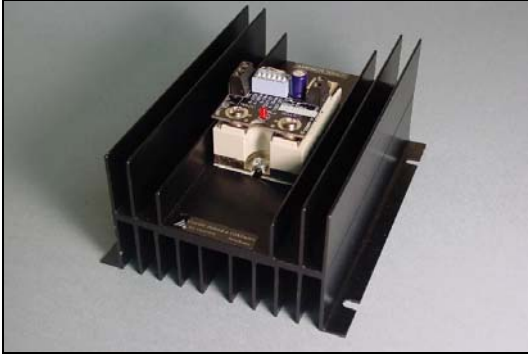




**"COOL ONE" PANEL MOUNT Phase Angle SCR Power Controller w/ PWM Input**



Dimensions: 6.0" x 4.75" x 3.0"

Anacon's "Cool One" heat sink design is by far one of the most unique ideas to come along in quite some time. Read about its amazing features and how Anacon can help with your design regardless of whose Solid State Relays you're using. "Cool One" works better!

**Standard "COOL ONE" Features:**

- Current Ratings from 0.1A to 50A
- Output voltages from 24Vac to 660Vac
- Standard LED Status Indicator
- UL/cUL Recognized TUV Approved & CE Compliant Version
- Operates from 47-63Hz
- **Input Options: PWM 5-30Vdc**
- Built in Transient Protection
- Phase Angle Linearity Proportional to Input
- Controller Card requires 24V AC for operation 3VA min.
- 40A & 50A models Standard. Higher & Lower current versions available from 10A to 100A
- Includes Control Module, Solid State Relay & Black Anodized "Cool One" Panel Mount Heat Sink.
- For Safety & Noise Immunity Compliance information, see page \_\_\_\_.

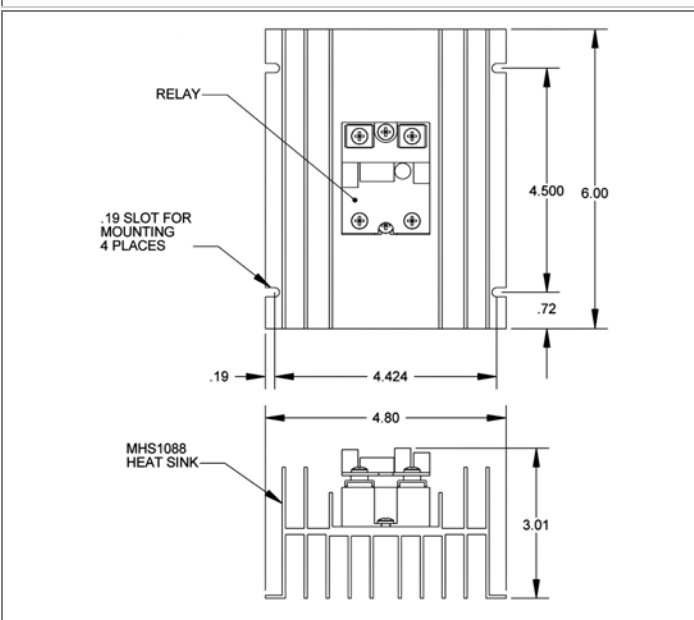
**SPECIFICATIONS**

PART NUMBER	INPUT RANGE	ASSEMBLY LOAD CURRENT (AMPS AC)	LINE VOLTAGE	PEAK VOLTAGE	RELAY RATING
APCSCR40LL-PWMP	PWM (Time Proportioning 5-30Vdc Logic Input)	.1A-40A Max @ 40 Degrees C Ambient	24-280Vac	600V Peak	50A
APCSCR40HL- PWMP	PWM (Time Proportioning 5-30Vdc Logic Input)	.1A-40A Max @ 40 Degrees C Ambient	48-660Vac	1200V Peak	50A
APCSCR50LL- PWMP	PWM (Time Proportioning 5-30Vdc Logic Input)	.1A-50A Max @ 40 Degrees C Ambient	24-280Vac	600V Peak	75A
APCSCR50HL- PWMP	PWM (Time Proportioning 5-30Vdc Logic Input)	.1A-50A Max @ 40 Degrees C Ambient	48-660Vac	1200V Peak	75A

