STC-3008

USER GUIDE

MAIN FUNCTION:

Dual display two-way thermostat, with mode switching between cool and heat.

Temperature can be controlled by setting the temperature set value and the difference value

Features: Temperature calibration, Refrigerating control output delay protection, Alarm when temperature exceeds temperature limit or when there is a sensor error.

SIZE SPECIFICATIONS:

FRONT PANEL SIZE: 75mm x 34.5mm (LxW)

MOUNTING SIZE: 71mm x 29mm (LxW)

PRODUCT SIZE: 75mm x 34.5mm x 85mm (LxWxD)

SENSOR LENGTH: 100cm (Including Probe)

TECHNICAL SPECIFICATIONS:

HOUSING MATERIAL: ABS gray flame retardant molded case.

TEMPERATURE RANGE: -55°C – 120°C

POWER SUPPLY AC VERSION: 110 – 220VAC ±10%, 50/60Hz

POWER SUPPLY 12V DC VERSION: 12VDC

POWER SUPPLY 24V DC VERSION: 24VDC

ACCURACY: ±1°C

TEMPERATURE MEASUREMENT ACCURACY (RESOLUTION): 0.1^{o}C

HUMIDITY MEASUREMENT ACCURACY: 3%

OUTPUT CONTROL: Relay Output

OUTPUT POWER: 10A (Maximum)

SENSOR: 2 x NTC

OPERATION:

SET STARTING TEMPERATURE: Press the "up" button once to display the current starting temperature, to set the starting temperature, press and hold the up key for appox. 3 seconds, the display with start to flash. Use the up and down arrows to set, once desired temperature is set, don't press any buttons for a couple of seconds and it will save this setting.

SET STOPPING TEMPERATURE: Press the "down" button once to display the current stopping temperature, to set the stopping temperature, press and hold the up key for appox. 3 seconds, the display with start to flash. Use the up and down arrows to set, once desired temperature is set, don't press any buttons for a couple of seconds and it will save this setting.

**NOTE: This process applies to both relay 1 & 2.

**NOTE: If the starting temperature is higher than the stopping temperature, the relay will be in cooling mode. If the starting temperature is lower than the stopping temperature the relay will be in heating mode.

EXAMPLES:

HEATING EXAMPLE: *Controlling a water heater to start heating the water when it is 40°C or less, and then stop heating once the water temperature has reached 60°C.*

1. Hold the "up" key for ~3 seconds until display is flashing, set temperature to 40.0, leave the buttons until setting is saved.
2. Hold the "down" key for ~3 seconds until display is flashing, set temperature to 60.0, leave the buttons until setting is saved.

COOLING EXAMPLE: *Activate a fan to cool down an area when the temperature reaches 35°C or more, and stop the fan once the area temperature reaches 30°C.*

1. Hold the "up" key for ~3 seconds until display is flashing, set temperature to 35.0, leave the buttons until setting is saved.
2. Hold the "down" key for ~3 seconds until display is flashing, set temperature to 30.0, leave the buttons until setting is saved.
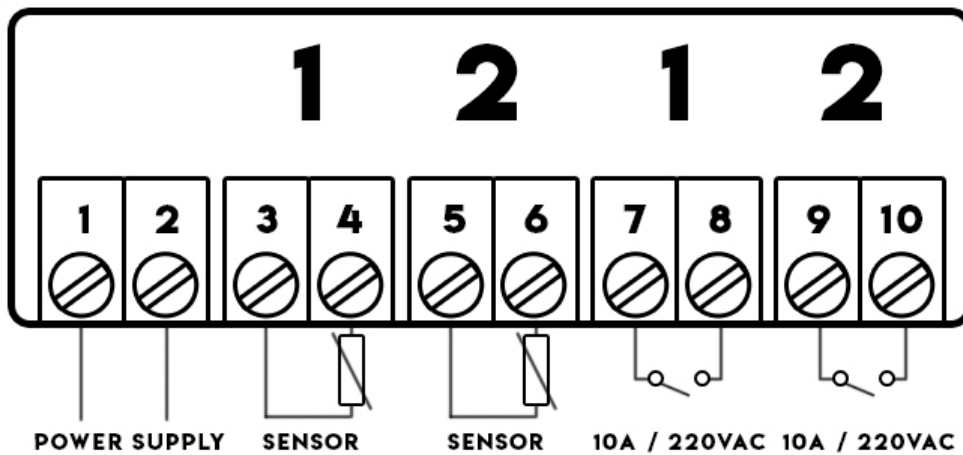
SETTINGS:

Press and hold together "up1" and "up2" buttons together to enter the setting modes:

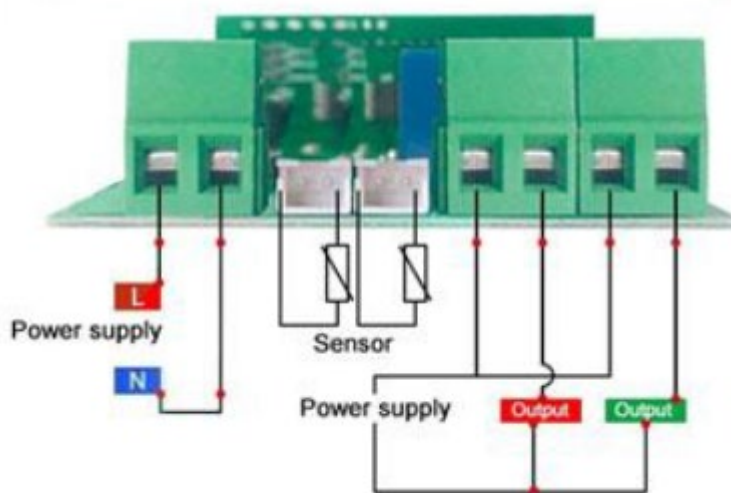| CODE	FUNCTION	RANGE	DEFAULT
P0	Relay 1 Delay Time	0 – 60 Minutes	0 Minutes
P1	Relay 2 Delay Time	0 – 60 Minutes	0 Minutes
P2	High Temperature Alarm Value	-55°C - 120°C	120°C
P3	Lower Temperature Alarm Value	-55°C - 120°C	-55°C

RESET FACTORY DEFAULT SETTINGS:

To reset the device back to factory default settings, press and hold "down 1" and "down 2" buttons together for ~3 seconds. This will restore the device back to factory default settings.

WIRING:

INDEPENDENT POWER SUPPLY FOR LOAD:

SAME POWER SUPPLY FOR LOAD: