



ThermoProbe Inc.



TL2-A

USB Interface
Reference
Thermometer

The TL2-A is a 2-channel precision bench top thermometer offering the convenience of sensor configuration through the USB port of your Windows computer. Coefficient entry from your keyboard makes it easy to change from a daily use RTD to a SPRT including user selectable choice of ITS-90 or Callandar-Van Dusen equations. Faceplate interface allows viewing of Highest, Lowest and Average Readings, Zero Offset adjustment for sensor drift and readings in C, F, K and Ohms. Also the TL2-A can log data to a PC or USB Flash drive.

Units come with 5 point resistance calibration from 20 to 425 ohms.

With available PRT(s) ThermoProbe can provide a temperature reference system.

A one year warranty, calibration report, USB cable, Flash drive, interface software and country specific power adaptor are included.

Instrument Features:

Two 5-pin DIN connector channels
Accepts 100Ω and 200Ω RTD, PRT or SPRT
Standard 5 Point Resistance Calibration:

Resistance	Accuracy
20Ω	+/-0.002°C
100Ω	+/-0.007°C
190Ω	+/-0.015°C
265Ω	+/-0.021°C
425Ω	+/-0.032°C

Switchable units °C, °F, °K or Ω

Resolution: 0.01 or 0.001 Degrees, 0.0001 Ohms

Temperature Range: -328°F to 1764°F (-200°C to 962°C)
-depending on sensor selection

ITS-90 or Callandar-Van Dusen Linearization equations

Large 0.5" (1.3cm) character LCD with backlight

Zero Offset adjustment

Temperature triggered SPDT relay output (Channel 1)

Stores and displays Average, Lowest & Highest readings.

Arrows indicating increasing/decreasing temperature.

Ambient operating range: 59°F to 86°F (15°C to 30°C)

Standard Sensors:

- 100Ω Precision wire wound platinum RTD
- 12"(30cm) sheath with 5ft(1.5m) cable
- 0.25"(6.35mm) diameter

Accuracy +/-0.05°F (0.03°C)

Standard 5 Point Temperature Calibration:

- 4°F(-20°C), 32°F(0°C), 120°F(49°C),
199°F(93°C) & 300°F(149°C)

Recommended Minimum Immersion Depth: 4.7" (12cm)

Custom sensor configurations & ranges available.

PC & Data Logging Features:

Data capture to USB Flash drive

- saved in CSV format (comma delimited)

Data capture to PC via HyperTerminal

Selectable logging intervals and polling mode

2-Channel Sensor coefficient entry

- via USB & included software

Construction:

Rugged powder coated steel enclosure with silicone buttons and a durable polyester graphics window.

Nominal Body Dimensions: 7.25 x 5.25 x 2.25"
(18.4 x 13.3 x 5.7cm)

TYPICAL APPLICATIONS

Distillations, temperature baths, melting point tests, flash point tests, reference, thermowells, provers, temperature calibration for flow meters.

Industries:

Laboratory
Pharmaceutical
Food
Pour Point Test

