PEARL-MM

Relay Output PC/104 Module

- 16 SPDT (form C) relays

- Long lifetime - 100,000,000 operations

- 500VAC/DC isolation between board and signals

- Screw terminals or pin headers for user connections

DESCRIPTION

Pearl-MM is a PC/104 format industrial control module with 16 relays. The relays have SPDT (form C) configuration. Each relay has 3 contacts: Common, Normally Open, and Normally Closed. For safety and reliability, all relays are in their power-off state (Common connected to Normally Closed) at power-up or system reset. The relays can switch both AC and DC voltages. They feature long life (100,000,000 operations), quick actuation time (4ms max operate and release), and superior isolation (500V AC or DC).

Two user connection options are available:

- The -S version has miniature screw terminals on .1" centers, providing a means of direct connection to user wiring ranging from 16-28AWG

- The -P version has standard pin headers to allow mating with a ribbon cable

SPECIFICATIONS

Feature	Pearl-MM
# Relays	16
Relay type	SPDT (form C)
Max DC Power	30V / 2A
Max AC Power	125VAC / 0.5A resistive
Max Load	60W / 60VA
Max Op Voltage	220VDC, 250VAC
Contact Resistance	100mΩ max
Relay lifetime	100,000,000 operations
Actuation Time	4ms max, operate / release
Opto inputs	0
Input Voltage	N/A
Input impedance	N/A
Dimensions	3.55" x 3.775" (90mm x 96mm)
Input Power	+5VDC±10%
Operating temp	-40°C to +85°C
Weight	3.4 / 96g 3.6oz / 102g w/Screw Terminals

Relay Circuit

Pearl-MM has 16 relay outputs with SPDT (form C) design. Each relay has a common (C), normally open (NO), and normally closed (NC) contact. The relays are controlled with two 8-bit control registers and have have break-before-make operation to prevent shorting.

I/O Connectors

Pearl-MM is available with either pin headers or screw terminals for the relay connections. In the pin header drawing at left, note that each pair of pins is connected to the same signal. The screw-terminal pinout is equivalent to one column of the pin header, without the last unused row.

ORDERING INFORMATION

Part No.	Description
PMM-S	16 relays, screw terminals
PMM-P	16 relays, pin headers