

### INSTRUCTIONS FOR:-HEATER CONTROLLER Model:- CS-7

Thank you for purchasing a BNThermic product. Manufactured to a high standard, this product will, if used according to these instructions and properly maintained, give you years of trouble free performance. Please ensure instructions remain with your customer for their reference.



**IMPORTANT:** PLEASE READ THESE INSTRUCTIONS IN CONJUNCTION WITH THE HEATER INSTRUCTIONS, NOTE THE SAFE OPERATIONAL REQUIREMENTS, WARNINGS, AND CAUTIONS. USE THIS PRODUCT CORRECTLY, AND WITH CARE FOR THE PURPOSE FOR WHICH IT IS INTENDED. FAILURE TO DO SO MAY CAUSE DAMAGE AND/OR PERSONAL INJURY AND WILL INVALIDATE THE WARRANTY.

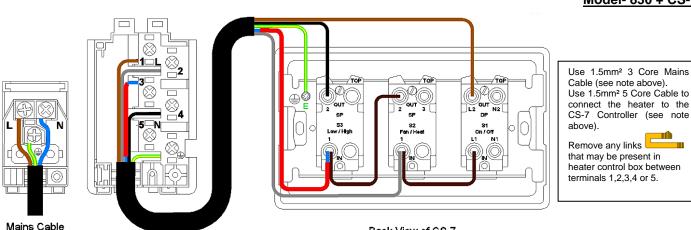


Please ensure you follow the correct wiring diagram for the heater you are connecting the CS-7 controller too.
Incorrect installation may damage the heater and is not covered by the guarantee.
Please Note:- Specified cable sizes are for typical installations, correction factors may need to be used when determining actual cable sizes.

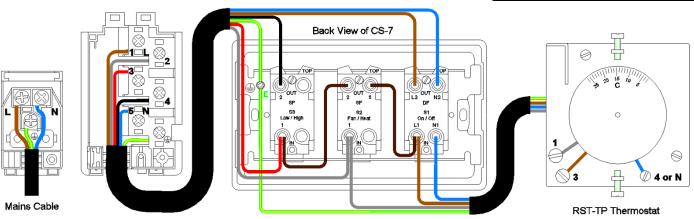
The model number of the heater can be found on the silver label attached to the heater close to the mains cable electrical connection box.

#### 1. Heater Model – 830

#### Model- 830 + CS-7



#### Model- 830 + CS-7 + Thermostat



Back View of CS-7

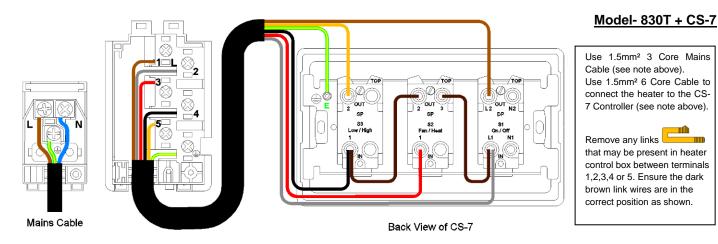
Use 1.5mm<sup>2</sup> 3 Core Mains Cable (see note above).

Use 1.5mm² 6 Core Cable to connect the heater to the CS-7 Controller (see note above).

Use 1.5mm<sup>2</sup> 4 Core Cable to connect the CS-7 Controller to Thermostat (see note above)

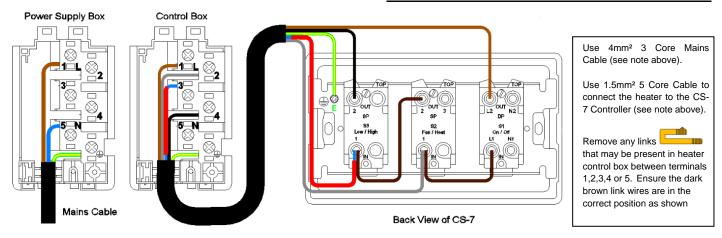
Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5. Ensure the dark brown link wires are in the correct position as shown above.

