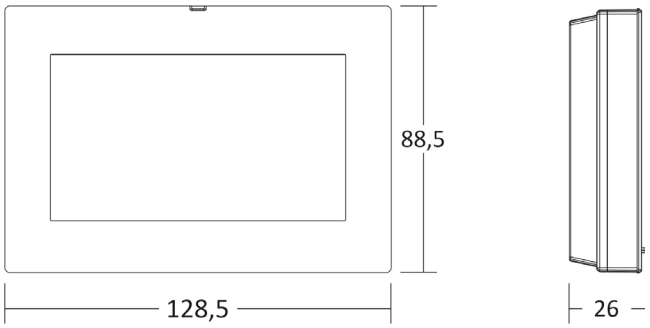
1PE2CDOM06

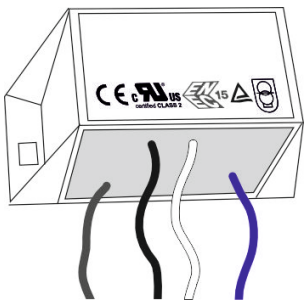
Domotic programmable thermostat

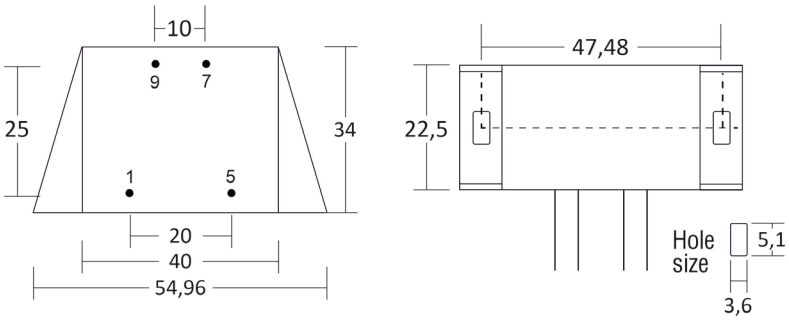
The CDOM06 programmable thermostat allows the management of multi-zone room thermoregulation of a set of 8 rooms/zones in both residential and tertiary or public administration contexts and is an integral part of a Building Automation System designed for the integrated management of thermoregulation, accounting and remote control of the building's technological system.
The programmable thermostat allows, via local LCD or remotely via APP, the consultation of consumption data detected by heat meters/cost allocators and DHW/AFS meters, of the temperatures detected in the room and of the current operating status of the thermoregulation system, with the ability to turn each individual zone on/off and modify the weekly programming.

important note: this device is part of the CDOM Building Automation System, compliant with UNI EN ISO 52120:1, whose automation level/class certification must be drawn up by a specific professional in compliance with the certification procedures reported in the UNI TS 11651 Technical Specification.



Dimensions (mm)





