

Technical data sheet Throughbeam photoelectric sensor receiver

Part no.: 50147922

LE25CI.XR1/2N-M8



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Technical data



Basic data

Series	25C
Operating principle	Throughbeam principle
Device type	Receiver
Application	Detection of products in bag packaging

Electrical data

Protective circuit	Polarity reversal protection
	Short circuit protected

Performance data

Supply voltage U _B	10 30 V, DC, Incl. residual ripple
Residual ripple	0 15 %, From U _B
Open-circuit current	0 20 mA

Outputs

Number of digital switching	outputs	2 Piece(s)
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Switching outputs	
Voltage type	DC
Switching current, max.	100 mA
Switching voltage	high: ≥(U _B -2V)
	low: ≤ 2 V

Switching output 1

Assignment	Connection 1, pin 4
Switching element	Transistor, NPN
Switching principle	Light switching

Switching output 2

Connection 1, pin 2
Transistor, NPN
Dark switching
I

Time behavior

Switching frequency	100 Hz
Response time	5 ms
Readiness delay	300 ms

Connection

Connection 1

Function	Signal OUT
	Voltage supply
Type of connection	Connector
Thread size	M8
Туре	Male
Material	PUR
No. of pins	4 -pin

Mechanical data

Dimension (W x H x L)	15 mm x 42.7 mm x 30 mm
Housing material	Plastic
Plastic housing	ABS
Lens cover material	Plastic
Net weight	22 g
Housing color	Red
Type of fastening	Through-hole mounting with M4 thread
	Via optional mounting device
Compatibility of materials	ECOLAB

Environmental data

Ambient temperature, operation	-40 60 °C	
Ambient temperature, storage	-40 70 °C	

Certifications

Degree of protection	IP 67
	IP 69K
Protection class	III
Approvals	c UL US
Standards applied	IEC 60947-5-2

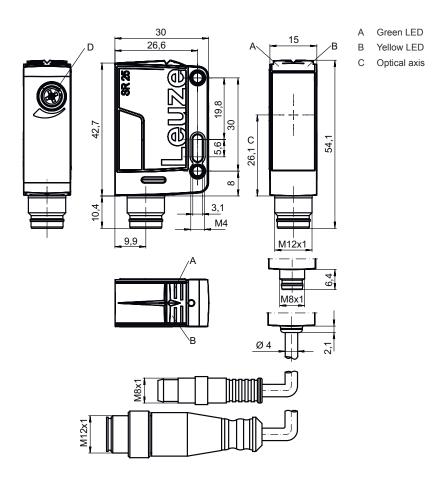
Classification

Customs tariff number 85365019 ECLASS 5.1.4 27270901 ECLASS 8.0 27270901 ECLASS 9.0 27270901 ECLASS 10.0 27270901 ECLASS 11.0 27270901 ECLASS 12.0 27270901 ECLASS 13.0 27270901 ECLASS 14.0 27270901 ECLASS 15.0 27270901 ETIM 5.0 EC002716 ETIM 6.0 EC002716 ETIM 7.0 EC002716 ETIM 8.0 EC002716		
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ETIM 0.0	ETIM 8.0	EC002716
ETIM 3.0 EC002/10	ETIM 9.0	EC002716
ETIM 10.0 EC002716	ETIM 10.0	EC002716

Dimensioned drawings

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All dimensions in millimeters



Electrical connection

Connection 1

Function	Signal OUT
	Voltage supply
Type of connection	Connector
Thread size	M8
Туре	Male
Material	PUR
No. of pins	4 -pin

Pin	Pin assignment
1	V+
2	OUT 2
3	GND
4	OUT 1







Part no.	Designation	Article	Description
50147916	LS25CI.XR1/XX-M8	Throughbeam photoelectric sensor transmitter	Application: Detection of products in bag packaging Operating range limit: 0 220 m Light source: LED, Infrared Supply voltage: DC Connection: Connector, M8, PUR, 4 -pin Operational controls: 270° potentiometer
50147913	LS25CI.XXR/XX-M8	Throughbeam photoelectric sensor transmitter	Application: Detection of products in bag packaging Operating range limit: 0 400 m Light source: LED, Infrared Supply voltage: DC Connection: Connector, M8, PUR, 4 -pin

