

Non-Contact Magnetostrictive Position Sensor In Cylinder Applications

ANALOG mA

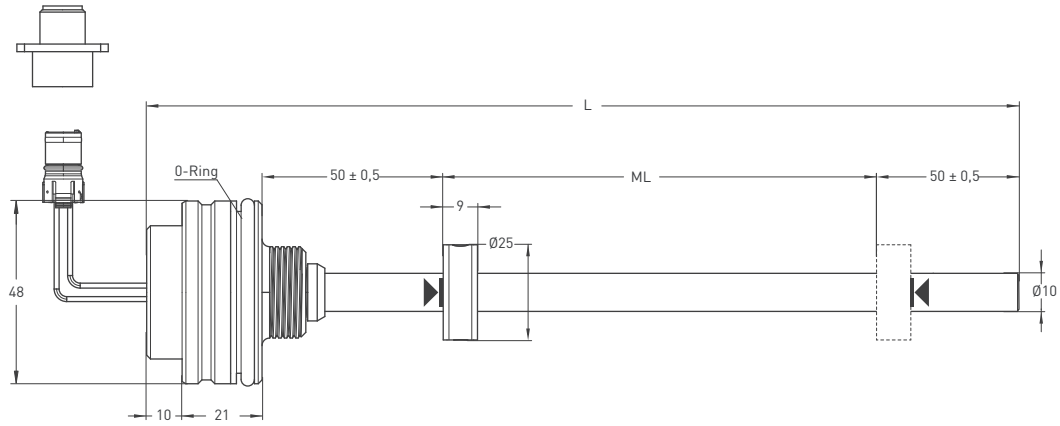
- Measuring length 50 - 3000 mm
- 15 bit resolution
- 0 - 20 mA, 4 - 20 mA output
- 24 VDC power supply



Technical Specifications

Measurement stroke	50 to 3000 mm
Resolution	15 bit DAC output
Repeatability	100 µm
Output	0-20mA, 20-0mA, 4-20mA, 20-4mA
Power supply	24 VDC ±10%
Displacement speed	max. <5 m/s
Linearity	50-100 mm < %1, 100-300 mm < %0.2, 300-500 mm < %0.1, 500-3000 mm > %0.05
Sampling rate	Up to 2 kHz (depending on stroke length)
Vibration	EN 60068-2-6 , 5-200 Hz 200 m/s ² (20g) , 2h 30min each axis (x,y,z)
Shock	EN 60068-2-2:2007 500 m/s ² (50g) , 11ms. (x,y,z axis)
Update time	0-600mm, 0,5ms 600-1500mm, 1ms 1500-3000mm, 2ms
Max. consumption	< 50 mA - 90 mA (depending on stroke length)
Max. output noise	< 5 mVpp
Load resistance	max. 500 Ohm
Reverse polarity protection	Up to -30 VDC
Overvoltage protection	Up to +30 VDC
Pressure rating	< 500 bar
Sealing	O-ring: NBR Backup Ring: PTFE
Mounting	M18 x 1.5 or 3/4" -16 UNF O-ring or Flat
Case material	Profile :Anodized aluminium Tube: Stainless steel Caps: Stainless steel
Protection level	IP 67
Operating temperature	-10°C ... +70°C
Storage temperature	-30°C ... +90°C

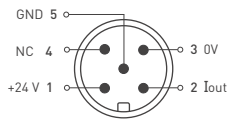
Mechanical Specifications



MSP (mm)	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	1000	1100	1200	1300	1400	1500	1750	2000	2250	2500	3000
ML (Measuring length)	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	1000	1100	1200	1300	1400	1500	1750	2000	2250	2500	3000
L (Total length)	190	240	290	340	390	440	490	540	590	640	690	740	790	840	890	940	990	1040	1190	1240	1340	1440	1540	1640	1920	2170	2420	2670	3170
Dead zone calculation	50 / 50															80 / 50													

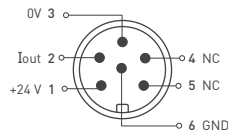
Connector

5 pin Connector Configuration



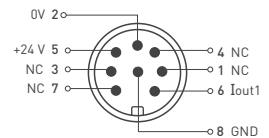
CN5 M12 (A) / M16 (B)
5 pin

6 pin Connector Configuration

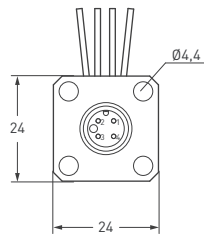


CN6 M12 (A) / M16 (B)
6 pin

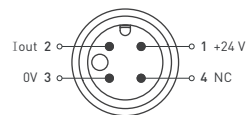
8 pin Connector Configuration



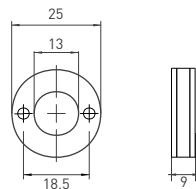
CN8 M12 (A) / M16 (B)
8 pin



4 pin Male Connector Configuration



Cursor



R05

Ordering Procedure

Model	Measuring range	Rod & Thread	Resolution	Cursor	Output	Connector/Cable	Dead zone
MSP	300	E10	B	1R05	I40	CN5A	50/50
MSP	50 - 3000 mm	E010 : Ø10	B : 15 bit	R05: 25 mm	I40 : 4-20mA I04 : 20-4mA I20 : 0-20mA I02 : 20-0mA	CN5A : M12 CN5B : M16 CN6A : M12 CN6B : M16 CN8A : M12 CN8B : M16 1M: 1 meter (standard)	≤ 1500 mm 50/50 > 1750-3000 mm 80/50