

**SHP Series: Heavy Duty Modular Power Supplies**

These high power, modular power supplies, from 1500 through 2000 watts, are capable of up to 12 independent outputs. Modular design makes these units easy to customize for unusual voltage and power combinations. All units have power factor corrected inputs, an end mounted fan for cooling and a variety of built-in signals and controls. High reliability and a flexible design make these an excellent choice for process control and semiconductor fabrication applications.

**Features**

- Capable of up to 12 outputs
- Single output 24 V up to 87.4 A
- IEC 801 immunity standards
- Current Share on all outputs
- End mounted fan
- Voltage adjustment on all outputs  $\pm 10\%$
- Overload protection on all outputs
- Power factor correction (.99 typ.)
- Margining on all outputs
- Modular Construction
- Signals
  - Global and individual module inhibits/enable
- Single phase and three phase inputs
- Two year warranty

**Applications**

- Process Controls
- Semi-conductor Fabrication
- Automated Service Equipment

**Related Products**

- Surge Suppression
- SCD DC to DC Converters
- Active Tracking® Filters



**Specifications**

Parameter	Condition	Limit
<b>Input</b>		
<b>Input Voltage</b>	SH Series	86 to 264 Vac (1 $\emptyset$ )
	S3H Series	180 to 264 (3 $\emptyset$ )
<b>Frequency</b>		47 to 440 Hz
<b>Protection</b>		Internally Fused
<b>Inrush Current</b>		40A Max
<b>Output</b>		
<b>Line Regulation</b>	Full Rated Load	0.2% or 5mV max
<b>Load Regulation</b>	Full Rated Load	0.2% or 5mV max
<b>Minimum Loading</b>	Where indicated	
<b>Temp. Coefficient</b>		$\pm 0.02\%/^{\circ}\text{C}$
<b>Hold up Time</b>	Full Rated Load	No less than 20ms
<b>Overvoltage Protection</b>		2-5 V 122% to 134%
<b>Short-Circuit Protection</b>	Continuous	Protected for short-circuit, auto-recovery
<b>Output Ripple</b>		0.1% or 10mV RMS
<b>General</b>		
<b>Operating Temperature</b>	Full Rated Load	-10 to 50°C
<b>Storage Temperature</b>		-55 to +85°C
<b>Efficiency</b>	Full Rated Load	75% to 82%
<b>MTBF</b>		>500,000 hours
<b>Shock &amp; Vibration</b>		MIL-HDBK 810E
<b>EMI</b>		CISPR 22, EN55022 Level B
<b>Safety</b>	All Models	UL, CE and CSA
<b>Cooling</b>		Internal DC fan 24

## Selection Tables

## Single Phase 1500 Watt, SH15 Series

Catalog Number	Output 1	Output 2	Output 3	Output 4	Maximum Output
SH15-Q2	3.3 V, 300 A	-	-		1500 W
SH15-Q3	5 V, 300 A	-	-		1500 W
SH15-Q4	12 V, 125 A	-	-		1500 W
SH15-Q5	15 V, 100 A	-	-		1500 W
SH15-Q6	24 V, 62.4 A	-	-		1500 W
SH15-Q7	28 V, 53.4 A	-	-		1500 W
SH15-Q8	36 V, 41.6 A	-	-		1500 W
SH15-Q9	48 V, 31.2 A	-	-		1500 W
SH20-P3T53J4	5 V, 150 A	24 V, 10.5 A	12 V, 25 A	12 V, 20 A	1500 W
SH20-P3T54J5	5 V, 150 A	24 V, 10.5 A	15 V, 20 A	15 V, 20 A	1500 W

## Single Phase 2000 Watt, SH20 Series

Catalog Number	Output 1	Output 2	Output 3	Output 4	Output 5	Output 6	Maximum Output
SH20-Q3K3-7	5 V, 420 A	-	-	-	-	-	2000 W
SH20-Q6K6-7	24 V, 87.4 A	-	-	-	-	-	2000 W
SH20-Q9K9-7	48 V, 43.7 A	-	-	-	-	-	2000 W
SH20-M3K2	5 V, 240 A	3.3 V, 120 A	12 V, 4 A	-	-	-	2000 W
SH20-Z6Z7M3	5 V, 240 A	12 V, 21 A	12 V, 20 A	5 V, 50 A	15 V, 10 A	24 V, 5 A	2000 W

