



1) not included in scope of delivery, 2) Non-usable area, 3) Nominal length = Measuring length, 11) Installation length



Basic features

Approval/Conformity	CE 3-A conformal according standard 74- Ecolab EAC WEEE
Magnets, number (factory setting)	1
Magnets, number max.	1

Electrical connection

Bending radius min., fixed cable	5 x D
Cable diameter D	6...6.7 mm
Cable length L	5 m
Connection	Cable, 5.00 m, PTFE
Connection version	radial
Polarity reversal protected	Ub up to 28 V

Electrical data

Current consumption max. at 24 V DC	150 mA
Galvanic isolation	no
Inrush current	≤ 3 A/0.5 ms
Operating voltage Ub	20...28 VDC
Output current max.	5 mA
Output signal adjustable	no
Overvoltage protection	Ub up to 36 V
Voltage-proof up to (GND to housing)	500 V DC

Environmental conditions

Ambient temperature	-40...85 °C
Cable temperature, fixed routing	-40...200 °C
EN 55016-2-3, Radiation	For industrial and residential use
EN 60068-2-27, Continuous shock	100 g, 2 ms
EN 60068-2-27, Shock	100 g, 6 ms
EN 60068-2-6, Vibration	12 g, 10...2000 Hz
EN 61000-4-2, ESD	Severity Level 3
EN 61000-4-3, RFI	Severity Level 3
EN 61000-4-4, Burst	Severity Level 3
EN 61000-4-5, Surge	Severity Level 2
EN 61000-4-6, High-frequency fields	Severity Level 3
EN 61000-4-8 Magnetic fields	Severity Level 4
Process temperature max. (1 hr.)	130 °C
Process temperature min.	-20 °C
Protection degree	IP67
Relative humidity	≤ 90 %, non-condensing
Storage temperature	-40...100 °C
Temperature coefficient typ.	≤ 40 ppm/K at 50% of nominal stroke 500mm

Functional safety

MTTF (40 °C)	58 a
---------------------	------

Magnetostrictive Sensors
BTL5-A11-M0660-SF-F05
Order Code: BTL14KT

BALLUFF

Material

Cable flame-resistant	IEC 60332-1
Cable jacket, material	PTFE
Housing material	Stainless steel (1.4404)
Material flange	Stainless steel (1.4404)
Protection tube material	Stainless steel (1.4404)

Mechanical data

Housing diameter	55.00 mm
Installation length from contact surface	742 mm
Mounting	1 1/2" Tri Clamp
Pressure rating max.	300 bar
Protection tube diameter	10.2 mm

Output/Interface

Analog output	Analog, voltage 0...10 V Analog, voltage 10...0 V
---------------	---

Range/Distance

Measuring length	660 mm
Non-linearity max.	±0.02 %FS
Reproducibility	≤4 µm
Sampling rate, length-dependent	500 Hz, standard

Wiring Diagrams

colour	
YE	NC
GY	GND output
PK	10...0 V
GN	0...10 V
BU	GND
BN	+24 V DC
WH	NC