

SmartReader Plus 6

Eight-Channel Temperature Data Logger

The SmartReader Plus 6 data logger is ideal for monitoring temperature over a wide range. Easily and accurately record temperature from any J, K, S, T or E type thermocouple probe. With seven inputs for thermocouple probes and an on-board cold-junction thermistor, the SmartReader Plus 6 is one of the most versatile thermocouple data loggers available.

APPLICATIONS

Monitor performance of gas-fired heating equipment, verifying concrete curing temperatures, process verification, etc.

GENERAL SPECIFICATIONS

Size: 107mm x 74mm x 22mm (4.2" x 2.9" x 0.9")

Weight: 110 g (3.75 oz)
Case Material: Noryl® Plastic
Battery: 3.6 volt Lithium
Resolution: 12-bit (1 part in 4096)

Mounting: Magnetic backing or locking eyelet

Clock Accuracy: \pm 2 seconds per day

Sampling Methods: Continuous (First-in First-out)*, Stop When Full (Fill-then-stop)

*Not available with sample rates faster than eight seconds

Operating Limits: -40°C to 70°C (-40°F to 158°F) and 0 to 95% RH (non-condensing)

PC Requirements: Windows PC with at least one free USB or serial port (depending on interface)
Software Requirements: TrendReader® 2 (Compatible with Windows XP, Vista, Windows 7 and Windows 8

[32 bit & 64 bit])

Memory Size: 32 KB (capable of storing up to 21,500 readings)
(3 models available) 128 KB (capable of storing up to 87,000 readings)
1.5 MB (capable of storing up to 1,048,000 readings)

Sampling Rates: User selectable rates from 25 per second to once every eight hours (BP-101

battery pack or PS-201 power supply required for sampling rates faster than

eight seconds)

Number of Channels: Eight (one internal thermistor for cold-junction compensation and seven thermo-

couple inputs)

SENSOR SPECIFICATIONS

Internal Temperature Sensor

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

Range: -40°C to 70°C (-40°F to 158°F)

Accuracy: $\pm 0.2^{\circ}\text{C}$ over the range of 0°C to 70°C ($\pm 0.3^{\circ}\text{F}$ over the range of 32°F to 158°F) Resolution: 0.03°C (0.05°F) @ 25°C; better than 0.07°C (0.12°F) between -25°C and 70°C (-13°F and 158°F); better than 0.13°C (0.23°F) between -40°C and -25°C

 $(-40^{\circ} F \text{ and } -13^{\circ} F)$

Thermocouple Wire Resolution -50°C to 600°C (-55°F to 1100°F) 0.30°C (0.55°F) J Type -100°C to 1150°C (-145°F to 2100°F) 0.50°C (0.90°F) K Type 0°C to 1450°C (32°F to 2642°F) S Type 1°C (1.8°F) -200°C to 400°C (-325°F to 750°F) 0.40°C (0.75°F) T Type -50°C to 680°C (-58°F to 1250°F) 0.24°C (0.44°F) E Type

Accuracy: ±0.5% of range + resolution

ORDERING INFORMATION

 Item:
 Cat#:
 Item:
 Cat#:

 SRP-006-32K
 01-0013
 SRP-006-1.5M
 01-0151

 SRP-006-128K
 01-0122





