

These products feature a pre-wired 1/16<sup>th</sup> DIN size, autotuning PID temperature controller and solid state relay mounted in an industrial rated enclosure. The enclosure is ideal where the customer has no provisions for installing the base controller, requires a stand-alone installation, or desires portability.

The enclosure features a hinged front door for access and a window to provide continuous viewing of the process temperature and setpoint. Mounting lugs are provided for easy attachment to a wall or support structure.

Controllers are available for input voltage of 120 or 240 VAC, 50/60 Hz. and heater current of 10 A or 25A. A solid state relay and heat sink are mounted and prewired. The controller comes ready-to-use.

There are three models available:

**Model C80E**

The Model C80E controller features a reinforced polymer enclosure suitable for indoor use.

This model features a heavy-duty 3 wire power cord for input power. 120 volt controllers are supplied with a NEMA L5-15R, three prong plug for 10 Amp models and a NEMA L5-30R plug for 25 Amp models. 240 volt controllers are supplied with bare leads to connect to customer's power supply. The controller is connected to the heated bundle through an umbilical cord with connector. A matching connector can be supplied on the heated bundle.

Model C80E controllers are orderd pre-configured for the type of temperature sensor used. Controllers are available with Type J or Type K thermocouple sensors, or 2 wire 100 ohm RTD sensors.

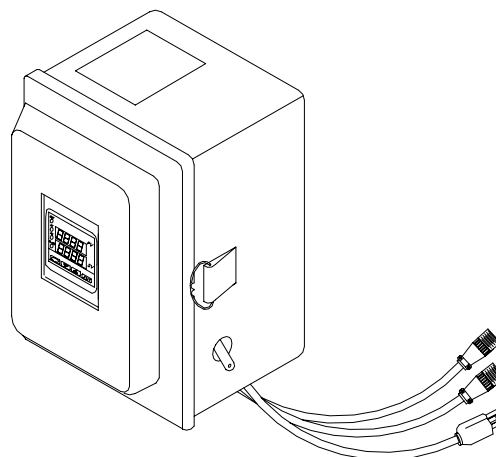
**Model C81E**

The Model C81E controller features the same controller as the Model C80E, but replaces the power and control cords with an internal terminal strip. The customer can then program the controller to use any standard thermocouple input, 2 or 3 wire RTD sensors, or millivolt sources.

The C81E operates at 85-240VAC without reprogramming or moving jumpers. This allows maximum versatility.

**Model C82E**

The Model C82E is similar in features to the Model C81E, but uses a metal weather resistant enclosure for outdoor applications. A weather resistant window is optional.



**C80E-10-J(K)-115-2 Controller/Enclosure**

**SPECIFICATIONS**

Temperature Controller.....	Series 80
Operating Voltage	Model C80E: 115 or 230 VAC 50/60 Hz Model C81E and C82E: 85-240VAC 50/60 Hz
Sensor Input.....	Model C80E: Type J or Type K Thermocouple or 100 Ohm RTD Model C81E and C82E: Type J, K, T, E, S, R, B, N Thermocouple, 2-wire or 3-wire 100 Ohm RTD 0-10, 10-50, 0-100 mVdc
Output Rating.....	10 Amp or 25 Amp
Control Output Connector.....	Model C80E: 5 pin connector with 2ft cable. Model C81E and C82E: Internal Terminal Strip
On/Off Switch.....	Single Pole circuit breaker

**HOW TO ORDER**

**Models:**

C80E, C81E, C82E

**Input Type:**

- J - Type J Thermocouple
- K - Type K Thermocouple
- R - 2 wire 100 Ohm RTD
- U - Universal Input (81E and 82E)

**Output:**

10Amp or 25Amp

**Supply Voltage:**

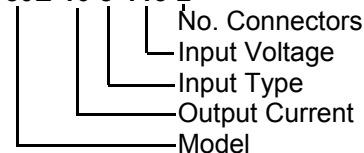
115 VAC or 230 VAC +/- 10%  
(Universal Input 85 –240 VAC)

**Output Connector:**

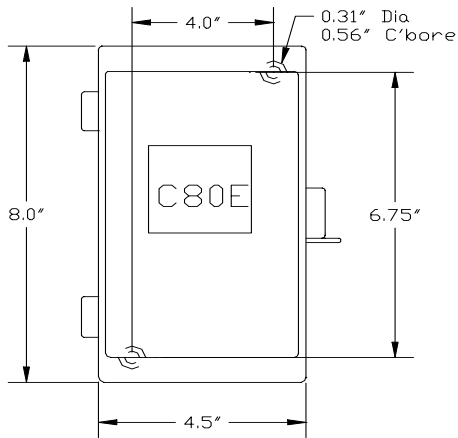
- 1 - Single Connector
- 2 - Dual Connector (T/C Only)

