

INSTALLATION AND USER MANUAL

SMART TOUCH ELEMENT



Smart Touch Element



Table of contents

1. Safety & Warnings

2. Installation

- 2.1 'Electric-only' Element Installation
- 2.2 'Dual-fuel' Element Installation
- 2.3 Install the cable mask to the element box

3. Control Operation

4. Control Panel

- 4.1 Standby Mode
- 4.2 Heating Mode
 - 4.2.1 Room heating mode
 - 4.2.2 Radiator mode
 - 4.2.3 Timer Mode
 - 4.2.4 LST(Low surface temperature) Mode
 - 4.2.5 Anti-freeze Mode
 - 4.2.6 Child Lock

5. Connecting to WiFi

- 5.1 Downloading the App
- 5.2 Connecting to the App
- 5.3 Adding Devices

6. Using the APP

- 6.1 Home Overview
- 6.2 Control Interface
- 6.3 Choose Mode
- 6.4 Timer Mode

7. Device Setting

- 7.1 Program
- 7.2 Room Temperature Compensation
- 7.3 Child Lock
- 7.4 Open Window Detection
- 7.5 Heat Plus

8. Technical Information

9. Disposal

Before you begin installation, setup or operation of the unit, please read all of these instructions carefully.

1. SAFETY & WARNINGS

- Electric Towel Rails must be installed by a licensed electrician in accordance with the current IEE wiring regulations.
- The product should be permanently fixed and connected to the 220/240 Volt AC mains power supply via a fused spur/cable outlet, and earth bonded.
- This product is a Class 1 unit and as a result it must be earth connected.
- The element must NEVER be used without the towel rail or radiator being filled with water or fluid at correct fluid level.
- Only use the device in a suitable towel rail or radiator, for space heating and/or towel drying.
- This element should be mounted vertically and in the BOTTOM of the towel rail . It can be mounted horizontally only when it is in the ambient temperature control mode.
- It is imperative that you have the correct fluid level(90% fluid of towel rail total volume is recommended) in the towel rail before the element is used.
- A Never attempt to disconnect the control unit from the heating element. It is a unit that was factory-sealed.
- Ensure the O-ring is on the connection part before installation. This o-ring is preventing the leakage after installation.
- The appliance is not a toy for children.
- The unit is not to be used by persons (including children) with reduced physical, sensory or mental capabilities, only use if they are supervised by a competent person.

Warning!

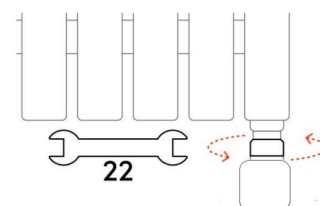
Never tighten using the housing itself, Always use the correct tools (Spanner).

2. INSTALLATION

- These are general-purpose instructions for fitting your element into a suitable radiator or towel rail. Always check with the radiator manufacturer to ensure the product is suitable for use with the element, and follow any additional installation guidance provided with the unit. Installation must be completed by a qualified electrician. Do not attempt installation DIY.
- **WARNING** – Do not attempt to operate the element before it has been installed in a fluid-filled radiator or towel rail. Switching on the element in an empty radiator or in open air will cause the element to cease functioning. Always switch off the power supply at the mains during installation and maintenance. We recommend that the fuse is withdrawn or circuit breaker switched off at the distribution board while work is in progress.

2.1 'Electric-only' Element Installation

- Identify the inlet where the element will be fitted in the radiator or towel rail. For vertical models, the element is fitted vertically, entering at the bottom of the right-hand vertical strut. For horizontal models, the element is fitted horizontally, entering sideways through the lowest horizontal strut. Never fit the element at the top of a radiator or towel rail.
- Tilt the radiator so the next free filling cap is at the highest point. Remove the cap and fill the towel rail or radiator to 90% of its volume with a suitable heating medium. This should be a glycol-based formulation. Replace the cap when done.
- Push the heating element into the radiator (Ensure all threaded joints are wrapped with PTFE tape and the O-ring is present on the element thread)
- Tighten the element at the main nut, using a size 22 spanner. Ensure the rubber O-ring, above the main nut, makes a firm seal between the radiator and the element. This prevents leakage after installation.



