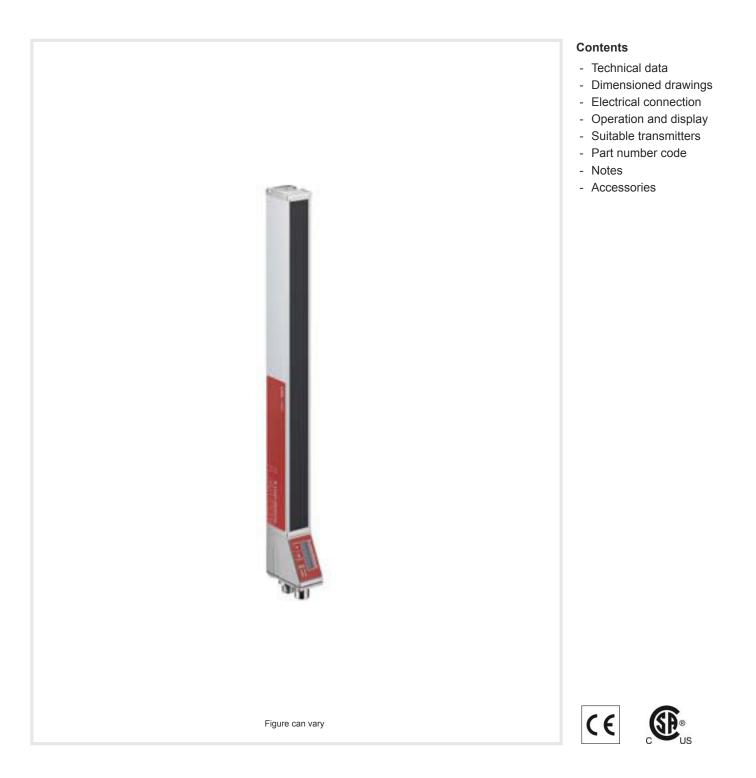


Technical data sheet Light curtain receiver Part no.: 50123294 CML730i-R05-2000.A/D3-M12



The Sensor People In der Braike 1, 73277 Owen

Leuze electronic GmbH + Co. KG info@leuze.com • www.leuze.com In der Braike 1, 73277 Owen Phone: +49 7021 573-0 • Fax: +49 7021 573-199

