



Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from,Europe,America and south Asia,supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of “Quality Parts,Customers Priority,Honest Operation,and Considerate Service”,our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip,ALPS,ROHM,Xilinx,Pulse,ON,Everlight and Freescale. Main products comprise IC,Modules,Potentiometer,IC Socket,Relay,Connector.Our parts cover such applications as commercial,industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832

Email & Skype: info@chipsmall.com Web: www.chipsmall.com

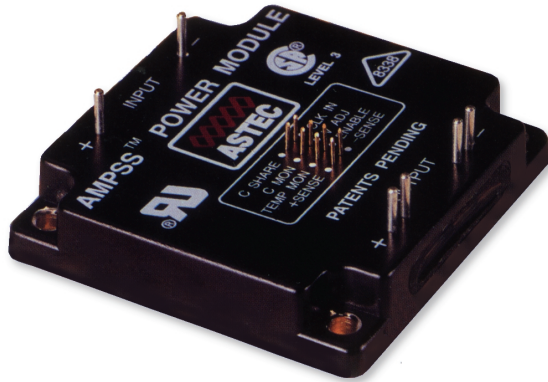
Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China



120 Watts

AL60A

Total Power: 120 Watts
Input Voltages: 12V, 24V or 48V
No. of Outputs: Single, Dual



Electrical Specs

Input

Input Range 180 to 400 VDC or 36 to 72 VDC
 Efficiency 83% typical (5V @ 20A);
 85% typical (12V @ 9A)

Output

Load Regulation 0.2% typical down to no load
 Line Regulation 0.1% typical
 Noise/Ripple 75 mV typical (output below 5V)
 2% typical (output 5V and over)
 Up to 0.5V

Remote sense Up to 0.5V
 Output Voltage ±10% of nominal output
 Adjust Range 4% typical deviation with
 Transient Response 250µs recovery (25-75% full load)
 Current Share Accuracy 5% typical
 Overvoltage Protection 125% nominal Vo
 Current Limit 110% Io max

Control

Voltage Adjust 90 to 110% Vo
 Enable TTL compatible (low to enable)
 Clock Input 3.3 to 5.5Vp-p @ 1MHz ± 10%
 Temperature 10 mV/°K (2.73V = 0°C)
 Monitor Output 0 to 1mA (1mA = 100% Io Rated)
 Current Monitor Output

Special Features

- High efficiency - up to 86%
- 500 KHz fixed frequency
- 100°C baseplate operating temperature (with no derating)
- Low output ripple and noise
- Excellent transient response
- Safety isolated low voltage control and monitoring
- High reliability
- Wide input voltage range
- Parallelable with accurate current sharing
- Adjustable output voltage and current limit
- Regulation to zero load
- Temperature monitor output

Environmental

Storage temperature: -40°C to +105°C
 Overtemperature shutdown: 90°C typical
 MTBF: > 1 million hours (50°C baseplate)

Safety

UL	UL 1950	E182206 & E32002
CSA	CSA22.2-234 CSA22.2-950	LR53982C
VDE	IEC 950	20396-3336-1003 & 1009
EN	60950	
CE	CEMark (LVD)	

Ordering Information

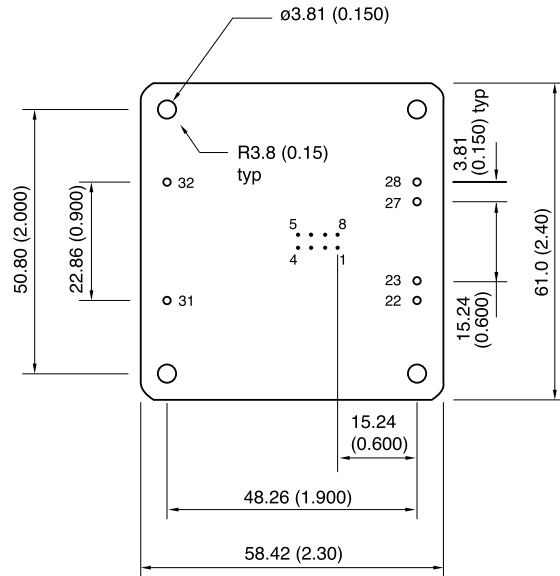
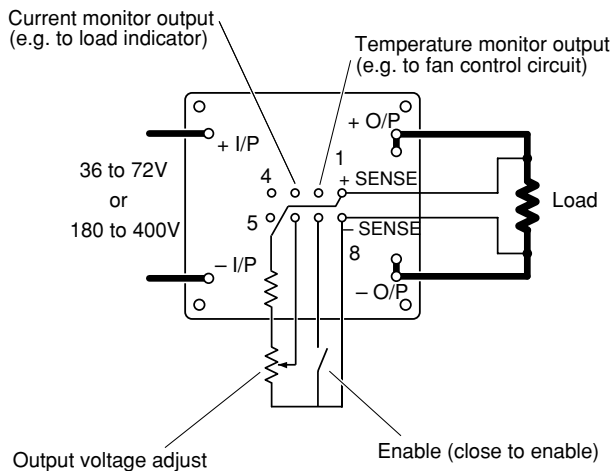
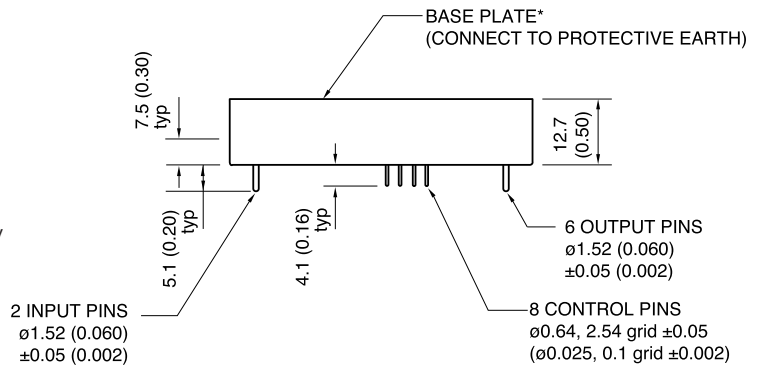
Input Voltage	Output Voltage	Output Current	Model Number	Input Voltage	Output Voltage	Output Current	Model Number
300V	2.0V	20A	AL60A-300L-020F20	48V	2.2V	30A	AL60A-048L-022F30
300V	3.3V	25A	AL60A-300L-033F25	48V	3.3V	25A	AL60A-048L-033F25
300V	5V	20A	AL60A-300L-050F20	48V	5V	10A	AL60A-048L-050F10
300V	12V	9A	AL60A-300L-120F09	48V	5V	20A	AL60A-048L-050F20
300V	15V	8A	AL60A-300L-150F08	48V	12V	6A	AL60A-048L-120F06
300V	24V	3A	AL60A-300L-240F03	48V	12V	9A	AL60A-048L-120F09
				48V	15V	8A	AL60A-048L-150F08

Please contact Astec for information on other output voltages, power ranges and configurations.

Pin Assignments

Input	Output	Control Pins
31. +ve	22. +ve	1. +SENSE
32. -ve	23. +ve	2. TEMP MON
	27. -ve	3. C MON
	28. -ve	4. C SHARE
		5. CLK IN
		6. V ADJ
		7. ENABLE
		8. -SENSE

Secondary side controls



- Notes:
1. All dimensions in mm and (inches)
 2. Baseplate must be connected to protective earth
 3. General tolerance: .X ±0.5 (0.02)
.XX ±0.25 (0.010)
 4. Surface Flatness: Concave 0.12mm max
Convex 0.38mm max