ENGO E7

Programmable, Wireless Thermostat

E7-TXW / E7-TXB E7-RX

Quick Guide

Ver. 0.1
Release date: VI 2025
Soft: v0.3

Producer:
Engo Controls sp.z.o.sp.k.
Rolna 4 st.
43-262 Kobielice
Poland

www.engocontrols.com

Product Compliance

This product complies with the following EU Directives: 2014/53/EU, 2011/65/EU

Safety information

Use in accordance with national and EU regulations. Use the device only as intended, keeping it in a dry condition. The product is for indoor use only. Please read the entire manual, before installation or use.

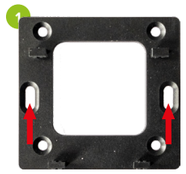
Installation

Installation must be performed by a qualified person with appropriate electrical qualifications, in accordance with the standards and regulations in force in a given country and in the EU. The manufacturer is not responsible for non compliance with the instructions.

ATTENTION!

For the entire installation, there may be additional protection requirements, which the installer is responsible for.

Wall mounting of the thermostat,



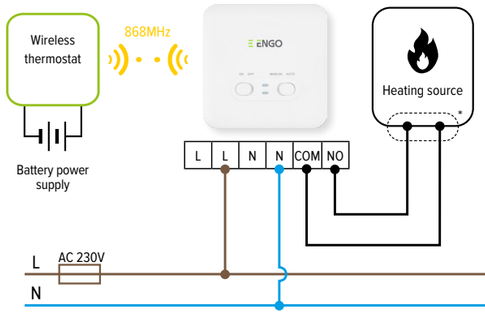
Screw the mounting plate to the box/wall.

Insert batteries in the thermostat.

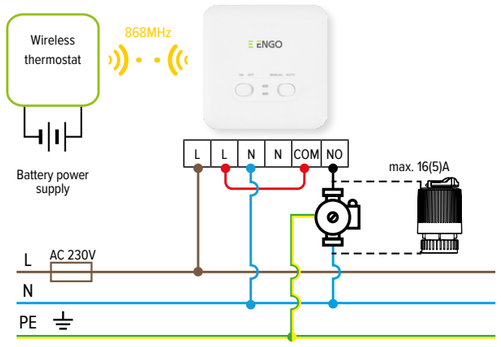
Attach thermostat to the mounting plate.

Connection description

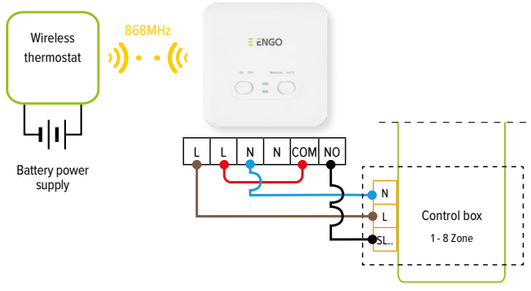
a) Connection diagram to the heating source



b) Connection diagram for the pump/actuator



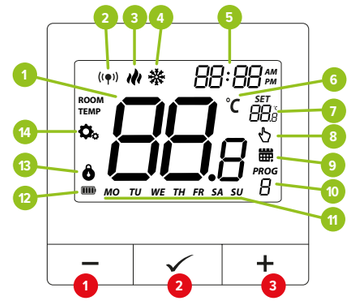
c) Connection diagram for the UFH control box



Legend:

	Fuse		Pump
	Battery power supply		Valve actuator
L, N	230V AC power supply		Wireless communication
PE	Ground (electricity)		Boiler - Boiler connection * - Boiler's contacts for ON/ OFF thermostat (according to the boiler's instructions)
COM, NO	Voltage-free output		
SL..	Signal Live - input in the control box		

LCD Icon Description



1. Current temperature
2. Status of the receiver connection
3. Heating indicator (icon is animating when there is heating demand)
4. Cooling indicator (icon is animating when there is cooling demand)
5. Clock
6. Temperature unit
7. Setpoint temperature
8. Temporary override mode
9. Schedule mode icon
10. Program number
11. Day of the week indicator
12. Battery indicator
13. Button lock
14. Settings icon

