# Temperature switch Model TSM-550

Switzer data sheet TSM-550

### **Applications**

- Pumps, filters
- Lubrication system, hydraulic system
- HVAC
- Circuit breakers
- Turbines

### **Special features**

- Wide adjustable range
- Adjustable on-off differential
- Sturdy snap action switch
- Repeatability ±1%
- Weatherproof to IP67



# Description

The TSM-550 is used in industrial contol, monitoring and alarm applications.

The switch point can be specified by the customer on site.

The instrument can switch electrical loads of up to AC 230V, 10A.

The TSM-550 temperature switch offers many application possibilities with non-corrosive media.

#### Temperature switch, model TSM-550



## Standard version

Switch enclosure Cover: ABS Plastic Housing: Polyester (DMC) Repeatability ±1 % of full scale value

Permissible ambient temperature -40  $^{\circ}\text{C}$  ... +70  $^{\circ}\text{C}$ 

Permissible medium temperature Refer range table

Measuring system Vapor filled thermal system with Phosphor bronze / SS bellows

Wetted parts
Copper bulb (standard)

SS bulb (optional)

Range Refer ordering matrix

Switch contacts One SPDT contact system **On-off differential** Adjustable

Electrical rating ■ AC-1: 10A, 230V 50/60 Hz ■ AC-15: 4A, 230V 50/60 Hz

Electrical entry 1/2" NPT(F)

Ingress protection IP67

**Mounting** Wall, panel

Weight Approx. 700 grams

## Ordering matrix

Range in °C	Capillary Length Meters (M)	Adjustable differential		Maximum working temperature
		Contact system		
		At min. temp	At max. temp	in deg C
25 90	3, 5, 8	2.4 10	3.5 20	300
70 150	3, 5, 8, 10, 12	6 25	1.8 6	215
120 215	3, 8, 10, 12	7 30	1.8 9	260
150 250	3, 5, 8, 10, 12	6.5 30	1.89	300
200 300	3, 5, 8, 10, 12	5 25	2.5 10	350

★ In range 120 ... 215°C and 150 ... 250°C Capillary length 3 & 8 are non-standard thermal system. Available only on extended delivery basis. 10 & 12 Meters long thermal systems are available on request. Contact sales for price and delivery

## Ordering matrix continued

#### Sensing element

Tin plated copper bulb and copper capillary with stainless steel armour on capillary

#### **Capillary length**

3 meters

5 meters

8 meters

Special

#### **Contact version**

One SPDT contact system.

One SPDT microswitch

DPDT microswitch

#### Switch enclosure

ABS, plastic cover with polyester housing, weatherproof to IP67 as per IS/IEC:60529-2001 (standard)

Aluminium, powder coated cover with Die cast aluminium housing, weatherproof to IP67 as per IS/IEC:60529-2001

#### Model Number to be ordered as below



#### Example

Model: TSM-550

Range: 25 ... 90°C

Capillary length: 5 meters

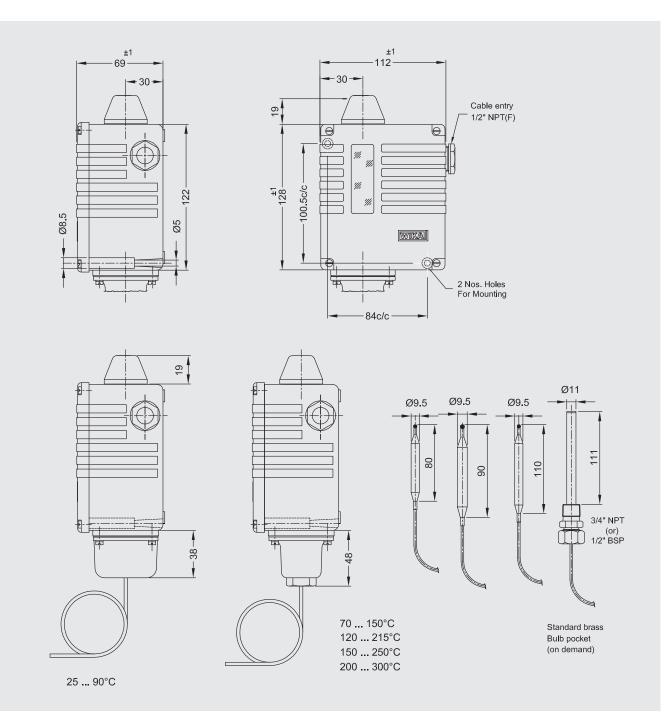
Contact version: One SPDT contact system

Switch enclosure: ABS, plastic cover with polyester housing, weatherproof to IP67 as per IS/IEC 60529-2001 (standard)

### **Bulb details**

Range	Capillary Length	Bulb dia	Blub length	
in °C	Meters (M)		Copper	SS
25 90	3, 5, 8	9.5	80	69
70 150	3, 5, 8, 10, 12	9.5	80	69
120 215	5, 8, 10, 12	9.5	110	102
150 250	3, 5, 8, 10, 12	9.5	110	102
200 300	3, 5, 8, 10, 12	11	Not available	102

### **Dimensions in mm**



#### Ordering information

Model / Range / Capillary length / Contact version / Switch enclosure

The specifications given in this document represent the state of engineering at the time of publishing. We reserve the right to make modifications to the specifications and materials.

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