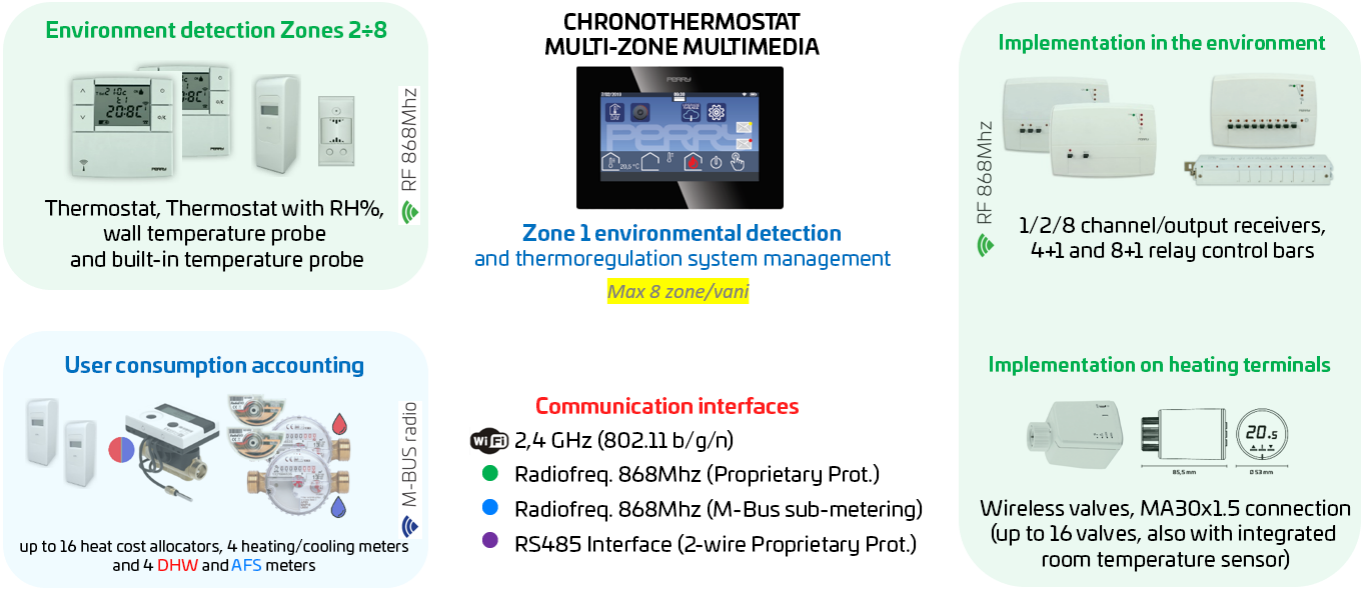
Dimensions (mm)

TECHNICAL FEATURES

Detection range:	-5°C to +55°C.
Display type:	4.3" TFT color touchscreen;
Power supply:	5Vdc (via the supplied 1PRAL05I power supply);
Connectivity:	Bidirectional RF 868MHz, RF transmission power <25mW e.r.p. RS485 wired BUS line 2.4GHz Wi-Fi (802.11 b/g/n)
Radio coverage:	30-80 meters, depending on the type of environment;
Operating conditions:	-5°C to +55°C – RH% 0-95% (non-condensing)
Dimensions:	129x89x26 mm
Protection rating:	IP30
Compliance:	Directive 2014/53/EU (RED).

OPERATION

The programmable thermostat allows the management and control of up to eight zones/rooms thanks to the use of various accessory devices designed to detect temperatures and the consequent and necessary actuations for the control of emission terminals (radiators, fan coils, radiant systems, etc.) in order to guarantee the best climatic comfort conditions in the rooms.
The room temperature of zone/room 1 is detected by the programmable thermostat sensor, while in the subsequent zones/rooms (zones 2÷8) thermostats, thermo-hygrometers, room probes, or radiator actuators equipped with an integrated room temperature detection sensor can be used without distinction.
The implementation and control of the different types of emission terminals, present in the various zones/rooms, is carried out by specific actuators or wireless modules that provide the type of individual terminal, be it a radiator, a fan coil or a radiant circuit manifold or in some cases zone circulators.
The programmable thermostat also allows the collection and consultation of consumption data detected by direct heat metering devices (calorimeters, ACS/AFS volumetric meters) or indirect heat metering devices (heat cost allocators) present in the rooms and transmitted in wireless M-Bus mode by compatible Perry brand devices.
The maximum number of devices that can be managed, for each type, by the programmable thermostat is indicated in the specific table on the following pages of this document.



Via an RS485 BUS line, which interconnects all the various programmable thermostats in the building to the 1PE2BMS01 electronic unit located in the technological system management panel, the system is able to manage the interaction of room thermoregulation with the automation of regulation/control of thermal energy production (PCD, boilers, refrigeration units, hybrid systems, etc.) and regulation/control of distribution circuits (mixing units, circulators, etc.) complying with the functional requirements required by the UNI EN ISO 52120:1 standard for BACS systems with performance classes A and B.

