

# Thermal control

## Selection guide mechanical version

### Control temperature

#### Control a resistance heater or an alarm



NC thermostat

Setting range	Display	Contact	Application	Control element	Interrupting capacity (resistive load)	Reference
0...+60 °C	°C	O	Heat	Bimetal	30 W DC 120 V AC; 15 A 250 V AC; 10 A	NSYCCOTHC
+32...+140 °F	°F					NSYCCOTHCF

#### Control a fan or an alarm



NO thermostat

Setting range	Display	Contact	Application	Control element	Interrupting capacity (resistive load)	Reference
0...+60 °C	°C	NO	Ventilate	Bimetal	30 W DC 120 V AC; 15 A 250 V AC; 10 A	NSYCCOTH0
+32...+140 °F	°F					NSYCCOTH0F

#### Control a resistance heater and a fan



Double thermostat

Setting range	Display	Contact	Application	Control element	Interrupting capacity (resistive load)	Reference
0...+60 °C	°C	NC + NO	Heat / Ventilate	Bimetal	30 W DC 120 V AC; 15 A 250 V AC; 10 A	NSYCCOTH0D
+32...+140 °F	°F					NSYCCOTH0DF

#### Control a resistance heater or a fan



Thermostat with inverse contact

Setting range	Display	Contact	Application	Control element	Interrupting capacity (resistive load)	Reference
0...+60 °C	°C	Inverse	Heat or ventilate	Bimetal	Closing: 30 W DC 250 V AC; 5 A Opening: 30 W DC 250 V AC; 10 A	NSYCCOTH0I
+32...+140 °F	°F					NSYCCOTH0IF

# Thermal control

## Selection guide electronic version

### Control temperature

#### Control a resistance heater or a fan



Electronic thermostat

Setting range	Display	Power input	Application	Control element	No. of relays	Interrupting capacity (resistive load)	Reference
+5 °C...+50 °C	°C or °F	9-30 V AC/DC	Heat or ventilate	Electronic	2	8 (5) A 230 V AC 5 A 30 V DC	NSYCCOTH30VID
		110-127 V AC					NSYCCOTH120VID
		220-240 V AC					NSYCCOTH230VID

7 different operating modes.  
Option of installing one or two external sensors.

### Control temperature and relative humidity



Electronic hygrotherm

Setting range	Display	Power input	Application	Control element	No. of relays	Interrupting capacity (resistive load)	Reference
+5 °C...+50 °C	°C or °F	9-30 V AC/DC	Heat or ventilate	Electronic	2	8 (5) A 230 V AC 5 A 30 V DC	NSYCCOHT30VID
		110-127 V AC					NSYCCOHT120VID
		220-240 V AC					NSYCCOHT230VID

3 different operating modes.  
Option of installing an external sensor.

### Control relative humidity



Electronic hygrostat

Setting range	Display	Power input	Application	Control element	No. of relays	Interrupting capacity (resistive load)	Reference
20%...80%	% RH	110-240 V AC	Heat or ventilate	Electronic	2	8 (5) A 230 V AC 5 A 30 V DC	NSYCCOHY230VID

2 different operating modes.

### PTC external temperature sensor (double insulation)

- Length: 3 metres.
- Several types of fixings (on DIN rail, on Spacial SF profile, on VDI cross-rail, on mounting plate).
- Sensor operation or reading range: -30 °C...+80 °C.
- Protection rating: IP 67.

Reference  
NSYCCAST



Temperature sensor

#### Thermostat installation tips:

The thermostat should be installed at the top of the enclosure (the hottest place). See the various operating modes of each thermostat to choose the one that best meets your needs.

#### Hygrostat installation tips:

The hygrostat should be installed at the bottom of the enclosure. 60% RH is the optimum value in the enclosure.