

RDM-3EM and RDM-6EM Energy Management Modules

The RDM-3EM (FG606-81) and RDM-6EM (FG606-80) are 3 and 6 channel switching energy management modules. They are designed for use with the RDA series of enclosures in an AMX Lighting™ system. For more detailed installation and operating instructions, refer to the *Radia Lighting Control System* Instruction Manual, available on-line at www.amx.com.

The RDM-3EM and RDM-6EM are designed with the most advanced latching energy management relays to support heavy duty commercial applications, building automation, and loadside management. Equipped with on-board module microprocessors, both support relay control and sequencing. Features include:

- User selectable delays in sequencing mode to minimize inrush current and stress on the electrical distribution system.
- Selectable strapping facilitates multiple relays on one Radia control channel for large area control.
- Manual on/off override on each relay independent of control system.
- Relays retain their state during power and control system outages.
- Visual Status Indicators on each relay.
- Latching relays do not consume any control current, except when they change state, eliminating the need for additional Radia power supplies.

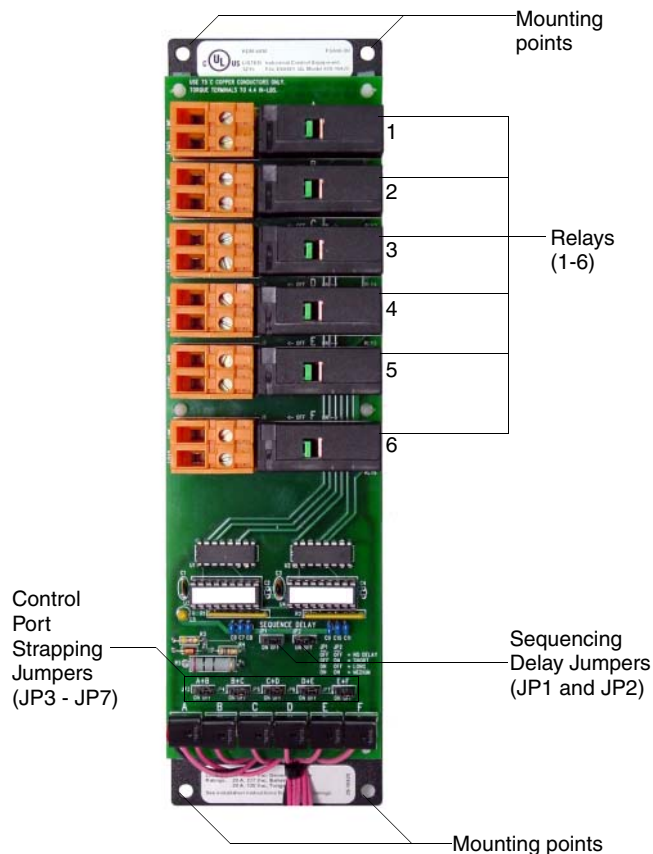


FIG. 1 RDM-6EM

Specifications

- Dimensions (HW): 10.00" x 2.75" (25.40 cm x 6.99 cm)
- Non-phase dependant
- Use wires rated at 75°C (167°F)
- Torque terminals to 4.4 in lbs.
- Wire size: 26 AWG to 10 AWG
- Wire stripping length: 0.28" (7 mm)
- Weight: 15 oz. (RDM-3EM) and 1.5 lbs. (RDM-6EM)

Included Accessories

- 4 mounting screws
- Control wiring harness

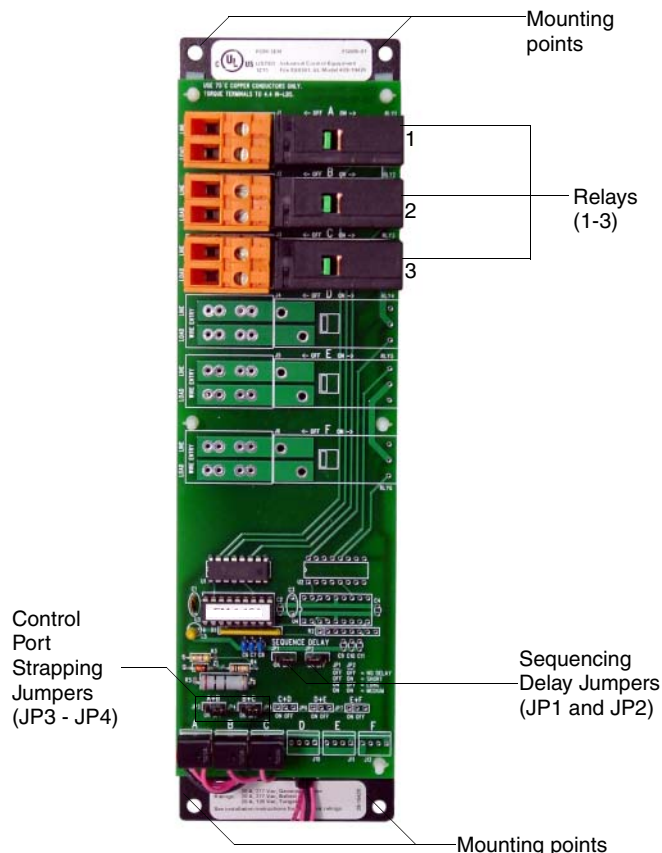


FIG. 2 RDM-3EM

RDM-3EM and RDM-6EM UL and C-UI Ratings

- General purpose: 120, 240, 277, and 347* VAC, 20 A
- UL/CUL916 Energy Management Systems.
- UL/CUL508 Industrial Control Systems.