- ◆ **NOTE** - Never attempt to tighten the element by twisting the control head or product housing. Always use the correct tools as directed in the instructions.

- Fit the rail to the wall, following the manufacturers fitting instructions.
- Connect the element to the mains power using a BS fused connection unit.
 - The wires should be connected as follows: **Blue** (Neutral), **Brown** (Live), **Green/Yellow** (Earth).
- The fused connection unit should be fitted with a 5 Amp fuse to BS1362.
- Shortly after switching on the unit, ensure the towel rail is bled for any excess air.
- Check for leaks and re-tighten joints as necessary.

2.2 'Dual-fuel' Element Installation

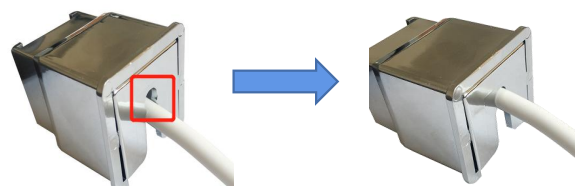
- Identify the inlet where the element will be fitted in the radiator or towel rail. For vertical radiators and towel rails, the element is fitted vertically, entering at the bottom of the right-hand vertical strut. For horizontal models, the element is fitted horizontally, entering sideways through the lowest horizontal strut. Never fit the element at the top of a radiator or towel rail.
 - Ensure all threaded joints are wrapped with PTFE tape.
 - Ensure the O-ring is present on both the element and Tee piece threads.
 - Insert the element into the Tee piece and tighten with a spanner.
 - Insert the Tee piece with electric element into the chosen side of towel rail or radiator and tighten with a spanner.
 - Fit towel rail or radiator to the wall and connect to the central heating, following the manufacturers fitting instructions.
 - Once the rail is mounted on the wall and connected securely to the central heating system, open the radiator valves and allow the rail to fill.
 - Once the rail has filled with water, with the central heating OFF, use the air vent to purge any excess from the rail.
 - Connect the element to the mains power using a BS fused connection unit.
- The wires should be connected as follows: **Blue** (Neutral), **Brown** (Live), **Green/Yellow** (Earth).
- The fused connection unit should be fitted with a 5 amp fuse to BS1362.
 - Shortly after switching on the unit, ensure the towel rail is bled again for any excess air.
 - Check for leaks and re-tighten joints as necessary.

2.3 How to install the cable mask to the element box after installing the element to the towel rail or radiator

Step 1: Slide the decorative cable mask into track on the back of element box



Step 2: Lock the cable to the hole on the mask



3. CONTROL OPERATION



Note: During operation, the screen will light up for one minute and then turn off. Pressing any button during this time will turn the screen back on, allowing any operation to be performed during this period.

4. MANUAL OPERATION OF THERMOSTATIC CONTROLLER

The controller has below functional modes:

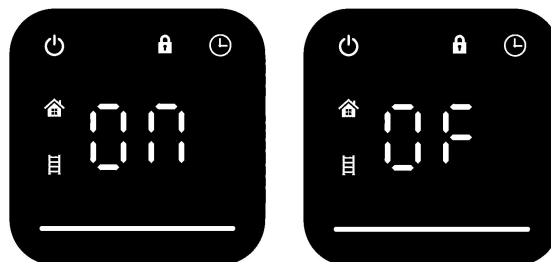
4.1 Standby Mode

4.2 Heating Mode

- 4.2.1 Room Heating Mode
- 4.2.2 Radiator Mode
- 4.2.3 Timer Mode
- 4.2.4 LST Mode
- 4.2.5 Anti-Freeze Mode
- 4.2.6 Child Lock

4.1 Standby Mode

Once the controller is powered on, the unit will go into standby mode. You can press the button  to switch between ON/OFF.



