



Specifications

Resistance	Nominal 100Ω
Temperature Coefficient	0.00385Ω/Ω/°C nominal
Temperature Range	-200°C to 420°C (transition and cable temperature: 0°C to 150°C)
Drift Rate	±0.13°C at 0°C after 1000 hours at 400°C
Sheath Material	316 Stainless Steel
Leads	Teflon™-insulated, nickel-plated stranded copper, 22 AWG
Termination	Four gold-plated spade lugs are standard. Other options available. See Ordering Information.
Time Constant	Four seconds maximum for 63.2% response to step change in water moving at 3 fps.
Bending Radius	Sheath may be ordered with a bend on a minimum radius of 3/4" except for 2" area of sheath near tip.
Calibration	Includes NIST-traceable calibration and table with R vs. T values in 1°C increments from -196°C to 500°C (to 300°C for Model 5627-6). ITS-90 coefficients included.
Immersion	At least 4" recommended
Accuracy (includes calibration uncertainty and short-term stability)	±0.050°C at -196°C ±0.050°C at 0°C ±0.051°C at 200°C ±0.055°C at 420°C
Size	5627-12: 12" L x 1/4" Dia. 5627-9: 9" L x 3/16" Dia. 5627-6: 6" L x 3/16" Dia.

Precision Industrial RTDs

Model 5627

Vibration and shock resistant

3/4-inch bend radius for increased durability

NIST-traceable calibration included

When buying an RTD, performance isn't the only criterion you need to look at. The issue really is price-to-accuracy and price-to-durability ratios.

The Model 5627 probes have a temperature range up to 420°C and an accuracy as good as ±0.05°C. They come in three different lengths. Each instrument is shipped with its ITS-90 coefficients and a calibration table in 1°C increments.

One of the best features of this sensor is that it conforms to the standard 385 curve, letting you use your DIN/IEC RTD meters fully. Why use a probe that's less accurate than your meter?

The Model 5627s are manufactured using a coil suspension element design for increased shock and vibration resistance. It has a mineral-insulated sheath with a minimum bend radius of 3/4-inch for flexibility and durability. (Bend, if any, should be specified at time of order.)

Six-inch 5267s are calibrated at -196°C, -38°C, 0°C, 200°C, and 300°C. For 9-inch and 12-inch versions, an additional point is added at 420°C.

Each probe is individually calibrated and includes a report of calibration from the manufacturer. Contact Hart for calibration in Hart's NVLAP accredited lab.

This probe is an excellent value. It has the price-to-accuracy and price-to-durability ratios you should demand in every RTD you buy!



Read about our accredited calibration services on page 156.



Don't forget a protective case.

Ordering Information

5627-6-X	Secondary PRT, 6" x 3/16", -200 to 300°C
5627-9-X	Secondary PRT, 9" x 3/16", -200 to 420°C
5627-12-X	Secondary PRT, 12" x 1/4", -200 to 420°C
2601	Protective Case

X = termination. Specify "B" (bare wire), "S" (spade lugs), "D" (5-pin DIN for Tweener Thermometer), or "I" (INFO-CON for 1521 or 1522 Handheld Thermometer).