

K492



Radiant
Systems

Temperature and humidity weekly thermostat, for external wall-mount installation, K492DY012

Datasheet
0954EN 01/2024



Temperature and humidity weekly chronothermostat, for external wall-mount installation, with display. Suitable for controlling thermo-electric actuators and dehumidifiers. Heating and cooling operating mode with weekly, daily, timed program and possibility of manual operation. Integrated sensor for measuring ambient relative humidity.

➤ Versions and product code

PRODUCT CODE	POWER SUPPLY	FUNCTION
K492DY012	230 V	Control of thermo-electric actuators and dehumidifiers

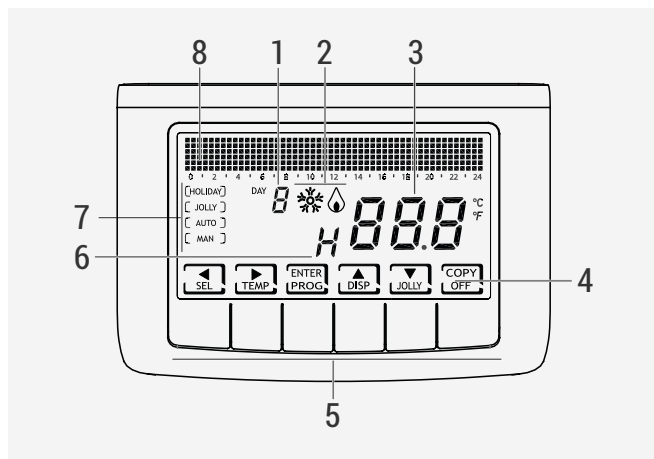
Accessories

- K463PY001: immersion supply temperature probe

➤ Technical data

- Power supply: 230 V, 50 Hz
- Max. absorbed power: 5 W
- Temperature range: 2÷40 °C, increase 0,1 °C
- Room T measuring range / display: -50÷50 °C
- Relative humidity regulation range: 30÷70 %, increase 1 %
- Type of output: 2 relays with dry changeover contact (COM/NA/NC) 3 screw clamps (closed + open)
- Type of input: 1 auxiliary probe - NTC 10K - Lmax 100 m section 0,5÷1,5 mm² (K463PY001) 2 auxiliary inputs - free contacts
- Back-up battery: for program and clock/calendar
- Contact capacity: 5(3)A 250 Vca
- Type of action: 1 B.U. (connection micro-switch)
- Software: class A
- Min. regulation differential: 0,1÷5 K
- Thermal gradient of reference: 4 K/h
- Max. working ambient temperature: 45 °C
- Storage temperature: -10÷60 °C
- Electric insulation: double insulation
- Protection class: IP30
- Pollution degree: 2
- Pulse voltage: 4000 V
- Installation: Wall/flush mounting box
- Dimensions (L x H x W): 137 x 90 x 32 mm
- Standards: EN 60730-1 standard and second parts
- ErP class: ErP Class V; 3 % [Reg. EU 811/2013 - 813/2013]

➤ Description of display keys



1	Day of the week
2	Activation status: cooling or heating
3	Room temperature (Celsius / Fahrenheit)
4	Multifunction key icons
5	Multifunction keys
6	Activation status: dehumidification
7	Operation mode
8	Bar graph to display messages and daily program

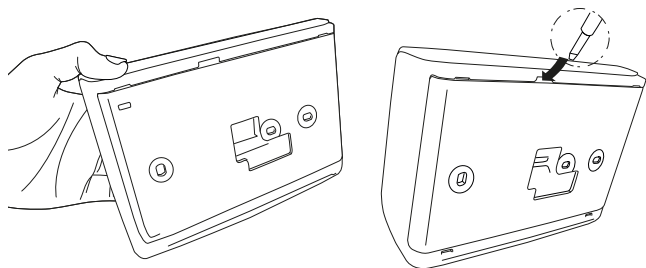
NOTE. The display lights up by pressing any key once. The function of each key varies with each program and it is shown on the display near the corresponding button.

➤ Installation

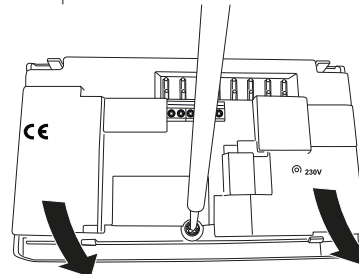
▲ WARNING. This product must be installed by qualified operators only in compliance with standards provided for electric devices. The product must be installed with power off.

