

1) LED function indicator, 2) LED function indicator, 3) Encoder



Basic features

Application	Positioning
Approval/Conformity	CE UKCA cURus EAC WEEE
Basic standard	IEC 60947-5-2 IEC 60947-5-7

Display/Operation

Function indicator	Adjustment indicator
Power indicator	no

Electrical connection

Connection	M12x1-Male, 3-pin, A-coded
Polarity reversal protected	yes
Protection against device mix-ups	yes
Short-circuit protection	yes

Electrical data

No-load current I_0 max. at U_e	20 mA
Operating voltage U_b	18...30 VDC
Rated insulation voltage U_i	75 V DC
Rated operating voltage U_e DC	24 V
Ripple max. (% of U_e)	10 %

Environmental conditions

Ambient temperature	-25...85 °C
Contamination scale	3
EN 60068-2-27, Shock	Half-sinus, 30 g _n , 11 ms
EN 60068-2-6, Vibration	55 Hz, amplitude 1 mm, 3x30 min
IP rating	IP67

Functional safety

MTTF (40 °C)	200 a
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Interface

Interface	IO-Link 1.0
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Inductive Sensors
BIP LD2-T040-02-S4
Order Code: BIP0004

BALLUFF

Material

Housing material	PA
Material sensing surface	PA

Mechanical data

Dimension	70 x 30 x 16 mm
Tightening torque max.	2.5 Nm

Range/Distance

Linearity range SI	0...40 mm
Measuring range	0...40 mm
Non-linearity max.	±500 µm
Repeat accuracy per BWN	±100 µm
Temperature drift max. from end value	±3.0 %

Remarks

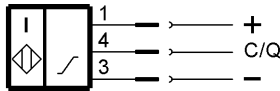
Please refer to manual.
Specification applies to recommended target BAM TG-XE-010. D = 2 mm
For more information about MTTF and B10d see MTTF / B10d Certificate

Indication of the MTTF- / B10d value does not represent a binding composition and/or life expectancy assurance; these are simply experiential values with no warranty implications. These declared values also do not extend the expiration period for defect claims or affect it in any way.

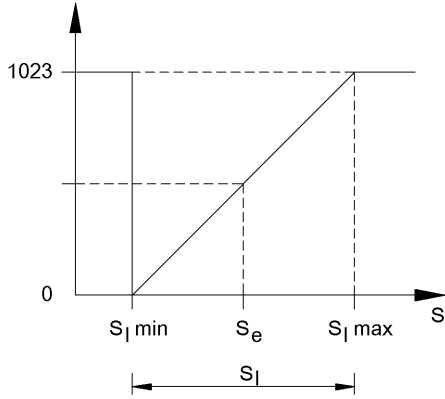
Connector Drawings



Wiring Diagrams



Technical Drawings



Help Views

Process Data

Byte 0								Byte 1							
7	6	5	4	3	2	1	0	7	6	5	4	3	2	1	0
MSB								LSB							
Analog value								0	0	0	0	0	0	0	Out of Range

Identification Data

DPP Index	SPDU Index / Sub Index		Object name	Length	Range	Default value
0x07			Vendor ID	2 Byte	read only	0x0378
0x08						
0x09			Device ID	3 Byte		0x020301
0x0A						
0x0B						
	0x10	0	Vendor name	7 Byte		BALLUFF
	0x11	0	Vendor text	15 Byte		www.balluff.com
	0x12	0	Product name	19 Byte		BIP LD2-T040-02-S4
	0x13	0	Product ID	7 Byte		BIP 0004
	0x14	0	Product text	37 Byte		Inductive Positioning Sensor 0...40mm
	0x16	0	Hardware Revision	3 Byte	1.0	
	0x17	0	Firmware Revision	3 Byte	1.0	