TECHNO VERSIONS LLC

MeterMatch™

Alarm Output Options

Standard Configuration:

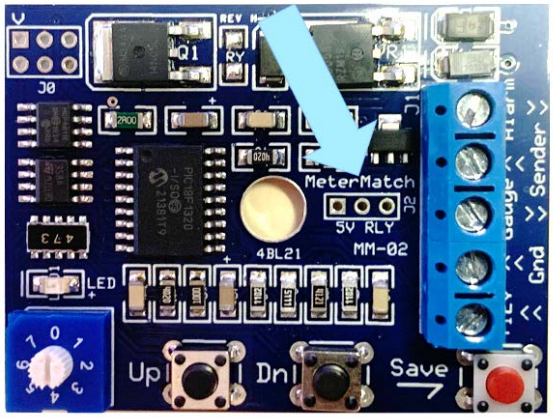
As shipped, the MeterMatch is designed to send a signal to flash an LED when alarm conditions are met. It can be configured to blink on less than, greater than, between, or outside of the programmed upper and lower limits. Output is via Pin 5 of the terminal strip.

In this case, the output is open-collector with a 402 Ohm series resistor to limit the current to about 30mA. The LED is connected with the anode side going to 12v, and the alarm output is connected to the LED cathode.

In the default mode, the alarm is blinking. To make it steady, perform this power-up sequence: power off, switch=7, hold down Save and Up buttons, then power on. It is a toggle, so repeating this sequence will turn it back to blinking.

Alarm Jumper:

To accommodate special needs, there is a series of three holes in the MeterMatch circuit board labeled J2, just to the left of the terminal strip. These can be used by either soldering a jumper between two adjacent holes, or installing a 3x1 header strip and using a removable jumper for configuration.



Voltage Output Configuration

If the two left holes of J2 are connected together (labeled **5V**), the alarm output pin can output regulated 5V power. This can be used to power a gauge or accessory. Output load should be small enough for the current to not exceed 500mA, which is ten Ohms.

When used in this configuration, the alarm should **not** be programmed to be active. Doing so could damage the MeterMatch alarm circuitry.

Relay Drive Configuration

In the relay drive configuration, the alarm output can be configured to drive a relay rather than an LED. To make this configuration, the right two holes of J2 (label **RLY**) are connected together.

A standard automotive relay can be wired with one side of the coil to +12v, and the other end of the coil to the MeterMatch alarm output. MeterMatch can accommodate up to 500mA of coil current. The MeterMatch has an internal snubber diode to prevent reverse EMF from the relay causing damage. It has an open-collector transistor output with no series resistance.

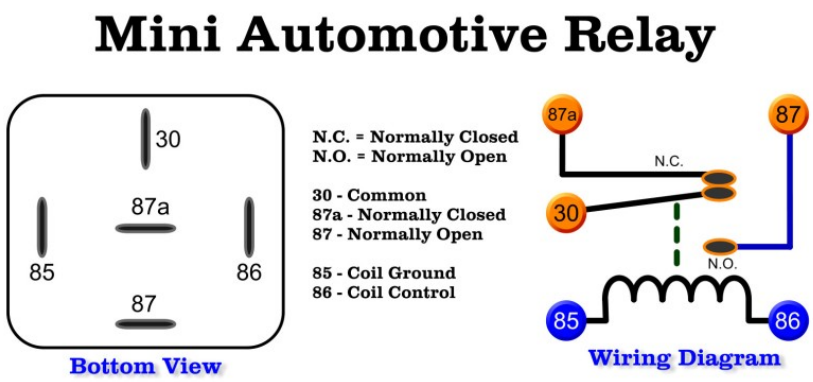
The alarm output is programmed as it would be for the LED, including steady or blinking.

Relay Wiring Example

In the relay drive configuration, a standard automotive relay can be used. These are available at any parts store, and look like this:

This relay has one set of contacts, but they are also available with two sets of contacts. In both cases the wiring is similar.

The relay wiring diagram is shown here:



And this is how it is connected if you wish to supply 12v to a load when the alarm is activated: