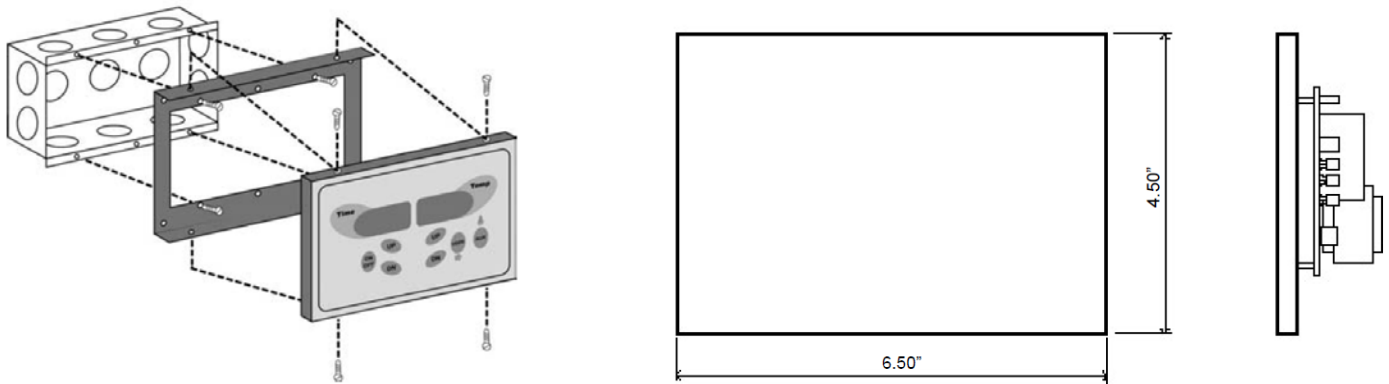


Electronic Control Operation Manual (EL-13)



Idle: When control is inactive, it will show “O” in time window and current room temperature.

Start: Press “**ON/OFF**”.
Sauna defaults to 60 minutes and maximum temperature (90C or 194 F).

When operational, time window will flash between the word “on” and setpoint and time remaining and actual temperature.

When the control is engaged, a small dot will flash in the time window.

Off: Pressing the “**ON/OFF**” to turn off the sauna.

Temperature: Use the “**up**” and “**down**” icons, on the “Temp” side (right) to set the desired temperature.

Time: Use the “**up**” and “**down**” icons, on the “Time” side (left) to set the desired time.

Light: Light Function not available

C. vs. F.: Controls come either Celsius or Fahrenheit as ordered.

TROUBLESHOOTING:

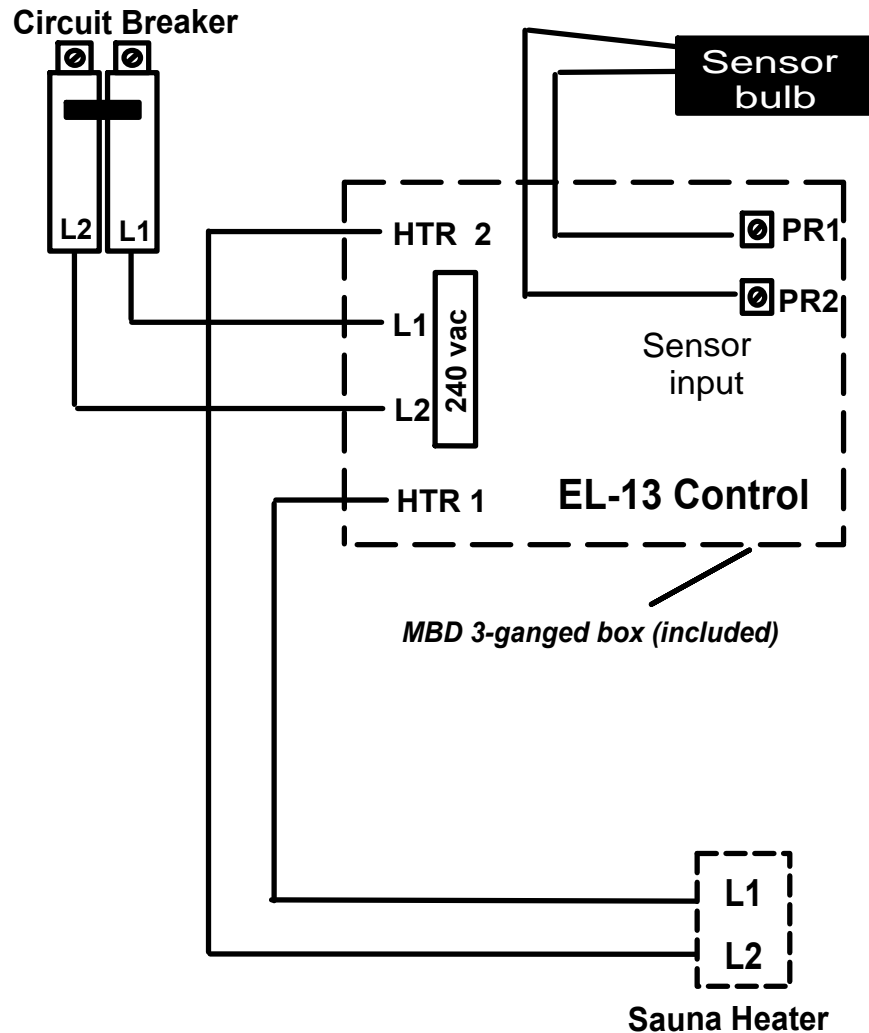
The sensor wiring and controls are continually checked for proper operation. If a malfunction is detected, the controller will automatically switch OFF the load and deactivate itself. At the same time the display will show “Err”. The controller cannot be reactivated until all causes of the malfunction are fixed.

