

Electronic Corrosivity Monitor



Features:

- **Corrosion Rate, Relative Humidity, Monitors Temperature, and Differential Pressure**
- **High-Sensitivity Corrosion Rate Measurement**
- **Corrosion Rate of Copper and Silver Sensors Corresponds to ISA Classification of Environments**
- **Digital and Analog Outputs**
- **Optional Data logging**

The ECM™ is a multi parameter monitoring system providing constant surveillance of the environment and rapid detection of any deterioration that could result in damage to expensive equipment and valuable assets.

Early detection of humid, high temperature or corrosive conditions will permit corrective action to be taken before substantial damage occurs to sensitive computer and instrumentation systems or electrical equipment.

The system measures humidity, temperature, and the corrosive attack on two replaceable thin-film sensors. The corrosion rate is shown by indicator lights that correspond to the ISA classification of environments (G1 through GX) for copper and silver.

Analog and/or digital outputs of corrosion, humidity and temperature information provides remote alarming, display and recording. The information may also be stored in the on-board data logger, and accessed via PC software.

The system can also be used as a high-sensitivity corrosion monitor for special applications. The ECM™ is particularly useful for environmental monitoring in refineries, chemical plants, pulp and paper plants, control rooms, computer rooms, museums, and clean rooms.



Electronic Corrosivity Monitor

Specifications:

Measured Parameters

Corrosion: Two independent channels
Corrosion Rate: Rate time period user selectable: 1-99 hrs.
ISA Classification: G1 through GX
Temperature: +32°F to +122°F or 0°C to +50°C
Humidity: 10% to 95% RH
Differential Pressure: Optional differential pressure transmitter, 0-2 inches or 0-50 mm (H₂O) standard

Sensors

2,500 D nominal span (life). One copper and one silver provided with instrument. Other materials are available by special order.

Displays

LCD display of corrosion and corrosion rate for each channel, humidity, temperature, and room loss differential, pressure LED indicators corresponding to ISA environmental classifications

Alarms

Corrosion rate (2 channels), low temperature, high temperature, low RH, high RH, differential pressure, ISA environmental classification (2 channels)

Outputs

Analog: Five 4-20 mA outputs (current sinking or current sourcing) user assignable to desired parameters.
Digital: RS-232 or RS-485 serial output of all nine measured and calculated parameters. Multiple units can be connected on RS485 multidrop (daisy chain). Contact factory for information concerning real time monitoring software.

Data logging

Internal data logger accessed by software direct from PC.

Power Requirements

24 VDC, 115 or 220 VAC, 0.4 amps

Operating Temperature Range

+32°F to +122°F or 0°C to +50°C

Weight

5 lbs. (2.3 kg)