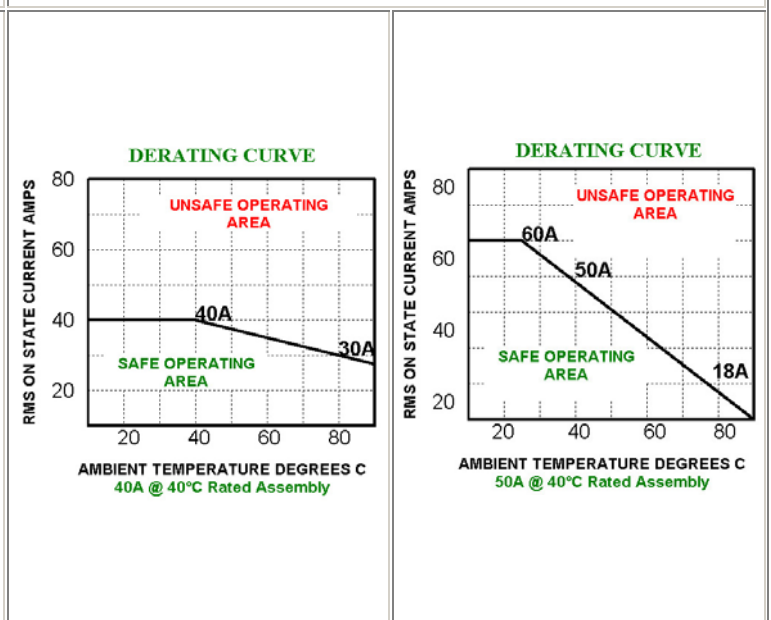
**Notes:**

- Ratings based upon 100% duty cycle for 20 minutes or 80% duty cycle continuous.
- Ratings based upon relays being mounted either individually or side by side with zero spacing.
- Cool One's unique construction allows better performance than conventional heat sink designs even when mounted side by side.

**MECHANICAL DRAWING**



**THERMAL CURVES**





## PWM Input Control Information Application Information

The APCSCR series are phase angle SCR Power Controllers. The switch selectable control range for the PWM Input version is: 5-30V. The power delivered to the load is proportional to the command signal input. Input selection options are achieved by dip switch selection as noted on front of this datasheet.

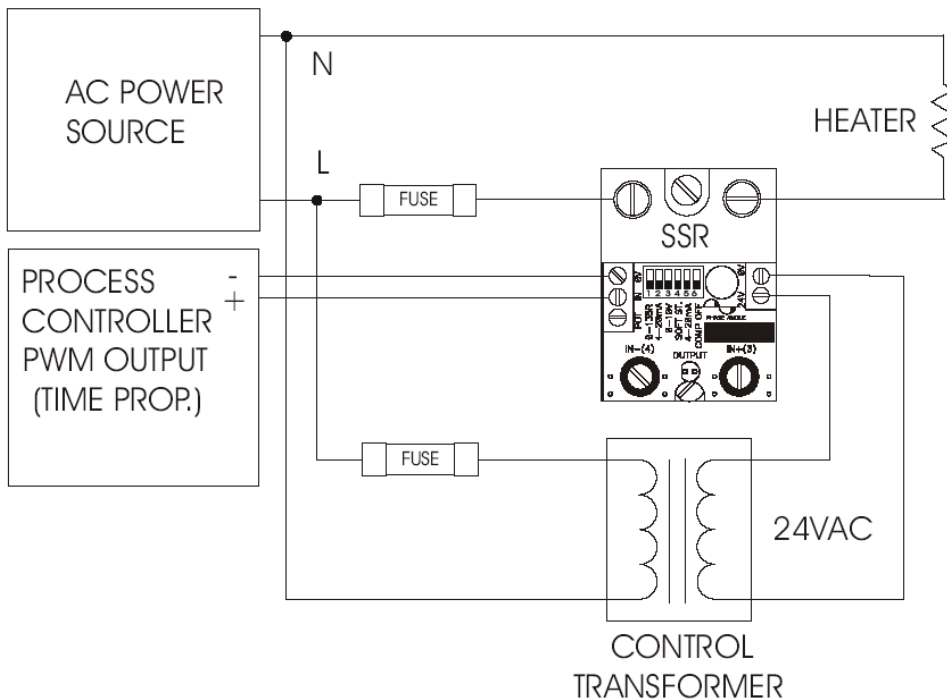
The APCSCR Power Controller's PWM Input is designed to accept a signal from a PLC or a processes/temperature controllers SSR drive output.

A line to 24Vac transformer supplies power and phase information to the controller card. The transformer is connected across the AC power source as noted below. There is a feature to compensate for line voltage variation. By adjusting the phase angle automatically with line voltage changes, constant power is maintained at the load. To use the line voltage compensation feature properly, the 24Vac transformer should be fed from the same mains as the load circuit to be controlled per the wiring diagram below. Line voltage compensation can be enabled or disabled via dip switch selections noted on front of this specification.

A separate control transformer is required for each APCSCR assembly.

See [User manual](#) for complete list of commands & wiring options.

### PWM Input Wiring Diagram



### Command Input

Command Input	1	2	3	5
PWM*	On	Off	Off	Off
<b>Feature Enable</b>			<b>4</b>	<b>6</b>
Line Voltage Comp Enable (Default)	Off	Off		
None		Off	On	
Soft Start		On	On	
Soft Start & Line Voltage Comp Enabled	On	Off		
*Feature is set for PWM Operation by Anacon.				
Input is designed to accept a signal from a PLC or Process/Temperature controllers SSR drive output. The logic signal is used to generate a command set point.				
Contact Anacon Power & Controls for applications assistance - 800-466-9080.				