

JOHNSON & STARLEY WARM AIR HEATER USER'S INSTRUCTIONS for HEATER MODELS

HI-SPEC J20	HI-SPEC J30	HI-SPEC J50	HI-SPEC J65	HISPEC J90
HI-SPEC JU55	J55-65	J70-90 Mk2	JB16-20	JB25-30
JB40-50	J15-22 Mk3	J15-22R Mk3	J25-32 Mk3	J25-32R Mk3
JA33-43	JT19-25 Mk2	JT/RS22-25 Mk2	JU40-55	

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THESE APPLIANCES CONFORM TO BS EN 45014 WARNING: THESE APPLIANCES MUST BE EARTHED

Statute law defines that all gas appliances SHALL be installed and maintained by a competent person in accordance with the Gas Safety (Instruction and Use) Regulations, (current edition).

Note: The colour of the mains wiring in these appliances may not correspond to the coloured markings identifying the terminals of your plug.

The GREEN/YELLOW wire must be connected to the terminal marked 'E', coloured green or green/yellow, or



The **BLUE** wire must be connected to the terminal marked 'N', or coloured blue or black.

The BROWN wire must be connected to the terminal marked 'L', or coloured brown or red.

BEFORE USE, IDENTIFY YOUR HEATER TYPE BY REFERRING THE TOPRIGHT HAND CORNER OF THE HEATER DOOR, OR TO THE DATA LABEL INSIDE THE HEATER CABINET. Your heater will either be a MODAIRFLOW or non-MODAIRFLOW controlled model.

MODAIRFLOW CONTROL - HOW IT WORKS

Modairflow Control automatically operates your heating system to maintain your heating level efficiently and unobtrusively. You select your heating level by setting the Thermista-stat. The amount of heat required depends upon the difference between the temperature outside your home and the heating level you have chosen. The system automatically adjusts its warm air output to achieve and maintain this level.

Examples:

When full heat is required (during very cold weather or on initial warm up), the gas burner operates continuously and the fan runs at high speed.

When moderate heat is required, the gas burner operates at regular intervals and the fan runs continuously but at a lower speed.

When low heat is require, the gas burner operates for short periods and the fan runs intermittently at low speed.

IMPORTANT

FOR YOUR APPLIANCE TO WORK EFFICIENTLY, AND FOR YOUR HEATING SYSTEM TO PERFORM SATISFACTORILY, IT IS ABSOLUTELY ESSENTIAL TO OBSERVE THE FOLLOWING:

The heater is installed in a ventilated area. DO SEEK ADVICE from a Gas Installer before making any alterations likely to reduce the supply of fresh air to the heater.

ENSURE any air grilles on the heater, in the heater compartment, or in any walls, windows, or doors are **KEPT CLEAN AND UNOBSTRUCTED.**

ENSURE the air filter is **CLEANED** and **CORRECTLY REPLACED** at least once a month, or in accordance with the manufacturers instructions.

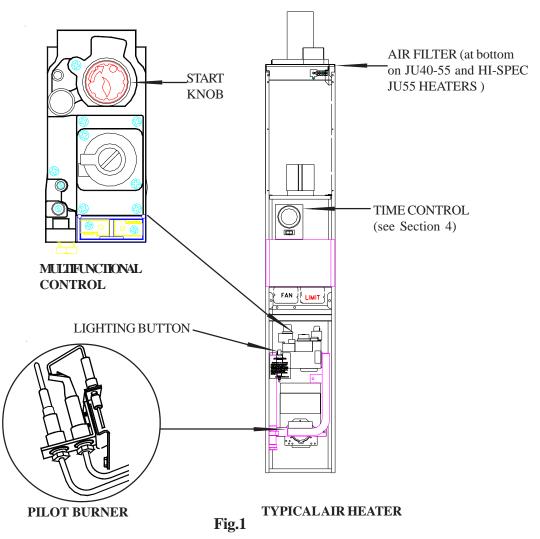
DO NOT PLACE ANYTHING (clothing, linen etc.) in contact with the heater or its flue pipe.

DO NOT USE the heater compartment for storage or airing.

DO NOT turn off the electrical mains supply to the heater until the gas supply has been turned off.

When replacing the mains fuse to the appliance, the fuse rating MUST NOT EXCEED 3A.

If at any time the main burner does not go out when there is no demand for heat, turn the Multifunctional control START KNOB clockwise (in the direction of the arrow), and contact your local gas service engineer.



TO LIGHT YOUR HEATER

WARNING: If the pilot light is extinguished, either intentionally or otherwise, no attempt should be made to relight the gas until at least 3 minutes have elapsed.

1.1 Remove the front door from the heater.

1.

- 1.2 Referring to Fig. 1, identify the positions of the Multifunctional control START KNOB and the PILOT BURNER.
- 1.3 Press and hold the START KNOB (allowing gas to be supplied to the heater), then repeatedly press and release the LIGHTING button until the PILOT BURNER lights whilst still holding the START KNOB depressed. After 20 seconds, release the START KNOB and ensure the PILOT BURNER is lit. If the PILOT BURNER does not remain lit, turn the START KNOB in the direction of the arrow and allow at least 3 minutes to elapse before repeating the lighting procedure, holding the START KNOB depressed for a longer period than before. If the PILOT BURNER will not stay alight, consult your local gas service engineer.

