

Air Products PAM Series Multi-Voltage Relay Modules



Description

The PAM Series Relays are encapsulated multi-voltage devices with “flying” leads that offer versatile, reliable performance in a convenient package. Several of the versions contain a red LED which indicates when the relay coil is energized. The PAM Series Relays are packaged with a self-tapping screw and a piece of double sided tape for easy installation almost anywhere. The relays are also packaged with wire-nuts to aid installation.

PAM Relays are ideal for applications where remote relays are required for control or status feedback. They are suitable for use with HVAC, Temperature Control, Fire Alarm, Security, Energy Management, Lighting Control Systems and Building Automation Systems.

PAM-1

The PAM-1 Relay provides 10.0 A form “C” contacts. The relay may be energized by one of three input voltages: 24VDC, 24VAC, or 120VAC. The input voltages are polarity-sensitive and diode-protected. PAM-1 Relays contain a red LED which indicates when the relay coil is energized. This relay may not be suitable for continuous duty use at 120VAC for extended periods of time. For these applications, please refer to our RIC-Series products.

Features

- Multi-voltage operation
- Activation LEDs to indicate when the relay coil is energized
- Easy installation
- Ideal for applications where remote relays are required for control or status feedback
- Suitable for use with HVAC, Temperature Control, Fire Alarm, Security, Energy Management, Lighting Control Systems and Building Automation Systems

PAM-2

The PAM-2 Relay provides 7.0 A form “C” contacts. The relay may be energized by one of two input voltages: 12VDC or 24VDC. The input voltages are polarity-sensitive and diode-protected. PAM-2 Relays contain a red LED which indicates when the relay coil is energized.

PAM-3

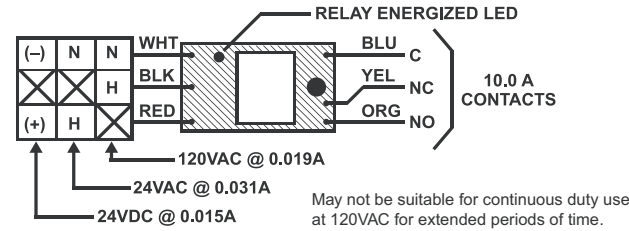
The PAM-3 Relay provides a 3.0 A form “A” contact. The relay may be energized across a wide voltage range from 9VDC to 40VDC, making it ideal for 12VDC and 24VDC EOL circuits. The 19.3 mA operating current is constant across the operating range. The input voltage is polarity-sensitive and diode-protected.

PAM-4

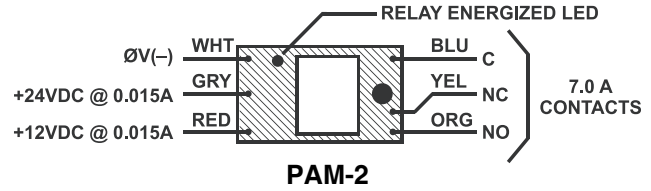
The PAM-4 Relay provides 10.0 A form “C” contacts. The relay may be energized across a wide voltage range from 9VDC to 40VDC, making it ideal for 12VDC and 24VDC EOL circuits. The 15mA operating current is constant across the operating range. The input voltages are polarity-sensitive and diode-protected.



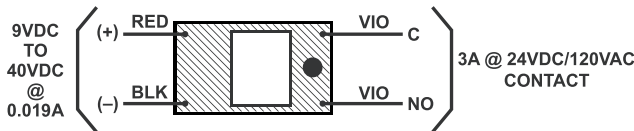
Wiring Diagrams



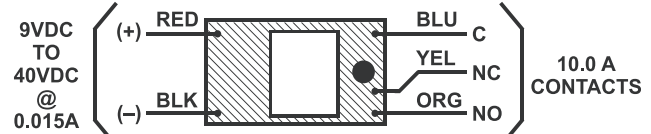
PAM-1



PAM-2



PAM-3



PAM-4

Specifications

Model Number	PAM-1	PAM-2	PAM-3	PAM-4
Coil Voltage	24VAC/24VDC/120VAC	12VDC/24VDC	90 to 40VDC	9 to 40VDC
Polarized	Yes	Yes	Yes	Yes
Energized Led Indicator	Yes	Yes	No	No
Current Requirement				
@ 12VDC	-	15mA	19.3mA	15mA
@ 24VDC	15mA	15mA	19.3mA	15mA
@ 24VAC	31mA	-	-	-
@ 120VAC	19mA	-	-	-
Contact Configuration	(1) SPDT dry form "C"	(1) SPDT dry form "C"	(1) SPDT dry form "A"	(1) SPDT dry form "C"
Contact Ratings (contact rating / power factor)				
@ 5VDC	250µA / .35 PF	250µA / .35 PF	-	250µA
@ 24VDC	7A / .35 PF	7A / .35 PF	3A / .35 PF	7A
@ 120VAC	10A	7A / .35 PF	3A / .35 PF	10A
Wire Leads	6 "flying" leads 12" / 18 AWG Wire-nuts provided	6 "flying" leads 12" / 18 AWG Wire-nuts provided	4 "flying" leads 12" / 18 AWG Wire-nuts provided	5 "flying" leads 12" / 18 AWG Wire-nuts provided
Ambient Temperature (@ 100% RH, condensing)	32°F to 120°F (0°C to 49°C)	32°F to 120°F (0°C to 49°C)	32°F to 120°F (0°C to 49°C)	32°F to 120°F (0°C to 49°C)
Construction	100% potted (sealed) with "flying" leads			
Mounting	Pre-drilled mounting screw hole and self tapping screw provided. Double sided tape provided.			
Dimensions	1.50" (38mm) H x 1.00" (25mm) W x 0.80" (20mm)	1.50" (38mm) H x 1.00" (25mm) W x 0.90" (23mm) D	1.50" (38mm) H x 1.00" (25mm) W x 0.90" (23mm) D	1.50" (38mm) H x 1.00" (25mm) W x 0.90" (23mm) D

Ordering Information

Model Number	Description
PAM-1	Encapsulated relay, Single SPDT, 10.0 A form "C" contact
PAM-2	Encapsulated relay, Single SPDT, 7.0 A form "C" contact
PAM-3	End-Of-Line Relay, 3.0 A form "A" contact
PAM-4	Encapsulated relay, Single SPDT, 10.0 A form "C" contact