

SERVICE AND APPLICATION NOTES

100052

08/2022

Re-issued 01/2024

Error Code 150 A2L on SL280, EL280, EL296 and EL297 Model

Lennox recently upgraded the two-stage Integrated Furnace Controls. We included future options for the safe handling of mildly flammable refrigerants (A2L) the industry is moving towards. As we get closer to the launch of these refrigerants, we will announce more information about the controls and sensors required and how to interface with our furnaces.

For non-communicating mode:

For two-stage constant torque controls and variable speed controls in non-communicating modes, both G and Y must be energized to initiate a cooling call. The presence of 24 VAC on Y, but not on G will result in the E150 error code to activate the A2L alarm and action. If an E150 error code is triggered, the blower will operate at a high cooling speed and not allow compressor or gas heating to operate. See figure 1 for the proper wiring connections. If you do not have sufficient thermostat wires to connect both Y & G, place a jumper between Y and G. If both wires are connected and you see the error code, we have identified that a timing delay of greater than 1 second will cause the E150 error code as well. Options to resolve this are:

- 1 - Leave G off from the thermostat and jump Y to G as mentioned earlier.
- 2 - Replace the control with earlier versions of board, constant torque versions are 98W20, variable speed versions are 15T94.

The software in the furnace control boards is being updated to extend the timing to be compatible with thermostats that provide a delay between "Y" cooling demand, signal (Y) and the "G" fan demand signal. We will post an update when they are available with their catalog numbers.

For communicating mode:

A variable speed control, in communicating mode, is considered operating normally when "Refrigerant Leak Monitor Input" at Thermostat control is disabled. If "Refrigerant Leak Monitor Input" at Thermostat is enabled, the A2L terminal on the control must be energized with a specific signal for normal operation. De-energizing of A2L terminal at the IFC shall activate the A2L alarm and start indoor blower at high speed until 5 minutes after the A2L is energized again. See figure 2 for proper wiring.

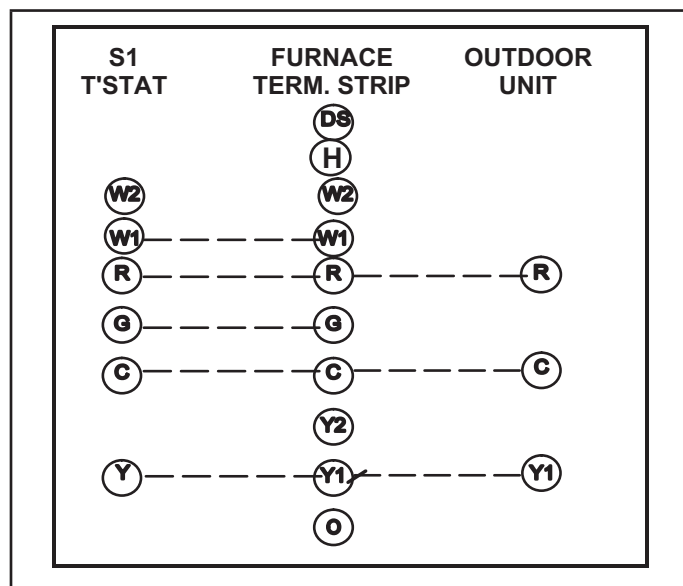


FIGURE 1

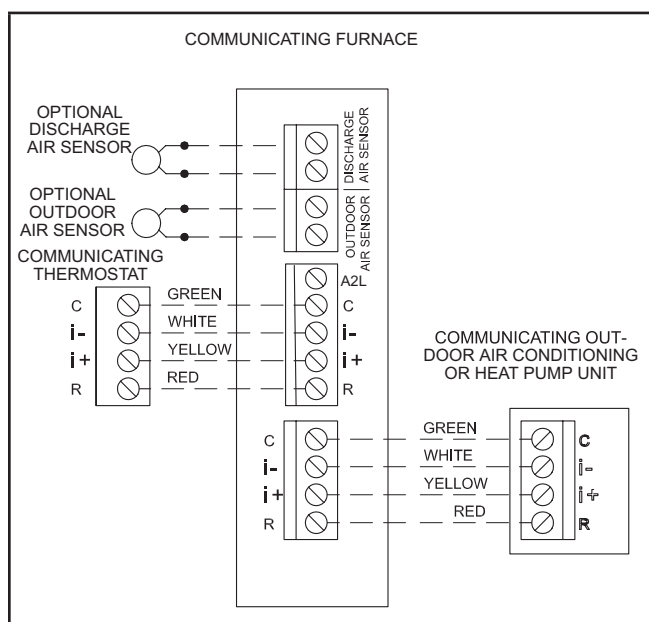


FIGURE 2