We reserve the right to make technical changes eng • 2020-12-20

Technical data

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Rasic data

Operating principle Throughbeam principle Device type Receiver Contains 2x BT-NC sliding block Application Detection of transparent objects Object measurement Object measurement Special version Crossed-beam scanning Diagonal-beam scanning Diagonal-beam scanning Operating range Cuaranteed operating range Operating range (transparent media 1 4.5 m Operating range limit 0.1 4.5 m Measurement field length 2,000 mm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data Short circuit protection Short circuit protected Transient protection Short circuit protected Transient protection Short circuit protected Transient protection Number of inputs/outputs selectable <th>Basic data</th> <th></th>	Basic data	
Device type Receiver Contains 2x BT-KC silding block Application Detection of transparent objects Object measurement Special version Crossed-beam scanning Diagonal-beam scanning Parallel-beam scanning Parallel-beam scanning Operating range Guaranteed operating range Operating range imit 0.1 4.5 m Operating range limit 0.1 4.5 m Operating range limit 0.1 4.5 m Operating range limit 0.1 6 m Measurement field length 2,000 mm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data Minimum object diameter 10 mm Electrical data Protective circuit Polarity reversal protection Short circuit protected Transient protection Short circuit current 0 45 m, Tran Specified values refer to the entire package consisting of trans- miter and receiver. Number of inputs/outputs selectable Voltage type, outputs Switching voltage, inputs Number of inputs/output Short Short Switching voltage, inputs Number of inputs/output Short Short cinputs/output Short Short Short Circuit Circuit Circuit C	Series	730
Contains 2x BT-NC silding block Application Detection of transparent objects Object measurement Object measurement Special version Crossed-beam scanning Special version Crossed-beam scanning Operating range Guaranteed operating range Operating range 0.1 4.5 m Operating range 0.1 4.5 m Operating range limit 0.1 6 m Measurement field length 0.000 nm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data Short circuit protected Minimum object diameter 10 mm Electrical data Performance data Suppl voltage Ug 18 30 V, DC Residual ripple 0 15 %, From Ug Open-circuit current 0 45 m Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/output selectable Voltage type, outputs DC Switching	Operating principle	Throughbeam principle
Application Detection of transparent objects Object measurement Special version Special version Crossed-beam scanning Diagonal-beam scanning Operating range Guaranteed operating range Operating range imit 0.1 4.5 m Operating range imit 0.1 4.5 m Operating range imit 0.1 6 m Measurement field length 2.000 mm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data Minimum object diameter Minimum object diameter 10 mm Electrical data Polarity reversal protection Short circuit protected Transient protection Short circuit protected Transient protection Qpen-circuit current 0 15 %, From U _g Open-circuit current 0 435 mA, The specified values refer Number of inputs/outputs selectable 2 Piece(s) Type Inputs/output selectable Number of inputs/output selectable 2 Piece(s) Type Inputs/output 1 Timing	Device type	Receiver
Object measurement Special version Crossed-beam scanning Diagonal-beam scanning Special version Crossed-beam scanning Operating range Guaranteed operating range Operating range 0.14.5 m Operating range 0.14.5 m Operating range limit 0.16.7 m Operating range limit 0.16.7 m Operating range limit 0.16 m Measurement field length 2.000 mm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data Minimum object diameter Number of beams 10 mm Electrical data Polarity reversal protection Short circuit protected Transient protection Short circuit protection Short circuit protected Residual ripple 0435 mA. The specified values refere to the entire package consisting of transmitter and receiver. Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/output selectable	Contains	2x BT-NC sliding block
Special version Crossed-beam scanning Diagonal-beam scanning Parallel-beam scanning Operating range Guaranteed operating range Operating range 0.1 4.5 m Operating range 0.1 4.5 m Operating range limit 0.1 6 m Operating range limit 0.1 6 m Measurement field length 2,000 mm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data Short circuit protection Minimum object diameter 10 mm Electrical data Polarity reversal protection Short circuit protected Transient protection Supply voltage Ug 18 30 V, DC Residual ripple 0 435 mA, The specified values refer to the entire package consisting of transimiter and receiver. Inputs/outputs selectable 2 Piece(s) Type Inputs/outputs Voltage type, outputs DC Switching voltage, inputs DC Switching voltage, inputs Typ. Ug / 0 V Switching voltage, inputs DC Switching voltage, inputs DC Switching voltage, inputs <th>Application</th> <th>Detection of transparent objects</th>	Application	Detection of transparent objects
Special version Crossed-beam scanning Diagonal-beam scanning Special version Crossed-beam scanning Operating range Guaranteed operating range Operating range 0.14.5 m Operating range limit Typical operating range Operating range limit 0.14.5 m Operating range limit 0.1		Object measurement
Diagonal-beam scanning Parallel-beam scanning Operating range Guaranteed operating range Operating range, transparent media 0.1 4.5 m Operating range limit 0.1 1.75 m Operating range limit 0.1 1.75 m Operating range limit 0.1 1.75 m Operating range limit 0.1 0.75 m Measurement field length 2,000 mm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data Polarity reversal protection Minimum object diameter 10 mm Electrical data Polarity reversal protection Short circuit protected Transient protection Residual ripple 0 15 %, From U _B Open-circuit current 0 15 %, From U _B Number of inputs/outputs selectable 2 Piece(s)	Special version	
