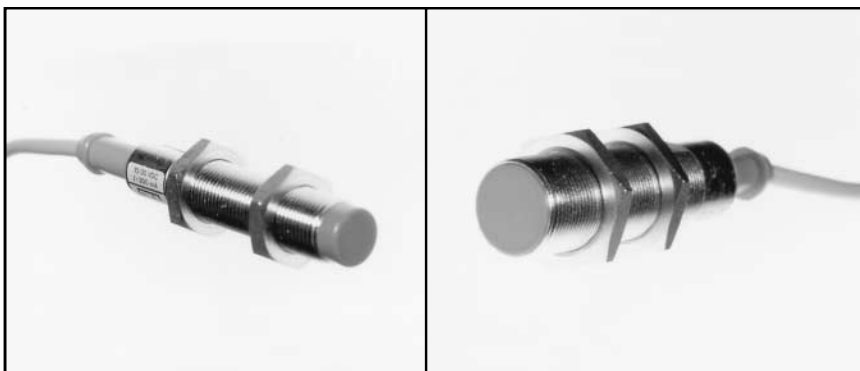




Series 300/301

Tubular Inductive Proximity Sensors
12mm, 18mm



SIZE	12mm						18mm					
TYPE	2 Wire DC		3/4 Wire DC		2 Wire AC		2 Wire DC		3/4 Wire DC		2 Wire AC	
Shielding S - Shielded N - Non-Shielded	S	N	S	N	S	N	S	N	S	N	S	N
Maximum Sensing Distance (Sn)mm	2	4	2	4	2	4	5	8	5	8	5	8
Supply Voltage (Residual Ripple <10%,DC Models)	10-30VDC				20-250VAC		10-30VDC		10-30VDC		20-250VAC	
Maximum Output Current mA	100		200		300		100		200		300	
No Load Current at 24VDC mA	—		<18		—		—		<18		—	
Voltage Drop (ON State)	<7VDC		<1.8VDC		<6VAC		<7VDC		<1.8VDC		<6VAC	
Outputs	N.O. or N.C.		NPN-N.O.-N.C. PNP-N.O.-N.C. NPN-N.O.&N.C. PNP-N.O.&N.C.		N.O. N.C.		N.O. or N.C.		NPN-N.O. or N.C. PNP-N.O. or N.C. NPN-N.O. & N.C. PNP-N.O. & N.C.		N.O. N.C.	
Switching Frequency Hz	1000		1000		12		600		600		12	
Repeatability mm	<0.01		<0.01		<0.2		<0.02		<0.02		<0.2	
Minimum Output Current mA	5		—		5		5		—		5	
Max. Peak Current For 20ms A	—		—		1.5		—		—		1.5	
Leakage Current mA	<3		—		<2.5		<3		—		<2.5	

SPECIFICATIONS

SWITCHING POINT HYSTERESIS

<10% of Max Sensing Distance

SHORT CIRCUIT PROTECTION

Yes All DC Models

REVERSE POLARITY PROTECTION

Yes All DC Models

LED INDICATOR

Yes

OPERATING TEMPERATURE

-25% TO +70°C

STANDARD TERMINATION

2 Meter Cable, Connectors

HOUSING MATERIAL

Nickel Brass, Stainless Steel, Plastic

DEGREE OF PROTECTION

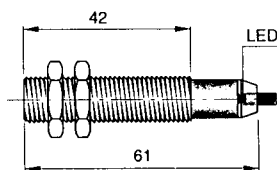
NEMA 1, 4, 6, 12, 13, IP67

APPROVALS

CE

DIMENSIONS:

(Note: Dimensions for 18mm sensors are on page 129).