1. "Down" Button –
2. "OK" Button ✓
3. "Up" Button +

Button Description

+	Change the parameter value up
–	Change the parameter value down
✓	Manual/Schedule mode - short button press
	Enter the installer parameters/schedule/time setting - hold 3 seconds
	Turn OFF/ON thermostat - hold 5 seconds
+ & –	Pairing the transmitter with the receiver - hold until the SY message, then release the keys
	Factory reset - hold until the FA message appears, then select YES and confirm
+ & ✓	Lock/Unlock thermostat keys - hold 3 seconds
– & ✓	Heating/Cooling mode change - hold 3 seconds

Introduction

Engo E7 is a modern room thermostat that combines simplicity of operation with the functionality needed for everyday thermal comfort. With a large, easy-to-read display and simple 3-button control, operation is made as simple as possible. A default day/night schedule makes it easy to get the system up and running quickly without programming. A full weekly schedule option is also available for more demanding users. The E7 is available in two colors - white and black - to match modern interiors. Thanks to radio communication and factory pairing of the devices, installation is quick and hassle-free.

Product features

- Operating modes: day/night
- HEATING/COOLING function
- Simple and intuitive device operation
- Wireless communication in the 868MHz standard
- Maximum/minimum temperature limitation
- Devices are factory-paired with unique communication codes, which prevents mutual interference

Technical data

Thermostat supply	2 x AA batteries
Receiver supply	230 V AC 50 Hz
Max load of the receiver	16 (5) A
Receiver outputs	Voltage-free NO/COM relay
Temperature range	5 - 35°C
Display temperature accuracy	0,1 or 0,5°C
Control algorithm	TPI or Histeresis (±0,2°C do ±2°C)
Communication	Wireless, 868 Mhz
Dimensions [mm]	thermostat: 80 x 80 x 22, receiver: 96 x 96 x 27

Receiver

LEFT SWITCH

1. ON - Manual mode - receiver ON
2. OFF - Manual mode - receiver OFF

RIGHT SWITCH

3. MANUAL - Receiver works in Manual mode (according to the left switch)
4. AUTO - Receiver works in AUTO mode (according to the thermostat's command)

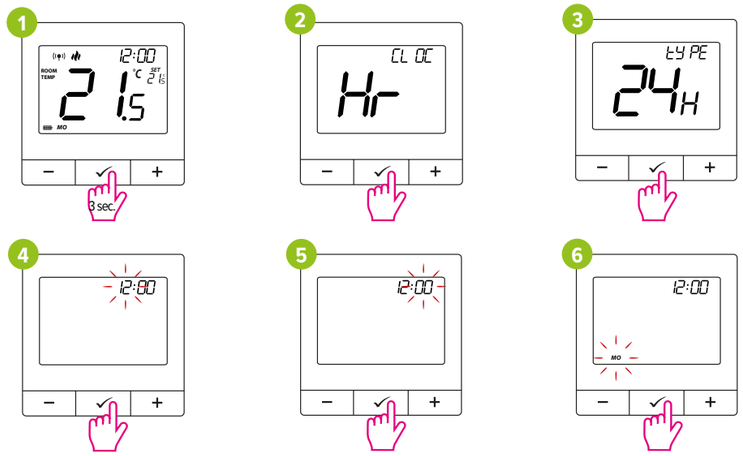
The status of the receiver is indicated by two LEDs. These are LEDs with the following colors:

1 - green (upper one),
2 - orange (lower one).

	A DETAILED EXPLANATION OF THE MEANING OF THE LEDS:
The green LED is solid	The receiver is connected to the 230V power supply. The receiver can be controlled by thermostat if it is in automatic mode when the right switch is in the AUTO position. The receiver can be controlled manually when the right switch is in the MANUAL position.
The green LED flashes	The receiver is in the pairing mode and is looking for a signal from the thermostat (then you must activate the "SYNC" parameter in the thermostat).
The green LED is off	The receiver is disconnected from the 230V powersupply or the left switch is in the OFF position.
The orange LED is solid	In automatic mode, the receiver received a heating / cooling signal from the thermostat. The receiver was turned ON in manual mode (left ON switch, right MANUAL switch)
The orange LED flashes	The receiver was paired but lost communication with the thermostat due to out of range or low battery in the thermostat. The receiver starts flashing after 40 minutes of time when it does not receive a signal from the thermostat.
The orange LED is off	The receiver does not send a heating / cooling signal.

