



DW Series 18mm Inductive Proximity Sensors



M18 (18mm)

- Flush and non-flush models
- LED status indicator
- IP67 rated
- Two M18 lock nuts included
- Complete overload protection
- Lifetime warranty
- IO Link (PNP N.O. models only)



DW Series M18 Inductive Proximity Selection Chart

Part Number	Price	Frequency	Sensing Range	Mounting	Output State	Logic	Connection	Wiring	Weight (g)	Drawing Link
Standard Sensing Distance										
DW-AS-601-M18-002	\$18.00	2000Hz	5mm	Flush	N.O.	NPN	M12 quick-disconnect	Diagram 1	43	PDF
DW-AS-603-M18-002	\$18.00	2000Hz	5mm	Flush	N.O.	PNP	M12 quick-disconnect	Diagram 2	43	PDF
DW-AS-604-M18-002	\$18.00	2000Hz	5mm	Flush	N.C.	PNP	M12 quick-disconnect	Diagram 3	43	PDF
DW-AS-611-M18-002	\$18.00	2000Hz	8mm	Non-flush	N.O.	NPN	M12 quick-disconnect	Diagram 1	49	PDF
DW-AS-613-M18-002	\$18.00	2000Hz	8mm	Non-flush	N.O.	PNP	M12 quick-disconnect	Diagram 2	49	PDF
DW-AS-614-M18-002	\$18.00	2000Hz	8mm	Non-flush	N.C.	PNP	M12 quick-disconnect	Diagram 3	49	PDF
Extended Sensing Distance										
DW-AS-621-M18-002	\$22.50	1500Hz	8mm	Flush	N.O.	NPN	M12 quick-disconnect	Diagram 1	51	PDF
DW-AS-623-M18-002	\$22.50	1500Hz	8mm	Flush	N.O.	PNP	M12 quick-disconnect	Diagram 2	51	PDF
DW-AS-624-M18-002	\$22.50	1500Hz	8mm	Flush	N.C.	PNP	M12 quick-disconnect	Diagram 3	51	PDF
DW-AS-631-M18-002	\$22.50	500Hz	12mm	Non-flush	N.O.	NPN	M12 quick-disconnect	Diagram 1	105	PDF
DW-AS-633-M18-002	\$22.50	500Hz	12mm	Non-flush	N.O.	PNP	M12 quick-disconnect	Diagram 2	105	PDF
DW-AS-634-M18-002	\$22.50	500Hz	12mm	Non-flush	N.C.	PNP	M12 quick-disconnect	Diagram 3	105	PDF

Wiring Diagrams

Diagram 1

NPN Connector

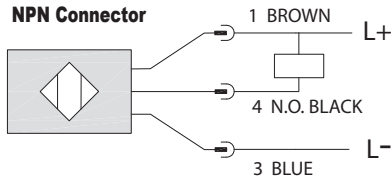
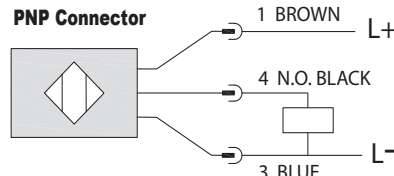


Diagram 2

PNP Connector



Connectors

M12 connector

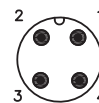
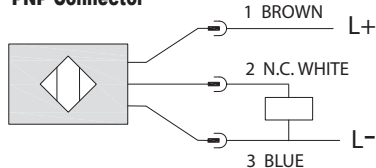