(12mm, 2 Wire DC) 300-3-1210-XX,

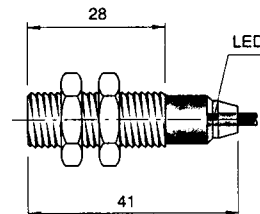
300-3-1410-XX, 300-3-1510-XX

(12mm, 3 & 4 Wire) 300-3-1210-XX,

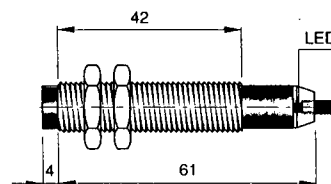
300-3-1410-XX, 300-3-1510-XX

(12mm, 2 Wire AC) 300-3-1210-XX,

300-3-1510-XX



(12mm, 3 & 4 Wire) 300-3-1310-XX



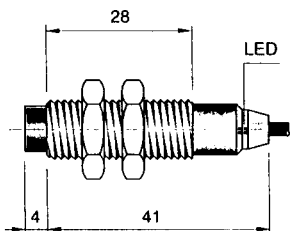
(12mm, 3 & 4 Wire) 301-3-1210-XX,

301-3-1410-XX, 300-3-1510-XX

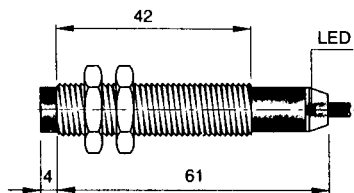
ORDERING INFORMATION

	— 3 —		—		—		
TYPE						EXTENDED SENSING RANGE [*]1	
Shielded300 Non-Shielded301						EXTENDED RANGES 4mm for 12mm 8mm for 18mm	
HOUSING						OUTPUT	
12mm Nickel Brass12 12mm Nickel Brass, Short Barrel.....13 12mm Plastic14 12mm Stainless Steel15 18mm Nickel Brass18 18mm Plastic19 18mm Nickel Brass, Short Barrel.....20 18mm Stainless Steel21						AC, 2 Wire, N.O.11 AC, 2 Wire, N.C.12 DC, 3 Wire, NPN, NO21 DC, 3 Wire, NPN, NC22 DC, 4 Wire, NPN, NO & NC23 DC, 3 Wire, PNP, NO24 DC, 3 Wire, PNP, NC25 DC, 4 Wire, PNP, NO & NC26 DC, 2 Wire, NO27 DC, 2 Wire, NC28	
						TERMINATION	
						2 Meter Cable10 K Connector30 H (Micro) Connector40 ^{*1} H1 Connector50	

^{*1} For information regarding connector cord sets that are compatible with H (Micro) connector sensors, refer to Page XX of this catalog.



(12mm, 3 & 4 Wire) 301-3-1310-XX



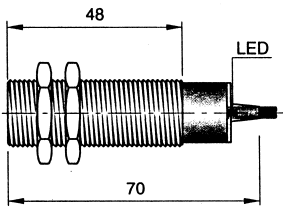
(12mm, 2 Wire AC) 301-3-1210-XX, 301-3-1510-XX
 (12mm, 2 Wire DC) 301-3-1210-XX, 301-3-1410-XX,
 301-3-1510-XX

Availability Guide For Short Barrel Housings, Extended Sensing Ranges and Connectors

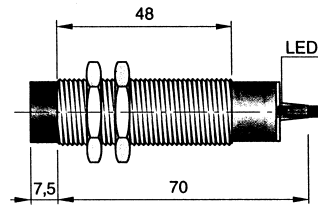
	Shielded	Non-Shielded
Standard Length Sensor With H (Micro) Connector	All 12mm & 18mm	All 12mm & 18mm
Short Barrel Housing With H (Micro) Connector	12 & 18mm 3 or 4 Wire	12 & 18mm 3 & 4 Wire
Short Barrel Housing With H (Micro) Connector & Extended Sensing Range	12mm, 3 Wire 18mm 3 Wire	
Short Barrel Housing With 2 Meter Cable & Extended Sensing Range	12mm, 3 Wire 18mm 3 Wire	
Short Barrel Housing With H1 Connector	12mm 3 Wire	12mm 3 Wire
Short Barrel Housing With H1 Connector & Extended (4mm) Sensing Range	12mm 3 Wire	
Short Barrel Housing With 2 Meter Cable	12mm 3 & 4 Wire 18mm 3 & 4 Wire	12mm 3 & 4 wire 18mm 3 & 4 Wire
Standard Length Housing With K Connector	All 12mm & 18mm	All 12mm & 18mm

NOTE: Extended Sensing Range Is Not Available In Standard Length Housing Sensors.

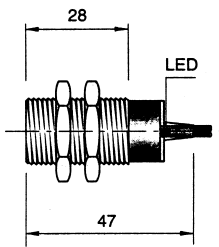
DIMENSIONS — 18mm SENSORS



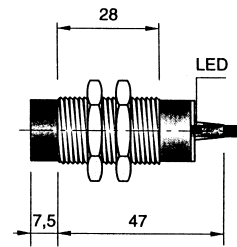
**(18mm, 3 & 4 Wire DC) 300-3-1810-XX,
300-3-1910-XX, 300-3-2110-XX**



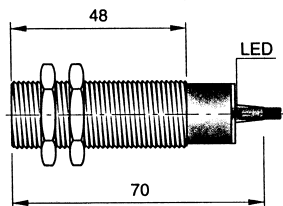
**(18mm, 3 & 4 Wire DC) 301-3-1810-XX,
301-3-1910-XX, 301-3-2110-XX**



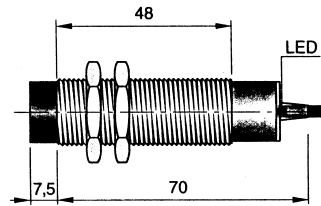
(18mm, 3 & 4 Wire DC) 300-3-2010-XX



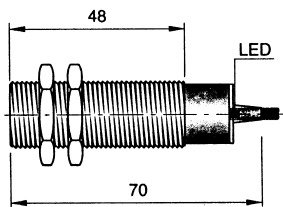
(18mm, 3 & 4 Wire DC) 301-3-2010-XX



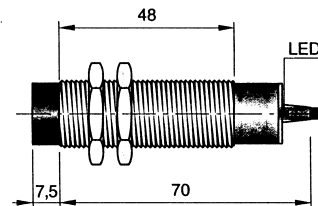
**(18mm, 2 Wire DC) 300-3-1810-XX, 300-3-1910-XX,
300-3-2110-XX**



**(18mm, 2 Wire DC) 301-3-1810-XX, 301-3-1910-XX,
301-3-2110-XX**



(18mm, 2 Wire AC) 300-3-1810-XX, 300-3-2110-XX



(18mm, 2 Wire AC) 301-3-1810-XX, 301-3-2110-XX