

Fitting & Wiring Instructions

IMPORTANT

PLEASE READ ALL INSTRUCTIONS CAREFULLY **BEFORE** COMMENCING INSTALLATION.

1. It is recommended that this controller is installed by a qualified electrician.
2. The installation and wiring must comply with current IEE Regulations, (BS 7671) or the appropriate standards in your country.
3. This controller is not suitable for use in rooms containing a fixed bath or shower.
4. When used with a Heat Recovery Ventilation unit installed in a room containing a fuel burning appliance, ensure that air replacement is adequate for both the fan(s) and the fuel burning appliance.
5. This controller has a maximum rating of 600W @ 20°C (400W @ 40°C) on a 220-240V ~ 50Hz supply. A maximum of 2 Vent-Axia Heat Recovery Ventilation units may be connected to one controller.

Description

This controller has been designed specifically for use with Vent-Axia Heat Recovery Ventilation units but may also be used to control other equivalent loads up to the stated rating. Facilities include on/off, heat recovery intake and extract, high and low volume extract, variable speed control and automatic control via electro-mechanical ON/OFF switched sensor, e.g. thermostat, timer relay, etc.

Location

The controller may be sited in any convenient position that is unaffected by direct heat sources such as radiators, boilers, etc. Do not site the controller where it may be subject to water spray, condensation, damp or wet conditions. If intended for use in abnormal ambient conditions, contact your local Vent-Axia Sales Centre.

Fitting

Unscrew the two screws and remove the lid/switch from the mounting box. The mounting box may be fixed to most single or double gang recessed metal outlet boxes or alternatively fixed direct to the wall for surface cable entry. When using surface wiring that is not being contained in conduit, the supply and output cables must be securely clipped to the mounting surface, close to the controller.

Wiring

WARNING: THIS APPLIANCE MUST BE EARTHED

Ensure that mains supply is isolated before proceeding with the wiring. The installation must be provided with a double-pole isolator switch, having a contact separation not less than 3mm, and be protected with a 5 amp fuse (UK).

Make electrical connections as shown in the wiring diagram to obtain all available functions of the controller.

For AUTOMATIC REMOTE SWITCHING (if required) see also relevant sensor wiring instructions.

Note:

Only mechanical or electro-mechanical switched sensors should be used.

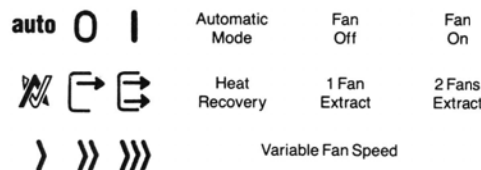
Connect sensor switch leads to L4 and L5 in the connector block 2.

When slide switch is in auto position marked **auto**, automatic switching from sensor/switch (if fitted) will be obtained. Ensure sensor switch is adequately rated for the switched load.

Note:

Where more than one Heat Recovery Ventilation unit is to be used, the additional unit must be wired in parallel using suitable junction boxes (not supplied).

SLIDE SWITCH FUNCTIONS

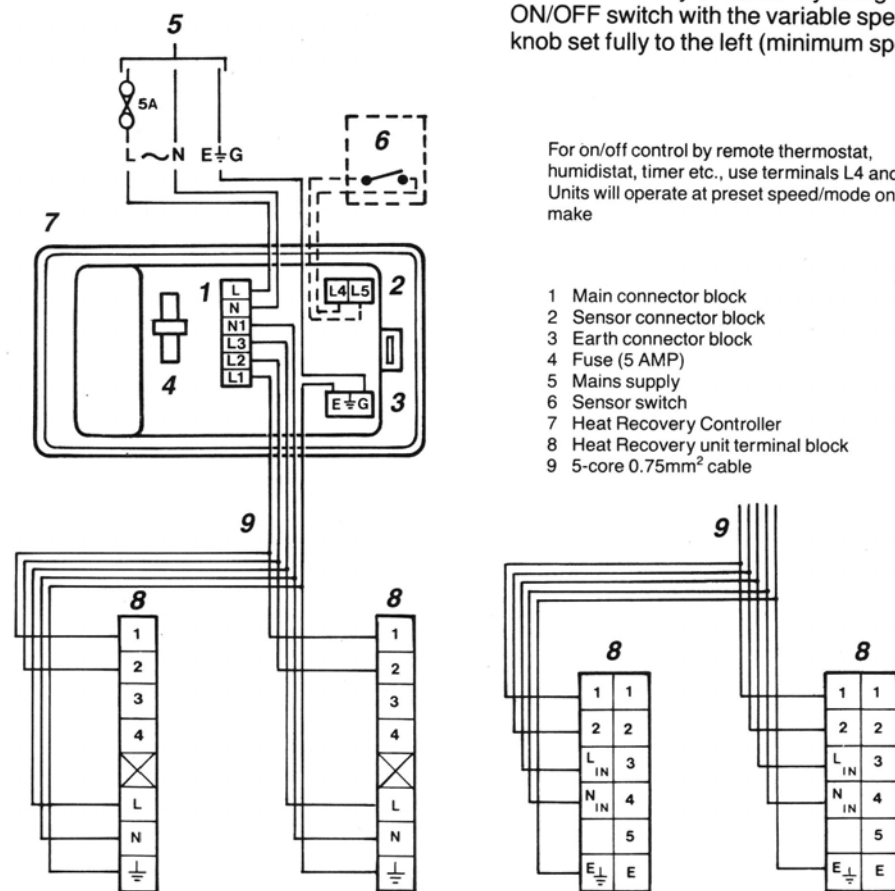


Replace the lid/switch into the mounting box. Do not over-tighten the captive screws.

MINIMUM SPEED ADJUSTMENT

A minimum speed adjuster is located on the front of the controller and is exposed when the bottom slide bar is moved fully to the left. This adjuster is used to vary the lowest speed setting if the fans do not revolve when the controller is set to minimum speed. Using a small screwdriver, turn the adjuster clockwise to increase the minimum speed setting. After any adjustment, make sure the fans will start from a stationary condition by using the ON/OFF switch with the variable speed slide knob set fully to the left (minimum speed).

For on/off control by remote thermostat, humidistat, timer etc., use terminals L4 and L5. Units will operate at preset speed/mode on make



- 1 Main connector block
- 2 Sensor connector block
- 3 Earth connector block
- 4 Fuse (5 AMP)
- 5 Mains supply
- 6 Sensor switch
- 7 Heat Recovery Controller
- 8 Heat Recovery unit terminal block
- 9 5-core 0.75mm² cable

CURRENT HEAT RECOVERY VENTILATION UNIT TERMINAL BLOCKS AS FITTED TO HR500 MKIII AND HR500X (STOCK REFS 14101010B AND 14101070)

EARLIER HEAT RECOVERY VENTILATION UNIT TERMINAL BLOCKS AS FITTED TO HR500 MKI AND MKII (STOCK REFS 14101010 AND 14101010A)