



## SmartReader Plus 10

### Four-Channel Temperature Data Logger

The SmartReader Plus 10 is a powerful and accurate RTD temperature logger designed for easy monitoring and recording of temperature. Any RTD probe or sensor with a TCR of 0.00385 can be used with this logger.

#### APPLICATIONS

Food process verification, pharmaceutical storage monitoring, transportation of temperature-sensitive goods, 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:	± 2 seconds per day
Sampling Methods:	Continuous (First-in First-out), Stop When Full (Fill-then-stop) <i>*Not available with sample rates faster than eight seconds</i>
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:	128 KB (capable of storing up to 87,000 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:	Four (one internal thermistor channel for ambient temperature and three external channels for use with RTD* temperature probes) *Any RTD with a Temperature Coefficient of Resistance (TCR) of 0.00385 can be used



#### SENSOR SPECIFICATIONS

**RTD Channels** - The following specifications are for:

- 4-Wire Platinum 100 Ohm @ 0°C & TCR = 0.00385
- 4-Wire Platinum 1000 Ohm @ 0°C & TCR = 0.00385

#### Temperature

Range:	-230°C to 300°C (-382°F to 572°F)
Accuracy:	±0.3°C (±0.54°F) + resolution or ±0.06% full scale (of logger)
Resolution:	±0.14°C (±0.25°F)

#### Resistance (100 Ohm)

Range:	5 to 210 Ohm
Accuracy:	±0.13 Ohm, ±0.06% full scale
Resolution:	±0.05 Ohm

#### Resistance (1000 Ohm)

Range:	50 to 2100 Ohm
Accuracy:	±1.3 Ohm, ±0.06% full scale
Resolution:	±0.5 Ohm

*Logger is Temperature compensated by internal temperature sensor for the range of -20°C to 80°C (-4°F to 176°F)*

#### ORDERING INFORMATION

<b>Item:</b>	<b>Cat#:</b>
SRP-010-128K	01-0132

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