**Example:**

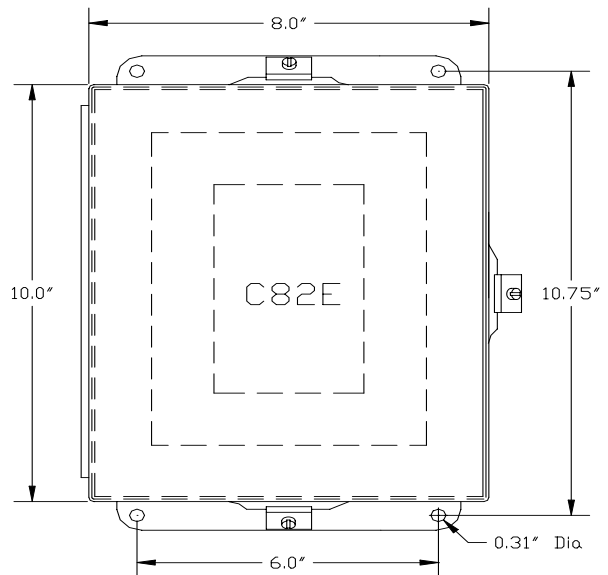
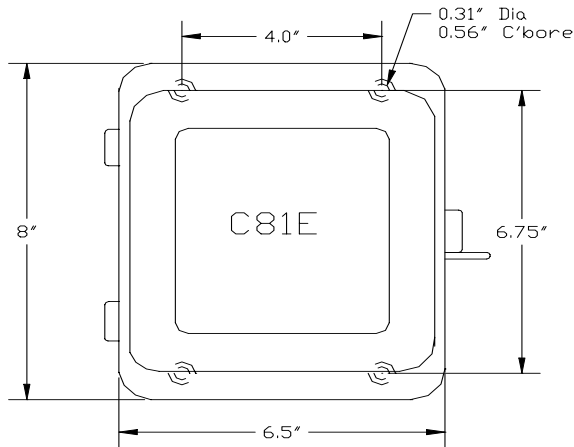
**C80E-10-J-115-2**



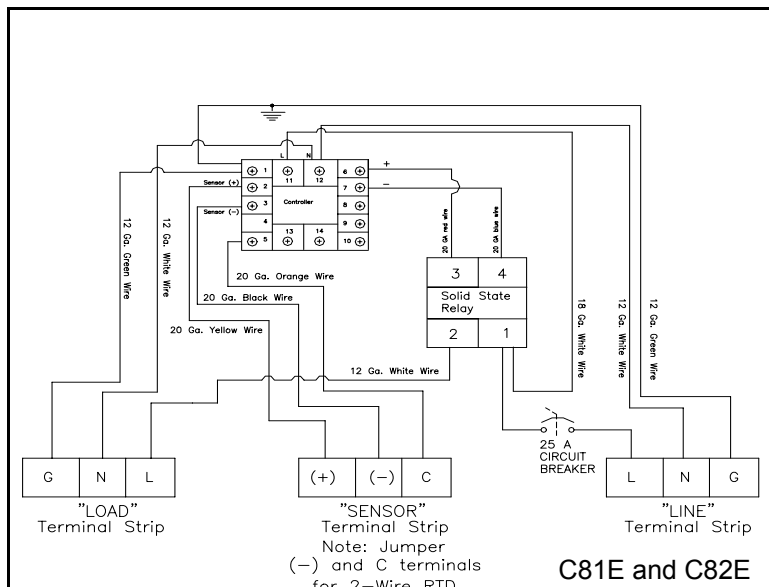
## Mounting Dimensions



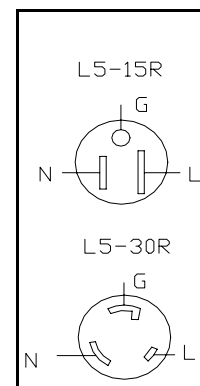
Note: Cover must be removed to access mounting holes on C80E and C81E.



## Typical Internal Wiring Schematic



## Power plugs used in C80E controllers



10A / 120 VAC

25A / 120 VAC