CARBON MONOXIDE DETECTOR

CMD5B1 SERIES

The CMD series carbon monoxide detector uses an electrochemical sensor to monitor the carbon monoxide level and outputs a factory calibrated 4-20 mA, 0-10 Vdc, or Modbus signal. Optionally, the device may be configured with an alarm relay.

PRODUCT HIGHLIGHTS

• 0-300PPM for analog and 0-500PPM for Modbus units.

• Analog outputs, 4-20mA or 0-10Vdc factory selectable

• Modbus RTU communication

• Coverage area of 700m2

• Optional form C relay with jumper selectable alarm point.

SPECIFICATIONS

|  |  |
| --- | --- |
| DESCRIPTION | ENGINEERING SPEC |
| SENSOR | CO Sensor, Electrochemical |
| AGENCY APPROVALS | Sensor is UL Recognized for ASNI/UL-2034 and UL-2075, E240671 |
| SAMPLE METHOD | Diffusion |
| MEASUREMENT RANGE | Analog: 0-300 ppm  Modbus: 0-500 ppm |
| ACCURACY | ±5 ppm or ±5% of reading (whichever is greater)  0 to 50°C (32 to 122°F), 15 to 95 %RH |
| STABILITY | <5% signal loss/year |
| RESPONSE TIME | <35 seconds for 90% step change |
| LIFE EXPECTANCY | 7 years in air |
| TYPICAL COVERAGE AREA | 700m2 (7500ft2) or 15m (50ft) radius |
| NON-RELAY MODEL | Power Supply: 24 Vdc ±20% or 24 Vac ± 10% (non-isolated half-wave rectified)  Consumption: 20 mA max  Output Signal: 4-20 mA loop-powered or 0-10 Vdc (factory calibrated)  Output Drive Capability @ 24 Vdc: Current - 550Ω max  Voltage - 10,000Ω min |
| RELAY MODEL | Power Supply: 24 Vdc ±20% or 24 Vdc ±10% (non-isolated half-wave rectified)  Consumption: 40 mA max  Output Signal: 4-20 mA sourcing or 0-10 Vdc (factory calibrated)  Output Drive Capability @ 24 Vdc: Current - 550Ω max  Voltage - 10,000Ω min  Relay Contacts: Form C contacts (N.O. and N.C.), 5 Amps @ 250 Vac, 5 Amps @ 30 Vdc  Relay Trip Point: 25, 60 and 150 ppm - jumper selectable  Relay Hysteresis: 3% or 9 ppm |
| COMMUNICATION NON-RELAY VERSION | Hardware: Isolated 2-wire RS-485 MS/TP  Software: Modbus RTU  Baud Rate: 9600, 19200, 38400, 57600, 76800 or 115200  Address Range: Modbus - 1-255 |
| OPERATING CONDITIONS | -20 to 50°C (-4 to 122°F), 0-90 %RH non-condensing |
| STORAGE TEMPERATURE | -20 to 60°C (-4 to 140°F) |
| ENCLOSURE | ABS, UL94-V, IP65 (NEMA 4X) 71mm W x 104mm H x 48mm D (2.8” x 4.1” x 1.9”) |
| COUNTRY OF ORIGIN | Canada |