

TS22545 Series Thermistor Bolt Sensor

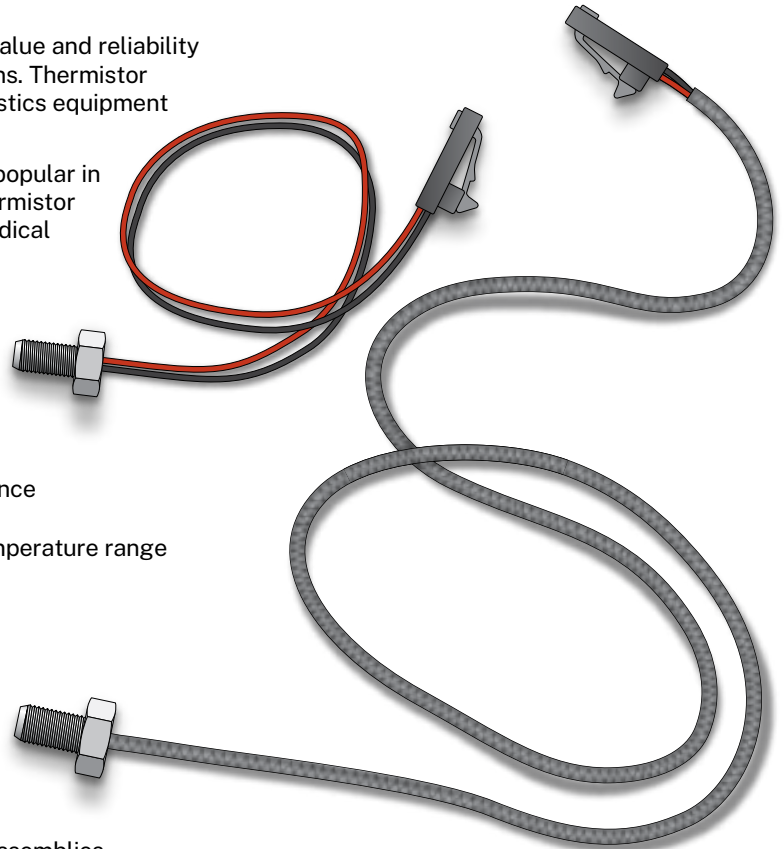
Thermistor probe for medical temperature measurement applications

Overview

Minco temperature sensors deliver unmatched performance, value and reliability to meet the demanding requirements in a variety of applications. Thermistor sensors offer high sensitivity and accuracy for medical diagnostics equipment and many other applications.

The versatility of bolt style temperature sensors makes them popular in a wide variety of applications throughout many industries. Thermistor configurations are most popular for their high sensitivity in medical equipment, while platinum RTD configurations are popular in industrial equipment for the extended temperature range.

- Temperature range: -50°F to 250°F (-45.6°C to 121.1°C)
- 167°F (75°C) max continuous for best stability
- Accuracy +/- 0.18°F (0.10°C) up to 122°F (50°C)
- Optional connector for easy installation
- M4 and larger bolt styles
- Stainless steel cases for high strength and corrosion resistance or aluminum cases for faster thermal conductivity
- Platinum RTD configurations also available for extended temperature range



Diagnostics Applications

Minco understands the critical requirements of your applications. Thermistor sensors are used to monitor reagents, chambers, enclosures, and ambient environmental temperature. Bolt sensors are also easily installed into heat-sinks to provide temperature feedback for PCR process control.

- Small bolt profile offers low thermal mass for fast time response and installation into small heatsinks and thermal assemblies
- Thermistor sensors are suitable for integration with many popular control systems
- Easily removed for periodic calibration to maintain quality standards

Additional Capabilities

Minco's broad development, integration, and assembly capabilities make us more than just a sensor supplier. We can optimize functional and packaging efficiency, and provide greater design flexibility for your application. We offer the following services:

- Comprehensive development support
- Seamless integration of sensors, heaters, flex circuits, controllers, transmitters, and other electronics
- Broad-based assembly capabilities

Thermistor Bolt Configuration Guide

Customize the sensor to best fit application needs

Consult with the following table to configure your TS22545-series bolt sensor and determine its Minco part number.

TS22545	Thermistor Bolt Sensor				Probe Type	
↓	0	0 M4x0.7 – 0.093" (2.36mm) hex			Bolt Size	
	1	1 M5x0.8 – 0.101" (2.57mm) hex				
	2	2 M6x1.0 – 0.125" (3.18mm) hex				
	3	8-32 UNC – 0.093" (2.36mm) hex				
	4	10-32 UNF – 0.101" (2.57mm) hex				
	5	1/4-20 UNC – 0.125" (3.18mm) hex				
↓	TA	2,252 Ohms at 77°F (25°C), Beta0-50 = 3892K			Sensing Element	
	TD	10,000 Ohms at 77°F (25°C), Beta0-50 = 3892K				
	TQ	30,000 Ohms at 77°F (25°C), Beta0-50 = 3892K				
↓	6	Specify in whole inches; standard lengths: 6" (0.15m); 12" (0.3m); 36" (0.9m); 60" (1.5m) Lead Length			Lead Length	
↓	S	PTFE insulated leads, copper braid shielding, drain wire and FEP jacket overall			Lead Wire Type	
	T	PTFE insulated leads, no jacket				
↓	N	No connector			Connector Option	
	C1	Connector Terminal, AMP 104257-1 (2 contacts)				
TS22545	2	TD	6	S	C1	Sample Part Number