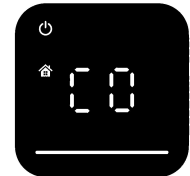
4.2 Heating Mode

Press  to switch the controller on. Press different icons to switch between modes. There are six modes: Room heating mode, Radiator mode, Timer mode, LST mode, Anti-freeze mode, Child Lock.

4.2.1 Room Heating Mode

In this mode, the element controls the room temperature and heats to a constant set temperature. The external thermostat measures the ambient temperature and instructs the element to heat or stop heating according to the temperature set.

- Press the  button to enter the room heating mode. In this mode, the set temperature and "CO" will alternately flash. The icon  will flash while heating and remain steady once the target temperature is reached.
- The set temperature can be adjusted by sliding the bar located at the bottom of the screen. The temperature can be set within a range of 15-30°C in steps of 1°C.



4.2.2 Radiator Mode

In this mode, the element controls the radiator's internal temperature and heats to a constant set temperature. The internal thermostat measures the temperature of the heating fluid and instructs the element to heat or stop heating according to the temperature set.

- Press the  button to enter the radiator mode. In this mode, the icon  will appear and flash while heating, then remain steady once the target temperature is reached.
- The set temperature can be adjusted by sliding the bar located at the bottom of the screen. The temperature can be set within a range of 30-70°C in steps of 5°C.



4.2.3 Timer Mode

The element will stay working at the setting hours at maximum performance which is heating the fluid under 70°C. After heating at the setting hours, it will return to standby mode.

- Press the  button in any mode to enter Timer mode. In this mode, "2H" will be displayed on the screen and the icon  will flash while heating and remain steady once the target temperature is reached.
- The timer duration is set to 2 hours and cannot be adjusted.



4.2.4 LST(Low surface temperature) Mode

In this mode, the element controls the radiator's internal temperature and heats to a constant 43°C and can not be adjustable.

- In the powered-on state, press and hold both the  and  buttons for about 3 seconds to enter this mode. The icon  will flash while heating and remain steady once the target temperature is reached.

4.2.5 Anti-freeze Mode

If the radiator's internal temperature drops below 7°C, the heating system will automatically activate, heating the liquid inside the radiator to 15°C before switching off again. (This function is set to default and does not appear in the interface.)

In this mode, it will prevent the liquid in the radiator from freezing and can also maintain a low room temperature.

4.2.6 Child Lock

Use this function to prevent any change in the thermostat setting.

Press and hold the  button for 3 seconds to lock the display. The  icon will appear and all buttons including the  button will be locked. Repeat the same procedure or cut off the power to unlock it.

Remark: When the internal temperature exceeds the set temperature, the icon corresponding to the mode on the screen will blink twice.

5. CONNECTING TO WIFI



5.1 Downloading the App

Download the APP onto your smart phone. You can find the app by scanning the QR code below or searching "Smart Life" in the Google Play or Apple app store. Install and follow the app's instructions to create an account.



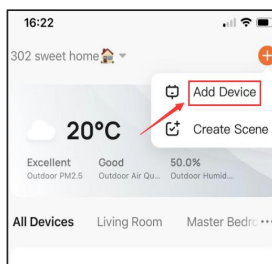
NOTE - The Smart Life app is a constantly evolving third party system. This guide was correct at time of printing but may differ slightly from future versions. The app is designed to work on Android or iOS but older software versions may affect app presentation and performance.

5.2 Connecting to the App

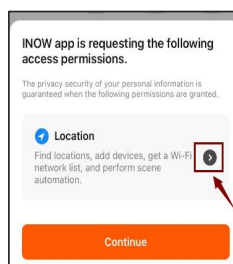
To put the device in pairing mode, press  to enter power OFF mode and hold down  button for 2 seconds, coming with a sound "DI", it is in pairing stage and WIFI icon starts flashing, follow the below operation you can operate the paring job.