EL-13 CONTROL

CONTROL TO BE INSTALL OUTSIDE OF SAUNA (i.e.front wall, next to door)

4 KW, 5 KW & 6 KW / 240 Volt / 1 PHASE

Sensing bulb comes connected to control. Remove and relocate. Sensing bulb should be located at ceiling 3'-4' from heater. 12' of capillary wire included. (If additional length required, use 18ga or 20ga wire to extend)



EL-13 CONTROL INSTALLATION AND OPERATION

| <u>Watts</u> | <u>Volts</u> | <u>Phase</u> | <u>Wire Size</u> | <u>Breaker</u> |
|--------------|--------------|--------------|------------------|----------------|
| 4000 | 240 | 1 | 10 | 30 |
| 5000 | 240 | 1 | 10 | 30 |
| 6000 | 240 | 1 | 10 | 30 |

* Breaker & wire size is recommendation only. Confirm with your licensed electrician.

Operation

** See programming instruction sheet for set up of control

Installation Tips

1. Avoid static build up when control sensor bulb are handled.
2. Avoid running sensor bulb capillary wire too close to line power lines.
3. #10 SEW wire with spade connector included. For use with 6kw heater with #8 supply

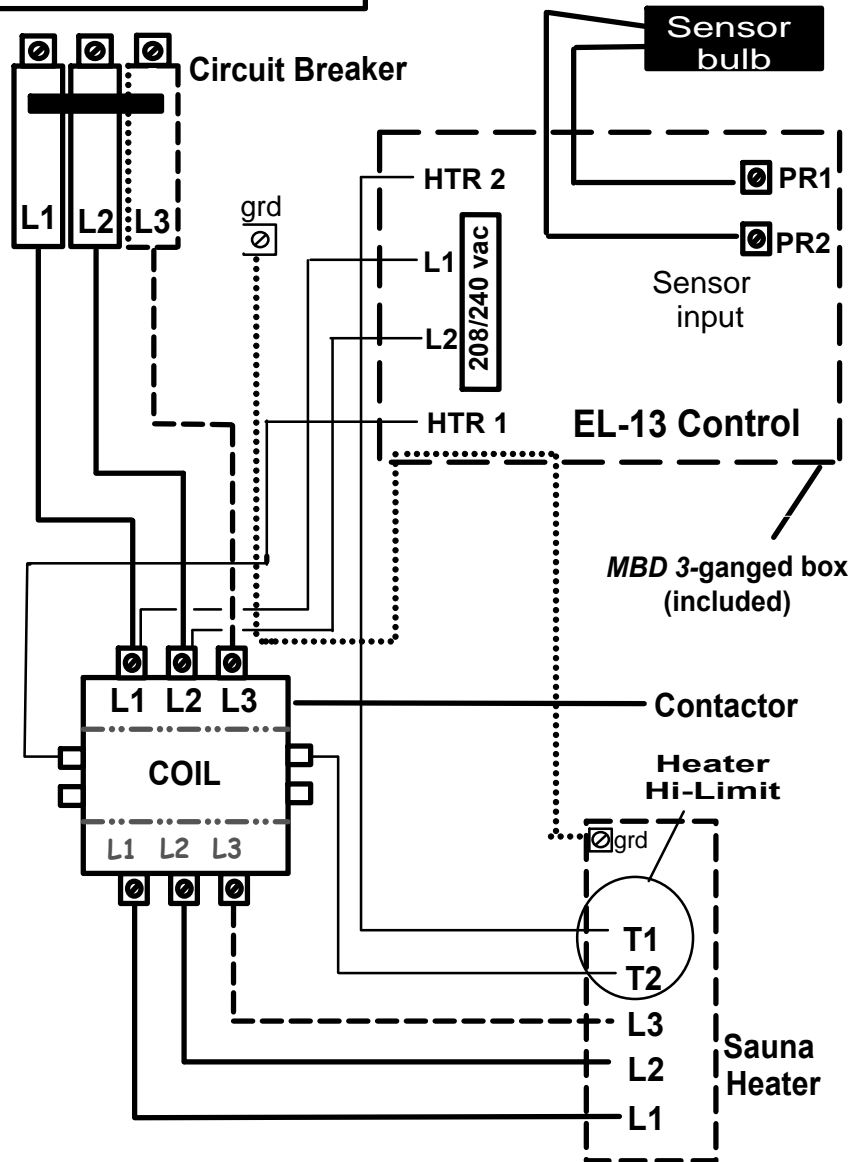
EL-13 CONTROL with CONTACTOR

For Heaters 7.5 kw & larger

Ensure that correct voltage is applied to the contactor coil.

- Control Wire (#14)
- Supply Wire
- - - Dashed line for 3 Phase Only

Sensing bulb comes connected to control. Remove and relocate. Sensing bulb should be located at ceiling 3'-4' from heater. 12' of capillary wire included. (If additional length required, use 18ga or 20ga wire to extend)

