

Magic Module™ Programmable Controller

ELK-MM443

The MM443 is a programmable logic controller (PLC) with four analog or digital inputs and four relay outputs. It may be used as a stand alone controller in a vast array of applications from timers, door controllers, simple process controllers, multiple zone security controls, etc. or as a networked controller with up to 31 other modules connected on a common RS-485 data bus. The Magic Module supports transmitting and receiving commands from two way X-10® Power Line Carrier Devices. Also optional interfaces are available for reading Temperature, Clock/Calendar, Wiegand Proximity devices, Dallas iButton™ identification devices, and can be interfaced to Caddx NX Security Controls.

The Magic Module is programmed by a personal computer. The program is stored into re-programmable Electrically Erasable Programmable Read Only Memory (EEPROM memory). The ELK Starter Kit (ELK-MK400) or Programming Kit (ELK-MK485) contains components and software needed to program the Magic Module™.



Features

- Four analog or digital inputs.
- Four relay outputs (2 relay outputs may be jumper programmed for transistor open collector outputs).
- 16,384 program bytes using SIMPLE programming language.
- 4 general purpose Counters, range 0 to 255 counts.
- 4 general purpose Timers, range 1/10 second to over 255 hours.
- Networked to optional PC and up to 31 ELK-MM443's through a RS-485 data bus.
- X-10® Power Line Carrier Interface. PL513, PSC04 (Transmit Only), or TW523, PSC05 (Two Way).
- Analog transmission MM443 to MM443 and Preset Dim Commands.
- Dallas iButton™ TouchKey Reader with optional ELK-MA100 or ELK-MA290 interface.
- Programs the ELK-MM220 (two inputs, two relay outputs).
- Emulates ELK-MM220 for code development.
- Program stored in non-volatile EEPROM memory.
- Mounts to single or double gang electrical box.
- Optional DIN Rail Mounting. PCB mounts into 4 inch SnapTrack.
- Lifetime Limited Warranty.

Specifications

- Inputs: 4 analog, 0 to 13.6 volts, with jumper programmable 2k pull up resistor to 12V, or 2k pull down resistor to ground.
May be left floating.
Software programmable high and low threshold levels per input for end-of-line resistor circuits.
Input impedance (floating input) - 100k ohms.
- Outputs: 4 Form "C" relays, 10 Amps @ 120 VAC or 7 Amps @ 28 VDC.
Two relay outputs may be configured as open collector transistor outputs - 100 mA Max.
- Operating Voltage: 9.5 - 15 Volts D.C.
- Current Draw: 10mA Nominal, 130mA Maximum with all relays active.
- X-10® Interface: PL513, PSC04 or TW523, PSC05 - 4 wire RJ-11 telephone style.
- Data Bus: RS-485, max bus length - 4000 feet w/22 AWG wire.
- Enclosure: White plastic, 6.5"W x 4.375"H x 2"D.