SYSTEM COMPONENTS AND ACCESSORIES

detection devices:

item	Description	max number per CDOM06
1PE2STX01	Wireless wall-mounted room sensor with LCD, battery powered;	7
1PE2STX03A/B	Wireless built-in room sensor (colors: A=Anthracite, B=White), 230 VAC power supply;	
1PE2TETX05	Wireless wall-mounted room thermostat with LCD and function keys, battery powered	
1PE2RXTEUM01	Wireless wall-mounted room thermo-hygrometer with LCD and function keys, battery powered;	

Actuation/control devices:

item	Description	max number per CDOM06
1PE2VTRX05*	Wireless radiator actuator with integrated temperature sensor, battery powered;	16
1PE2VTRX04	Wireless radiator actuator with tamper-proof controls, battery powered	
1PE2RTX01D0	Wireless actuation module with 1 relay, 230Vac power supply;	16 thermoregulation 8 humidity control 2 pump operation 1 boost operation
1PE2RTX01I	Wireless actuation module with one relay and one digital input, 230 VAC power supply	
1PE2RTX02D0	Wireless actuation module with two relays and one auxiliary relay, 230 VAC power supply;	16 thermoregulation 8 humidity control
1PE2RTX01FC	Wireless control module for fan coils (3-speed or 0-10V), 230VAC power supply;	
1PE2RTX08	Wireless control module for radiant circuit control bars 1PE2BC0800 or 1PE2BC0400 series;	2
1PE2BC0800	Control bar with 8 relay outputs for controlling radiant circuit collectors;	2
1PE2BC0400	Control bar with 4 relay outputs for controlling radiant circuit collectors;	

Accounting devices:

Item	Description	max number per CDOM06
1PE2ULxxxxR01	Ultrasonic thermal energy meter (various DN)	4 for only HEAT 2 if HEAT/COOL
1PE2CCxxR03	Mechanical thermal energy meter (various DN)	
1PE2CAFSxxxx	AFS volumetric meters (various DN)	4
1PE2CACSxxxx	ACS volumetric meters (various DN)	
1PE2MBR03	Radio module for AFS/ACS meters	4
1SE100301	Giusto-100N2 electronic heating cost allocator	16
1SE100302	Giusto-100NE2 electronic heating cost allocator with remote probe	

Centralization devices:

item	Description	max number zones/rooms
1PE2BMS01	BMS01 unit for centralization of CDOM06 systems	250

SPECIFICATION ITEM

Multimedia programmable thermostat (4.3" TFT touchscreen color screen) “CDOM” series, Perry brand, mod. 1PE2CDOM06 with multi-protocol wireless/wired communication interfaces for managing thermoregulation in eight distinct zones/rooms and sub-metering devices for direct/indirect metering.

Equipped with an 868MHz RF module for two-way connection with temperature and humidity detection devices (thermostats, room probes and thermo-hygrometers) and with actuation devices (electronic heads for radiators, 1/2 relay output receiver modules and receiver modules for 4/8 zone control bars).

Equipped with an 868MHz RF module for reading heat cost allocators and with M-Bus protocol for reading hot/cold energy meters, ACS/AFS volumetric meters.

Equipped with an RS485 bus line with Modbus protocol for connection to the BMS01 Artificial Intelligence unit for controlling and improving the efficiency of the building's technological systems.

Equipped with an integrated Wi-Fi module for connection to the Perry cloud portal.

The CDOM06 home automation unit allows you to consult, via a local LCD or remotely via APP (if connected to the Wi-Fi network), the consumption data detected by the heat meters/cost allocators and by the ACS/AFS meters, the temperatures detected in the room, the operating status of the thermoregulation system with the ability to turn it on/off and modify its weekly programming remotely, in compliance with the requirements prescribed for Class A and B Building Automation systems of the EN15232 standard.

Montaggio parete o su scatola “tipo 503”; Alimentazione 5Vdc (tramite alimentatore mod. 1PRAL05I incluso); Grado di protezione IP30; Conforme alla Direttiva 2014/53/UE (RED); Dimensioni 129x89x26 mm.