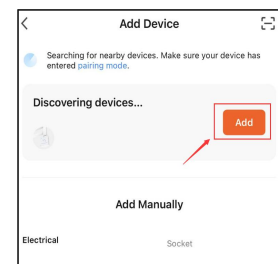
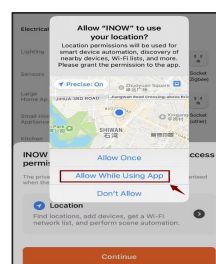
5.3 Adding devices



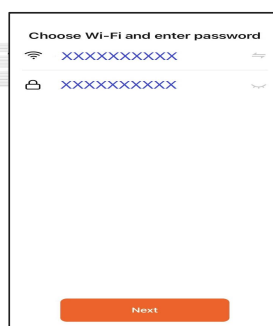
1. Click "+" and "Add Device"



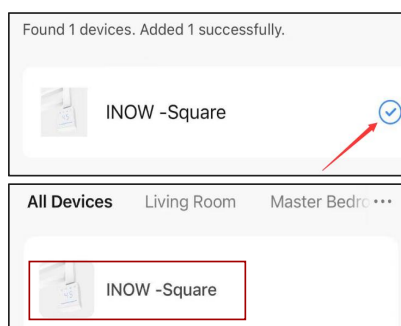
2. Before adding the device, please allow the Location to access



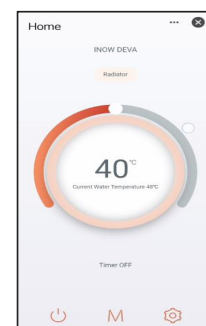
3. It will search the device automatically, click "Add"



4. Choose your WiFi network and enter the password. Press "Next".



5. The element will begin connecting. Device will display on the APP after successfully added.



Trouble shooting

If the element does not connect on the first attempt:

- Make sure both the element and your smart device are in range of your router.
- Make sure you complete the connection process in 2 minutes. If the APP can be not connected, you must begin the process again.
- Ensure your router has a strong internet connection.
- Ensure WiFi and Bluetooth are enabled on your smart device.
- Make sure the app has registered successfully.
- Make sure your smart device is connected to the same WiFi network as that to which you are attempting to connect the element.
- Ensure you are connected to a 2.4G WiFi band. See instructions within the app if you are currently connected to a 5G band.
- Check any local restrictions on your WiFi. WiFi networks in public places such as hotels and airports may require extra identification steps.

If the thermostat sensor becomes disconnected, "Er" will be displayed on the screen.

