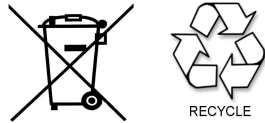


## **IMPORTANT**

- The appliance is not to be used by children or persons with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction
- Children should not be permitted to play with the appliance
- Ensure that the fan is switched off from the supply mains before removing the guard
- If the supply cord is damaged., it must be replaced by the manufacturer, its service agent or similarly qualified persons in order to avoid hazard.



Products with this symbol (crossed out wheeled bin) cannot be disposed as household waste. Old electrical and electronic equipment must be recycled at a facility capable of handling these products and their waste by-products. If you are purchasing replacement equipment your retailer may offer a 'take back' scheme, or will be able to give details of the nearest approved authorised treatment facility. Proper recycling and waste disposal will help conserve resources whilst preventing detrimental effects on our health and the environment.

WEEE Registered Code: WEE/ED0093VW

**This Installation and User Guide is printed on 100% re-cycled paper.**

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In light of our policy of continuous development Smith's Environmental Products Ltd reserve the right to alter specifications without prior notice.



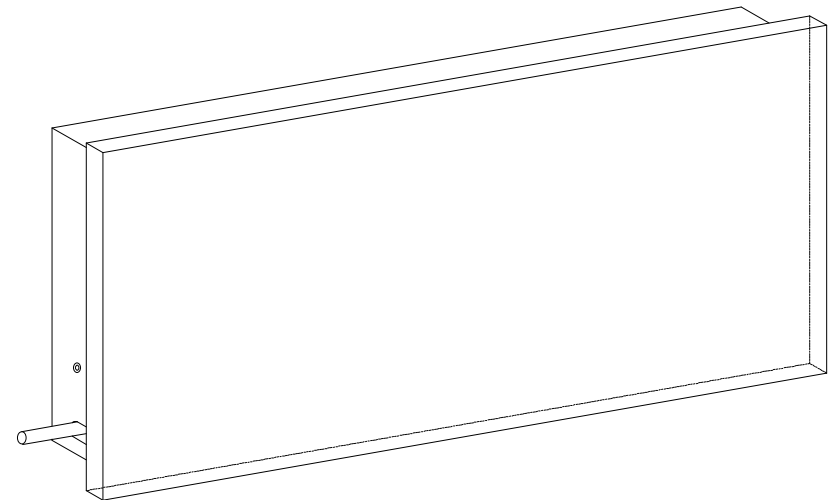
**Versatile, energy efficient heating**

**Eco-Powerad<sup>®</sup>**

**Models**

**500, 1000, 1500 & 2000**

## **INSTALLATION & USER GUIDE**



## INTRODUCTION

In the event of items missing or visible damage please contact us on 01245 324560.

This heating appliance is intended for mounting on a wall at low level. The minimum recommended installation height is 150cm (6 inches) from the floor. There is no clearance required on either side of the heater. The maximum installation height from the floor is 500mm.

This heater must not be used in bathrooms or other high humidity areas.

Eco-Powerad® units are designed for use on two-pipe pumped central heating systems and are suitable for use on low temperature systems where the hot water is generated from renewable sources. This product is not suitable for one-pipe heating systems. Pipe connections are 15mm.

We recommend the use of 15mm compression thermostatic radiator valves (TRV) and radiator lockshied valves for the pipe work connections.

Eco-Powerad® is classified as a fixed appliance and electrical connection should be via a switchable double pole 3A fused spur situated no more than 1metre away from the appliance and which must be accessible after completion of the installation. If the pre-wired mains cable is damaged, it must be replaced by the manufacturer, its service agent or similarly qualified persons. The appliance must be earthed.

