

# SciTemp™ Temperature Sensors\* Pre-Calibrated Single-Use or Reuse



- Filtration
- Chromatography
- Fermentation
- Bag Manifolds

## SciTemp Cost Effective Temperature Flow Cells with Stored Sensor ID & Calibration Data

SciTemp monitors 2 temperature sensors and displays T1, T2 and Differential Temperature (DT).

- Pre-Calibrated
- NIST-Traceable
- Certified Calibration
- Gamma-stable
- Autoclavable
- NaOH stable
- Real-Time Documentation

Call **800-955-1993** to order SciLog in-line, single-use flow cells and SciLog's Automated, Optimized Bioprocessing Systems.

\*Patents Pending



Time	Temp 1	Temp 2	Diff. Temp	Alarm
00:00:00	23.90	22.90	1.00	
00:00:05	23.90	22.90	1.00	
00:00:10	23.90	22.90	1.00	
00:00:15	23.90	22.90	1.00	
00:00:20	23.90	22.90	1.00	
00:00:25	23.90	22.90	1.00	
00:00:30	23.90	22.90	1.00	
00:00:35	23.90	22.90	1.00	

Real-Time Data Collection

Try SciLog's family of pre-calibrated, single-use, in-line sensors\*:  
**Conductivity, Temperature, Pressure. Scale-up or Scale-down.**



## SciTemp Sensor Specifications: Flow Rate & Pressure Limits

CONNECTOR TYPE	PART # Packs of 5	Compatible TUBING SIZES	Max FLOW RATE*	Max PRESSURE
Luer	080-799PSX-5	ID 0.03" to 0.31"	1 liters/min	60 psi
3/8" Barb	080-794PSX-5	ID 0.31" to 0.38"	8 liters/min	60 psi
1/2" Barb	080-795PSX-5	ID 0.50"	17 liters/min	60 psi
3/4" Tri-Clover (TC)	080-796PSX-5	Tubing with 3/4" TC	31 liters/min	60 psi
1.0" TC "Ladish"	080-797PSX-5	Tubing with 1" TC Ladish	60 liters/min	60 psi

\*At 1.0 psi pressure drop across SciTemp flow-through sensor.

## SciTemp Flow-Thru Temperature Sensor Specifications

**Material, Fluid Contact:** Medical Grade Polysulfone meets USP Class VI and FDA 21CFR177.1520. All Wetted Materials are made of Animal-Free Compounds. Compatible with Most Sanitizing Agents such as NaOH, Hypochlorite. Sensors can be repeatedly autoclaved. Gamma Stable available.

**Sensor Type:** Thermistor, Epoxy-Coated, 2252 Ohms.

**Temperature Range:** -10 to +125 °C.

**Temperature Accuracy:** ± 0.10 °C in the 4.00 °C to 70.00 °C Range.

**Temperature Display Resolution:** Two Decimal Places: 0.01 °C.

**Sensor Cable & Connectors:** Lockable & Waterproof.

**Sensor Microchip:** EPROM, Stored Sensor ID and Cal Factor.

## SciTemp Temperature Monitor (Part #080-790) Specifications

**Power Supply:** Wall Transformer, 115/230 VAC.

**Monitor Display:** 2 Lines, 20 Characters each, Backlit.

**Data Entry:** Membrane Switch, 6 Keys.

**Standard Digital I/O:** RS-232.

**Sensor Inputs:** Up to Two SciTemp Temperature Sensors (T1 and T2) Hookups.

**Sensor Readout:** Display of Sensors T1, T2 as well as Differential Temperature (DT).

**Barcode Scanner Hook-up:** Optional, Allows Sensor ID and Cal-Factor to be scanned into Monitor.

## Monitor I/O

**Analog Outputs:** Three, 4-20 mA Outputs for Sensors T1, T2 and DT, 18 Bit Resolution.

**Alarm Outputs:** 3 TTL Switches, User-Selectable Hi/Lo Temperature Limit Settings for T1, T2 and DT.

## Software: User-Selectable Parameters

**Temperature Units:** °C, °F.

**Temperature Range, High:** 100 °C, Analog Out at 100%.

**Temperature Range, Low:** 0 °C, Analog Out at 0%.

**Serial Com:** BR=9600, WL=8, SB=2, PT=N.

**Alarm Outputs:** T1 Hi/Lo  
T2 Hi/Lo  
DT Hi/Lo

**Print Time:** User-Selectable, 1 to 60 Seconds.

**Time/Date:** All Data Printout with Time/Date Stamp.

**Parameter Lock-Out:** Requires Password.

**Re-Cal:** Custom Temperature Calibration.

## SciDoc Real-Time Documentation/Graphing

The screenshot displays the SciLog SciTemp Monitor software interface. It features a data table with columns for Time, Temp 1, Temp 2, Diff. Temp, and Alarm. The data shows a steady increase in temperature from 22.90 to 23.80 over a period of 100 seconds. To the right of the table is a form for documentation, including fields for Operator, Date, Time, Product Batch Number, Product Description, and Membrane details (Manufacturer, Type, Lot Number, Serial Number, Pore Size, Surface Area).

Time	Temp 1	Temp 2	Diff. Temp	Alarm
00:00:00	22.90	22.90	1.00	
00:00:05	23.90	22.90	1.00	
00:00:10	23.90	22.90	1.00	
00:00:15	23.90	22.90	1.00	
00:00:20	23.90	22.90	1.00	
00:00:25	23.90	22.90	1.00	
00:00:30	23.90	22.90	1.00	
00:00:35	23.90	22.90	1.00	
00:00:40	23.90	22.90	1.00	
00:00:45	23.90	22.90	1.00	
00:00:50	23.90	22.90	1.00	
00:00:55	23.90	22.90	1.00	
00:01:00	23.90	22.90	1.00	
00:01:05	23.90	22.90	1.00	
00:01:10	23.90	22.90	1.00	
00:01:15	23.90	22.90	1.00	
00:01:20	23.90	22.90	1.00	
00:01:25	23.90	22.90	1.00	
00:01:30	23.90	22.90	1.00	
00:01:35	23.90	22.90	1.00	