6. USING THE APP

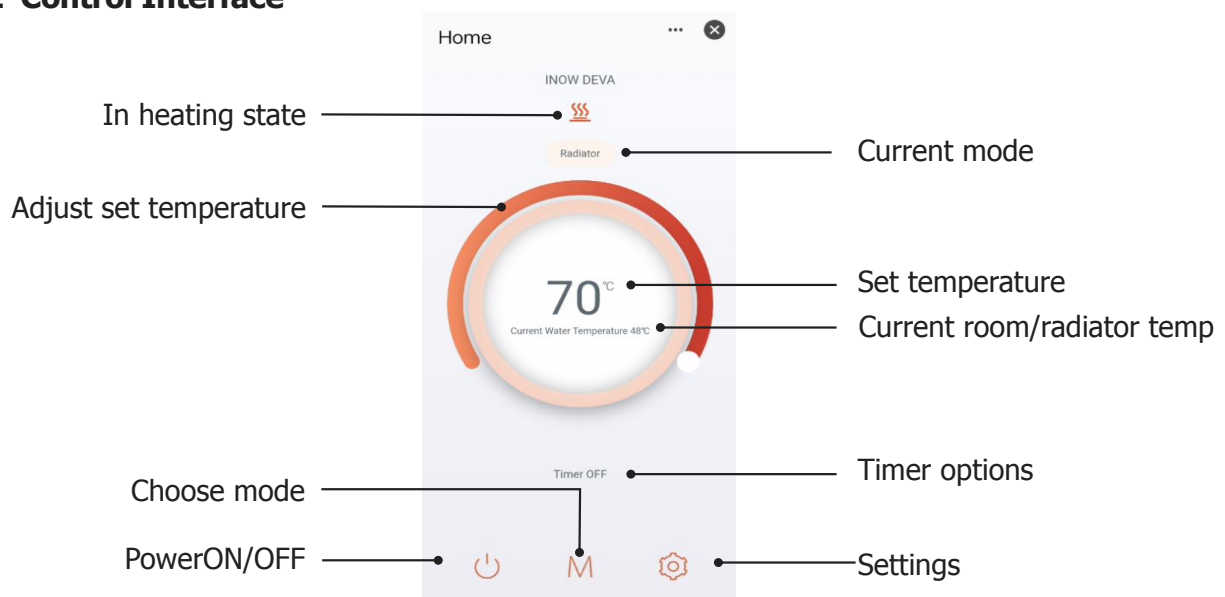
6.1 Home Overview

You can use the Smart Life app to control multiple devices. All devices are displayed on the home screen with their status.

Possible statuses:

- Online – Heater will respond to app commands.
- Offline – Device is turned off at wall or power switch. It cannot be controlled by the app.

6.2 Control Interface



6.3 Choose Mode

Tap the mode button on the interface to choose mode. The four options correspond to the four modes on the control panel. Comfort, Eco, Radiator and LST modes.

6.3.1 Comfort mode & Eco Mode

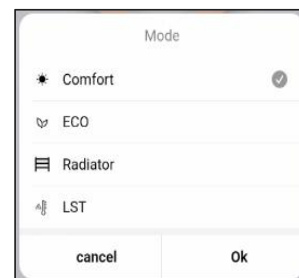
In comfort and Eco mode, simply use the sliding dial to adjust the set room temp.

6.3.2 Radiator Mode

In radiator mode, simply use the sliding dial to adjust the set radiator internal temperature.

6.3.3 LST Mode

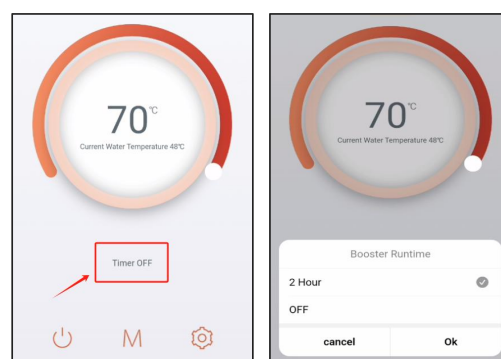
The device will operate at 43°C, and the temperature is non-adjustable.



6.4 Timer Mode

Timer options include 2 hours and OFF.

You can temporarily activate MAX working temperature by tapping the timer icon on the APP interface, the device will work at maximum power for 2 hours in radiator mode. After the set working hours are completed, it will return to standby mode.



