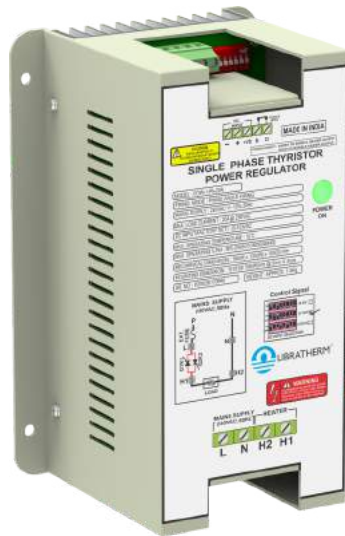


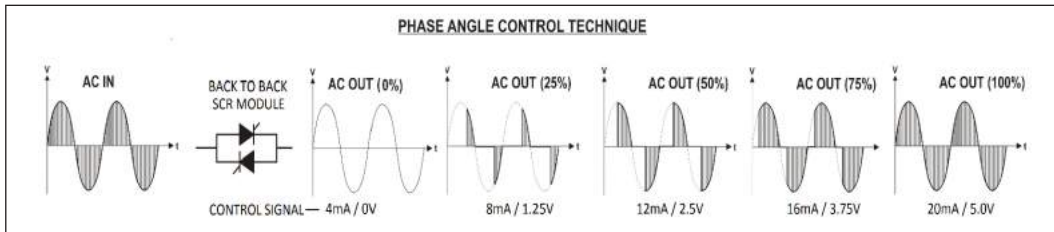
Single Phase (2 to 8KW) SCR Power Regulator for Heater Load (ECO models)



POW-1PA-20A



POW-1PA-40A



MODEL WISE DESCRIPTION

Model	Product Description	Size (w x h x d) mm.
POW-1-PA-10A	Single Phase SCR power regulator for 2KW @ 230VAC heater load	120 x 120 x 120
POW-1-PA-20A	Single Phase SCR power regulator for 4KW @ 230VAC heater load	190 x 120 x 100
POW-1-PA-30A	Single Phase SCR power regulator for 6KW @ 230VAC heater load	190 x 130 x 110
POW-1-PA-40A	Single Phase SCR power regulator for 8KW @ 230VAC heater load	190 x 130 x 110

FEATURES

- Solid state, field proven, rugged and reliable design.
- DIN rail mount or base mount
- User selectable control signal
- Gradual, smooth and step less control of power across the heater

DESCRIPTION

Libratherm offers Single phase power regulator for Heating control of resistive or inductive loads. This regulator accepts the user selectable control signal of 0-5V, 0-10V and 4-20mA or through potentiometer, and hence, can be easily interfaced with DDC, PID, or PLC. The output voltage can be varied proportional to the input signal. The phase angle firing control technique ensures smooth and gradual step less voltage control across the heater load. Facility is also provided to adjust the soft rise or drop in the voltage across the load using on card Ramp UP and Ramp Down potentiometers. The maximum and minimum voltage output can also be adjusted. These modules can be easily mounted on the standard 35 mm. DIN rail or on the base plate using 4 screws.