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Parallel-beam scanning Optical data Operating range Guaranteed operating range Operating range, transparent media 0.1 0.5 m Operating range limit 0.1 0.75 m Mumber of beams 400 Piece(s) Beam spacing 5 mm Measurement data 10 mm Electrical data Polarity reversal protection Short circuit protected Transient protection Short circuit protected Transient protection Supply voltage UB 18 30 V, DC Residual ripple 0 15 %, From UB Open-circuit current 0		
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Operating range Guaranteed operating range Operating range, transparent media 0.1 4.5 m Operating range, transparent media 0.1 1.75 m Operating range limit 0.1 6 m Measurement field length 2,000 mm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data 10 mm Electrical data Polarity reversal protection Short circuit protected Transient protection Protective circuit Polarity reversal protection Short circuit protected Transient protection Supply voltage U _B 18 30 V, DC Residual ripple 0 15 %, From U _B Open-circuit current 0 435 mA, The specified values refer to the entire package consisting of transmitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable Number of inputs, outputs DC Switching voltage, unputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V Input/output 1 Imming Cycle time 4.15 ms Response time per beam 10 µs Interface 10 µs Type RS 485 Modbus Function Process		-
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Operating range limit Typical operating range Operating range limit 0.1 6 m Measurement field length 2,000 mm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data Minimum object diameter Minimum object diameter 10 mm Electrical data Polarity reversal protection Short circuit protected Transient protection Supply voltage U _B 18 30 V, DC Residual ripple 0 435 mA, The specified values refer to the entire package consisting of transmitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, unputs Typ. U _B / 0 V Switching voltage, inputs Inputs/output 1 Timing Input/output 1 Cycle time 4.15 ms Response time per beam 10 µs Interface Type Type RS 485 Modbus Function Process	Operating range	
Operating range limit 0.16 m Measurement field length 2,000 mm Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data Minimum object diameter 10 mm Electrical data Polarity reversal protection Short circuit protected Transient protection Supply voltage U _B 18 30 V, DC Residual ripple 0 15 %, From U _B Open-circuit current 0 435 mA, The specified values refer to the entire package consisting of transmitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable Voltage type, outputs DC Switching voltage, inputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V low: ≤4V Input/output 1 Timing Cycle time Cycle time per beam 10 µs Interface Type Type RS 485 Modbus Function Process	Operating range, transparent media	0.1 1.75 m
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Number of beams 400 Piece(s) Beam spacing 5 mm Measurement data 5 mm Minimum object diameter 10 mm Electrical data Polarity reversal protection Short circuit protected Transient protection Performance data Supply voltage U _B Supply voltage U _B 18 30 V, DC Residual ripple 0 15 %, From U _B Open-circuit current 0 435 mA, The specified values refer Inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Vottage type, outputs DC Switching voltage, inputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: 26V Iow: <4V Input/output 1 Timing U/V Cycle time 4.15 ms Response time per beam 10 µs Interface Type Type RS 485 Modbus Function Process	Operating range limit	
Beam spacing 5 mm Measurement data Minimum object diameter 10 mm Electrical data Protective circuit Polarity reversal protection Short circuit protected Transient protection Performance data Supply voltage U _B 18 30 V, DC Residual ripple 0 15 %, From U _B Open-circuit current 0 435 mA, The specified values refer to the entire package consisting of trans- mitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, inputs DC Switching voltage, inputs type. U _B / 0 V high: ≥6V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 µs Interface Type RS 485 Modbus RS 485 Modbus RS 485 Modbus	Measurement field length	,
Measurement data Minimum object diameter 10 mm Electrical data Protective circuit Polarity reversal protection Short circuit protected Transient protection Supply voltage U _B 18 30 V, DC Residual ripple 0 15 %, From U _B Open-circuit current 0 435 mA, The specified values refer to the entire package consisting of trans- mitter and receiver. Inputs/outputs selectable Plece(s) Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, inputs DC Switching voltage, inputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V low: ≤4V low: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 µs Interface Type Type RS 485 Modbus Function Process		()
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Electrical data Protective circuit Potective circuit Potective circuit Performance data Supply voltage U _B 1830 V, DC Residual ripple 015 %, From U _B Open-circuit current 0435 mA, The specified values refer to the entire package consisting of trans- mitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs DC Switching voltage, outputs DC Switching voltage, inputs high: ≥6V Iow: ≤4V Input/output 1 Timing Cycle time Rs 485 Function Rs 485 Function Process Service interface	Measurement data	
