

## INSTALLATION INSTRUCTIONS FOR M503ME STAND ALONE MICRO MODULE

### GENERAL DESCRIPTION

M503ME stand alone micro modules provide a two-wire initiating circuit for normally open contact fire alarm and supervisory devices. The circuit may be monitored for open-circuit and short-circuit wiring faults. An LED indicator output drive is provided to allow visual monitoring of the module's operating condition.

The M503ME is small enough to fit inside a single gang junction box behind the device being monitored. Its size and light weight allows it to be installed without the need to be rigidly mounted (see figure 1) however it is recommended that the screw fixing positions be used if possible, particularly in larger enclosures or where the installation is expected to be subject to vibration or movement.

### SPECIFICATIONS

Size	48mm (l) x 40mm (w) x 13mm (h) (excluding screw fixings and cables)
Weight	33g
Operating Temperature Range	-10°C to 60°C
<b>Note:</b> Do not install in locations where the normal ambient temperature range extends beyond 0° to 50°C for extended periods	
Operating Humidity Range	10% to 93% Relative Humidity, Non-condensing
Com. Line Supply Range	15 to 32 VDC
Max. Standby Current	300µA @ 24 VDC (no communication)
Max. Standby Current	375µA @ 24 VDC (communication once every 5 secs)
Supervisory Loop Current	100µA (normal)
Supervisory Loop Current (min)	150µA (short)
Initiating Circuit Line Requirements:	
Maximum Resistance	20 ohms

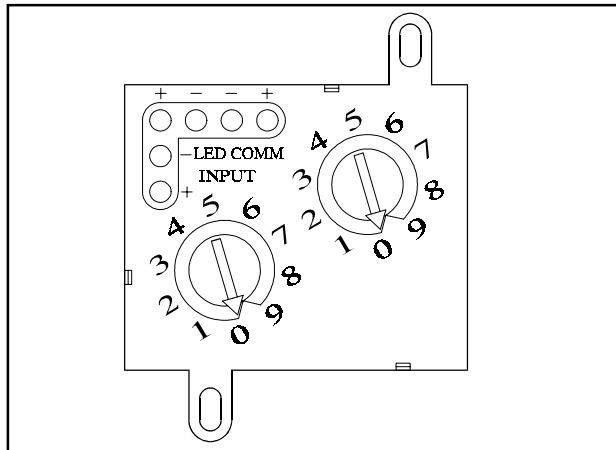


Figure 1. M503ME  
Stand Alone Micro-module.

### INSTALLATION

#### CAUTION

Do not connect circuit wiring to control unit or modules or apply any power to any portion of the system until after the circuit test has been performed.

**Note:** All wiring must conform to applicable local national codes and regulations.

1. Install module wiring in accordance with the design drawings and appropriate wiring diagram (see figure 2).
2. Set the address on the module per fire system design drawings.
3. Place the module in its desired mounting position.
4. Perform step one to three for all modules.

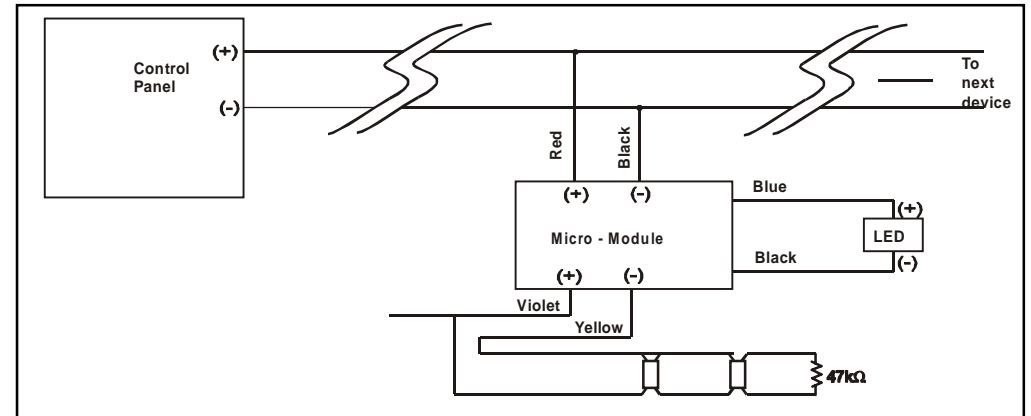


Figure 2. Wiring diagram for M503ME Monitor Module.

#### Notes:

1. The detection circuit is current limited to 230µA maximum. 24VDC nominal.
2. The detection circuit may help to monitor the following services:
  - a. Fire: automatic/manual waterflow alarm services with N.O. contact devices
  - b. Sprinkler supervision with N.O. contact devices.
3. Do not mix services.