

# A Series Proximity Switches

## Characteristics

	3-wire DC	2-wire AC
Leakage Current (max)	10 $\mu$ A	2mA
Voltage Drop (max)	2V DC	7V AC
Inrush Current		1.7A/20ms
Short Circuit, Overload Protection and Reverse Polarity Protection	Yes	
Supply Voltage	10-36VDC	20-250VAC
Supply Current	10mA (24V)	
Repeatability	5%	
Hysteresis	10%	
LED	Yes	
False Pulse Protection	Yes	
Temperature Range	-25~70°C	
Degree of Protection	IP67	



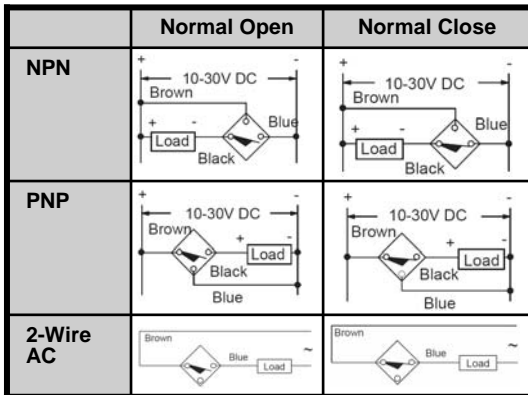
## Selection Guide

AA		12		A		N		5		C	
Type		Dimension		Output Type		Output Type		Sensing Range		Wiring	
AA	DC	08	M8	A	NO	N	NPN output			2	2m cable
AB	AC	12	M12	B	NC	P	PNP output			5	5m cable
		18	M18	V	NO/NC					C	M12 quick connector
		30	M30								
		17	17x17								
		25	25x25								
		40	40x40								

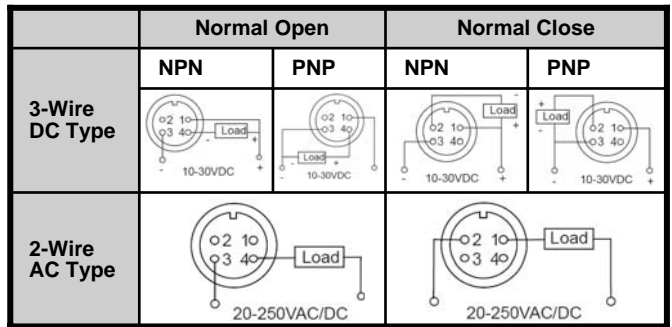
	M8		M12		M18		M30		17X17		25X25		40X40	
3-Wire DC	Shielded	Non-Shielded	Shielded	Non-Shielded	Shielded	Non-Shielded	Shielded	Non-Shielded	Shielded	Non-Shielded	Shielded	Non-Shielded	Shielded	Non-Shielded
Sensing Range	1.5mm	3mm	2mm	5mm	5mm	10mm	10mm	15mm	5mm	10mm	10mm	15mm	15mm	20mm
Load Current	200mA		200mA		200mA		200mA		200mA		200mA		200mA	
Switching Frequency	2500Hz	2000Hz	2000Hz	1500Hz	800Hz	500Hz	500Hz	300Hz	800Hz	500Hz	500Hz	300Hz	300Hz	150Hz
2-Wire AC			Shielded	Non-Shielded	Shielded	Non-Shielded	Shielded	Non-Shielded			Shielded	Non-Shielded	Shielded	Non-Shielded
Sensing Range			2mm	5mm	5mm	10mm	10mm	15mm			10mm	15mm	15mm	20mm
Load Current	5-100mA		5-200mA		5-200mA		5-200mA				5-200mA		5-200mA	
Switching Frequency			25Hz		25Hz		25Hz				25Hz		25Hz	

# A Series Proximity Switches

## Prewired Type Wiring Diagram



## Quick Connector Type Wiring Diagram



## Dimensions

	Thread	Type	A (mm)	B (max, mm)	C (min, mm)	D (max, mm)
	M8 X 1	Shielded	8	45	35	4.5
		Unshielded		50		
	M12 X 1	Shielded	12	55	40	5.0
		Unshielded		60		
	M18 X 1	Shielded	18	60	45	8.5
		Unshielded		68		
M30 X 1	Shielded	30	60	45	13	
	Unshielded		73			
	M8 X 1	Shielded	8	66	40	4.5
		Unshielded		70		
	M12 X 1	Shielded	12	66	35	5.0
		Unshielded		70		
	M18 X 1	Shielded	18	62	40	8.5
		Unshielded		70		
M30 X 1	Shielded	30	68	37	13	
	Unshielded		81			