# JC SYSTEMS by TMC Services, Inc.

# MODEL 2271 Event Relay Board

- FOR USE WITH MODEL 620\600 PROGRAMMER\CONTROLLERS
- RIBBON CABLE INTERFACE TO MODEL 620\600
- 115VAC OPERATION WITH ON BOARD 24VDC POWER SUPPLY
- 10 SOCKETED LOCATIONS FOR PLUG IN DRY CONTACT RELAYS (RELAY CONTACTS, DOUBLE POLE, SINGLE THROW FORM "C", 3AMP MAX PER CONTACT, PN HC4-H-DC24V)
- FOUR LOCATIONS JUMPER SELECTABLE FOR SPECIAL FUNCTIONS

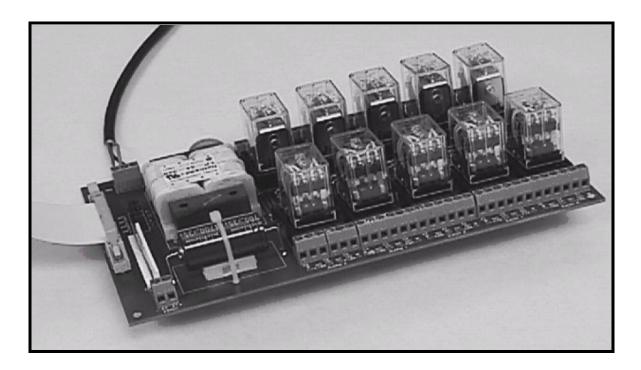
LOCATION

7 = EVENT 7 OR CH1 LIMIT OUTPUT

8 = EVENT 8 OR CH2 LIMIT OUTPUT

9 = EVENT A OR MTO (COMPRESSOR TIME OUT)

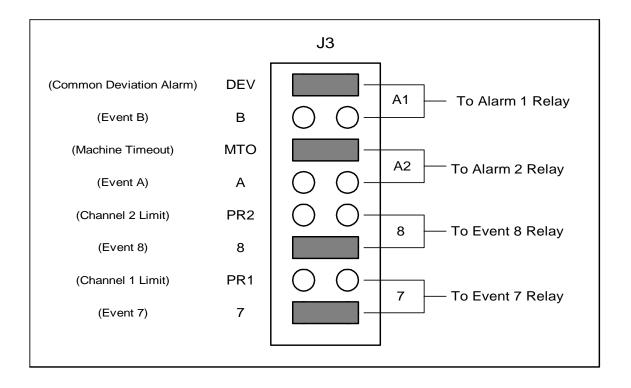
10 = EVENT B OR ALARM OUTPUT



JC Systems' Model A2271 Event Relay Board (shown with optional plug-in relays installed).

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### **MODEL A2271 JUMPER SELECTION INFORMATION**



Put jumper on the appropriate position to select event or function for last four relay locations.

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#### 1. GENERAL DESCRIPTION

The JC Systems Model A2271 Event Relay Board is used to electrically isolate a JC Programmer from other functions or circuitry. Installing this board between the programmer and events enables you to run isolated double-pole, double-throw (DPDT) relay contacts associated with each of the 8 events and 2 alarm outputs. If a programmed event is ON, the relay is actuated.

Let's take Event 1, for example. Event 1 from the programmer is normally a clamp output signal (coming straight off the programmer) that's used to drive a solid state relay. With the A2271 board installed, that signal comes through the board to the coil of Relay K1, energizing the relay contacts. If you're planning to tie into a different power supply voltage, want to connect programmer output functions into other circuitry, or you need to switch a remote device other than a solid state relay (such as an inductive load), this board would be used to isolate the programmer output.

Using the event board also makes it easier to connect events because the screws-clamp terminal blocks simplify connections.

#### 2. COMPONENT DESCRIPTION

The A2271 connects directly to the A2225 Rear Interconnect Board of the Model 620A/600A via a ribbon cable.

The A2271 board has a self contained 24 volt power supply for the relay coils. The fused (1 amp) 115vac input is connected to TB2, a 3 pin terminal strip.

Relays K1 to K6 are dedicated for events 1 - 6. The last four relays can be selected for either of two functions. See Jumper Selection information on the previous page. The drawing shows the factory default settings.

Each event relay has a corresponding LED which indicates that the relay is energized. Flyback protection is built onto the board to protect the programmer. The A2271 uses plug in 24vdc dry contact relays (HC4-H-DC24V). Relays are optional.

#### 3. Installation

The A2271 event Relay Board is installed remotely from the programmer, using the ribbon cable provided. It must be mounted on standoffs in a loctation that provides protection from dust, environmental hazards, and mechanical vibration.

## 4 Typical applications

**Switch Voltage:** To switch 115Vac (3 amps maximum per contact) from the output of the programmer to an event. Simpler than wiring a solid state relay (SSR) directly to the programmer event output.

**Logic Functions:** To perform a logic function where and operation (such as manually actuating a switch to start a separate function) depends on an enabled event. In this case you can connect the switch to the A2271 board, which in turn is connected to the programmer event output. Now the event relay must be actuated and the button pushed by an operator before the function will happen.

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