# **PY4 Series Inductive Proximity Sensors**



#### Miniature M4 (4mm) Stainless Steel - DC

- Complete overload protection
- IP67 rated
- · Stainless steel construction
- LED status indicator
- Lifetime warranty

PY Series M4 DC Inductive Proximity Selection Chart										
Part Number	Price	Sensing Range mm [in]	Mounting	Output State	Logic	Connection	Dimensions			
Standard Distance										
PY4-AN-1A	\$95.00	0.6 [0.024]	Flush	N.O.	NPN	2m [6.5 ft] axial cable	Figure 1			
PY4-AP-1A	\$95.00	0.6 [0.024]	Flush	N.O.	PNP	2m [6.5 ft] axial cable	Figure 1			
Extended Distance										
PY4-AN-3A	\$105.00	1 [0.039]	Flush	N.O.	NPN	2m [6.5 ft] axial cable	Figure 1			
PY4-AP-3A	\$105.00	1 [0.039]	Flush	N.O.	PNP	2m [6.5 ft] axial cable	Figure 1			

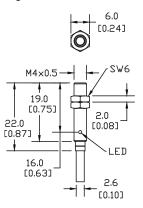
PY Series Specifications								
Specification	Standard Distance	Extended Distance						
Mounting Type	Flush							
Nominal Sensing Distance	0.6 mm [0.024 in]	1mm [0.039 in]						
Operating Distance	NA NA							
Material Correction Factors	See the Material influence table							
Output Type	NPN or PNP/N.O. only/3-wire							
Operating Voltage	10 to 30 VDC							
No-load Supply Current	≤ 10mA							
Operating (Load) Current	≤ 100mA							
Off-state (Leakage) Current	≤ 10µA	≤ 0.1mA						
Voltage Drop	≤ 2.0 V							
Switching Frequency	5kHz	3kHz						
Differential Travel (% of Nominal Distance)	≤10%							
Repeat Accuracy	≤ 5%							
Ripple	≤ 20%							
Time Delay Before Availability (tv)	10ms							
Reverse Polarity Protection	Yes							
Short-Circuit Protection	Yes [switch auto-resets after overload is removed]							
Operating Temperature	-25 to +70°C [-13 to 158° F]							
Protection Degree (DIN 40050)	IEC IP67							
Indication/Switch Status	Yellow [output energized]							
Housing Material	Stainless steel							
Sensing Face Material	Polyester							
Shock/Vibration	See Proximity Sei	nsor Terminology						
Tightening Torque	0.8 N•m [7	7.08 lb•in]						
Weight	23g [0.81 oz]	26g [0.92 oz]						
Connection	2m [6.5 ft] PVC cable							
Agency Approvals	UL file E	328811						

To obtain the most current agency approval information, see the Agency Approval Checklist section on the specific part number's web page.

#### **Dimensions**

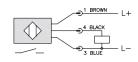
mm [inches]

Figure 1

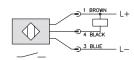


#### **Wiring Diagrams**

**PNP Output** 



#### **NPN Output**



## **Accessories for 4mm Sensors**

### **Right-angle Mounting Bracket**

Mounting bracket, right-angle, plastic. For use with 4mm sensors.

Accessories for 4mm Sensors								
Part Number	Price	Description	Drawing Link	Weight [lb]				
<u>OPT2106</u>	\$8.00	Wenglor mounting bracket, right-angle, plastic. For use with 4mm sensors.	<u>PDF</u>	0.02				



tSEN-475

www.automationdirect.com Sensor Accessories