#### 2. Heater Model – 830T

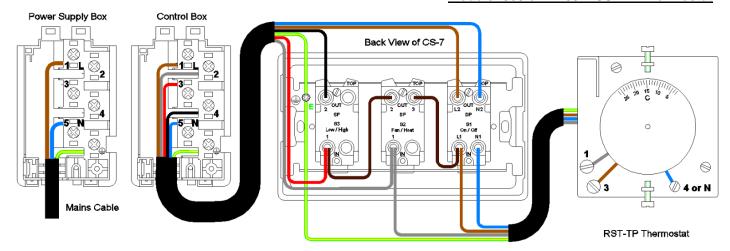


#### 3. Heater Models - 860 / SCHG-60 / SMH-60 or RH60

#### Models- 860 or SCHG-60 or SMH-60 or RH60 + CS-7



#### Models- 860 or RH60 + CS-7 + Thermostat

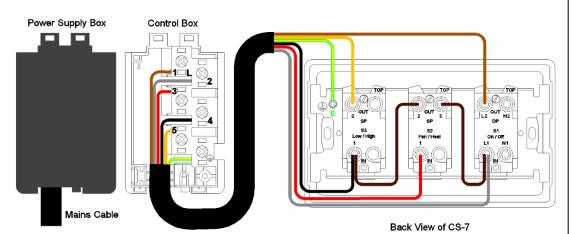


Use 4mm² 3 Core Mains Cable (see note above). Use 1.5mm² 6 Core Cable to connect the heater to the CS-7 Controller (see note above). Use 1.5mm² 4 Core Cable to connect the CS-7 Controller to Thermostat (see note above).

Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5. Ensure the dark brown link wires are in the correct position as shown above.

#### 4. Heater Models - 860T / 890T / SCHG-60T / SMH-60T

#### Models-860T or 890T or SCHG-60T or SMH-60T + CS-7



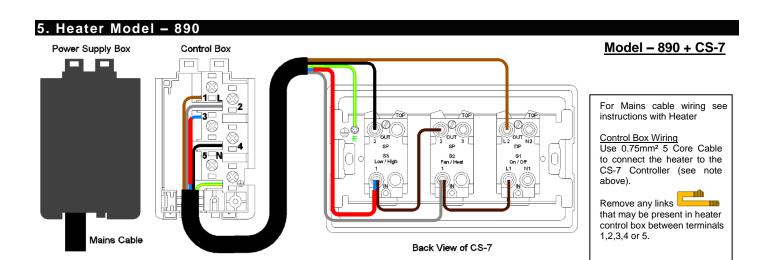
For Mains cable wiring see instructions with each Heater

#### Control Box Wiring

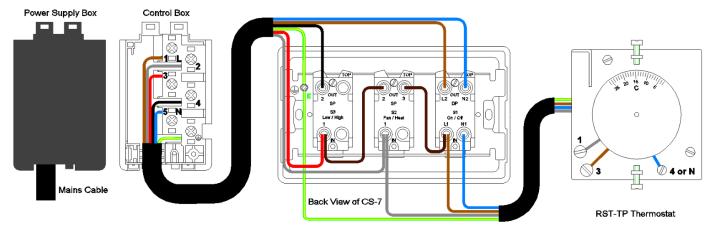
Use 1.5mm² 6 Core Cable to connect the heater to the CS-7 Controller for all heaters except 890T (see note above).

For 890T heater use 0.750mm² 6 Core Cable to connect the heater to the CS-7 Controller

Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5. Ensure the dark brown link wires are in the correct position as shown.



#### Model - 890 + CS-7 + Thermostat

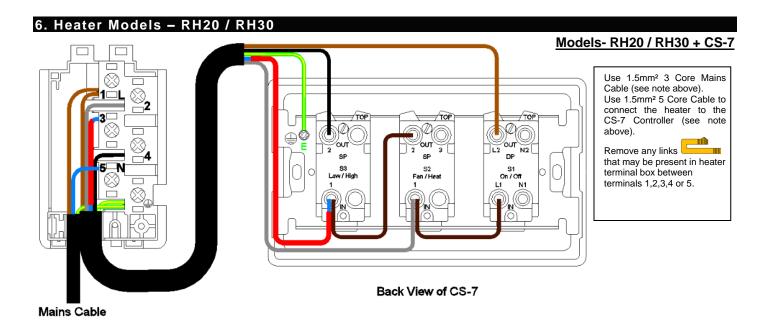


For Mains cable wiring see instructions with Heater

#### Control Box Wiring

Use 0.75mm<sup>2</sup> 6 Core Cable to connect the heater to the CS-7 Controller (see note above). Use 0.75mm<sup>2</sup> 4 Core Cable to connect the CS-7 Controller to Thermostat (see note above).

