Pt100-Temperature-Relay TR1200

12 Sensors, Interface RS485

TR1200



Part number:
T224095 AC/DC 24-240 V

12-channel Temperature-Relay for Sensors Pt100 (RTD)
Temperature-relays TR1200 measure the temperature of up to 12 sensors within 199…+850 °C and provide the data at an interface RS485 for external evaluation. With its universal power-supply AC/DC 24-240 V it can be connected to all common supply-voltages.
The TR1200 provides the data as Modbus-RTU-protocol or according to the ZIEHL-standard.

With protocol ZIEHL-standard it can replace two ZIEHL TR600.

The TR1200 is used where temperatures of many sensors Pt100 shall be evaluated by a device with input RS485. TR1200 itself does not monitor temperatures for limits. For direct monitoring of temperatures our devices with alarms and output relays are recommended.

Applications are e.g. monitoring of
- motors and generators (windings, bearings, coolant, ambient temperature)
- transformers (windings, core, ambient temperature)
- machines, plants and equipment

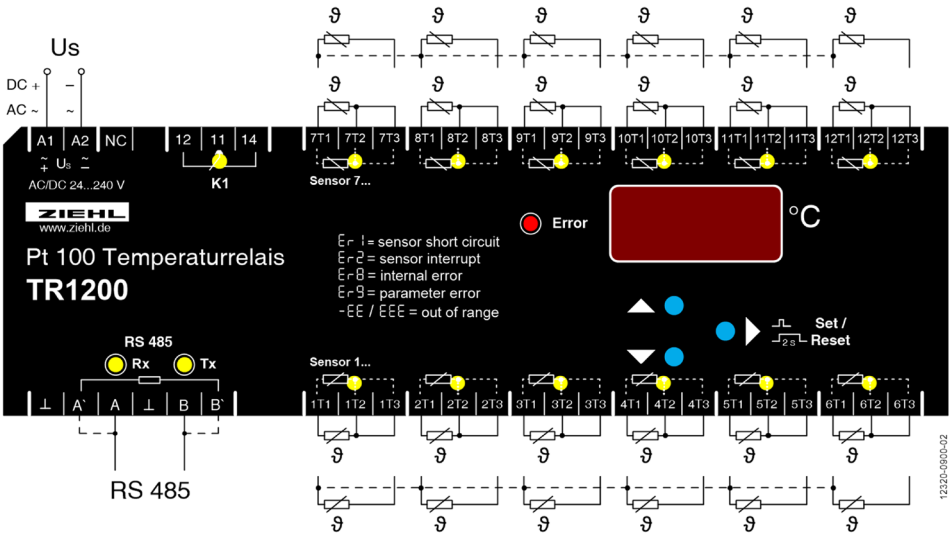
Features

Sensors and Displays:
- 12 inputs for sensors Pt100 (RTD)
- Connection 2- or 3-wire unneeded inputs can be switched off
- Monitoring of sensors for short-circuit and interrupt
- 3-digit-display for temperature
- LEDs for assigning the measured value, error, state of relay and interface

Interface:
- Interface RS485 (protocols ZIEHL-standard and Modbus-RTU)
- Baud rate (4800/9600/19200) and Parity-Bit
- selectableProtocols see operating-manual on www.ziehl.de
- Relay for Error (1 co-contact) for sensor-error and operational failure

More Features:
- easy operation and selection of temperatures at the device
- Sensor-simulation
- Code-protection against manipulation of settings
- Universal supply-voltage AC/DC 24…240 V
- Housing for switchgear-mount, 140 mm wide, mounting-height 55 mm
- Mounting on DIN-rail 35mm or with screws M4 (option)

Software for operation (download from www.ziehl.de)
- Software (Modbus) for programming the inputs
- Logging-function (with connected PC only)
- Hardware for every TR1200: PC with USB or RS232 interface + RS485-RS232 converter (depending on the interface)
- Software: Win7/Win10 and Excel 2010-2016



Technical Data TR1200

Rated Supply Voltage Us	AC/DC 24-240 V, 0/45...65 Hz, < 5 VA DC: 20,4...297 V, AC: 20,4...264 V
Relay output	1 change-over contact (CO) type 2, see "general technical informations"
Measuring inputs	12 x Pt100 (RTD) acc. to EN 60 751 / IEC 60 751
Measuring time sensor	0,25...3s (depending on number of sensors)
Measuring range	-199°...850°C
Resolution	1°C
Tolerance	± 0,5% of value ± 1 K
Sensor-current	≤ 0,8 mA
RS485 interface	
Adress of device	0...96
Baud rate	4800, 9600, 19200 baud
Parity	N, O, E (non, odd, even)
cable-length	max. 1000 m at 19200 baud
Testing conditions	see "general technical informations"
Rated ambient temperature range	-20°C...+65°C
Housing	Design V8
Dimensions (W x H x D)	140 x 90 x 58 mm, mounting height 55 mm
Protection housing/terminals	IP 30 / IP 20
Attachment	DIN-rail 35 mm acc. to EN 60715 or screws M4 (option)
Weight	app. 350 g