MODEL NO. END0512

This specification describes the requirements of 120 watts switching power supply .

☞ 1.0 INPUT REQUIREMENTS

1.1 DC input requirements

The input voltage, requirements for continuous

operation are stated below.

Table 1 DC Input Line Requirements

Parameter	Min	Nom.	Max	Unit
Input voltage	15	19	24	VDC

1.2 Input rated current

12 A @ 15V

2.0 OUTPUT REQUIREMENTS

2.1 Static load:

Output	Voltage	Minimum load	Nominal load	Maximum load
1	+5V	0A	5A	7A
2	+12V	0A	6A	8A
3	-12V	0A	0.2A	0.2A
4	3.3V	0A	5A	7A
5	+5VSB	0A	1.5A	2A

2.2 Output voltage:

The output voltage shall be statically regulated for all combinations of load, line and environment including cross regulation as shown.

Output	Voltage	Range	Tolerance
1	+5V	+4.75V~5.25V	+/-5%
2	+12V	+11.4V~12.6V	+/-5%
3	-12V	-11.4V~-12.6V	+/-5%
4	3.3V	+3.14~+3.47V	+/-5%
5	+5VSB	+4.75V~5.25V	+/-5%

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*2.3 Ripple and Noise

Output	Voltage	Maximum peak to peak ripple & Noise
1	+3.3V	50m Vp-p
2	+5V	50m Vp-p
3	+12V	120m Vp-p
4	-12V	120m Vp-p
5	+5VSB'	50m Vp-p

2.4 Standard Voltage

Standard Voltage: 19V±1 DC

2.5 Efficiency

1. Power supply efficiency minimum 80% at normal AC main voltage and full load . 2.No load input current :DC 100mA max

2.6 Remote on/off control

When the logic level "PS-ON" is low, the DC outputs are to be enabled. When the logic level is high or open collector, the DC outputs are to be disabled.

2.7: Power good signal turn on delay time (100ms~500ms)

2.8:Turn-On SEQUENCE:

The main DC output of 3.3V/5V/12V should be turn on. $\leq 20ms$

2.9: Rise Time:

At <u>15V</u>dc or <u>24</u>Vdc, DC output rise time from <u>10</u>% to <u>90</u>% of Vo. \leq 20ms

3.0 PROTECTION REQUIREMENT

3.1: SHORT CIRCUIT PROTECTION

With input power source at 165W max. power limiting, when shorting at 3.3V, 5V&5VSB, it should not have any component damage for indefinitely period of time. The power supply shall shut down

3.2: OVER CURRENT PROTECTION

Available at 3.3V, 5V at 110-350% of output max, current rating. The power supply shall shut down and no damage

4.0 ENVIRONMENT

4.1 Operation

Temperature	0 to 40 °C
Relative Humidity	20 to 80%RH

4.2 Shipping and Storage

Temperature	-20 to80°C
Relative Humidity	10 %to 90%RH

☞ 5.0 MTBF (MEAN-TIME-BETWEEN FAILURES) CALCULATION

The demonstrated MTBF shall be 40,000 hours of continuous operation at 25° C, Full load. 80% confidence limit and nominal line. The MTBF of the power supply shall be calculated in accordance with MIL-STD-217F.

6.0 MECHANICAL REQUIREMENTS

6.1 Physical Dimension: 146*45*35mm

6.2 Weight: 240g

6.3 MECHANICAL SPECIFICATION

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