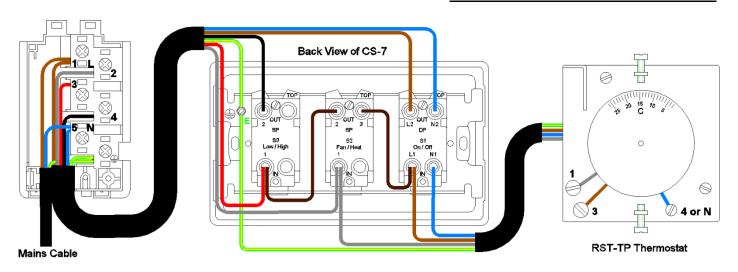
Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5. Ensure the dark brown link wires are in the correct position as shown above.



#### Models-RH20 / RH30 + CS-7 + Thermostat

Models- SCHG-30/45 + CS-7 or SMH-30/45

above).

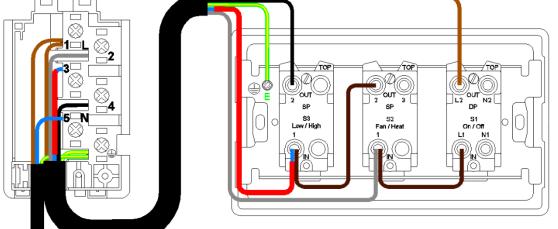


Use 1.5mm² 3 Core Mains Cable (see note above). Use 1.5mm² 6 Core Cable to connect the heater to the CS-7 Controller (see note above). Use 1.5mm<sup>2</sup> 4 Core Cable to connect the CS-7 Controller to Thermostat (see note above).

🚥 that may be present in heater terminal box between terminals 1,2,3,4 or 5. Ensure the dark brown link wires are in the correct position.



#### Use 2.5mm<sup>2</sup> 3 Core Mains Cable (SCHG-45 or SMH-45) or 1.5mm<sup>2</sup> 3 Core Mains Cable (SCHG-30 or SMH-30) (see note above).



Remove any links that may be present in heater terminal box between terminals 1,2,3,4 or 5.

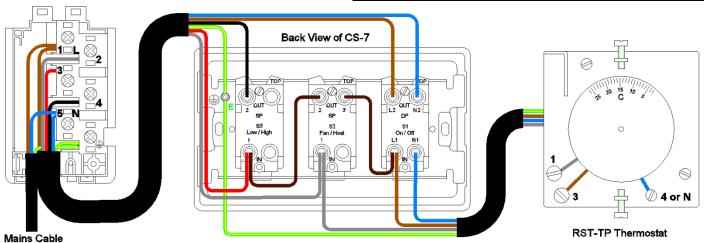
Use 2.5mm<sup>2</sup> 5 Core Cable (SCHG-45 or SMH-45) or 1.5mm<sup>2</sup> 5 Core Cable

(SCHG-30 or SMH-30) to connect the heater to the CS-7 Controller (see note

Back View of CS-7

Mains Cable

#### Models- SCHG-30/45 or SMH-30/45 + CS-7 + Thermostat



Use 2.5mm<sup>2</sup> 3 Core Mains Cable (SCHG-45 or SMH-45) or 1.5mm<sup>2</sup> 3 Core Mains Cable (SCHG-30 or SMH-30) (see note above). Use 2.5mm² 6 Core Cable (SCHG-45 or SMH-45) or 1.5mm² 6 Core Cable (SCHG-30 or SMH-30) to connect the heater to the CS-7 Controller (see note above). Use 2.5mm² 4 Core Cable (SCHG-45 or SMH-45) or 1.5mm² 4 Core Cable (SCHG-30 or SMH-30) to connect the CS-7 Controller to Thermostat (see note above). Remove any links that may be present in heater terminal box between terminals 1,2,3,4 or 5.

#### 8. Heater Models - SCHG-30T / SCHG-45T or SMH-30T / SMH-45T

# Models - SCHG-30T/45T or SMH-30T/45T + CS-7 **Power Supply Box** Control Box NO) DP Mains Cable Back View of CS-7

#### For Mains cable wiring see

instructions with each Heater

#### Control Box Wiring

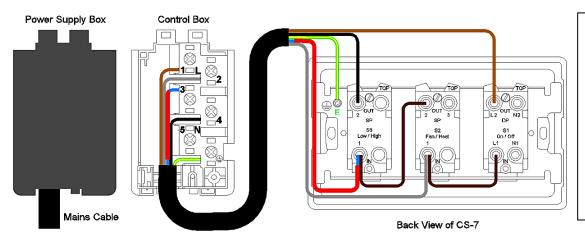
Use 2.5mm<sup>2</sup> 6 Core Cable (SCHG-45T or SMH-45T) or 1.5mm² 6 Core Cáble (SCHG-30T or SMH-30T) to connect the heater to the CS-7 Controller (see note above).

Remove any links that may be present in heater control box between terminals 1.2.3.4 or 5.

