

PE18 Non-Contact Rotary Position Sensor



- Patented true non-contact position sensing
 - 0.5" (12mm) gap between sensor and application
 - 0.10" (2.5mm) center alignment
 - 30° planar tilt
- Totally sealed IP69K (connector dependent)
- LED indicators for power and output feedback
- Incremental or Absolute position
- Outputs: Quadrature, Analog, J1939, Analog - Voltage Output
- Detects rotation through non-ferrous barriers

ELECTRICAL

Outputs	B-PPR-SEPP : Incremental 8 bit Quadrature w/ Single Ended Output	
	A-1939 : 8 bit J1939 256 Count Absolute Single-Turn	
	V1 : Voltage Out / 0-5 VDC IN, 0-5 VDC OUT (code V3 for 2x redundant output)	
	V2 : Voltage Out / 6-36 VDC IN, 0-5 VDC OUT	
	I1 : Current Out / 0-24 VDC IN, 4-20 mA OUT (code I2 for 2x redundant output)	
	Input Power	6 to 30 VDC at approx 60 mA max, not including output loads
	Electrical Protection	Over-voltage, reverse-voltage, output short-circuit protected
	LED Indicators	Power and communication
	Connections	M8, Flying Lead Cable or Shielded Flying Lead
	Resolution	5.625° (8 bit 64 positions across 360°)
Accuracy	0.6°	
Hysteresis	0.18°	

MECHANICAL

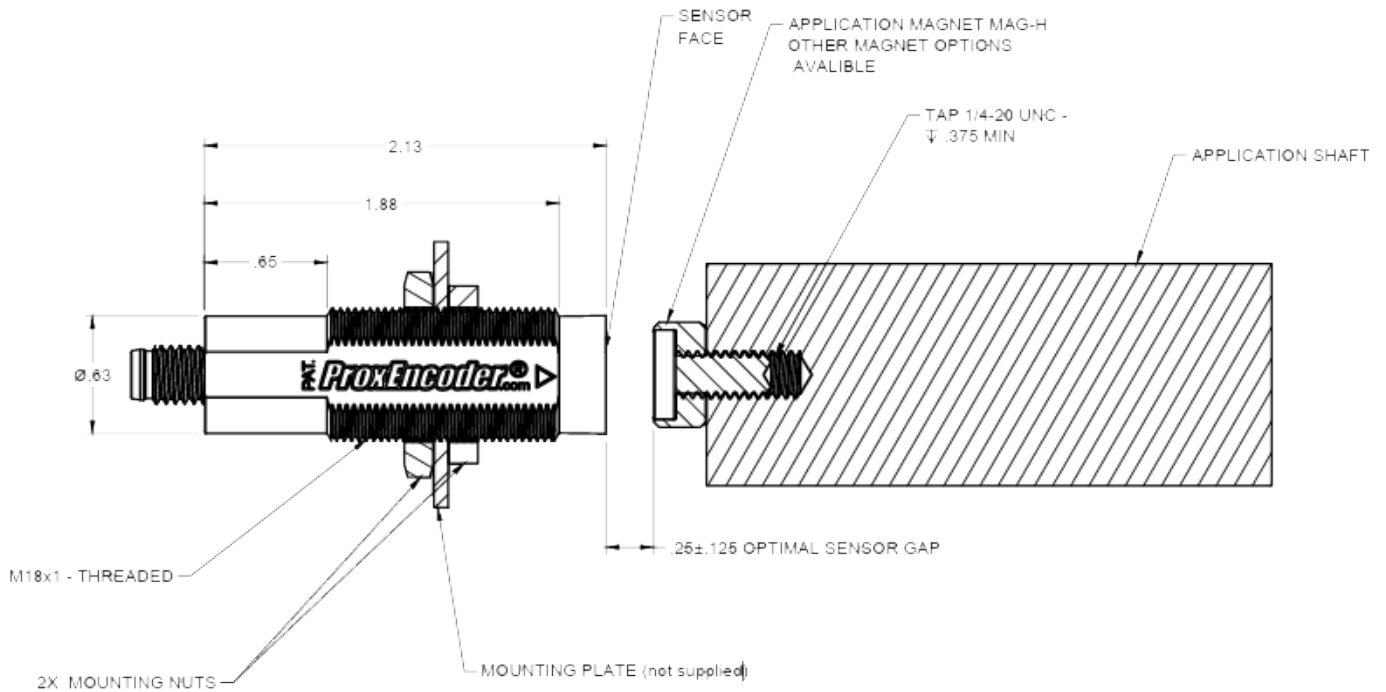
* Non-contact tolerances rated using MAG-RING 1/4x20 magnet accessory.