Thermostat K492DY012 must be installed on a wall or inside a 3-module or round wall-mount box at approximately 1,5 m from the floor and in a position suitable to read the room temperature. Do not install the thermostat on outside walls, near doors and windows and in positions under direct sunlight. Follow the steps below to install the Thermostat:

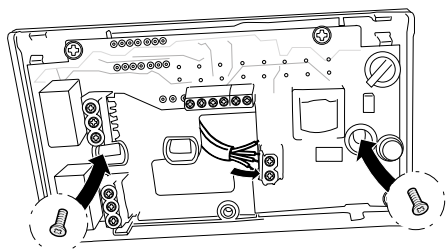
1) Separate the back cover from the body prying on the slot.



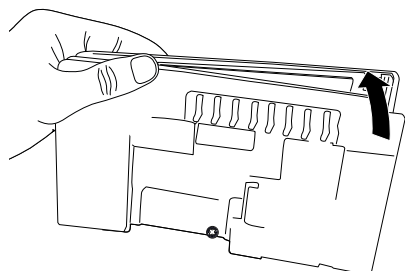
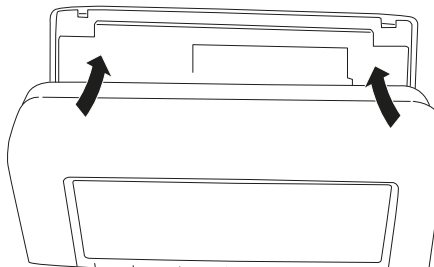
2) Remove the insulation by unscrewing the special waterproof screw.



3) Connect the wires (see "Electric connections") and fit the back cover on the wall using the screws included.