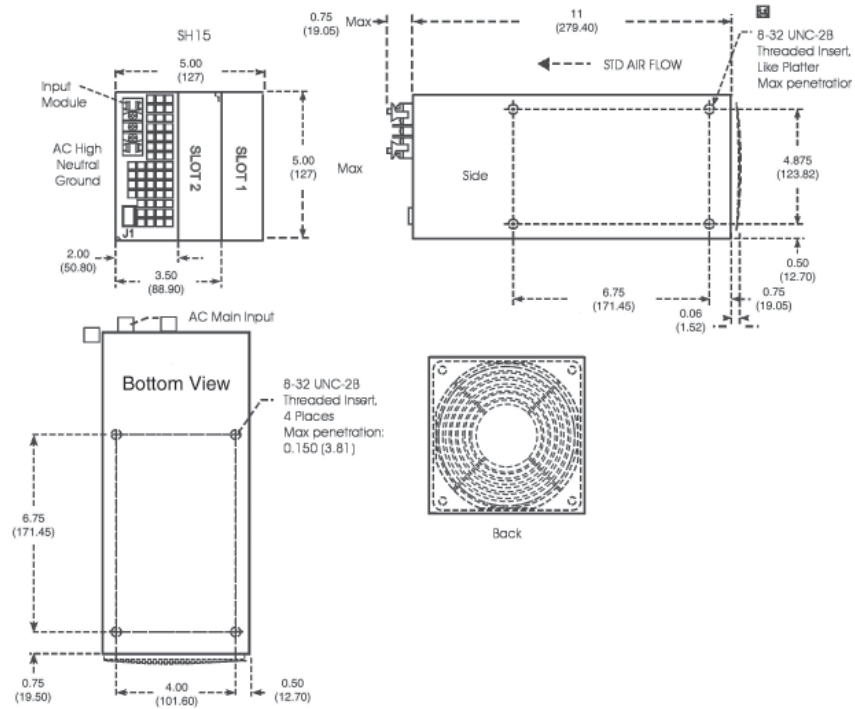
## Three Phase 1500 Watt, S3H15 Series

Catalog Number	Output 1	Output 2	Output 3	Output 4	Maximum Output
S3H15-Q2	3.3 V, 300 A	-	-	-	1500 W
S3H15-Q3	5 V, 300 A	-	-	-	1500 W
S3H15-Q4	12 V, 125 A	-	-	-	1500 W
S3H15-Q5	15 V, 100 A	-	-	-	1500 W
S3H15-Q6	24 V, 62.4 A	-	-	-	1500 W
S3H15-Q7	28 V, 53.4 A	-	-	-	1500 W
S3H15-Q8	36 V, 41.6 A	-	-	-	1500 W
S3H15-Q9	48 V, 31.2 A	-	-	-	1500 W
S3H20-P3T53J4	5 V, 150 A	24 V, 10.5 A	12 V, 25 A	12 V, 20 A	1500 W
S3H20-P3T54J5	5 V, 150 A	24 V, 10.5 A	15 V, 20 A	15 V, 20 A	1500 W

## Three Phase 2000 Watt, S3H20 Series

Catalog Number	Output 1	Output 2	Output 3	Output 4	Output 5	Output 6	Maximum Output
S3H20-Q3K3-7	5 V, 420 A	-	-	-	-	-	2000 W
S3H20-Q6K6-7	24 V, 87.4 A	-	-	-	-	-	2000 W
S3H20-Q9K9-7	48 V, 43.7 A	-	-	-	-	-	2000 W
S3H20-M3K2	5 V, 240 A	3.3 V, 120 A	-	-	-	-	2000 W
S3H20-Z6Z7M3	5 V, 240 A	12 V, 21 A	12 V, 20 A	5 V, 50 A	15 V, 10 A	24 V, 5 A	2000 W

SH15 & S3H15 Dimensions



SH20 & S3H20 Dimensions

