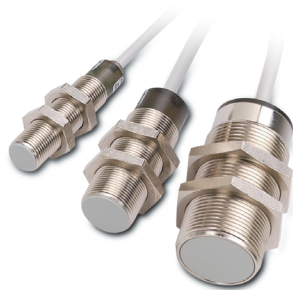


V Series AC Inductive Proximity Sensors

M12 (12 mm), M18 (18 mm), M30 (30 mm) metal – AC



- Multi-voltage: 20 to 253 VAC
- 2-wire
- Metal housing
- Axial cable with tang or quick-disconnect models; purchase cable separately
- IP67 rated
- LED status indicator
- Lifetime warranty

V Series M12/18/30 AC Inductive Prox Selection Chart						
Part Number	Sensing Range	Housing	Output State	Connection	Wiring	Dimensions
M12 Models						
VM1-A0-1B	2 mm (0.06 in) ¹	Shielded	NO	2 m (6.5') axial cable	Diagram 1 or 2	Figure 1
VM1-A0-2B	4 mm (0.157 in) ¹	Unshielded		2 m (6.5') axial cable		Figure 1
VM1-A0-1H	2 mm (0.08 in) ¹	Shielded		M12 (12 mm)		Figure 2
VM1-A0-2H	4 mm (0.157 in) ¹	Unshielded		M12 (12 mm)		Figure 2
M18 Models						
VK1-A0-1B	5 mm (0.197 in) ²	Shielded	NO	2 m (6.5') axial cable	Diagram 1 or 2	Figure 3
VK1-A0-2B	8 mm (0.315 in) ²	Unshielded		2 m (6.5') axial cable		Figure 3
VK1-A0-1H	5 mm (0.197 in) ²	Shielded		M12 (12 mm)		Figure 4
VK1-A0-2H	8 mm (0.315 in) ²	Unshielded		M12 (12 mm)		Figure 4
M30 Models						
VT1-A0-1B	10 mm (0.394 in) ³	Shielded	NO	2 m (6.5') axial cable	Diagram 1 or 2	Figure 5
VT1-A0-2B	15 mm (0.591 in) ³	Unshielded		2 m (6.5') axial cable		Figure 5

¹With 12x12 Fe360 target ²With 18x18 Fe360 target ³With 30x30 Fe360 target

* V Series sensors with 4-pin M12 connectors do not work with Zip Port junction blocks.

Wiring diagram

Diagram 1

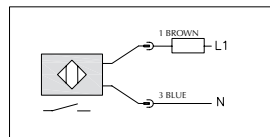
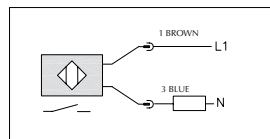


Diagram 2



Connector

M12 connector



Dimensions

mm [inches]

Figure 1

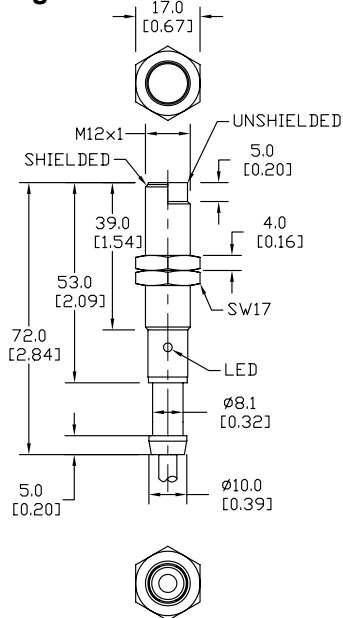


Figure 2

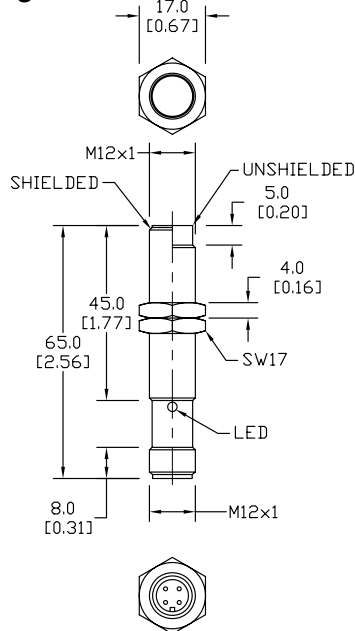
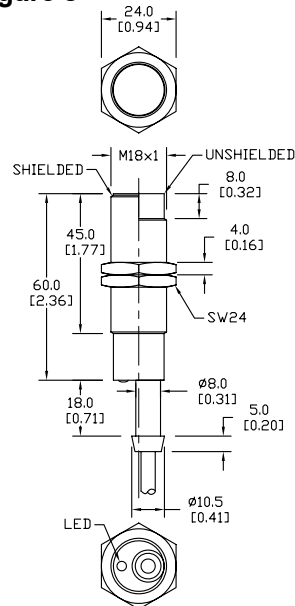


Figure 3



V Series AC Inductive Proximity Sensors

Specifications	M12 Models		M18 Models		M30 Models	
Mounting Type	Shielded	Unshielded	Shielded	Unshielded	Shielded	Unshielded
Nominal Sensing Distance	2	4	5	8	10	15
Operating Distance	NA					
Material Correction Factors	See the Material Influence table					
Output Type	Triac/NO/2-wire					
Operating Voltage	20 to 253 VAC, 50/60 Hz					
No-load Supply Current	NA					
Operating (Load) Current	5 to 300 mA (RMS)					
Off-state Leakage Current	1.0 mA max. (RMS)					
Voltage Drop						
Switching Frequency	25 Hz					
Differential Travel (% of Nominal Distance)	2 to 10%					
Repeat Accuracy	5%					
Ripple	NA					
Time Delay Before Availability (tv)	200 ms					
Reverse Polarity Protection	NA					
Short Circuit Protection	No					
Operating Temperature	-25° to +70°C (-13° to 158°F)					
Protection Degree (DIN 40 050)	IEC IP67					
LED Indicators	Yellow (output energized)					
Housing Material	Nickel-plated brass					
Sensing Face Material	Polybutylene Terephthalate (PBT)					
Shock/Vibration	See Proximity Sensor Terminology					
Tightening Torque	10 Nm (11 lb-ft)		25 Nm (18.44 lb-ft)		50 Nm (36.88 lb-ft)	
Weight	70 g (2.47 oz)		120 g (4.23 oz)		300 g (10.6 oz)	
Connection	2 m (6.5') axial cable or M12 (12 mm) connector					
Agency Approvals	CE, ULRecognized file E130644					

Use only 2M or 7M cables for AC sensors with M12 connectors.

Dimensions

mm [inches]

Figure 4

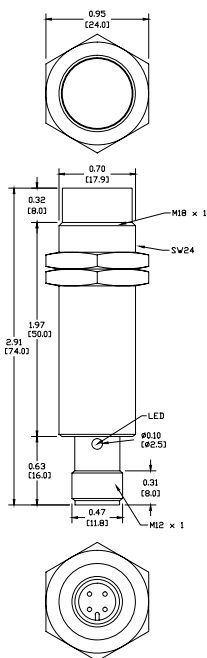


Figure 5