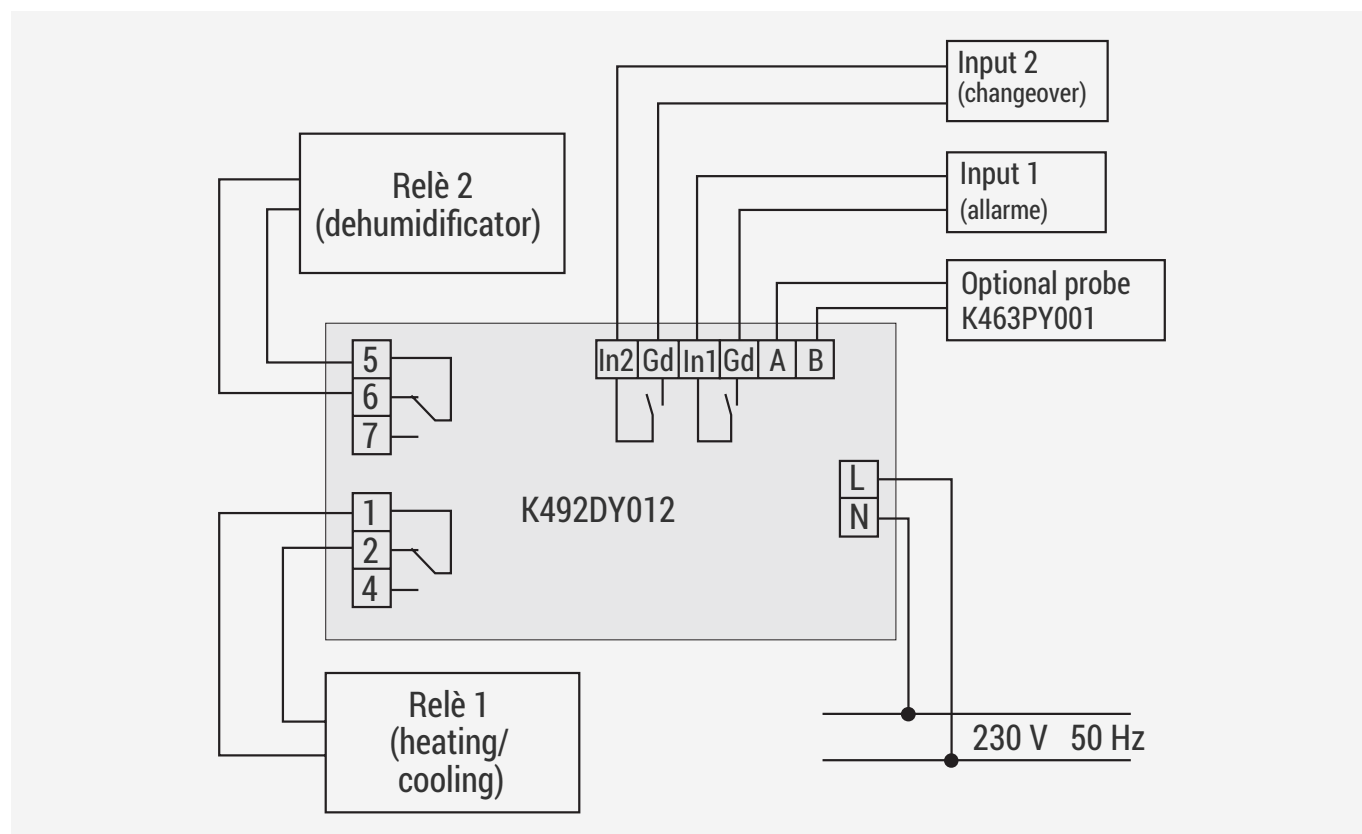


4) Tighten the screw and snap the body on the back cover.



➤ Electric connections

⚠ WARNING. Connect the electric wires with power off.
The electric wires must be connected by qualified operators only.



NOTE. In case of blackouts, the settings will not be deleted as they are saved in a non-volatile memory. Uninterrupted operation of the clock/ calendar in case of extended network failure is also guaranteed by an internal back-up battery.

► Operation

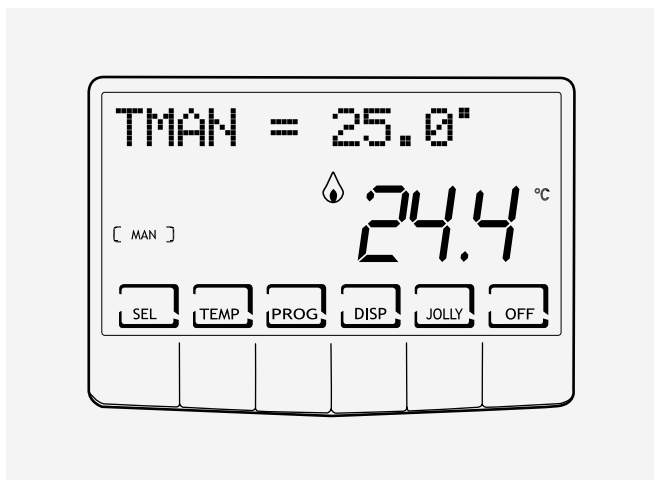
Thermostat K492DY012 is a device equipped with a temperature and relative humidity sensor with two side output relays. It controls heating/cooling systems and one dehumidifier at the same time. The LCD display shows the energy consumptions of the entire system through a user-friendly bar graph.

Operation programs

The Thermostat includes multiple operation programs to control heating/cooling.

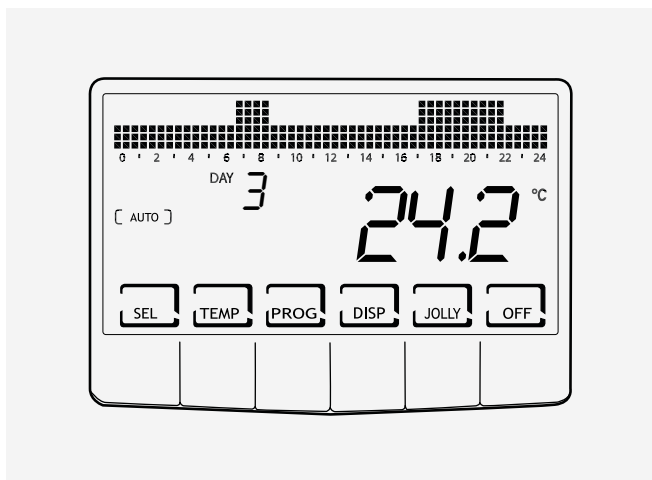
Manual program (MAN)

The device controls the room temperature using a preset value specified from time to time and saved up to selection of a new program.



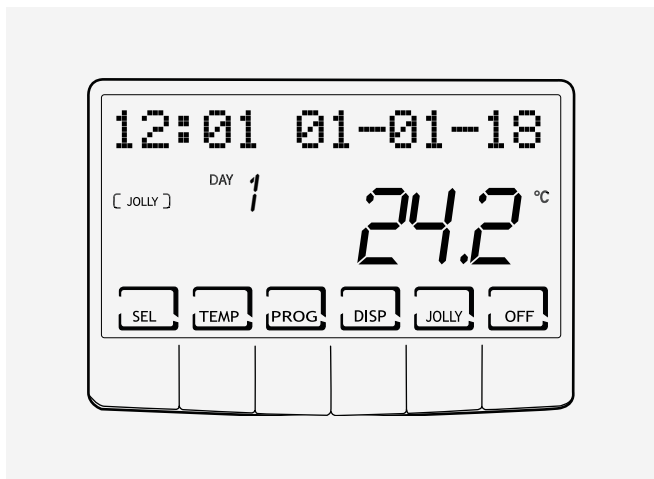
Weekly program (AUTO)

The device controls the temperature set based on hourly programs of weekly profiles. Available temperature levels: tC, tE, tA, OFF (every half an hour).