NOTE: It may be that your heater is not fitted with Piezo ignition (push button), or that the Piezo ignition is faulty. In this case, your heater can be lit manually by careful use of a lighted taper, as follows:

Press and hold the START KNOB and apply the lighted taper to the PILOT BURNER and ensure the PILOT BURNER lights. After 20 seconds, release the START KNOB and ensure the PILOT BURNER remains alight.

- 1.4 With the PILOT BURNER lit, refit the heater front door.
- 1.5 Switch the electrical supply to the heater ON, set the TIME CONTROL (if fitted) to an ON POSITION (refer to Section 4), and set the Thermista-stat/Room thermostat to the desired setting. The heater will now operate automatically and under thermostatic control.

2. TO STOP YOUR HEATER

2.1 **For short periods** (i.e. weekends):

- 2.1.1 Set the Thermista-stat (MODAIRFLOW heater) or room Thermostat (non-MODAIRFLOW heater) to the minimum setting. This prevents the main burner from lighting (except under very cold conditions when frost protection is provided), but leaves the pilot burner lit.
- 2.1.2 When heating is again required, set the thermista-stat to the required setting.
- 2.2 **For longer periods** (i.e. 1 week, or summer shut down):
 - 2.2.1 Turn the Multifunctional control START KNOB clockwise (approximately ¹/₄ turn). This extinguishes both the main burner and pilot burner, and prevents them from relighting until the full procedure for lighting your heater is followed as laid out in Section 1,
 - 2.2.2 If Summer Air Circulation is NOT required, Turn OFF the electrical supply to heater.

WARNING: Do not turn the OFF electrical supply to the heater whilst the main burner is lit, or damage to the heater may result.

NOTE: If Summer Air Circulation IS required, the electrical supply to the heater must remain ON.

3. TEMPERATURE CONTROL

MODAIRFLOW HEATERS:

3.1 The numbers on the Thermista-stat dial represent levels of warmth. When you select a number, the heater will automatically operate to maintain this level. You will soon find the setting with which you are most comfortable, and it is suggested that you start at mark 6, making adjustments up or down until a satisfactory level is reached.

Non-MODAIRFLOW HEATERS:

3.2 The room thermostat enables you to select the room temperature that you require. When the air temperature surrounding the thermostat reaches the selected temperature, the thermostat will switch the heater off. The thermostat will then automatically allow the heater to cycle on and off to maintain the selected room temperature.

CONTROL OF YOUR HEATING SYSTEM:

- 3.3 You can control the heat to each room by opening and closing the warm air outlets, but not more than half of these outlets should be closed at any one time or the performance of the heating system may be adversely affected.
- 3.4 Warm air outlets in the room where the Thermista-stat or room thermostat is sited should always be left open to ensure that the heating system is properly controlled.
- 3.5 During average winter weather, warm air outlets should only be opened as much as necessary to bring the room to a comfortable level, except in rooms where the Thermista-stat or room thermostat is fitted when the outlets should be left open to ensure that the heating system is properly controlled.

SUMMER AIR CIRCULATION (if fitted):

3.6 During hot weather, unheated air can be circulated around the home, by turning the heating requirement off and setting the SUMMER AIR CIRCULATION SWITCH to ON. This switches the heater's fan on, and circulates air around the home through the air outlets.

ECONOMIC OPERATION:

- 3.7 The best economy is achieved by setting the Thermista-stat or room thermostat to the lowest setting that you find acceptable.
- 3.8 Overnight in prolonged severe weather, it is better to set the air heater TIME CONTROL (if fitted), to ON ALL TIME, and reduce the Thermista-stat or room thermostat setting to provide general background heating. Resetting the controls to normal settings on rising will quickly raise the room temperature.
 - 3.8.1 Recommended background heating settings:

Thermista-stat: Mark 4

Room thermostat: 13°C (55°F)

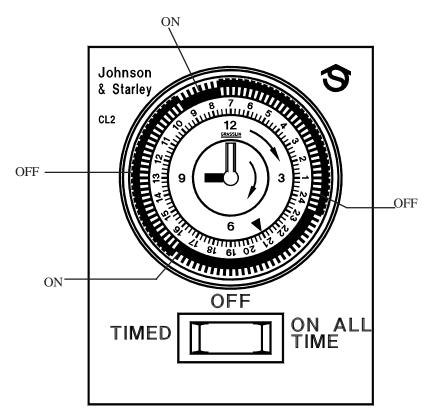


Fig. 2a CL2 TIME CONTROL

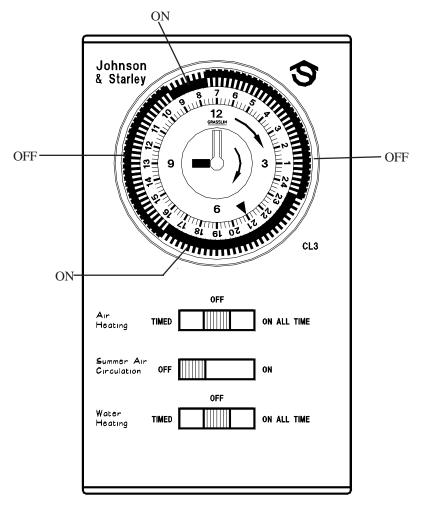


Fig. 2b CL3 TIME CONTROL

- 4.1 If an integral time control is fitted, it will be one of the two types shown in Fig. 2a or 2b.

