



# MST01 Pt100 Temperature Sensor

🌡️\* -200~200°C  
Ultra-Low Temperature Monitoring



## 🔧 Customizable Probes

Various custom options are available, including FEP wire length, probe material and length, and temperature range.

## 🌡️\* Ultra-Low Temperature Capabilities

The sensor supports extreme low-temperature monitoring, with different probes covering -40 ~ 180°C and -200 ~ 200°C. The range can be customized as needed.

## 📊 Real-Time Data Visualization

Displays stored data status, including max, min, and average values, and whether data is within thresholds. Temperature data can be visualized via an app and exported to Excel.

## 📄 Large Local Data Storage of 20,408 Logs

Capable of storing up to 20,408 logs, ensuring comprehensive data collection and minimizing the risk of data loss.

## 🍴 Food-Grade Probes

Made from food-grade materials, the MST01 Pt100 temperature sensor is perfect for sensitive environments requiring strict hygiene standards.

## 🎯 High-Precision Monitoring

Utilizes a 4-wire Pt100 sensor with Class A accuracy for precise temperature measurements, along with a calibration report.

## ⚙️ Configurable Temperature Thresholds

Users can set multiple temperature thresholds to receive immediate alerts when limits are exceeded, allowing for timely adjustments.

## 🛡️ IP67 Dust and Water Resistance

Built to withstand harsh environments, the MST01 is fully protected against dust and water, making it ideal for industrial high-performance applications.

## PRODUCT INTRODUCTION ▶

Minew's MST01 Pt100 Temperature Sensor is a Bluetooth device designed for **precise temperature monitoring and threshold alarms**. It excels in high and low-temperature environments, making it ideal for industries like food, medical, vaccine, and biological sectors. The MST01 stands out with its **customizable probes**, offering flexibility to match different cable lengths and temperature ranges, ensuring it's perfectly suited for any application.

Crafted from **food-grade materials**, the MST01 is safe for use in sensitive environments, including food processing and storage. With 24/7 monitoring, users can set multiple **custom temperature thresholds** and receive **instant alerts** if any are breached. The sensor's large local storage capacity ensures you won't lose critical data, keeping your operations running smoothly.

## BASIC SPECIFICATIONS

Model



MST01-09



MST01-10

Body size:	75 x 66.5 x 27mm (without bracket)	
	82 x 66.5 x 31.3mm (with bracket)	
Probe:	Φ 4 x 70mm	Φ 5 x 150mm
Wire:	Φ 3 x 1000mm	Φ 3 x 1000mm
Temp. range:	-200°C~200°C	-40°C~180°C
Accuracy:	± 0.5°C(-70~130°C)	± 0.5°C(-40~130°C)
	± 1°C(-130~180°C)	± 1°C(other ranges)
	± 2°C(other ranges)	
Bluetooth chipset:	Nordic nRF52 series	
Broadcast range:	Up to 150 meters (open area)	
Protection:	IP67	
Battery:	1 lithium battery; 2,700 mAh	
Battery lifespan:	3years (default configuration)	
Sensor:	Pt100	
Button:	2 buttons	
Buzzer:	Supported	
OTA:	Supported	
Configure App:	MSensor	

## APPLICATIONS ▶

Ultra-low temperature storage technology is widely used in the medical and food industries. It provides more effective preservation of living tissues, biological samples or seafood, and ensures the freshness. Minew's MST01 series can reach temperatures as low as -200°C, meeting the ultra-low temperature recording needs of various industries.