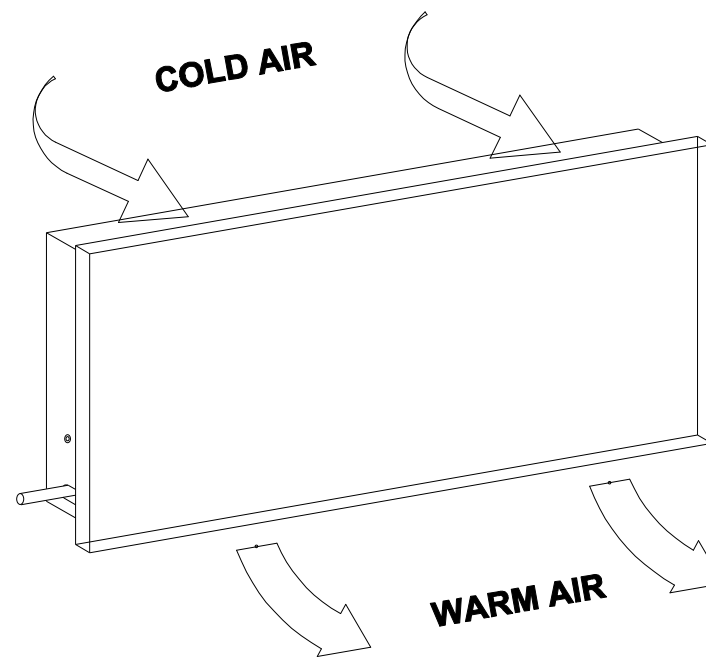
To avoid possibility of vibration, this product must be installed on a flat, even surface.

To comply with Building Regulations Part L (Part J in Scotland) this heater should be fitted and controlled by a thermostatic radiator valve or zone control thermostat.

**Please note the guarantee may be invalidated if this product is not installed and used in accordance with this guide.**

## MOUNTING THE UNIT

Remove both the EZ Hanger and the lower mounting bracket from the back of the heater.



## FAULT FINDING

### Fan does not run.

- Check the power source is switched ON
- Check fuse in the fused spur
- Check wiring connections at the fused spur
- Check the central heating system is on and water temperature 35°C +

### No heat output

- Check the power supply is switched ON
- Ensure the Thermostatic Radiator Valve (TRV) is calling for heat
- Balance the central heating system and increase the circulating pump speed if required.

In the event of difficulty please contact us on 01245 324560. It will be more helpful if you do not remove the product from the central heating system.

Please leave this installation & operation guide and the guarantee registration card with the owner of the property.

## USER GUIDE

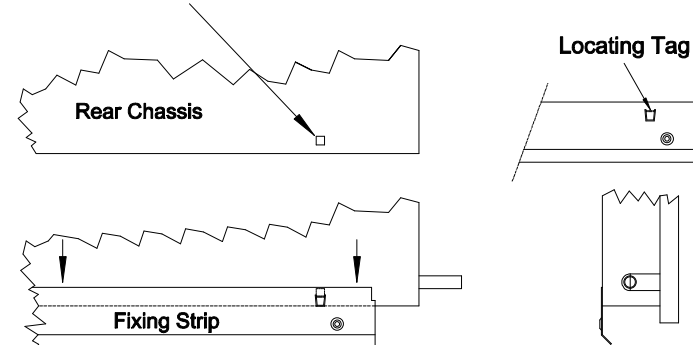
Your product is covered by a free 5-year parts and labour guarantee; please complete and return the Guarantee Registration Card to us as soon as possible to ensure that should you require assistance, we can help you quickly and efficiently.

Your Eco-Powerad® heater is designed to operate as part of your central heating system in the same way as a panel radiator. It will switch on and off automatically with your central heating system.

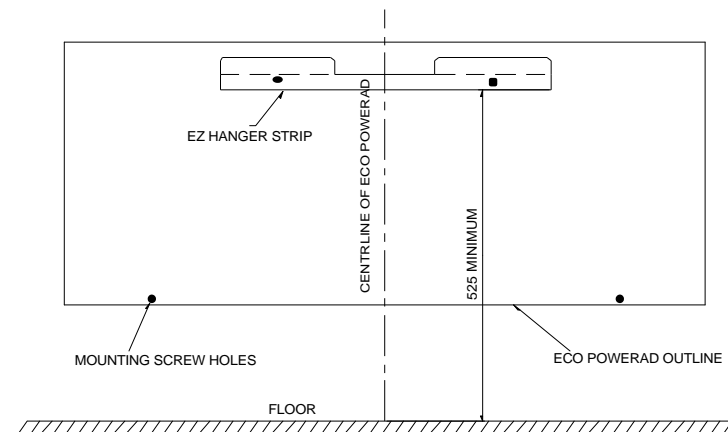
Heat from your central heating system passes through a heat exchanger transferring its heat to the aluminium fins, room air is drawn in the top grille and heated as it passes through the heat exchanger before being gently expelled back into the room at floor level.