Setting the day of the week and time

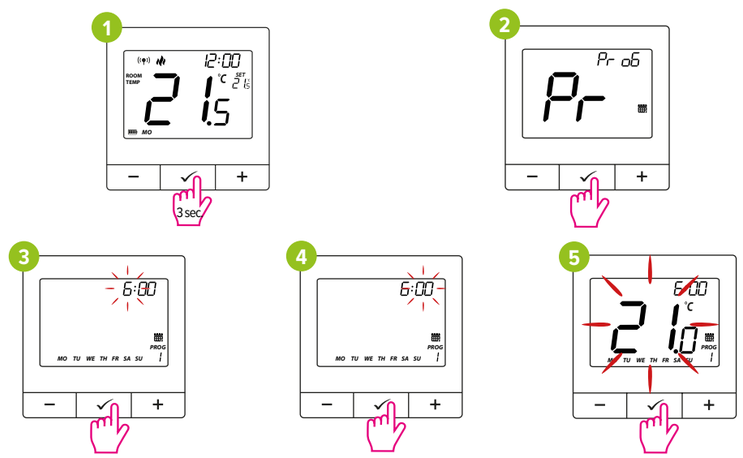
To enter clock settings press and hold ✓ button for 3 seconds, then Select “Hr” with the - or + button and confirm with the ✓ button.



Using the - or + buttons, set the clock format, then confirm with ✓ button. Similarly, set the following parameters: Hour, minutes and day of the week.

Setting the schedule

To enter the schedule programming, press and hold ✓ button for 3 seconds, then Select “Pr” with the - or + button and confirm with the ✓ button.



Use the “-” or “+” buttons to set the hour, minutes and temperature for each of the two time intervals, each time confirming the selection with ✓ button . By default, the schedule for each day of the week will be the same.
If you want to set an individual schedule for selected days of the week, change parameter P12 from 0 to 1 (see installer parameters).
You can copy the set schedule to the next day by confirming ‘YES’ value for the “Copy” parameter - just approve it with ✓ button. If you want to set an individual schedule for the next day, set the “Copy” parameter to “NO”, confirm the selection with ✓ button , and then create a schedule.

ATTENTION!

To exit to the home screen without saving changes, hold the ✓ key for 3 seconds.

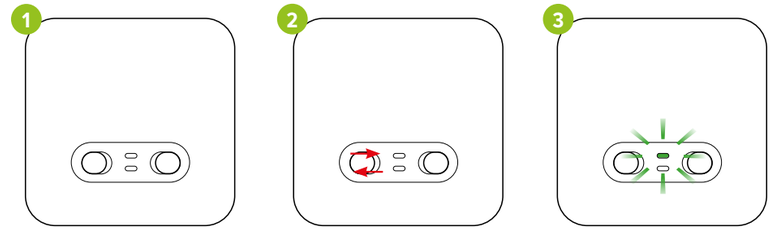
ATTENTION!

Programs should be set for all days of the week.

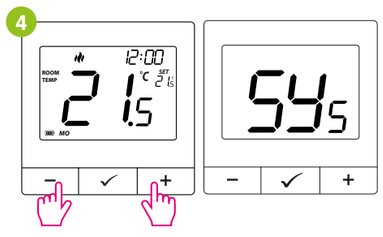
Pairing process with the receiver

PLEASE NOTE:

THERMOSTAT IS ALREADY PAIRED WITH THE RECEIVER!

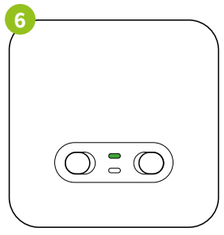


If you want to re-pair the devices with each other, make sure that the receiver is disconnected from the power supply, and the switches on it are in the ON and AUTO positions. Then connect the receiver to the power supply and wait for the green diode to glow continuously. Next, move the left switch to the OFF position and back to the ON position with a quick motion. After all, the green diode will start blinking, which will confirm that the receiver has entered the pairing mode.