Part number code

Part designation: AAA25C d EE-f.GGH/iJ-K

AAA25C	Operating principle / construction HT25C: Diffuse reflection sensor with background suppression PRK25C: Retro-reflective photoelectric sensor with polarization filter LS25C: Throughbeam photoelectric sensor transmitter LE25C: Throughbeam photoelectric sensor receiver DRT25C: Dynamic reference diffuse sensor
d	Light type n/a: red light I: infrared light
EE	Light source n/a: LED PP: Power PinPoint LED L1: laser class 1 L2: laser class 2
f	Preset range (optional) n/a: operating range acc. to data sheet xxxF: Preset range [mm]
GG	Equipment A: Autocollimation principle (single lens) S: small light spot D: Detection of stretch-wrapped objects X: extended model HF: Suppression of HF illumination (LED) XL: Extra long light spot T: autocollimation principle (single lens) for highly transparent bottles without tracking TT: autocollimation principle (single lens) for highly transparent bottles with tracking F: Foreground suppression R: greater operating range SL: Slit diaphragm
н	Operating range adjustment 1: 270° potentiometer 2: multiturn potentiometer 3: teach-in via button R: greater operating range
i	Switching output/function OUT 1/IN: Pin 4 or black conductor 2: NPN transistor output, light switching N: NPN transistor output, dark switching 4: PNP transistor output, light switching P: PNP transistor output, dark switching X: pin not used 8: activation input (activation with high signal) L: IO-Link interface (SIO mode: PNP light switching, NPN dark switching) 6: push-pull switching output, PNP light switching, NPN light switching G: Push-pull switching output, PNP dark switching, NPN light switching

Part number code



Switching output / function OUT 2/IN: pin 2 or white conductor 2: NPN transistor output, light switching N: NPN transistor output, dark switching 4: PNP transistor output, light switching P: PNP transistor output, dark switching W: warning output X: pin not used 6: push-pull switching output, PNP light switching, NPN dark switching T: teach-in via cable G: Push-pull switching output, PNP dark switching, NPN light switching 8: activation input (activation with high signal) **Electrical connection** n/a: cable, standard length 2000 mm, 4-wire 200-M12: cable, length 200 mm with M12 connector, 4-pin, axial (plug) M8: M8 connector, 4-pin (plug) M12: M12 connector, 4-pin (plug) 200-M8: cable, length 200 mm with M8 connector, 4-pin, axial (plug)

Note



 $\$ A list with all available device types can be found on the Leuze website at www.leuze.com.

Notes



Observe intended use!



- \$ This product is not a safety sensor and is not intended as personnel protection.
- The product may only be put into operation by competent persons.

M8.1: Snap-in, M8 connector, 4-pin (plug)

Only use the product in accordance with its intended use.

For UL applications:

♦ Only for use in "class 2" circuits

Further information

· Sum of the output currents for both outputs 100 mA

Accessories

Connection technology - Connection cables

Part no.	Designation	Article	Description
50130850	KD U-M8-4A-V1-050	Connection cable	Connection 1: Connector, M8, Axial, Female, 4 -pin Connector, LED: No Connection 2: Open end Shielded: No Cable length: 5.000 mm Sheathing material: PVC

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Accessories



Part no.	Designation	Article	Description
50130871	KD U-M8-4W-V1-050	Connection cable	Connection 1: Connector, M8, Angled, Female, 4 -pin Connector, LED: No Connection 2: Open end Shielded: No Cable length: 5.000 mm Sheathing material: PVC

Mounting technology - Mounting brackets

Part no.	Designation	Article	Description
50118543	BT 300M.5	Mounting bracket	Design of mounting device: Angle, L-shape Fastening, at system: Through-hole mounting Mounting bracket, at device: Screw type, Suited for M4 screws Type of mounting device: Adjustable Material: Stainless steel

Mounting technology - Rod mounts

	Part no.	Designation	Article	Description
To be	50117829	BTP 200M-D12	Mounting system	Design of mounting device: Protection hood Fastening, at system: For 12 mm rod Mounting bracket, at device: Screw type Type of mounting device: Clampable, Adjustable, Turning, 360° Material: Metal
	50117252	BTU 300M-D12	Mounting system	Design of mounting device: Mounting system Fastening, at system: For 12 mm rod, Sheet-metal mounting Mounting bracket, at device: Screw type, Suited for M4 screws Type of mounting device: Clampable, Adjustable, Turning, 360° Material: Metal

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A list with all available accessories can be found on the Leuze website in the Download tab of the article detailed page.