ET3916 / ET3916T Multi-Channel Temperature Detectors

ET3916 Series (Thermocouple) · ET3916T Series (High Resolution)



翻页，翻页时间多档位可选。

OVERVIEW

The ET3916 series multi-channel temperature detectors offer a clear interface, flexible operation and large-volume temperature data storage. They accept 8 thermocouple types (J, K, T, E, S, N, B, R) and meet the needs of production lines, laboratories and R&D departments — lighting appliances, power tools, household appliances, motors, electric heating appliances, pharmaceutical, petrochemical, chemical, metallurgy and electric power industries, research institutes and quality-inspection departments. The ET3916T series is the high-resolution edition with 0.01 °C display resolution and the same accuracy as the ET3916 series.

FEATURES

- 5-inch industrial true-colour LCD
- High-speed, high-performance 32-bit ARM microprocessor — simultaneous multi-channel acquisition, recording, display and alarming
- Each measurement module supports 8 channels, up to 64 channels; module count configured to requirements
- Data displayed as numeric values, curves and bar graphs; numeric interface shows 4 / 8 / 16 / 32 channels at once with auto page-turning (selectable intervals)
- 6-digit display, range −999.99 to 9999.99
- Built-in GB2312 Chinese character library with full-pinyin input
- Per-channel parameter settings: high/low alarm limits, temperature calibration, display unit and free naming
- Audible and visual alarm when a measured temperature exceeds its set limits; relay alarm output optional
- Hardware real-time clock with lithium-battery backup; maximum clock error ±1 min/year
- Channels isolated from each other, strong anti-interference; isolation voltage peak up to 400 V
- History data stored on an 8 GB FLASH memory chip; export via USB flash drive
- USB Host and USB Device ports: USB Host exports history data, USB Device communicates with a computer

TECHNICAL PARAMETERS

Item	ET3916 Series	ET3916T Series
Models	ET3916-08 / -16 / -24 / -32 / -48 / -64	ET3916-08T / -16T / -24T / -32T / -48T / -64T
Channels	8 to 64 channels (8 per module)	
Measurement range	60 mV	
Accuracy	0.05 % FS	0.05 % FS
	0.1 °C	0.01 °C

Item	ET3916 Series	ET3916T Series
Temperature display resolution		
Supported thermocouple types	K, J, T, E, S, N, B, R (see thermocouple sheet below)	
Cold-junction compensation accuracy	±0.5 °C	
Measuring speed	Slow 1 s/channel, medium 0.5 s/channel	
Display modes	Numeric values, curves, bar graphs	
Calibration	Isolated correction factor for each channel	
Alarm	Isolated alarm setting (upper-upper, upper, lower, lower-lower limits)	
Data record interval	1 s	
Data storage	8 GB	

THERMOCOUPLE SHEET

Type	Temperature Range	ET3916 Accuracy	ET3916 Resolution	ET3916T Accuracy	ET3916T Resolution
K	−200 to 1372 °C	±0.8 °C	0.1 °C	±0.8 °C	0.01 °C
J	−200 to 1100 °C	±0.7 °C	0.1 °C	±0.7 °C	0.01 °C
T	−100 to 400 °C	±0.5 °C	0.1 °C	±0.5 °C	0.01 °C
E	−50 to 830 °C	±0.5 °C	0.1 °C	±0.5 °C	0.01 °C
S	−50 to 1760 °C	±2 °C	0.1 °C	±2 °C	0.01 °C
N	−200 to 1300 °C	±1 °C	0.1 °C	±1 °C	0.01 °C
B	600 to 1820 °C	±2.4 °C	0.1 °C	±2.4 °C	0.01 °C
R	−50 to 1768 °C	±2.1 °C	0.1 °C	±2.1 °C	0.01 °C

Accuracies exclude the error of the thermocouple itself and of cold-junction compensation.

GENERAL INFORMATION

Power supply	AC 220 V ±10 %, or AC 110 V ±10 %, 45–65 Hz
Display	5-inch industrial true-colour display, 854 × 480
Working temperature	0 °C to 40 °C
Storage temperature	−10 °C to 70 °C
Relative humidity	< 80 %
Communication ports	USB Device, USB Host (standard); RS232, relay alarm output (optional)
Dimensions	260 × 300 × 100 mm (L × W × H)