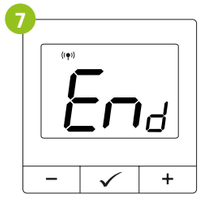


Press and hold the – & + buttons for approx. 5 seconds until the display shows „SY”. Then release the keys.

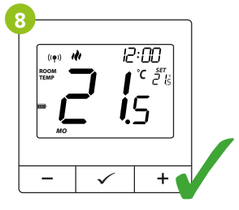
The thermostat started to send a signal ((•)) to find the receiver and started the countdown with the number 300 (sec). The pairing process may take up to 300 seconds.



When the green diode on the receiver lights up continuously, the devices have been paired on a new frequency.



After successfull pairing operation ”End” message will be displayed.



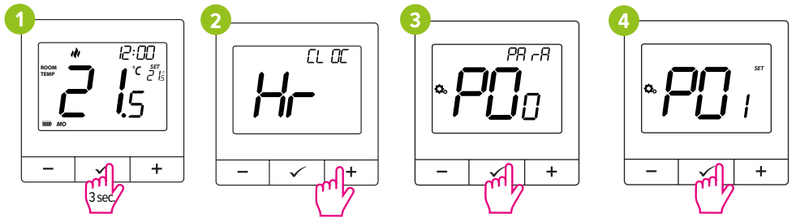
Thermostat displays the main screen, ” ((•)) ” icon means receiver is paired with thermostat.

PLEASE NOTE!

If the devices remain unpaired after 10 minutes (e.g. no antenna icon on the controller, the receiver does not respond to the heating signal from the controller), the pairing process must be repeated, taking into account the distances between the devices, obstacles and interference.

Installer settings

To enter installer parameters press and hold ✓ button for 3 seconds, then Select “PArA” with the - or + button and confirm with the ✓ button.



Use – or + button to move between parameters. Enter the parameter by ✓. Edit the parameter using – or + Confirm the new parameter value with the ✓ button.

Pxx	Function	Value	Desription	Default value
P01	Heating/Cooling Selection		Heating	
			Cooling	
P02	Control algorithm	UFH	TPI for Underfloor Heating	HIS 0.2
		RAD	TPI for Radiators	
		ELE	TPI for Electrical Heating	
		HIS 0.2	SPAN+/-0,1°C	
		HIS 0.4	SPAN +/-0,2°C	
		HIS 0.6	SPAN +/-0,3°C	
		HIS 0.8	SPAN +/-0,4°C	
		HIS 1.0	SPAN +/-0,5°C	
		HIS 2.0	SPAN +/-1,0°C	
		HIS 3.0	SPAN +/-1,5°C	
		HIS 4.0	SPAN +/-2,0°C	
P03	Display temperature resolution	0.1°C	This parameter specifies the accuracy of the displayed (measured) temperature.	0.1°C
		0.5°C		
P04	Offset temperature	-3.5°C to +3.5°C	If the thermostat indicates wrong temperature, you can correct it by max ± 3.5°C"	0°C
P05	Relay type	NO	Normally Open type of relay	NO
		NC	Normally Closed type of relay	
P06	Clock format	12H	12-hours	24H
		24H	24-hours	
P07	Minimum setpoint	5°C - 45°C	Minimum heating / cooling temperature that can be set	5°C
P08	Maximum setpoint	5°C - 45°C	Maximum heating / cooling temperature that can be set	35°C
P09	PIN Code for settings access	NO	Function disabled	NO
		PIN	Function enabled	
P10	PIN code value	000-999	user PIN	000
P11	Require a PIN to unlock the keys every time (function active when P09=PIN)	NO	No	NO
		YES	Yes	
P12	Type of schedule	0	One schedule for the entire week	0
		1	Separate schedule for each day of the week	
CLR	Clear settings factory reset	NO	No action	NO
		YES	Factory Reset	

Factory reset

To RESET Thermostat to factory settings, hold down the – and + buttons until the "FA" message appears. Then release the keys. Then use the - or + button to change “NO” to "YES" and confirm with ✓ button. Thermostat will restart, will restore the default factory settings and display the main screen.