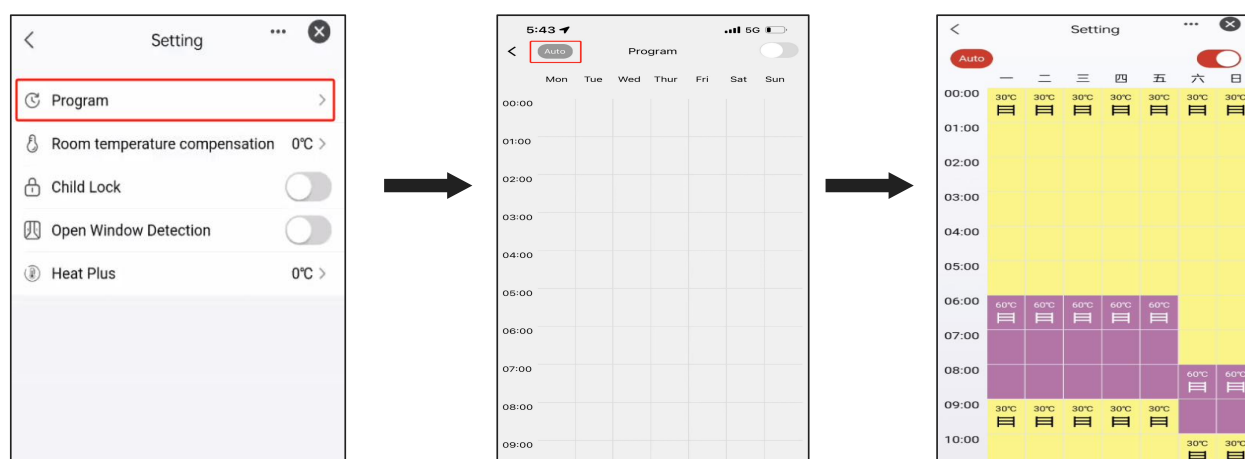
7. DEVICE SETTINGS

Tap the settings icon to view and adjust the device's settings. This menu allows you to configure several settings not available through the control dial.

7.1 Program

7.1.1 Auto Program

Tap the 'Auto' icon located in the top left corner of the program chart to activate the automatic preset program. The device will run in radiator mode by default program.



You can reset the program from the default automatic setting by clicking on the starting and ending hours on the axis, room temperature, radiator temperature and LST control options are available.



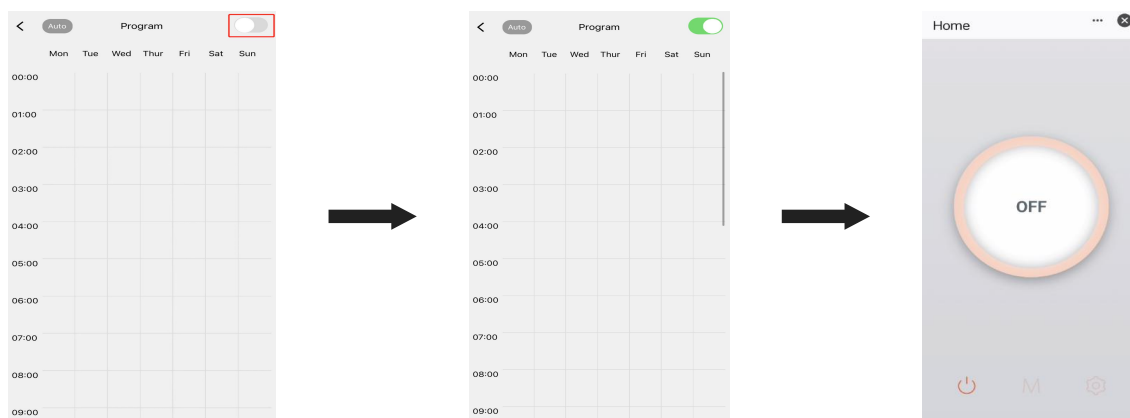
Default data list as below:

Period		Icon	Time	Temperature
Work day (Monday-Friday)	1	🏠	6:00	60°C
	2	🏠	9:00	30°C
	3	🏠	17:00	60°C
	4	🏠	22:00	30°C
Weekend (Saturday-Sunday)	1	🏠	8:00	60°C
	2	🏠	10:00	30°C
	3	🏠	17:00	60°C
	4	🏠	22:00	30°C

7.1.2 Set the program from no default

To set a preferred program, tap the  icon located in the top right corner of the program chart. You can create a program from unset data by clicking on the starting and ending hour on the axis, room temperature, radiator temperature and LST control options are available.

