

**MODEL NO. ENA-0806**

This specification describes the requirements of 60 watts switching power supply .

**☞ 1.0 INPUT REQUIREMENTS**

**1.1 AC input requirements**

The input voltage, current, and frequency requirements for continuous operation are stated below.

Table 1 AC Input Line Requirements

Parameter	Min	Nom.	Max	Unit
Input voltage	90	100-240	264	VACrms
Vin Frequency	47	50/60	63	Hz
Input current			1.5	Arms

Full voltage range.

**1.2 Inrush current**

60Amps Maximum(for 230Vac).

30Amps Maximum(for 115Vac)(at cold start).

**☞ 2.0 OUTPUT REQUIREMENTS**

**2.1 Voltage & output current load range & ripple**

Parameter	Range	Min	Nom.	Max	Unit
+12	+/-5%	11.4 0	12	12.6 5	Volts Amps
Parameter	Ripple Max.		Ripple&Noise Max		Unit
+12	100		120		mVp-p

2.1-1.At +12V surge, regulation can go to +/-10%.

2.1-2.The maximum continuous average dc output power shall not exceed 60 watts.

**2.2 Output Ripple Definition.**

The ripple voltage of the output shall be measured at the pins of the output connector

when terminated in the load impedance specified. Ripple and noise are measured at the connectors with a 0.1uF ceramic capacitor and A 47uF electrolytic capacitor to simulate system loading. Ripple shall be measured under any condition of line voltage, output load, line frequency, operation temperature.

### 2.3 Efficiency

Power supply efficiency minimum 70% at normal AC main voltage and full load .

## ☞ 3.0 PROTECTION

### 3.1 Over-power protection

The power supply will be shut down when output power over 150% of rated DC output.

(The power supply will be self recovering when the fault condition is removed.)

### 3.2 Short circuit

The power supply shall shut down for shorting the +12VDC output.

(The power supply will be self recovering when the fault condition is removed.)

## ☞ 4.0 POWER SUPPLY SEQUENCING

### 4.1 Hold up time

When the power loss its input power, it shall maintain 10ms in regulation limit at nominal input voltage.(AC: 115V)

## ☞ 5.0 ENVIRONMENT

### 5.1 Operation

Temperature	0 to 40 °C
Relative Humidity	10 to 85%,on-condensing

### 5.2 Shipping and Storage

Temperature	-20 to 60°C
Relative Humidity	5 to 95%,non-condensing

### 5.3 Altitude

Operating	10,000FT max.
Storage	50,000FT max.

AUDIT: \_\_\_\_\_ CHECK: \_\_\_\_\_ DESIGN: \_\_\_\_\_

## ☞ 6.0 SAFETY

6.1 Underwriters Laboratory (UL) listee.

The power supply designed to meet UL 60950.

6.2 Canadian Standards Association(CSA) approval.

The power supply designed to meet CSA C22.2 NO. 950.

6.3 The power supply must be certified to EN60 950, A1 and A2.

6.4 CB test report to meet the IEC 60950.

6.5 NEMKO certified by any NORDIC CENELEC.

6.6 The power supply must bear the German Bauart Mark from TUV/GS.

## ☞ 7.0 ELECTROMAGNETIC COMPATIBILITY (EMC)

7.1 IEC 801-2 ESD (IEC 1004-4-2)

7.2 IEC 801-3 Radiated electrical field requirement (IEC 1004-4-3)

7.3 IEC 801-4 BURST (IEC 1004-4-4)

7.4 IEC 801-5 Surge Voltages

7.5 EN60555-2 harmonic current emissions

7.6 EN55022 Class B Radio interference (CISPR 22)

7.7 FCC Part 15, Subpart J class B 115VAC operation.

## ☞ 8.0 MTBF ( MEAN-TIME-BETWEEN FAILURES ) CALCULATION

The demonstrated MTBF shall be 70,000 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.

## 9.0 MECHANICAL REQUIREMENTS

### 9.1 Physical Dimension