Housing Diameter	0.71" (18mm)
Housing Material	Aluminum (Red anodize standard) or Stainless steel
Housing Height	2.00" (50.8mm)
Mounting	18mm Threaded
Weight	0.81 oz (22.8 grams) without mounting nuts
Magnet / sensor gap*	Standard 0.5" (12mm)
Rated planar tilt / axial gap*	Planar 30° (Max 45°) / Axial 0.1" (2.5mm)(Max 0.16" [4mm])

ENVIRONMENTAL

Operating Temperature	-30° to +80° C
Storage Temperature	-40° to +60° C
Humidity	100%
Shock	400g/6ms (MIL STD 202)
Vibration	5 to 3000 Hz, 20g (MIL STD 202)
Protection Class	IP67 with standard M8 (IP69K optional)

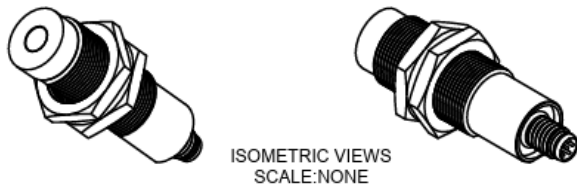
ORDER TABLE	Code 1: Housing Style	Code 2: MagElec		Code 3: Connection		Code 4: Modifiers	
		PE18 18mm Cylinder Housing	B-0064-SEPP	64 pulse single ended quadrature output	M8	6 pin M8 male	M1
V1			5 VDC IN, 0-5 VDC OUT	C72			72" flying lead cable
V2			6-36 VDC IN, 0-5 VDC OUT		53	Housing material Black Aluminum	
I1			0-24 VDC IN, 4-20 mA OUT		54	Housing material Stainless Steel	
PEBX 2" x 1" x 1" box Square Mount Housing		B-1939	256 count absolute single-turn J1939 output			101	Sense element orientation side sense orientation



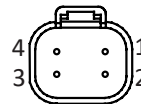
INTERFACE DETAILS AND NOTES:

1. APPLICATION SHAFT Ø.375" MINIMUM WHEN USING MAG-H APPLICATION MAGNET. TAP 1/4-20 A MINIMUM DEPTH OF .375".
2. 0.25" SENSOR GAP DISTANCE IS OPTIMAL FOR NORMAL INSTALLATION. THIS IS DEPENDNT ON MOUNT AND MATERIALS.

GENERAL PIN OUTS



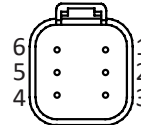
**DT04-4P MALE
FACE VIEW**



DT04-4P J1939 OUTPUT

- 1 = YEL = CAN HIGH
- 2 = GRN = CAN LOW
- 3 = RED = +VDC (VIN)
- 4 = BLK = COMMON/GROUND

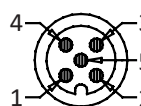
**DT04-6P MALE
FACE VIEW**



DT04-6P J1939 OUTPUT

- 1 = YEL = CAN HIGH
- 2 = GRN = CAN LOW
- 3 = RED = +VDC (VIN)
- 4 = BLK = ADDRESS GROUND
- 5 = WHT = ADDRESS PROG. RESISTOR
- 6 = BLK = COMMON/GROUND

**M12-5P MALE
FACE VIEW**



**M12-5P AND 5 CONDUCTOR
CABLE J1939 OUTPUT**

- 1 = BRN = +VDC (VIN)
- 2 = WHT = CAN HIGH
- 3 = BLUE = COMMON/GROUND
- 4 = BLK = CAN LOW
- 5 = GRY = OPTIONAL ADDRESS PROGRAMMING RESISTOR