



# OVENindustries

## ELECTRONIC CONTROL SOLUTIONS

### 5R7-388 THERMOELECTRIC CONTROLLER

The Bi-directional or unidirectional H-bridge configuration of this controller creates a seamless transition between heating and cooling as it commands the thermoelectric modules. The included user friendly PC software makes it easy for the user to change control configurations through the RS232 interface which has 1500VAC isolation from the electronic circuitry virtually eliminating interference from noise or errant signals. Once the controller is set-up, the computer may be disconnected and the controller becomes a stand alone unit or the computer can remain connected for data acquisition. The temperature may also be set through the optional display or remote potentiometer.



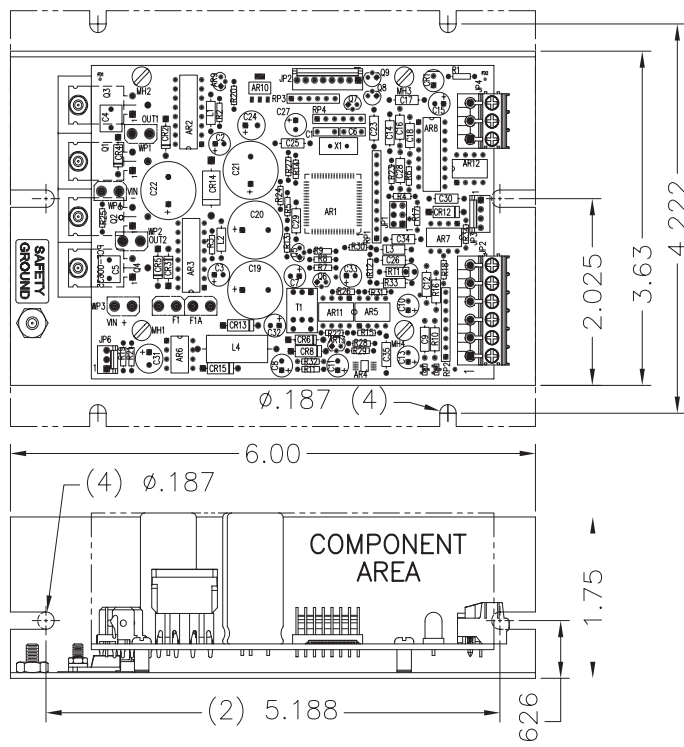
### FEATURES

- Solid State H-Bridge Control
- PC Programmable
- PID or On/Off Control
- PC Configurable Alarm Circuit
- 0-36 VDC Output using Split Power Supply
- RS232 Communication Port
- RoHS Compliant
- Nonvolatile Memory
- Type T Thermal Couple Sensor input

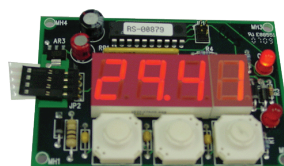
RoHS  
Compliant

### SPECIFICATIONS

- Set Temperature Range: T type TC -200 to 260°C
- Input Voltage: 12 to 36 VDC
- Output Voltage: 0 to 36 VDC with split supply
- Load Current: 0.1 to 25 A
- Temperature Resolution: 0.05°C
- PID Control Functions:
  - Bandwidth : 0.1 to 50°C
  - Integral: 0 to 10 repeats per minute
  - Derivative: 0 to 10 minutes
- PWM Base Frequency: 2.7 KHz
- Ambient Temperature range: -20 to 70°C
- Power Dissipation: <10 Watts
- Process Control Rate: 90 time per second
- Output Power Resolution:  $\pm 0.2\%$
- 1.75" H (2.64" with HS) x 6" W x 3.63" D (4.509" with HS)
- Customer Drawing: CDR-00174



### OPTIONAL 5R6-576 DISPLAY



### ACCESSORIES

- 5R6-576 Display with 4 digit readout
- Heat sink for  $\geq 15A$  loads

CONTACT US AT **877-766-OVEN** FOR DETAILED DRAWINGS AND PRICING OR VISIT **WWW.OVENIND.COM**