Protective circuit Polarity reversal protection Short circuit protected Transient protection Performance data Framework Supply voltage UB 18 30 V, DC Residual ripple 0 15 %, From UB Open-circuit current 0 435 mA, The specified values refer to the entire package consisting of transmitter and receiver. Inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs DC Switching voltage, outputs DC Switching voltage, inputs high: 26V low: ≤4V Input/output 1 Timing Input/output 1 Cycle time 4.15 ms Response time per beam 10 µs Interface Type Type RS 485 Modbus Function Process Service interface Service interface	Minimum object diameter	10 mm
Short circuit protected Transient protection Performance data Supply voltage U _B 18 30 V, DC Residual ripple 0 15 %, From U _B Open-circuit current 0 435 mA, The specified values refer to the entire package consisting of transmitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V Iow: ≤4V Iow: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 µs Interface Type Type RS 485 Modbus RS 485 Function Function Process	Electrical data	
Short circuit protected Transient protection Performance data Supply voltage U _B 18 30 V, DC Residual ripple 0 15 %, From U _B Open-circuit current 0 435 mA, The specified values refer to the entire package consisting of transmitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V Iow: ≤4V Iow: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 µs Interface Type Type RS 485 Modbus RS 485 Function Function Process	Protective circuit	Polarity reversal protection
Transient protection Performance data Supply voltage U _B 18 30 V, DC Residual ripple 0 15 %, From U _B Open-circuit current 0 435 mA, The specified values refer to the entire package consisting of transmitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V low: ≤4V low: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 µs Interface Type Type RS 485 Modbus Function Process		
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Supply voltage UB Residual ripple18 30 V, DC Residual rippleOpen-circuit current0 15 %, From UB 0 435 mA, The specified values refer to the entire package consisting of trans- mitter and receiver.Inputs/outputs selectable0 435 mA, The specified values refer to the entire package consisting of trans- mitter and receiver.Inputs/outputs selectable2 Piece(s)TypeInputs/outputs selectableVoltage type, outputsDCSwitching voltage, outputsTyp. UB / 0 VSwitching voltage, inputshigh: ≥6V low: ≤4VInput/output 1Input/output 1Timing10 μsInterface10 μsResponse time per beam10 μsResponse time per beamProcessService interfaceProcessService interfaceProcessService interfaceProcess		
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Open-circuit current 0435 mA, The specified values refer to the entire package consisting of transmitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V Input/output 1 Input/output 1 Timing Cycle time Response time per beam 10 µs Interface RS 485 Modbus Function Process Service interface Voltage Service interface	Supply voltage U _B	18 30 V, DC
to the entire package consisting of trans- mitter and receiver. Inputs/outputs selectable Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V Iow: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 μs Interface Type RS 485 Modbus RS 485 Function Process Service interface	Residual ripple	0 15 %, From U _B
Inputs/outputs selectable > Piece(s) Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V low: ≤4V low: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 μs Interface RS 485 Modbus Function Process Service interface Process	Open-circuit current	
Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V low: ≤4V low: ≤4V Input/output 1 Timing 4.15 ms Response time per beam 10 µs Interface RS 485 Modbus Function Process Service interface Process		
Number of inputs/outputs selectable 2 Piece(s) Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V low: ≤4V low: ≤4V Input/output 1 Timing 4.15 ms Response time per beam 10 µs Interface RS 485 Modbus Function Process Service interface Process		
Type Inputs/outputs selectable Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V low: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 µs Interface Type RS 485 Modbus Function Process Service interface		
Voltage type, outputs DC Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V low: ≤4V low: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 µs Interface RS 485 Modbus Function Process Service interface Process		
Switching voltage, outputs Typ. U _B / 0 V Switching voltage, inputs high: ≥6V low: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 µs Interface Type RS 485 Modbus Function Process Service interface		
Switching voltage, inputs high: ≥6∨ Input/output 1 low: ≤4∨ Timing Cycle time Cycle time per beam 4.15 ms Response time per beam 10 µs Interface RS 485 Modbus Rs 485 Function Process Service interface		
Iow: ≤4V Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 μs Interface 10 μs Type RS 485 Modbus RS 485 Function Function Process Service interface 10 μs		D
Input/output 1 Timing Cycle time 4.15 ms Response time per beam 10 μs Interface Type RS 485 Modbus RS 485 Function Process Service interface	Switching voltage, inputs	°
Timing Cycle time 4.15 ms Response time per beam 10 μs Interface Interface Type RS 485 Modbus RS 485 Function Service interface Process		10W: 54V
Cycle time 4.15 ms Response time per beam 10 μs Interface Type RS 485 Modbus RS 485 Function Process Service interface	Input/output 1	
Response time per beam 10 μs Interface Interface Type RS 485 Modbus RS 485 Function Process Service interface	Timing	
Response time per beam 10 μs Interface Interface Type RS 485 Modbus RS 485 Function Process Service interface	Cycle time	4.15 ms
Type RS 485 Modbus RS 485 Function Process Service interface	Response time per beam	
RS 485 Function Process Service interface	Interface	
Function Process Service interface Image: Comparison of the service of	Туре	RS 485 Modbus
Function Process Service interface Image: Comparison of the service of	RS 485	
Service interface		Process
Type IO-Link	Service interface	
	Туре	IO-Link