Diagram 3

PNP Connector



DW Series 18mm Inductive Proximity Sensors

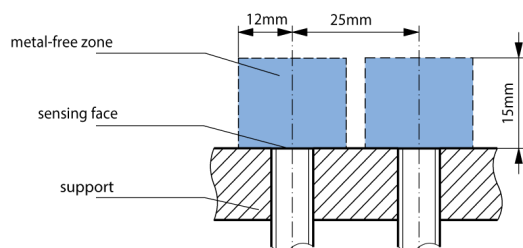
DW Series M18 Inductive Proximity Specifications				
Sensor	DW-Ax-60x-M18	DW-Ax-62x-M18	DW-Ax-61x-M18	DW-Ax-63x-M18
Mounting Type	Flush		Non-flush	
Nominal Sensing Distance	5mm	8mm	8mm	12mm
Operating Distance	-			
Material Correction Factors	See the Material influence table			
Output Type	NPN or PNP, N.O. or N.C.			
Operating Voltage	10 to 30 VDC			
No-load Supply Current	≤ 10mA			
Operating (Load) Current	≤ 200mA			
Off-state (Leakage) Current	≤ 0.1 mA			
Voltage Drop	≤ 2 V @ 200mA			
Switching Frequency	3000Hz	2500Hz	2000Hz	1400Hz
Differential Travel (% of Nominal Distance)	< 20%			
Repeat Accuracy	0.10 mm	0.20 mm		0.40 mm
Ripple	≤ 20%			
Time Delay Before Availability (tv)	≤ 80ms	≤ 60ms	≤ 80ms	≤ 50ms
Reverse Polarity Protection	Yes			
Short-Circuit Protection	Yes			
Operating Temperature	-25 to 70°C [-13 to 158°F]			
Protection Degree (DIN 40050)	IP67			
Indication/Switch Status	Indicator LED, Yellow, Solid (When the target is between 0-80% of Range, the LED will be solid) Indicator LED, Yellow, Blinking (When the target is between 80-100% of Range, the LED will blink to let you know it is nearing max range)			
Housing Material	Nickel Plated Brass			
Sensing Face Material	PBTP [Crastin]			
Shock/Vibration	IEC 60947-5-2/7.4			
Tightening Torque	25 Nm			
Connection	4-Pole M12 connection			
IO-Link	IO-Link [PNP, N.O. version only]			
Agency Approvals	CE, cULus E239373			

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

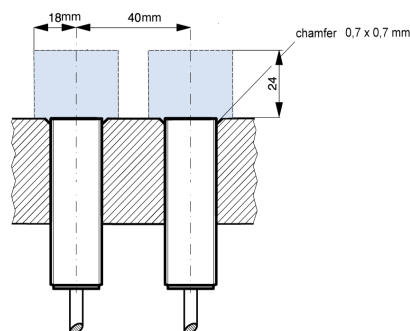
DW Series 18mm Inductive Proximity Sensors

Installation

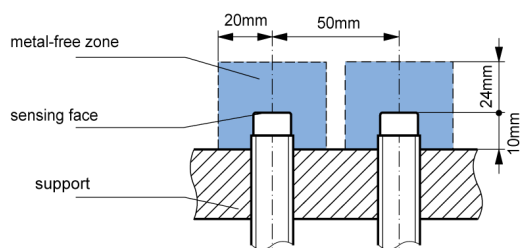
DW-Ax-60x-M18



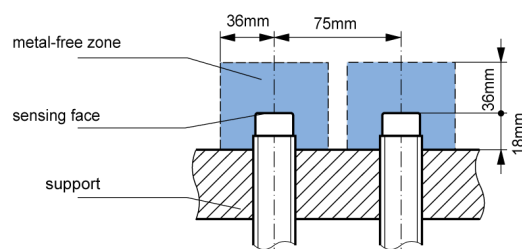
DW-Ax-62x-M18



DW-Ax-61x-M18

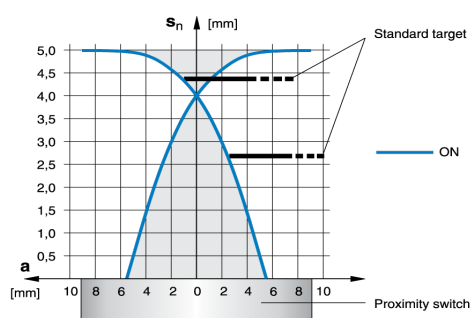


DW-Ax-63x-M18

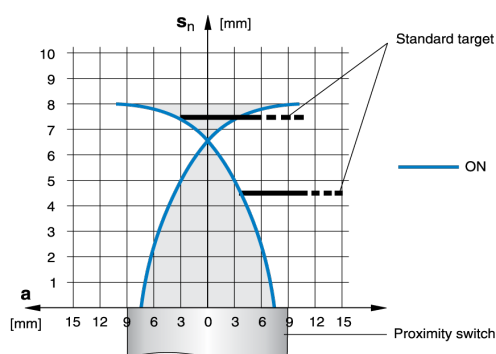


Response Diagrams

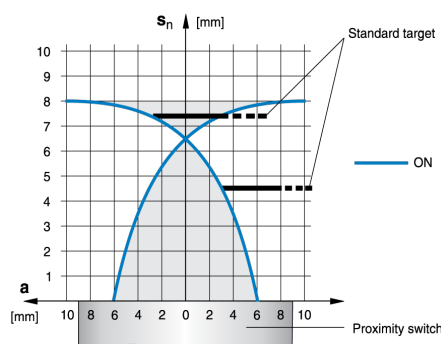
DW-Ax-60x-M18



DW-Ax-62x-M18



DW-Ax-61x-M18



DW-Ax-63x-M18