Fix to the lower mounting bracket / air deflector to the chassis of the heater as shown below.

*Align tags on fixing strip into square holes on lower rear chassis and push downwards to attach*

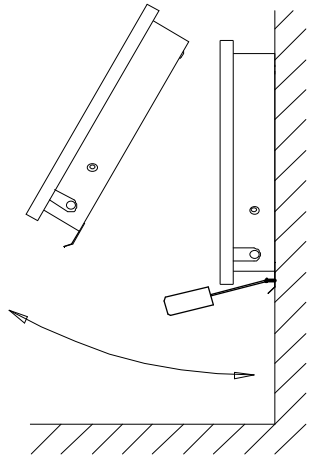


Fix the EZ easy hanger to the wall, position the heater on the EZ hanger and mark the fixing holes of the lower mounting bracket /air deflector.



Remove the heater from the EZ hanger and drill the marked holes for suitable fixings.

Position the unit on the EZ bracket and fix the lower mounting bracket /air deflector with suitable fixings (not supplied). See overleaf.



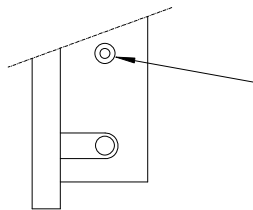
### PIPE WORK

This product should be connected to the system flow and return pipes using a 15mm compression type thermostatic radiator valve (TRV) and lockshield valve (refer to TRV manufacturer's instructions)

Take care not to stress or over tighten fittings as this could damage the unit pipe work.

Check for water leaks. Remove any trapped air from the system via the vent valve via the access holes on the left hand side of the unit.

Do not over tighten the air vent.



BLEED POINT  
ON LEFT SIDE

### ELECTRICAL CONNECTION

**ALL ELECTRICAL INSTALLATIONS CONNECTIONS MUST COMPLY WITH BS7671, 1992 AND THE IEE REGULATIONS. CHECK THE VOLTAGE ON THE HEATER IS CORRECT FOR YOUR SUPPLY. IF IN DOUBT, CONSULT A QUALIFIED ELECTRICIAN.**

If the pre-wired mains cable is damaged, it must be replaced by the manufacturer, its service agent or similarly qualified persons.

Isolate the supply and connect the heater three core mains lead to the switchable fused spur (3A) in accordance with the instructions provided on the mains lead label. (The supply wire which is coloured green or green and yellow must be connected to the terminal marked **E** on the appliance, the supply wire which is coloured black or blue must be connected to the terminal marked **N** on the appliance and the supply wire which is coloured red or brown must be connected to the terminal marked **L** on the appliance).

The switchable fused spur must not be directly above the heater and at a distance of no more than 1 metre from the heater and must be accessible after completion of the installation.

### COMMISSIONING

This heater is equipped with a low temperature cut out thermostat which requires the water in the heating system to be at least 35°C before the fan(s) will run.

Turn on the electrical supply at the fused spur, switch on the central heating system, set the thermostatic radiator valve (TRV) to maximum. Once the water within the heating system reaches + 35°C the fan(s) should run.

1. Turn on the electrical supply at the fused spur.
2. Turn on the central heating system.
3. Set thermostatic radiator valve (TRV) to maximum.
4. Balance the central heating system if required.
5. If the installation is working correctly remember to set the thermostatic radiator valve (TRV) to its normal/ desired setting.

### HEAT OUTPUT PERFORMANCE

Water Temperature	Eco-Powerad 500 Btu (kW)	Eco-Powerad 1000 Btu (kW)	Eco-Powerad 1500 Btu (kW)	Eco-Powerad 2000 Btu (kW)
40°	1025 (0.30)	2400 (0.70)	3075 (0.90)	4600 (1.35)
50°	1700 (0.50)	3400 (1.00)	5125 (1.50)	6825 (2.00)
75°	2900 (0.85)	7150 (2.10)	8200 (2.40)	11950 (3.50)

*Based on exiting water temperature, average temperature drop is 4°C.*