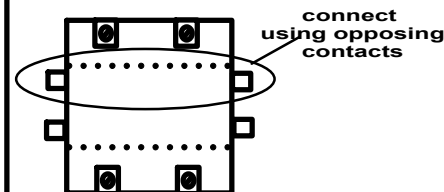


CONTACTOR DETAIL

Install contactor between breaker and control. Most are installed next to breaker panel. Following examples of the different contactors depending upon heater wattage and phase. The broken lines represent the coil in the middle of the contactor.

For 7.5 - 9 KW single phase units.

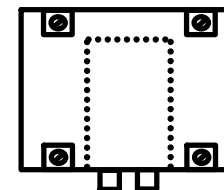
40 Amp. Res. (7.5 kw, 240 v, 1 phase)
50 Amp. Res. (9 kw, 240 v, 1 phase)



Coil connections at sides.

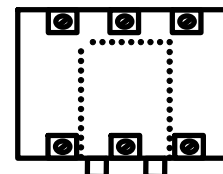
For 12 KW 1 phase units.

63 Amp. Res. (12 kw, 240 v, 1 phase)



Coil connections at bottom.

3 phase units.



Coil connections at bottom.

40 Amp. Res. (6kw to 12 kw, 208 v, 3 phase)
50 Amp. Res. (15 kw, 208 v, 3 phase)
63 Amp. Res. (18 kw, 208 v, 3 phase)

| <u>Watts</u> | <u>Volts</u> | <u>Phase</u> | <u>Wire Size</u> | <u>Breaker</u> |
|--------------|--------------|--------------|------------------|----------------|
| 6000 | 208 | 3 | 10 | 30 |
| 7500 | 240 | 1 | 8 | 40 |
| 7500 | 208 | 3 | 10 | 30 |
| 9000 | 240 | 1 | 8 | 40 |
| 9000 | 208 | 3 | 8 | 40 |
| 12000 | 240 | 1 | 6 | 60 |
| 12000 | 208 | 3 | 8 | 50 |
| 15000 | 240 | 1 | 4 | 80 |
| 15000 | 208 | 3 | 6 | 60 |
| 18000 | 208 | 3 | 6 | 70 |

* Breaker & wire size is recommendation only. Confirm with your licensed electrician.