ETB 200 temperature limiter with TF 24 temperature sensor

The ETB 200 temperature limiter monitors the temperature of process liquids in systems to a set limit value. If this value is exceeded, the integrated relay (AC 230/2A with fuse) switches to a safe operating state and the backlighting of the LC display changes from white to red.

The operating state of the temperature limiter is easy to determine based on the colour of the display. If the monitored temperature falls below the set limit value, in accordance with DIN EN 14597 for temperature limiters, the reset must be carried out manually on the device. An external release button can be connected as an option.

A further switching relay is available in addition to the main relay. This can be used as an advance alarm across an adjustable temperature, before the limit value is reached. Using the active analogue output (0/4...20 mA or 0/2...10 V DC), the measured temperature can be queried and evaluated via a PLC, for example.

Installing the device in the switch cabinet is especially simple thanks

to the power consumption of 5 VA and the integrated widerange power supply with a supply voltage of 20...250 V AC/DC.

The temperature limiter is installed in the switch cabinet on a top hat rail. The wiring is carried out using screw terminals with a max. cross-section of 2.5 mm². The permissible ambient temperature is -10...+55°C. The slimline polyamide housing measuring 22.5 x111x115mm (W x H x D) has protection rating IP 20.

The limiter temperature can be easily set via the switch on the front and is displayed on the clear, alphanumeric LC display. The maximum measuring range is -100...600°C (0.2% accuracy relative to the size of the measuring range), whereby the temperature sensor being connected covers a temperature usage range of -20...200°C.

The temperature sensor approved by TÜV in compliance with DIN EN 14597, in combination with our certified TF 24-160/SMG00-M temperature sensor, represents a standardscompliant temperature limitation system. The electronics



Temperature limiter ETB 200

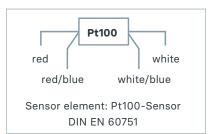
have been tested for electromagnetic compatibility in accordance with EN 61326 and provide functional safety conforming to SIL 2 in accordance with EN 61508.

The Pt100 sensor element in 4-conductor technology is located in a flexible protective tube made from the fluoropolymer PFA with a diameter of 6 mm and a nominal length of 1.6 m.

The small MG 00 plastic housing (protection rating IP 64) at the end of the PFA protective tube permits problem-free connection of a line. The maximum usage temperature of the temperature sensor is 200°C.



Temperature sensor with flexible protective tube





Type name	Article number
ETB 200	3496000001
TF 24-160/SMG00-M	3932440001