Function	Configuration via software Service
Connection	
lumber of connections	2 Piece(s)
Plug outlet	Axial
Connection 1	Configuration interface
runcuon	Connection to transmitter
	Signal IN
	Signal OUT
	Voltage supply
Type of connection	Connector
Thread size	M12
Туре	Male
Material	Metal
No. of pins	8 -pin
Encoding	A-coded
Connection 2	
Function	BUS IN
	BUS OUT
Type of connection	Connector
Thread size	M12
Туре	Female
Material	Metal
No. of pins	5 -pin
No. of pins Encoding	5 -pin B-coded
Encoding Mechanical data	B-coded
Encoding Mechanical data Design	B-coded Cubic
Encoding Mechanical data Design Dimension (W x H x L)	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm
Encoding Mechanical data Design Dimension (W x H x L) Housing material	B-coded Cubic
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deration and display	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Depration and display	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deration and display Type of display	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deration and display Type of display Number of LEDs	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s)
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deration and display Type of display Number of LEDs Type of configuration	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software Teach-in
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deration and display Type of display Number of LEDs Type of configuration	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deration and display Type of display Number of LEDs Type of configuration Derational controls	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software Teach-in
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deration and display Type of display Number of LEDs Type of configuration Derational controls Environmental data	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software Teach-in
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deration and display Type of display Number of LEDs Type of configuration Derational controls Environmental data Ambient temperature, operation	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software Teach-in Membrane keyboard
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deperation and display Type of display Number of LEDs Type of configuration Deperational controls Environmental data Ambient temperature, operation Ambient temperature, storage	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software Teach-in Membrane keyboard -30 60 °C
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deperation and display Type of display Number of LEDs Type of configuration Deperational controls Environmental data Ambient temperature, operation Ambient temperature, storage Certifications	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software Teach-in Membrane keyboard -30 60 °C
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deperation and display Type of display Number of LEDs	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software Teach-in Membrane keyboard -30 60 °C -40 70 °C
Encoding Mechanical data Design Dimension (W x H x L) Housing material Metal housing Lens cover material Net weight Housing color Type of fastening Deperation and display Type of display Number of LEDs Type of configuration Deprational controls Environmental data Ambient temperature, operation Ambient temperature, storage Degree of protection	B-coded Cubic 29 mm x 35.4 mm x 2,075 mm Metal Aluminum Plastic 2,100 g Silver Groove mounting Via optional mounting device LED OLED display 2 Piece(s) Software Teach-in Membrane keyboard -30 60 °C -40 70 °C