TECHNICAL SPECIFICATIONS

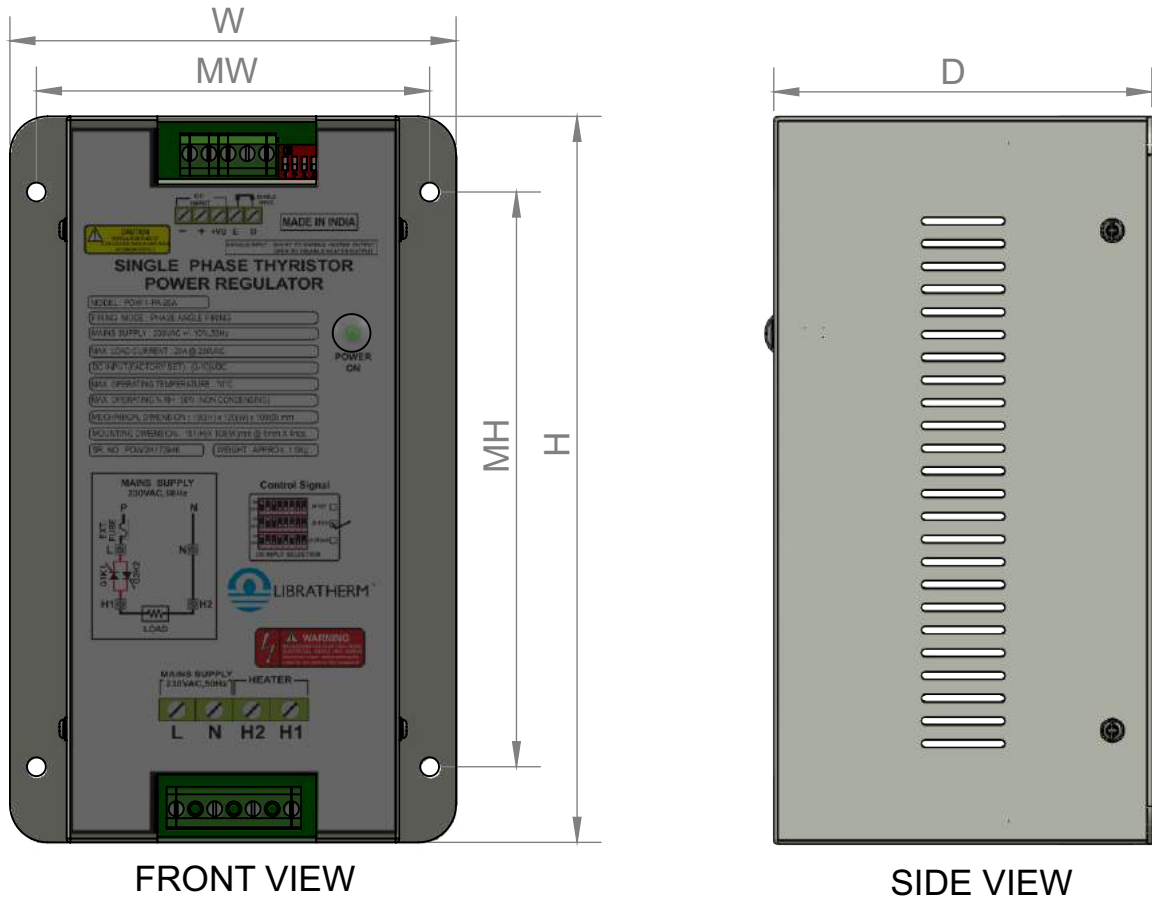
Item	Single Phase SCR based power regulator
Models	POW-1-PA-10A, POW-1-PA-20A, POW-1-PA-30A, POW-1-PA-40A
Control Signal Input (Linear)	Auto control using 0-5V, 0-10V, 4-20mA (DIP switch selectable) or Manual control using external 10K potentiometer.
Control Technique	Phase angle control (Self Synchronized).
Supply Voltage	115VAC or 230VAC +/- 10% @ 50/60Hz (Any one to be specified)
Output Voltage (Single phase Load)	Variable 0 to 115 / 0 to 230VAC with respect to neutral and proportional to control signal. (depends on line voltage w.r.t. neutral)
Max. Load Current	Max. 10A for POW-1-PA-10. Max. 20A for POW-1-PA-20 Max. 30A for POW-1-PA-30. Max. 40A for POW-1-PA-40
Ramp Up/Down and Max./Min Power	Adjustable using on card single turn presets.
Enable/Disable input	External potential free contact for remote on/off operation.
Mounting	35 mm. DIN rail or base plate mounting
Connections	Separate terminals for Auxiliary Supply, Heaters and Control Signal.
Sizes (H x W x D)	As given in the above table

ORDERING CODE

Model	Product Description	Part no.
POW-1-PA-10A	Single Phase SCR power regulator for 2KW @ 230VAC heater load	2301-1
POW-1-PA-10A	Single Phase SCR power regulator for 1KW @ 115VAC heater load	2301-2
POW-1-PA-20A	Single Phase SCR power regulator for 4KW @ 230VAC heater load	2302-1
POW-1-PA-20A	Single Phase SCR power regulator for 2KW @ 115VAC heater load	2302-2
POW-1-PA-30A	Single Phase SCR power regulator for 6KW @ 230VAC heater load	2303-1
POW-1-PA-30A	Single Phase SCR power regulator for 3KW @ 115VAC heater load	2303-2
POW-1-PA-40A	Single Phase SCR power regulator for 8KW @ 230VAC heater load	2304-1
POW-1-PA-40A	Single Phase SCR power regulator for 4KW @ 115VAC heater load	2304-2

