

Cylindrical Inductive Proximity Sensors

(DC 3-Wire)

PR Series



Features

- Spatter-resistant type:
PTFE coated for high heat resistance
(prevent malfunction from welding spatter)
- Operation indicator (red LED)
- IP67 Protection structure (IEC standards)

Specifications

Installation	Flush type			
General	PR□08-1.5D □	PR□12-2D □	PR□18-5D □	PR□30-10D □
Spatter-resistant	-	PRA□12-2D □	PRA□18-5D □	PRA□30-10D □
DIA. of sensing side	Ø 8 mm	Ø 12 mm	Ø 18 mm	Ø 30 mm
Sensing distance	1.5 mm	2 mm	5 mm	10 mm
Setting distance	0 to 1.05 mm	0 to 1.4 mm	0 to 3.5 mm	0 to 7 mm
Hysteresis	≤ 10 % of sensing distance (DIA. of sensing side Ø 8 mm connector type: ≤ 15 %)			
Standard sensing target: iron	8 × 8 × 1 mm	12 × 12 × 1 mm	18 × 18 × 1 mm	30 × 30 × 1 mm
Response frequency ⁰¹⁾	1.5 kHz	1.5 kHz	500 Hz	400 Hz
Affection by temperature	≤ ± 10 % for sensing distance at ambient temperature 20 °C (DIA. of sensing side Ø 8 mm: ≤ ± 20 %)			
Indicator	Operation indicator (red)			
Approval	CE EAC	CE EAC	CE EAC	CE EAC

Installation	Non-flush type			
General	PR□08-2D □	PR□12-4D □	PR□18-8D □	PR□30-15D □
DIA. of sensing side	Ø 8 mm	Ø 12 mm	Ø 18 mm	Ø 30 mm
Sensing distance	2 mm	4 mm	8 mm	15 mm
Setting distance	0 to 1.4 mm	0 to 2.8 mm	0 to 5.6 mm	0 to 10.5 mm
Hysteresis	≤ 10 % of sensing distance (DIA. of sensing side Ø 8 mm connector type: ≤ 15 %)			
Standard sensing target: iron	8×8×1 mm	12×12×1 mm	25×25×1 mm	45×45×1 mm
Response frequency ⁰¹⁾	1.0 kHz	500 Hz	350 Hz	200 Hz
Affection by temperature	≤ ± 10 % for sensing distance at ambient temperature 20 °C (DIA. of sensing side Ø 8 mm: ≤ ± 20 %)			
Indicator	Operation indicator (red)			
Approval	CE EAC	CE EAC	CE EAC	CE EAC

01) The response frequency is the average value. The standard sensing target is used and the width is set as 2 times of the standard sensing target, 1/2 of the sensing distance for the distance.

Unit weight (package)		Ø 8 mm	Ø 12 mm	Ø 18 mm	Ø 30 mm
Cable	Normal	≈ 52 g (≈ 64 g)	≈ 72 g (≈ 84 g)	≈ 110 g (≈ 122 g)	≈ 170 g (≈ 207 g)
	Short	-	≈ 70 g (≈ 82 g)	-	-
	Long	≈ 54 g (≈ 66 g)	≈ 76 g (≈ 88 g)	≈ 130 g (≈ 142 g)	≈ 210 g (≈ 247 g)
Cable connector	Normal	≈ 32 g (≈ 44 g)	≈ 42 g (≈ 54 g)	≈ 58 g (≈ 70 g)	≈ 122 g (≈ 134 g)
	Long	≈ 34 g (≈ 46 g)	-	≈ 78 g (≈ 90 g)	≈ 158 g (≈ 195 g)
Connector	Normal	≈ 10 g (≈ 32 g)	≈ 26 g (≈ 38 g)	≈ 49 g (≈ 61 g)	≈ 134 g (≈ 146 g)
	Long	-	-	≈ 73 g (≈ 85 g)	≈ 169 g (≈ 181 g)



View product detail