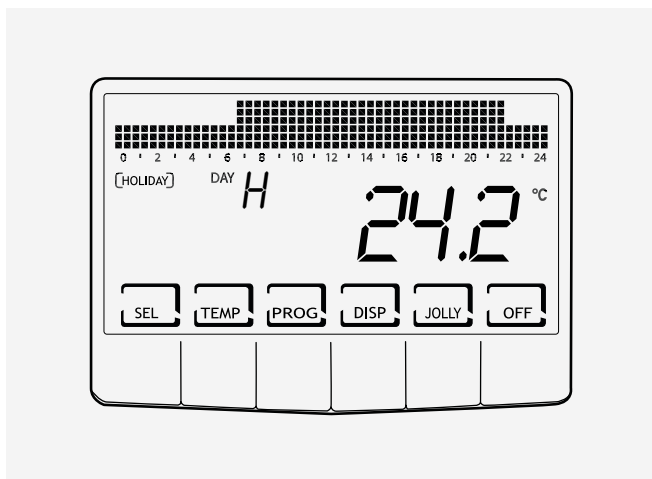
Temporary program (JOLLY)

The device controls the system using a temperature that can be set along a variable time frame (the user enters the time and day up to which he wants to maintain a specific temperature).

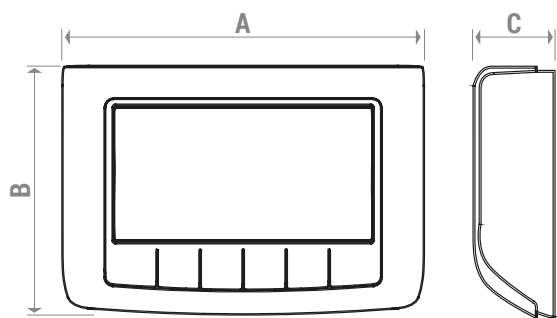


Holiday program (HOLIDAY)

The device controls the system through an additional daily profile (when the user is home on holiday). Two temperature levels available: tC, tE, tA, OFF (every half an hour).



➤ Dimensions



A [mm]	B [mm]	C [mm]
137	90	32

➤ Standards of reference

- CE certification
- EN 60730-1
- Classification of temperature control devices according to Reg.(EU) N.811/2013-813/2013: energy class V, 3 %.



➤ Product specifications

K492DY012

Digital electronic temperature and humidity thermostat with weekly programs to control heating and cooling systems. External wall-mount installation. Power supply 230 Vac, 50 Hz. Integrated room relative humidity sensor to engage dehumidifiers combined to the radiant system. Used to control thermo-electric actuators and dehumidifiers. Protection class IP30. Operation: manual, automatic, jolly, holiday. Summer/winter control. Working temperature range 2÷40 °C. Dimensions 137 x 90 x 32 mm. Certification CE. Compliance with ErP Class V; 3 % (Reg. EU 811/2013 - 813/2013) and EN 60730-1 and second parts.

🔗 **NOTE.** Refer to user manual included and www.giacomini.com for a detailed description of all functions and operation.

⚠ **Safety Warning.** Installation, commissioning and periodical maintenance of the product must be carried out by qualified operators in compliance with national regulations and/or local standards. A qualified installer must take all required measures, including use of Individual Protection Devices, for his and others' safety. An improper installation may damage people, animals or objects towards which Giacomini S.p.A. may not be held liable.

♻ **Package Disposal.** Carton boxes: paper recycling. Plastic bags and bubble wrap: plastic recycling.

ℹ **Additional information.** For more information, go to giacomini.com or contact our technical assistance service. This document provides only general indications. Giacomini S.p.A. may change at any time, without notice and for technical or commercial reasons, the items included herewith. The information included in this technical sheet do not exempt the user from strictly complying with the rules and good practice standards in force.

🗑 **Product Disposal.** Do not dispose of product as municipal waste at the end of its life cycle. Dispose of product at a special recycling platform managed by local authorities or at retailers providing this type of service.