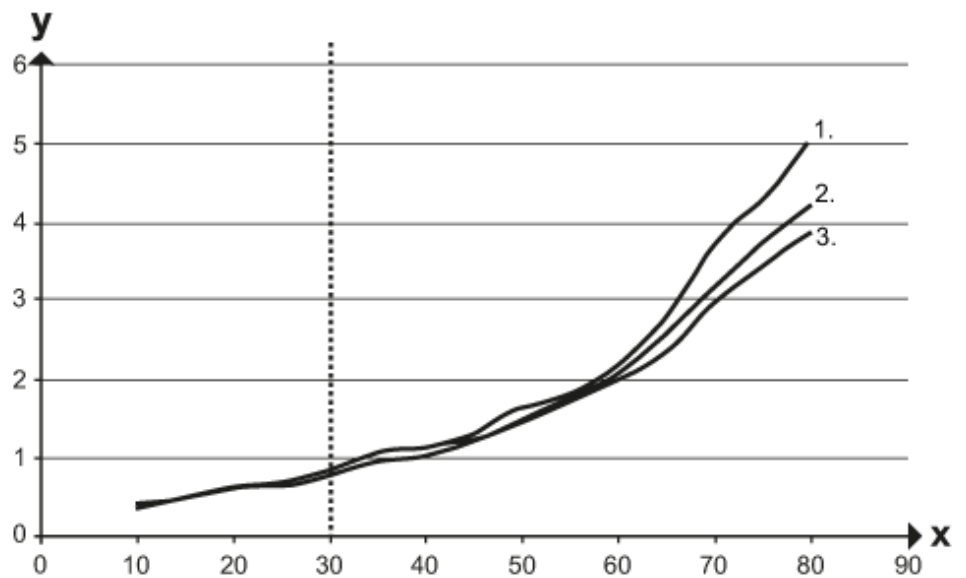
O8H-HPKG/IO-Link/0,30M/AS/3P

Diagrams and graphs



- a: sensor
 b: object
 c: background
 x: distance sensor/object [mm]
 y: min. distance object/background [mm]

accuracy graph



- x: distance sensor/object [mm]
 y: min. distance object/background [mm]
 1 = object black (6 % remission) , background (white 90 % remission)
 2 = object grey (18 % remission) , background (white 90 % remission)
 3 = object white (90 % remission) , background (white 90 % remission)