Ensure the dark brown link wires are in the correct position as shown.

#### Heater Models - CAS-30 / CAS-45

#### Models - CAS-30 and CAS-45



For Mains cable wiring see instructions with each Heater

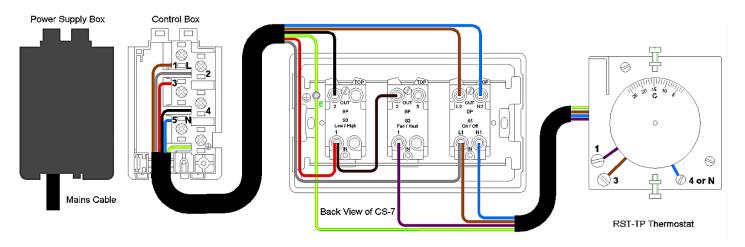
#### Control Box Wiring

Use 2.5mm<sup>2</sup> 6 Core Cable (CAS-45) or 1.5mm<sup>2</sup> 6 Core Cable (CAS-30) to connect the heater to the CS-7 Controller (see note above).

Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5. Ensure the dark brown link

wires are in the correct position as shown.

#### Models- CAS-30 and CAS-45 + CS-7 + Thermostat



For Mains cable wiring see instructions with each Heater

Remove any dark brown link that may be present between L1 on the right switch and the centre switch to leave only the link between terminal 2 of the centre switch and terminal 1 of the left switch

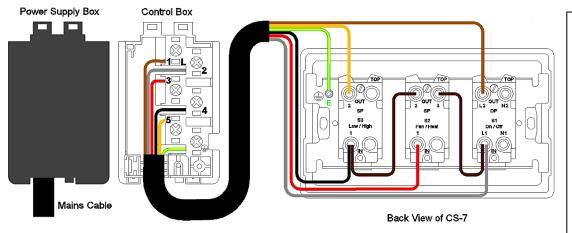
Use 2.5mm² 6 Core Cable (CAS-45) or 1.5mm² 6 Core Cable (CAS-30) to connect the heater to the CS-7 Controller (see note above).

Use 2.5mm² 4 Core Cable (CAS-45) or 1.5mm² 4 Core Cable (CAS-30) to connect the CS-7 Controller to Thermostat (see note above).

Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5.

#### 10. Heater Models - CAS-30T / CAS-45T

#### Models - CAS-30T and CAS-45T



For Mains cable wiring see instructions with each Heater

# Control Box Wiring Use 2.5mm² 6 Core Cable (CAS-45T) or 1.5mm² 6 Core Cable (CAS-30T) to connect the heater to the CS-7 Controller (see note above).

Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5. Ensure the dark brown link wires are in the correct position as shown.

#### 11. Heater Models - CAD-60 / CAD-90

# Power Supply Box Control Box Mains Cable Control Box Back View of CS-7

#### Models - CAD-60 and CAD-90

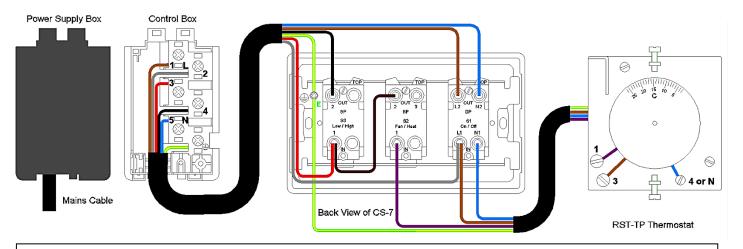
For Mains cable wiring see instructions with each Heater

# Control Box Wiring

Use 6mm² 6 Core Cable (CAD-90) or 4mm² 6 Core Cable (CAD-60) to connect the heater to the CS-7 Controller (see note above).

Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5. Ensure the dark brown link wires are in the correct position as shown.

#### Models- CAD-60 and CAD-90 + CS-7 + Thermostat



For Mains cable wiring see instructions with each Heater

Remove any dark brown link that may be present between L1 on the right switch and the centre switch to leave only the link between terminal 2 of the centre switch and terminal 1 of the left switch

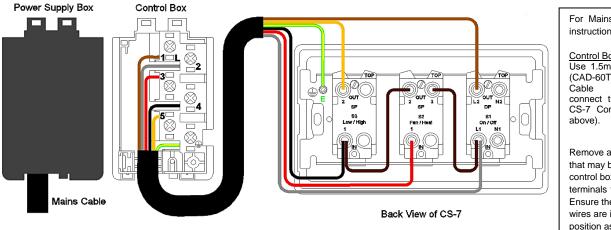
Use 1.5<sup>2</sup> 6 Core Cable (CAD-60) or 1mm<sup>2</sup> 6 Core Cable (CAD-90) to connect the heater to the CS-7 Controller (see note above).