Suggested Switched Loads

- Incandescent
- Fluorescent
- Transformer
- Low voltage
- General purpose

Caution: Pre-Installation Notes

- All Class 1 wiring must be connected to proper terminals.
- All control wiring must be connected to proper terminals.
- Disconnect power while installing or connecting the unit.
- Keep top and bottom air vents clear at all times.
- Test loads for shorts before connecting.
- Use low voltage wires with a 300 volt rating or greater.
- Use field installed copper conductors.
- All electrical ratings are for continuous duty.
- For indoor use only.

*Agency approval pending

Jumper Information

Jumpers provide user-selectable configuration options on the Radia Energy Management Modules.

Jumper Information	
Sequencing Delay Jumpers (JP1 and JP2)	The sequencing delay jumpers are set to short (0.5 sec.) delay by default. Installers can also select settings of no delay, medium delay (1.0 sec.) and long delay (1.5 sec.) between relays to minimize inrush current and stress on the electrical system.
Control Port Strapping Jumpers (JP3 - JP7)	Each relay is set to an individual Radia port by default. Installers have the option of setting multiple relays to an individual Radia port for large area control. For example, to combine A and B set JP3 to the ON position.

The following table describes the jumper settings for various delays and strapping:

JP1 - JP2 Jumper Settings		
JP1	JP2	Delay
off	off	no delay
off	on	short delay (0.5 sec.)
on	off	long delay (1.5 sec.)
on	on	medium delay (1.0 sec.)

Visual Status Indicators/Manual Override

Each relay includes a green lever that serves as both a status indicator and manual override switch. With the lever to the left (towards the wire terminals) the relay is in the OFF position. With the lever to the right the relay is in the ON position.

Connecting the RDM-3EM/6EM

Connect pins 1, 3 and 4 on the “A” connector only:

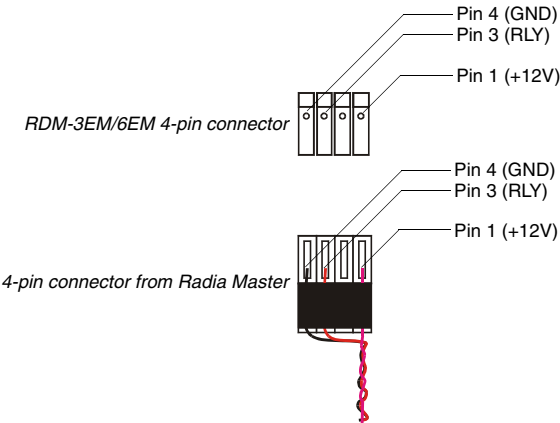


FIG. 3 RDM-3EM/6EM wiring connections - Connector “A” only

Connect only pin 3 on the remaining connectors (“B” through “F”):

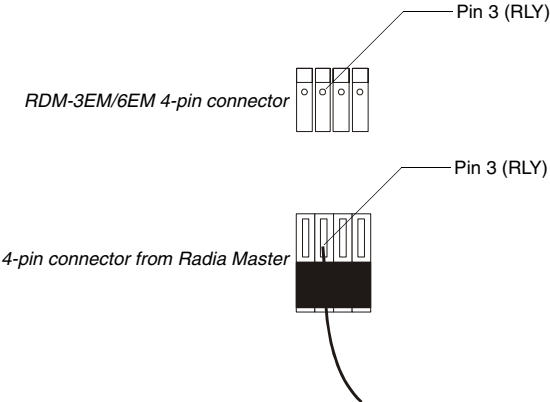


FIG. 4 RDM-3EM/6EM wiring connections - Connectors “B” through “F”

Connect the LINE IN and LOAD wiring on the (orange) 2-pin Channel connectors, as shown below:

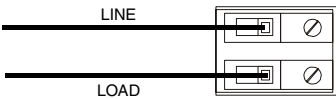


FIG. 5 2-pin Channel connectors

AMX Lighting Warranty Information

AMX Lighting products are guaranteed to switch on and off any load that is properly connected to our lighting products, as long as the AMX Lighting products are under warranty. AMX Corporation does guarantee the control of dimmable loads that are properly connected to our lighting products. The dimming performance or quality cannot be guaranteed due to the random combinations of dimmers, lamps and ballasts or transformers.