



FSP065 Series

FEATURES

- Compact size 129 × 51 × 31 mm
- Certified Medical Safety IEC 60601-1
- Meet Energy Efficiency DOE Level V
- No Load Power Consumption $\leq 0.5W$
- High altitude 5000M operation
- Meet EN55011 and FCC Class B
- Over Voltage Protection
- Over Current Protection
- Over Temperature Protection
- Compliant with RoHS requirement
- Both Class-I & Class-II design are provided

SAFETY STANDARD APPROVAL



DESCRIPTION

The series of AC/DC switching power supplies can deliver 65 watts continuous output power. High efficiency & compact dimension with an IEC320/C8 or IEC320/C6 inlet to mate with interchangeable cord for world-wide use. All models meet EN55011 and FCC class B emission limits.

INPUT SPECIFICATIONS

Input voltage:	90-264 VAC
Input frequency:	47-63 Hz
Input current:	< 1.8 A (rms) / 115 VAC < 0.9 A (rms) / 230 VAC
Touch current:	< 100 μ A / 264 VAC, 60 Hz

OUTPUT SPECIFICATIONS

Output voltage/current:	See rating chart
Total output power:	65W
Protection:	
Over voltage:	The power supply will shut down while over-voltage happened.
Short circuit:	Output can be short-circuited without damage, and will recover automatically after short-circuit condition is removed.
Over current:	Output current shall be limited between 200% max load and auto recovery or latch protection.
Over temperature:	The power supply will shut down while over-temperature happened. It will shutdown operation after the fault condition is removed.

ENVIRONMENTAL SPECIFICATIONS

Operating temperature	0°C~+40°C
Storage temperature	-20°C~+85°C
Operating humidity	5~95% RH non-condensing
Storage humidity	5~95% RH non-condensing

GENERAL SPECIFICATIONS

Efficiency:	87% min.
Hold-up time:	8 ms minimum at 115Vac/60Hz
Line regulation:	$\pm 1\%$ maximum at full load
Inrush current:	60 A @ 115 VAC or 140 A @ 230 VAC, at 25°C cold start
Operating altitude:	5000 meters
Withstand voltage:	4000 VAC from input to output (2 MOPP)
MTBF:	150,000 hours at full load at 25°C ambient, calculated per MIL-HDBK-217F
EMC Performance (IEC60601-1-2)	
EN55011:	Class B conducted, class B radiated
FCC:	Class B conducted, class B radiated
VCCI:	Class B conducted, class B radiated
EN61000-3-2:	Harmonic distortion, Class A
EN61000-3-3:	Line flicker
EN61000-4-2:	ESD, ± 15 KV air and ± 8 KV contact
EN61000-4-3:	Radiated immunity, 3 V/m
EN61000-4-4:	Fast transient/burst, ± 2 KV
EN61000-4-5:	Surge, ± 1 KV diff., ± 2 KV com.
EN61000-4-6:	Conducted immunity, 3 Vrms
EN61000-4-8:	Magnetic field immunity, 3 A/m
EN61000-4-11:	Voltage dip immunity, 30% reduction for 500 ms, 60% reduction for 100 ms, and >95% reduction for 10 ms

OUTPUT VOLTAGE/CURRENT RATING CHART

Model		Output						Average Active Efficiency (typical) @ 115 / 230 VAC
Class-I	Class-II	Voltage	Min. Current	Max. Current	Tolerance	Ripple & Noise	Max. Power	
FSP065-DHBM1	FSP065-DHCM1	12 V	0 A	5.42 A	±5%	120 mV	65W	87%
FSP065-DGBM1	FSP065-DGCM1	15 V	0 A	4.33 A	±5%	150 mV	65W	87%
FSP065-DDBM1	FSP065-DDCM1	18 V	0 A	3.62 A	±5%	180 mV	65W	87%
FSP065-DBBM1	FSP065-DBCM1	19 V	0 A	3.43 A	±5%	190 mV	65W	87%
FSP065-DABM1	FSP065-DACM1	24 V	0 A	2.71 A	±5%	240 mV	65W	87%