Use 1.5mm² 4 Core Cable (CAD-60) or 1mm² 4 Core Cable (CAD-90) to connect the CS-7 Controller to Thermostat (see note above).

Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5.

#### 12. Heater Models - CAD-60T / CAD-901

#### Models - CAD-60T and CAD-90T



# For Mains cable wiring see instructions with each Heater

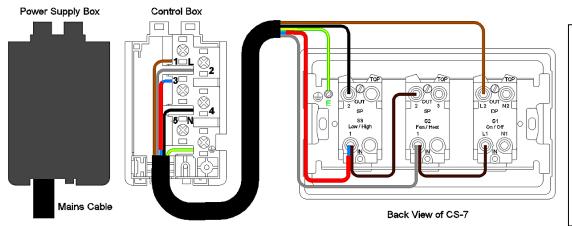
## Control Box Wiring

Use 1.5mm² 6 Core Cable (CAD-60T) or 1mm² 6 Core Cable (CAD-90T) to connect the heater to the CS-7 Controller (see note above).

Remove any links
that may be present in heater
control box between
terminals 1,2,3,4 or 5.
Ensure the dark brown link
wires are in the correct
position as shown.

#### 13. Heater Models - CAT-90 / CAT-135

#### Models - CAT-90 and CAT-135



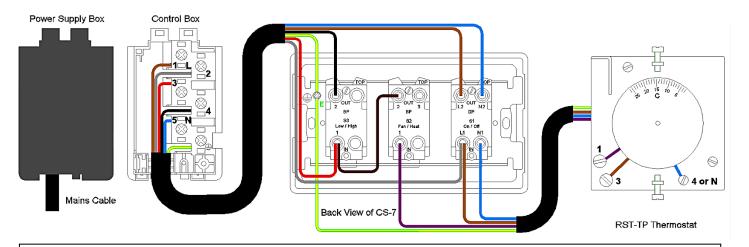
For Mains cable wiring see instructions with each Heater

#### Control Box Wiring

Use 1mm² 6 Core Cable (CAT-90) or 1mm² 6 Core Cable (CAT-135) to connect the heater to the CS-7 Controller (see note above).

Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5.
Ensure the dark brown link wires are in the correct position as shown.

#### Models- CAT-90 and CAT-135+ CS-7 + Thermostat



For Mains cable wiring see instructions with each Heater

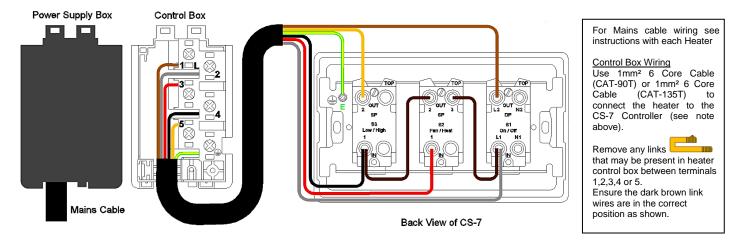
Remove any dark brown link that may be present between L1 on the right switch and the centre switch to leave only the link between terminal 2 of the centre switch and terminal 1 of the left switch

Use 1mm<sup>2</sup> 6 Core Cable (CAT-90) or 1mm<sup>2</sup> 6 Core Cable (CAT-135) to connect the heater to the CS-7 Controller (see note above). Use 1mm<sup>2</sup> 4 Core Cable (CAT-90) or 1mm<sup>2</sup> 4 Core Cable (CAT-135) to connect the CS-7 Controller to Thermostat (see note above).

Remove any links that may be present in heater control box between terminals 1,2,3,4 or 5.

#### 14. Heater Models - CAT-90T / CAT-135T

#### Models - CAT-90T and CAT-135T



# PLEASE CHECK ALL CONNECTIONS BEFORE TURNING ON AS INCORRECT WIRING IS NOT

#### **COVERED BY THE GUARANTEE**

NOTE: It is our policy to continually improve products and as such we reserve the right to alter data, specifications and component parts without prior notice.

**IMPORTANT:** No liability is accepted for incorrect use of this product.

**WARRANTY:** Your BN Thermic product is guaranteed for one year from date of purchase. We will repair or replace at our discretion any part found to be defective. We cannot assume any consequential liability. This guarantee in no way prejudices your rights under common law and is offered as an addition to consumer liability rights.

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