ZA SPD08012

The purpose of the document is to specify the functional requirements of 96W switching power supply.

1. INPUT CHARACTERISTICS

1.1 Input Voltage:

Rated Voltage:100-240Vac Variation Range: 90-264Vac

1.2 Input Frequency:

Rated Frequency: 50/60Hz. Variation Frequency:47-63Hz

- 1.3 Input Current: 2.0Amps max At any input voltage and rated, DC output rated load.
- 1.4 Inrush Current: 80Amps Max. Cold start at 240Vac input, with rated load and 25°C ambient.
- 1.5 AC Leakage Current: 0.25mA Max.At264Vac input

2. OUTPUT CHARACTERISTICS:

2.1 Power output

Voltage	Min. Load	Rated Load	Peak current	Output power
12Vdc	0.00A	8.0A		96W

2.2 Combined Load/Line Regulation

Voltage	Min. Load	Rated Load	Line Regulation	Load Regulation
12Vdc	0.00A	8.0A	±1%	±5%

2.3 Ripple and Noise:

Under nominal voltage and nominal load, the ripple and noise are as follows when measure with Max. Bandwidth of 20MHz and Parallel 47uF/0.1uF, crossed connected at testing point.

Voltage	Ripple and Noise(Max.)
+12Vdc	<150Mv p-p

- 2.4 Turn on delay time: 3Second Max.at 100Vac input and output Max.load.
- 2.5 Rise time: 40 MS Max.at 100Vac input and output Max load.
- 2.6 Hold up time: 5 MS Min.at 100Vac input and output Max.Load.
- 2.7 Efficiency: 85% Min. at 115Vac input and output Max.Load.
 - 85% Min. at 230Vac input and output Max.Load.

3. PROTECTION FUNCTION:

- 3.1 Short circuit protection: The power supply will be auto recovered when short circuit faults remove.
- 3.2 Over current Protection: The power supply will be auto recovered when over current faults remove.

4. ENVIRONMENTAL REQUIREMET:

- 4.1 Operating Temperature: 0°C to 40°C, Full load, Normal operation.
- 4.2 Storage Temperature: -10°C to 70°C with package
- 4.3 Relative Humidity: 5%(0°C)~90%(40°C)RH,72Hrs,Full load, Normal operating

5. SAFETY AND EMI REQUIREMENT:

- 5.1 Safety:accord with EN60950.
- 5.2 DIELECTRIC STRENGTH Hi-Pot:

Primary to secondary,3000Vac/15mA/3s. Primary to Case,3000Vac/5mA/3s.

5.3 EMI STANDARD: Meets the Limits of <1>.EN55022 class A rules

6. MECHANICAL REQUIREMENT:

6.1 Enclosure: The power supply size: L175x W72x H42mm