 The Sensor People
 In der Braike 1, 73277 Owen
 Phone: +49 7021 573-0 • Fax: +49 7021 573-199
 eng • 2020-12-20

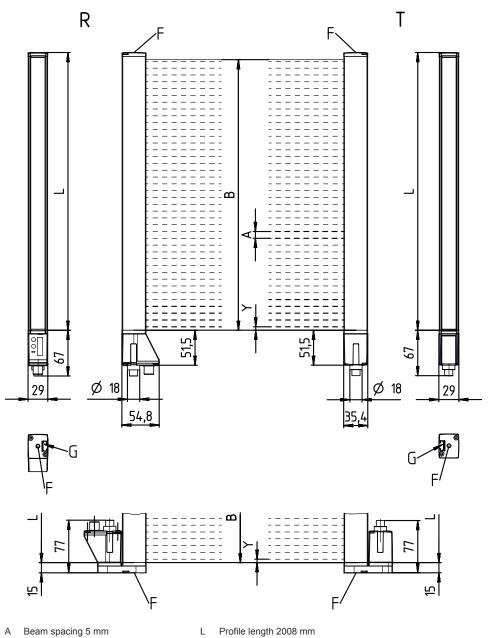
Technical data

Customs tariff number	90314990
eCl@ss 5.1.4	27270910
eCl@ss 8.0	27270910
eCl@ss 9.0	27270910
eCl@ss 10.0	27270910
eCl@ss 11.0	27270910
ETIM 5.0	EC002549
ETIM 6.0	EC002549
ETIM 7.0	EC002549

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Dimensioned drawings

All dimensions in millimeters



- Beam spacing 5 mm А
- В Measurement field length 2000 mm
- F M6 thread G
 - Fastening groove
- Transmitter R Receiver

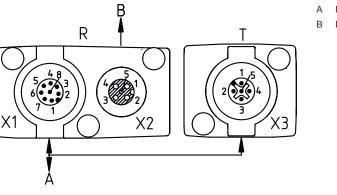


Т



Dimensioned drawings





A PWR / SW IN / OUTB BUS IN / OUT

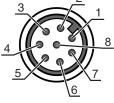
Electrical connection

Connection 1

Function	Configuration interface
	Connection to transmitter
	Signal IN
	Signal OUT
	Voltage supply
Type of connection	Connector
Thread size	M12
Туре	Male
Material	Metal
No. of pins	8 -pin
Encoding	A-coded

Pin Pin assignment

1	V+		
2	I/O 1		
3	GND		
4	IO-Link		
5	I/O 2		
6	RS 485 Tx+		
7	RS 485 Tx+		
8	FE/SHIELD		



Connection 2

Function	BUS IN
	BUS OUT
Type of connection	Connector
Thread size	M12
Туре	Female
Material	Metal
No. of pins	5 -pin
Encoding	B-coded

Electrical connection

Pin Pin assignment 1 V+ 2 Tx 3 PB GND 4 Tx+ 5 FE/SHIELD

Operation and display

LED	Display	Meaning
1	Green, continuous light	Operational readiness
	Green, flashing	Teach / error
2	Yellow, continuous light	Light path free, with function reserve
	Yellow, flashing	No function reserve
	Off	Object detected

Suitable transmitters

 Part no.	Designation	Article	Description
50118600	CML730i-T05- 2000.A-M12	Light curtain transmitter	Operating range: 0.1 4 m Connection: Connector, M12, Axial, 5 -pin