DIMENSIONAL DRAWING

POW-1-PA



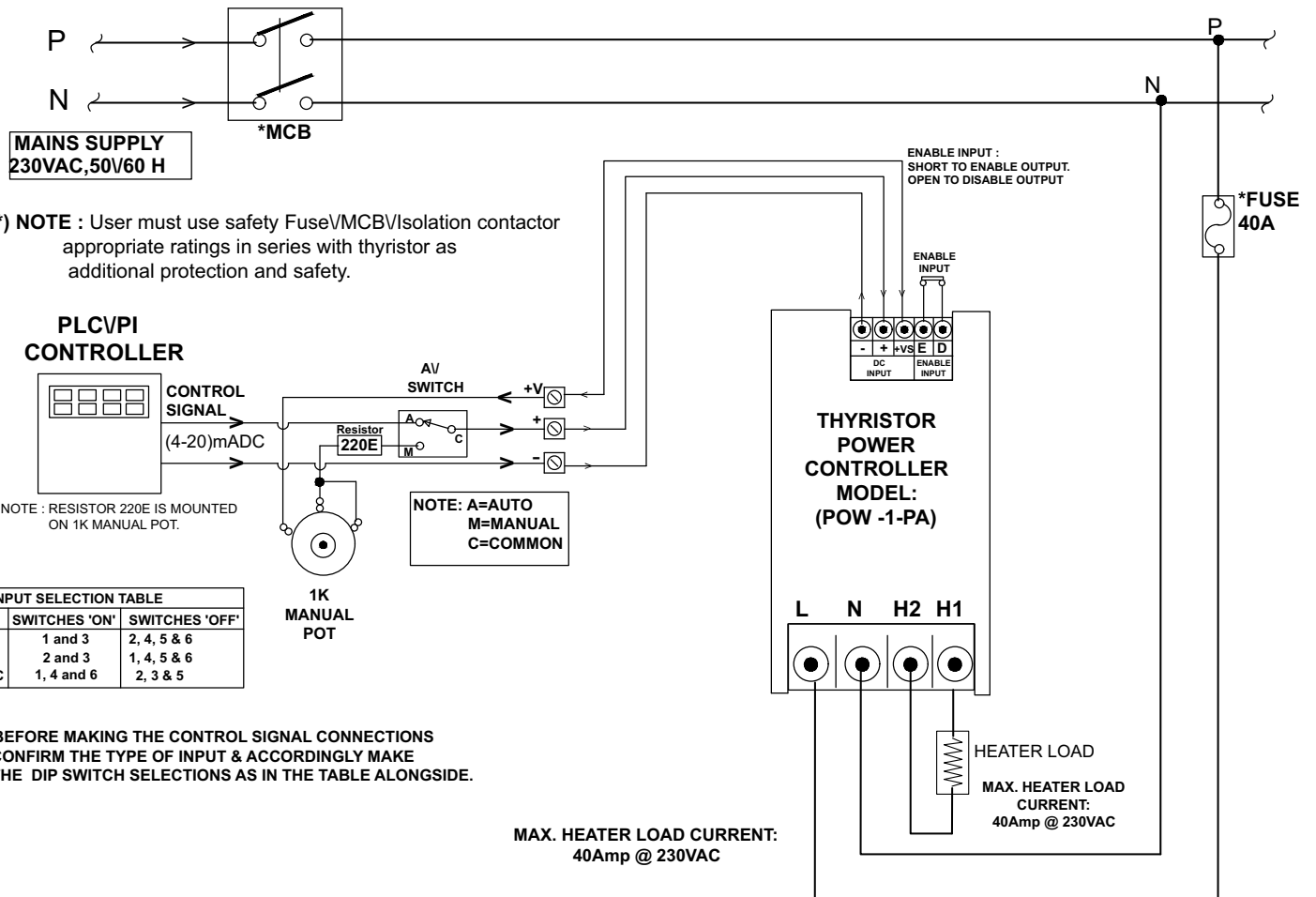
ALL DIMENSIONS IN mm

DIMENSION TABLE:-

SR NO.	MODEL NAME	HEIGHT (H)	WIDTH (W)	DEPTH (D)	MOUNTING HEIGHT (MH)	MOUNTING WIDTH (MW)
1	POW-1-PA-10A	190	120	100	150	105
2	POW-1-PA-20A	190	120	100	150	105
3	POW-1-PA-30A	190	130	110	150	110
4	POW-1-PA-40A	190	130	110	150	110

Note: Dimensions and specifications are subjected to change during product upgradation.

WIRING DIAGRAM



INPUT SELECTION TABLE		
INPUT	SWITCHES 'ON'	SWITCHES 'OFF'
(0-5)VDC	1 and 3	2, 4, 5 & 6
(0-10)VDC	2 and 3	1, 4, 5 & 6
(4-20)mADC	1, 4 and 6	2, 3 & 5

CAUTION : BEFORE MAKING THE CONTROL SIGNAL CONNECTIONS CONFIRM THE TYPE OF INPUT & ACCORDINGLY MAKE THE DIP SWITCH SELECTIONS AS IN THE TABLE ALONGSIDE.

MAX. HEATER LOAD CURRENT:
40Amp @ 230VAC

LOAD CONFIGURATION

