

Inductive Sensor with Standard Switching Distances

I30N006

Part Number



- Innovative ASIC circuit technology
- Integrated error display
- Minimal mounting clearance thanks to wenglor weproTec

weproTec

Technical Data

Inductive Data

Switching Distance	10 mm
Correction Factors Stainless Steel V2A/CuZn/Al	1,18/0,5/0,46
Mounting	flush
Mounting A/B/C/D in mm	0/20/30/0
Mounting B1 in mm	0...10
Switching Hysteresis	< 10 %

Electrical Data

Supply Voltage	10...30 V DC
Current Consumption (Ub = 24 V)	< 10 mA
Switching Frequency	580 Hz
Temperature Drift	< 10 %
Temperature Range	-40...80 °C
Switching Output Voltage Drop	< 1 V
Switching Output/Switching Current	150 mA
Residual Current Switching Output	< 100 µA
Short Circuit Protection	yes
Reverse Polarity and Overload Protection	yes
Protection Class	III

Mechanical Data

Housing Material	CuZn, nickel-plated
Degree of Protection	IP67
Connection	M12 x 1; 3-pin

Safety-relevant Data

MTTFd (EN ISO 13849-1)	3706,54 a
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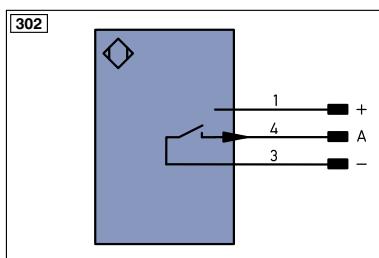
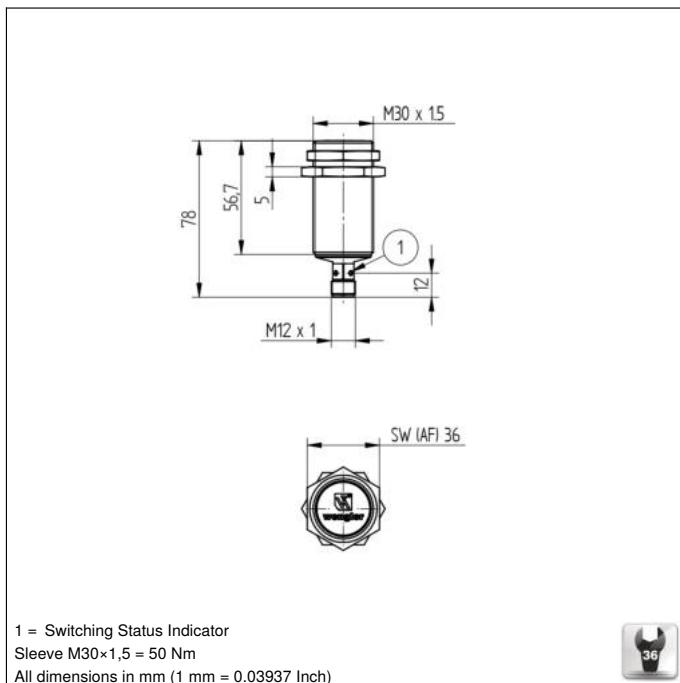
Function

Error Indicator	yes
NPN NO	●
Connection Diagram No.	302
Suitable Connection Equipment No.	2

Suitable Mounting Technology No.

130 | 131

Inductive Sensors with standard switching distances are distinguished by rugged design, easy installation and reliable measured values. In addition to error-free operation of several sensors in a very small space, the new generation also provides the possibility of detecting system errors before it's too late thanks to ASIC und wenglor weproTec.


Legend

+	Supply Voltage +	PT	Platinum measuring resistor
-	Supply Voltage 0 V	nc	not connected
~	Supply Voltage (AC Voltage)	U	Test Input
A	Switching Output (NO)	Ü	Test Input inverted
~A	Switching Output (NC)	W	Trigger Input
V	Contamination/Error Output (NO)	W-	Ground for the Trigger Input
~V	Contamination/Error Output (NC)	O	Analog Output
E	Input (analog or digital)	O-	Ground for the Analog Output
T	Teach Input	BZ	Block Discharge
Z	Time Delay (activation)	Awv	Valve Output
S	Shielding	a	Valve Control Output +
RxD	Interface Receive Path	b	Valve Control Output 0 V
TxD	Interface Send Path	SY	Synchronization
RDY	Ready	SY-	Ground for the Synchronization
GND	Ground	E+	Receiver-Line
CL	Clock	E-	Emitter-Line
E/A	Output/Input programmable	±	Grounding
IO-Link	IO-Link	SnR	Switching Distance Reduction
PoE	Power over Ethernet	Rx+/-	Ethernet Receive Path
IN	Safety Input	Tx+/-	Ethernet Send Path
SSD	Safety Output	Bus	Interfaces-Bus A(+)/B(-)
Signal	Signal Output	La	Emitted Light disengageable
BLD	Ethernet Gigabit bidirect. data line (A-D)	Mag	Magnet activation
EN0RS422	Encoder 0-pulse 0-0 (TTL)	RES	Input confirmation
		EDM	Contactor Monitoring

EN0RS422 Encoder A/A (TTL)
EN0RS422 Encoder B/B (TTL)
ENa Encoder A
ENb Encoder B
AMIN Digital output MIN
AMAX Digital output MAX
AOK Digital output OK
SY IN Synchronization IN
SY OUT Synchronization OUT
OLT Brightness output
M Maintenance
rsv reserved

Wire Colors according to DIN IEC 757

BK	Black
BN	Brown
RD	Red
OG	Orange
YE	Yellow
GN	Green
BU	Blue
VT	Violet
GY	Grey
WH	White
PK	Pink
GNYE	Green/Yellow

Mounting