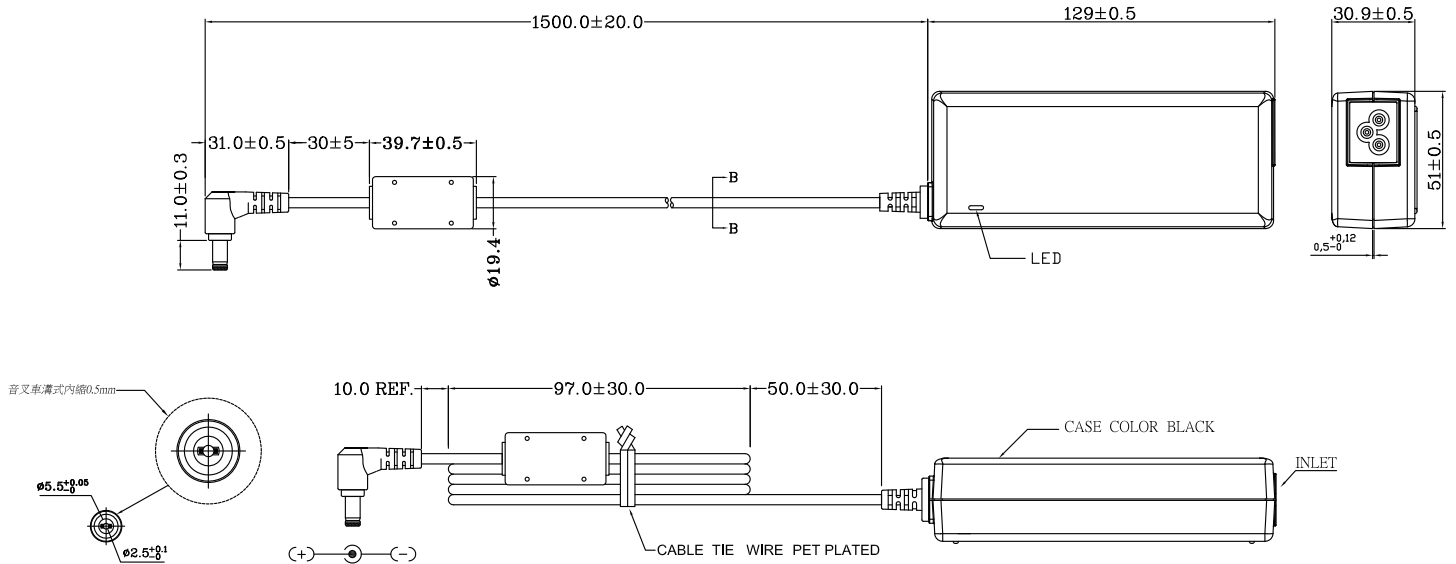
NOTES:

1. Class-I models are equipped with IEC 320/C6 inlet, and Class-II models with IEC 320/C8 inlet

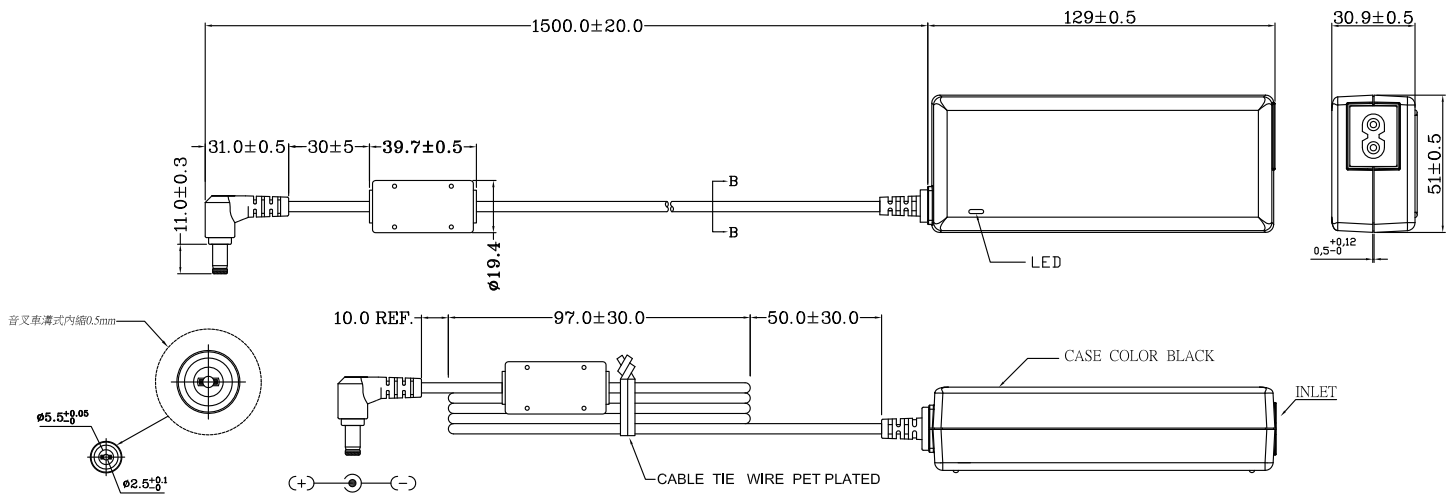
2. Ripple and noise measurements shall be made with an oscilloscope of at least 20MHz bandwidth. Output shall be bypassed at the connector with a 0.1µF ceramic disk capacitor and a 10µF electrolytic capacitor to simulate system loading.

MECHANICAL SPECIFICATIONS

Class I IEC 320/C6 AC Inlet



Class II IEC 320/C8 AC Inlet



NOTES:
 1. Dimensions shown in mm