

JR-1001 Intrinsically Safe

Single-Channel Temperature Data Logger

The JR-1001 is an Intrinsically Safe, simple and easy-to-use single-channel data logger. It is ideal for quick and accurate temperature recordings in a variety of applications.

APPLICATIONS

Flammable and explosive environments, military, oil & gas processing and transportation, pharmaceutical storage, laboratories, transportation of temperature sensitive goods.

GENERAL SPECIFICATIONS

Size: 33mm x 43mm x 20mm (1.3" x 1.7" x 0.75")

Weight: 35 g (1.23 oz)
Case Material: Polyurethane

Battery: 3.6 volt Lithium, 0.45 Amp-Hour

Resolution: 8-bit (1 part in 256)
Mounting: Magnetic backing
Clock Accuracy: ± 2 seconds per day

Sampling Methods:
Operating Limits:
PC Requirements:
First-in First-out, Stop When Full, Delay Start, or Spot & Average
-40°C to 85°C (-40°F to 185°F) and 0 to 95% RH (non-condensing)
Windows PC with at least one free USB or serial port (depending on

connection)

Software Requirements: TrendReader® Express or TrendReader® 2

(Compatible with Windows 2000 SP4, XP SP1 and Vista 32 bit)

Approval: Intrinsically Safe for use in Class 1, Div 1, Groups A, B, C, D, Class II, Div 1,

Groups E, F, G, Class III, Div 1 Hazardous

Memory Size: 32 KB (capable of storing up to 244,800 readings when data compression is

selected)

Sampling Rates: User selectable rates from 8 seconds to 34 minutes (readings stored to memory

can be spot or averaged over the sample interval, except for the 8-second interval)

Number of Channels: One (one internal channel for ambient temperature)

SENSOR SPECIFICATIONS

Temperature Sensor Type: NTC Thermistor - 10,000 Ohms @ 25°C (77°F)

Range: -40°C to 85°C (-40°F to 185°F)

Accuracy: $\pm 0.2^{\circ}$ over the range of 0°C to 70°C ($\pm 0.3^{\circ}$ C over the range of 32°F to 158°F)

Resolution: 0.4°C (0.7°F) @ 25°C; better than 1°C (1.8°F) between -25°C and 70°C (-13°F and 158°F); better than 2.0°C (3.6°F) between -40°C and -25°C

(-40°F and -13°F)