 Type **CL2** will provide continuous or timed operation of the air heater, whilst type **CL3** will provide continuous or timed operation of the air heater and water heater, either individually or both together.
- 4.2 **To set the time of day:** Grip the outside of the dial and turn the dial **clockwise** until the correct time is represented by the centre clock on the dial, and the arrow at the bottom right points to the correct time on the 24 hour dial (the shortest time period is 15 minutes). **DO NOT** attempt to turn the dial anticlockwise.
- 4.3 **To set ON and OFF Times:** ON times are set by pushing the tappets IN towards the centre of the dial, and OFF times are set by tappets being withdrawn to the outside of the dial. The minimum operating period that can be set is 15 minutes (single tappet).

Example: required ON times are 07.30 (7.30 am) to 09.00 (9.00 am) and 16.30 (4.30 pm) to 23.15 (11.15 pm).

- 4.3.1 Push all tappets from 7.30 to 9.00, and 16.30 to 23.15 in towards the centre of the dial
- 4.3.2 Withdraw all other tappets to the outside of the dial.
- 4.3.3 Set the correct time of day by turning the dial CLOCKWISE until the actual time lines up with the pointer.
- 4.3.4 Set the switch to 'TIMED'.
- 4.3.5 Set the Thermista-stat or room thermostat to the desired setting, the heater will now operate during the required on times.
- 4.4 **OTHER OPERATING CONDITIONS:** The heater can also be operated outside the time control settings, (at weekends for example), by setting the appropriate switch to 'ON ALL TIME'. To return to timed operation, simply return the switch to the 'TIMED' position. If heating is not required, the switch is set to the 'OFF' position.

5. AIR FILTER

IMPORTANT: The air filter should be cleaned every two weeks during the heating season, or every week for the first month in new homes to clear builder's dust etc.

5.1 To clean the air filter, withdraw it from the heater and clean it using either a soft brush or vacuum cleaner before refitting it to the heater. DO NOT allow the filter to become clogged, or the heater output will be greatly reduced and fuel will be wasted.

6. MAINTENANCE

6.1 It is recommended that a full maintenance check on your appliance is made annually, and that a service contract is taken out on completion of the guarantee period. Your installer will give you details of arrangements for this service. If your installer has difficulty in providing this information, please contact Johnson & Starley Service department, who will provide information of suitable service companies.

7. POWER CUTS

7.1 If you experience an electrical power cut, the Multifunctional control will automatically close. This will cause the main burner to go out, whilst the pilot burner will remain lit. When the electrical supply is restored, you heater will start working normally. If your heating system is controlled by an electrical time control (CL2 or CL3), it may be necessary to reset it.

8. HEATER NOT GIVING THE SERVICE YOU NEED

- 8.1 Check that the Thermista-stat or room thermostat and time control (if fitted) are correctly set to your requirements, and at least half of the warm air outlets are open, especially in the room where the temperature control is sited.
- 8.2 Check that the pilot burner is lit. If not, carry out the lighting procedure as detailed in Section 1.
- 8.3 Check if the air filter is clogged, and clean as instructed in Section 5.
- 8.4 If the fan will not slow down or stop at any time, ensure that the summer air circulation switch (if fitted) is set to 'OFF'.

8.5 **SERVICE ARRANGEMENTS:**

New Appliances: Service is supplied under guarantee by the installer for the first 12 months, thereafter, should you have difficulty in obtaining service, Johnson and Starley Service Department will provide information of suitable service companies.

Landlords: Landlords must have their own arrangements for servicing.

9. IF YOU SMELL GAS:

- 9.1 DO NOT OPERATE ANY ELECTRICAL SWITCHES, OR USE A NAKED FLAME.
- 9.2 **TURN OFF** the gas at the gas meter.
- 9.3 **VENTILATE** the area by opening doors and windows.
- 9.4 Contact your local gas service engineer, or gas supplier.

10. CLEANING

10.1 If necessary, the heater cabinet may be cleaned using a mild soap solution. DO NOT USE ABRASIVE or STRONG ALKALIS

In the event of the appliance being sold or transferred to another user, THESE instructions must be supplied

Johnson and Starley prides itself on its ability to supply spare parts quickly and efficiently. If your service engineer indicates a problem in obtaining a spare part, advise him to contact Johnson and Starley Spares Department at the address below.

Telephone: 01604 762881

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Fax: 01604 767408