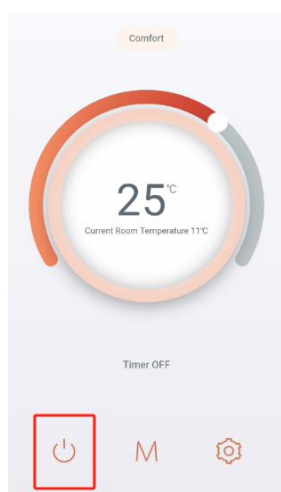
Note: When the time period on the axis is shown in grey, the device is in standby mode.



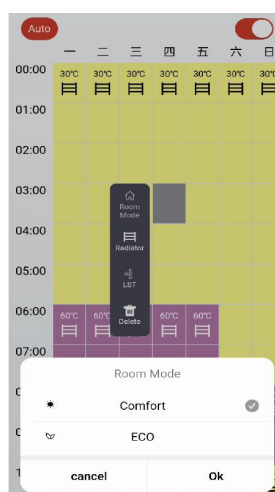
Tap the icon located in the top right corner to switch the program

When there is no program input, the area will be displayed in grey color

The device is in standby mode



Switch on again



Click the hours on the axis and choose the mode



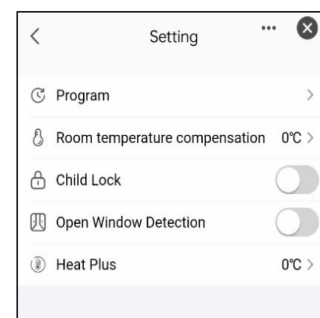
The selected program is displayed on the chart

7.2 Room Temperature Compensation

The room temperature compensation setting allows users to adjust for any discrepancy between the average room temperature and the temperature sensed by the thermostat.

You can adjust the room temperature compensation in steps of 1°C, from -10°C to 10°C. The default temperature compensation is 0°C.

For instance, if the temperature in the room is 18°C, but the device is sensing 16°C, a compensation factor of +2°C will offset the difference.



7.3 Child Lock

Use the toggle switch to lock or unlock the element's display.  displays on the screen when the device is locked.

7.4 Open Window Detection

Use the toggle switch to activate the open window detection function.

When the device detects a sudden drop in temperature (3°C or more within 5 minutes), it will switch to the anti-freeze temperature (fixed at 7°C) for 30 minutes to prevent energy wastage caused by heat escaping through the window. After the designated time period, it will revert back to the previous mode. If the temperature drops by 3°C within 5 minutes again, the device will switch back to the anti-freeze temperature and cycle through the process again.

7.5 Heat Plus

Heat plus is a function that lets you adjust the maximum internal temperature of your radiator or heated towel rail, the default cut off temperature is set to 70°C, this can be increase by 5°C to 75°C.

The Heat Plus function can be used for radiators or heated towel rails that have poor circulation where premature cutoff may be an issue.

8. TECHNICAL INFORMATION

Voltage	220-240V AC / 50Hz
Wattage	100-1200W
Mode	Room Temperature/Radiator/Anti-freezie//Timer/Child Lock/LST
Frost protection	7°C
Temperature setting	Room Temperature: 7°C -30°C Internal Fluid Temperature: 30°C -70°C
IP rating	IPX4
Timer mode	Boost 2 hours
Appliance class	Class I
Thread size	G ½ "
Application	This element is not suitable for dry heating. It must be submerged in liquid (either in a liquid-filled electric-only installation, or as part of a dual-fuel installation).

8. DISPOSAL



In accordance with WEEE Directive 2012/19/EU, the icon with the crossed-out waste bin on electrical or electronic equipment stipulates that this equipment must not be disposed of with household waste at the end of its life. You will find collection points for free return of waste electrical and electronic equipment in your vicinity. The addresses can be obtained from your local authority.

The separate collection of waste electrical and electronic equipment enables the re-use, recycling and other forms of recovery of waste equipment, and prevents any negative effects for the environment or human health.