Power Supply Unit

Features

- Fixed, regulated output voltage
- Wide input voltage range
- Compact construction

Input Specification

Parameter	Conditions / Description	Min.	Nom.	Max.	Units
Voltage	Universal-AC Input normal voltage	100	115/230	240	VAC
	Universal-AC Input ranging voltage	90	115/230	264	VAC
Current	@115 VAC 90 W Load	--	--	2	A rms
	@230 VAC 90 W Load	--	--	1	A rms
Frequency	Auto-ranging	47	50/60	63	Hz

Cold Start @ 115 VAC @ 25 ℃	60 A
Cold Start @ 230 VAC @ 25 ℃	100 A

Output Specification

Voltage (VDC)		Load Range (A)		Line Regulation (%)	Load Regulation (%) (Note 1)	Ripple&Noise (PARD) (mVp-p) (Note 2)
		MIN.	Max. (Convection)			
S2	+12V	0 A	7.5 A	±0.5%	11.4 ~ 12.6 VDC (±5 %)	240 mVp-p

Note : 1.Load regulation is tested at 10% to 100% of rated load.
2. Peak-to-peak for 90W (convection rating) @115Vac MIN. ; Measurements with a 20MHz bandwidth and terminated with a 22uF electrolytic Cap. in parallel with a 0.1uF ceramic Cap

Overshoot / Undershoot

Turn-on / Turn-off	< 10%

General Specification

Efficiency

Full Load @ 115 VAC	> 85%
Full Load @ 230 VAC	> 85%
Minimum Average Efficiency in Active Mode	≥ 89%
Maximum Power in No Load mode (W)	≤ 0.15
DoE Level VI , ErP CoC V.5, Tier II	Meets
Power Factor Correction @ 115 VAC Full Load	> 0.9

Turn-on Time	
Full Load @ 115 VAC	< 3 sec
Hold-up Time	
Full Load @ 115 VAC	> 16 msec
Safety Ground Leakage Current	
Class II Type @ 230 VAC 50 Hz	< 0.25 mA
Withstand (Isolation) Voltage (UL60950-1；EN60950-1 2nd)	
4242 VDC, 1 min from Input(L1&L2) to Output	< 10 mA
2952 VDC, 1 Minute from Input(L1&L2) to Earth	< N/A
Insulation Resistance	
Input(L1&L2) to Output @ DC 500 V	> 100 MΩ
Input(L1&L2) to Earth @ DC 500 V	> N/A
MTBF	
Full Load, MIL-HDBK-217F @ 25 ℃	> 100 kHours
Weight	
Not Include Packing	< 480 g

Protection Specification

Brown-Out Protection (Input Voltage drops down to zero then back to nominal slowly)	
All Outputs	Hiccup / Auto-recovery
Overvoltage Protection (Latch)	
V1 Overvoltage Range	110% ~ 200%
Overcurrent(Overload) Protection（Overcurrent Range @ 110 % ~ 200 % above Rating Load）	
All Outputs	Hiccup / Auto-recovery
Short Circuit Protection:	
All Outputs	Hiccup / Auto-recovery

Electromagnetic Compatibility Specifications

FCC PART 15 Conducted / Radiated Emissions	Class B
CISPR 32 Conducted / Radiated Emissions	Class B
EN55032 Conducted / Radiated Emissions	Class B
Harmonic Current	
EN61000-3-2 Class A (Power Factor Correction)	Meet
Voltage Variation Immunity (Flicker)	
EN61000-3-3	Compliant
Electrostatic Discharge (ESD) Susceptibility	
EN61000-4-2 ; ± 8 kV Air Discharge	Criterion A
EN61000-4-2 ; ± 4 kV Contact Discharge	Criterion A
Radiated Susceptibility(RS)	
EN61000-4-3 ; 3 V/M	Criterion A
Electrical Fast Transient(EFT)/Burst	
EN61000-4-4 ; Impulse ±1 kV	Criterion A
Surge Susceptibility (Input Transient Protection)	
EN61000-4-5 ； ± 1 kV Line(L1) to Neutral(L2)	Criterion A
EN61000-4-5 ； ± 2 kV Line(L1) & Neutral(L2) to Earth	N/A

Conducted RF Immunity

EN61000-4-6 ； 3V	Criterion A

Voltage Dips / Interruptions

EN61000-4-11 ；Dips	Criterion A
EN61000-4-11 ；Interruptions	Criterion B

Safety Standarts Specifications

UL 60950-1	Certified
cUL 60950-1	Certified
TUV EN 60950-1	Certified
CB Report (IEC 60950-1)	Certified
CE	Certified
BSMI	Certified

Environmental Specifications

Temperature

Operating Range	0 ~ 40 ℃
Storage Range	-40 ~ 85 ℃
Derating Output（40 ~ 60 ℃）	-2.5% per ℃

Relative Humidity

Non-Condensing	5 % ~ 95 % RH

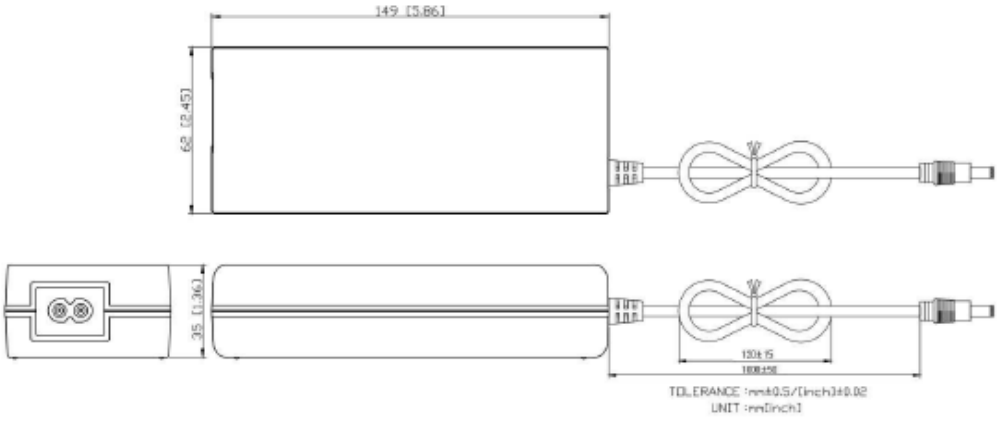
Vibration

Random — Operating , 3 Axes , 50 ~ 500 Hz , 10 Minutes / Axis	2.4 Grms Max.

Shock

Operating , Half Sine , 3 Axes , 10 mS , 6 Shocks Total	20 Gpk Max.

Mechanical Specifications



Connector Types & Pin Assignments

Connector Number	Connector Type	Pin Number	Signal
AC Inlet (Input)	IEC320 C8 AC Inlet	Pole 1 Pole 2	LINE NEUTRAL
(Output)	DC CORD 5.5x2.1x11mm 180 degree UL2095 4C 16AWG L = 1000mm (M01-0210-100103) <REV.:A >	INNER OUTTER	+OUTPUT RETURN

Note : (5.5x2.1x11 Plug Max. Current Rating : 5 A)