

THERMOSTATS SERIES TH 20

Description

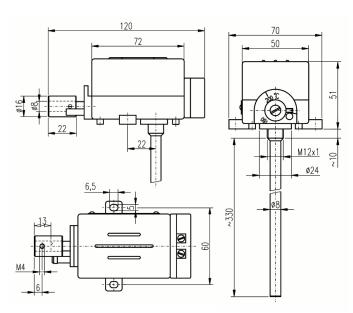
TH 20 series thermostats are temperature dependent single pole switches, working on principle of thermal expansion of two different metals. The temperature sensitive element is the thermostat stem consisting of a steel tube for the TH 20 and a brass tube for the TH 20/7 and TH 20/8. The thermostats are manufactured in expandable (two-clamp) version.

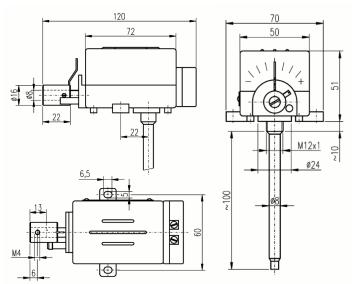
Method of application

The thermostat is used to switch electrical circuits, but not as the main switch. The TH 20 thermostat is designed for AC voltage. During installation, the stem must not be mechanically stressed and must be positioned so that it can expand freely. TH 20, 20/7, 20/8 for temperature control in non-portable ovens. Other uses must be consulted with the manufacturer. To install the TH, follow the instructions in the manual of the device in which the TH is installed.

Dimensional drawings

TH20 TH 20 ZP 7/8





Technical data TH 20 TH 20/7 TH 20/8 80÷320°C 80÷320°C 80÷320°C **Control range** Rated sensitivity 1÷12 K 5÷45 K 5÷45 **Setting accuracy** ±16°C at 200°C ±25°C at 140°C ±25°C at 170°C 10 A, 250 V~ 10 A, 250 V~ 10 A, 250 V~ **Terminals load** Weight 0,45 kg 0,35 kg 0,35 kg IP rating IP 20 IP 20 **IP 20** Permissible temperature of 0÷120°C 0÷120°C 0÷120°C the head



Effect on other products

As a result of the operation of the contacts of the TH 20, there is a short-term voltage fluctuation on the terminals which is superposed to the power supply wave shape.

Installation

Installation and connection of the thermostat to the electrical circuit may only be carried out by a person qualified according to Decree No. 50/1978 min. §6 or by a professional service worker. The following recommendations must be followed during installation:

- The thermostat does not have a separate earth terminal, therefore a reliable conductive connection must be guaranteed to the oven frame, which is earthed as a whole
- The thermostat must be installed in such way that it is not damaged during installation or adapted to the installation conditions. Particular care must be taken to ensure that the thermostat stem is not bent or dislodged from the base plate
- Installation is done with two screws behind the tabs in the thermostat head
- Thermostats are IP 20 rated and therefore must be installed in equipment that provides additional protection
- Thermostats must be installed in AB5, AE1, AM1, AN1, BE1 environments that are free from fumes or gases of chemicals that may damage thermostat parts
- The thermostat switch is designed for electrical circuits with ohmic loads up to a minimum power factor of 0,95
- When mounting, it is necessary that the lower part
 of the switching head is about 2 cm away from the
 wall of the body and this space is filled with an
 insulating substance so that the temperature of the
 switching head does not exceed 120°C

Storage conditions

Storage can be done in closed ventilated areas in the temperature range 0-40°C and relative humidity max. 80%. Storage and handling must not cause mechanical damage to the instrument. The thermostats must be handled gently, without strong shocks and impacts. The storage room must be free of harmful gases.

Disposal

Dispose of a TH as follows: Dispose of the raw materials collection

Possible minor faults and their removal

Thermostat faults are repaired exclusively by the manufacturer.

Warranty

Provided that the thermostat is installed, wired and used in accordance with the instructions in the installation and operating instructions, the manufacturer warrants the thermostat in accordance with the applicable code, unless otherwise agreed.

The manufacturer will refuse warranty repairs if the unit has been damaged:

- During transport and storage by the customer or his customers
- During installation or dismantling in the equipment of the customer or his customers
- In case of improper handling and installation in equipment other than that specified in the instructions
- If the thermostat has been exposed to an environment other than specified in the instructions

Warranty and post-warranty repairs

Warranty and post-warranty repairs are provided by the manufacturer. Pack the defective product and send it to the following address:

APATOR POWOGAZ CZECHIA s.r.o.

Havlíčkova 919/24 787 01, Šumperk Czech Republic

Tel.: 583 718 261

E-mail: <u>prodej@metra-su.cz</u> www: <u>www.metra-su.cz</u>