Part number code

Part designation: CML7XXi-YZZ-AAAA.BCCCDDD-EEEFFF

CML	Operating principle Measuring light curtain
7XXi	Series 720i: 720i series 730i: 730i series
Y	Device type T: transmitter R: receiver
22	Beam spacing 05: 5 mm 10: 10 mm 20: 20 mm 40: 40 mm
AAAA	Measurement field length [mm], dependent on beam spacing
В	Equipment A: connector outlet, axial R: rear connector outlet
ccc	Interface L: IO-Link /CN: CANopen /PB: PROFIBUS /PN: PROFINET /CV: Analog current and voltage output /D3: RS 485 Modbus



Part number code



DDD	Special equipment -PS: Power Setting			
EEE	Electrical connection M12: M12 connector			
FFF	-EX: Explosion protection			
	Note			
A	∜ 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. Only use the product in accordance with its intended use.



For UL applications:

 For UL applications, use is only permitted in Class 2 circuits in accordance with the NEC (National Electric Code).
 These proximity switches shall be used with UL Listed Cable assemblies rated 30V, 0.5A min, in the field installation, or equivalent (categories: CYJV/ CYJV7 or PVVA/PVVA7)

Accessories

Connection technology - Connection cables

 Part no.	Designation	Article	Description
50132079	KD U-M12-5A-V1- 050	Connection cable	Connection 1: Connector, M12, Axial, Female, A-coded, 5 -pin Connection 2: Open end Shielded: No Cable length: 5,000 mm Sheathing material: PVC

Connection technology - Y distribution cables

	Part no.	Designation	Article	Description
	50118183	K-Y1 M12A-5m- M12A-S-PUR	Interconnection cable	Connection 1: Connector, M12, Axial, Female, A-coded, 5 -pin Connection 2: Connector, M12, Axial, Male, A-coded, 5 -pin Connection 3: Connector, M12, Axial, Female, A-coded, 8 -pin Shielded: Yes Cable length fork 1: 5,000 mm Cable length fork 2: 150 mm Sheathing material: PUR

Accessories

Leuze

	Part no.	Designation	Article	Description
	50123265	K-YPB M12A-5m- M12A-S-PUR	Interconnection cable	Suitable for interface: PROFIBUS DP Connection 1: Connector, M12, Axial, Male, B-coded, 5 -pin Connection 2: Cable with connector, M12, Axial, Female, B-coded, 5 -pin Connection 3: Cable with connector, M12, Axial, Male, B-coded, 5 -pin Shielded: Yes Sheathing material: PUR

Mounting technology - Mounting brackets

	Part no.	Designation	Article	Description
1 + 1 + 1 + 1 + 1	50142900	BT 700M.5-2SET	Mounting device set	Design of mounting device: Bracket mounting Fastening, at system: Through-hole mounting, T slotted hole Mounting bracket, at device: Screw type, Sliding block Type of mounting device: Rigid Material: Steel

Mounting technology - Swivel mounts

	Part no.	Designation	Article	Description
ęę.	429046	BT-2R1	Mounting bracket set	Fastening, at system: Through-hole mounting Mounting bracket, at device: Clampable Type of mounting device: Turning, 360° Material: Metal, Plastic

Services

	Part no.	Designation	Article	Description
y;	S981001	CS10-S-110	Start-up support	Details: Performed at location of customer's choosing, duration: max. 10 hours. Conditions: Devices and connection cables are already mounted, price not including travel costs and, if applicable, accommodation expenses. Restrictions: No mechanical (mounting) and electrical (wiring) work performed, no changes (attachments, wiring, programming) to third-party components in the nearby environment.
	S981005	CS10-T-110	Product training	Details: Location and content to be agreed upon, duration: max. 10 hours. Conditions: Price not including travel costs and, if applicable, accommodation expenses. Restrictions: Travel costs and accommodation expenses charged separately and according to expenditure.

Note

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