# 800 Watt Embedded **Power Supply**



### **Features**

OUTPUT

- · Universal AC input / Full range
- Built-in active PFC function, PF > 0.96
- Using ZVS technology to reduce power dissipation
- Output protection: OVP/OLP/SCP/OPP/OTP
- · Built in fan speed control
- Built in AC inrush current limiting circuit (<20A)

DC Output

· Built in constant current limiting circuit

- · Built in Remote Sense Function
- · Built in DC OK signal
- Wide operating ambient temperature (-30°C~70°C)

48V

- 1U low profile, 41mm
- 100% full load burn-in test
- 3 year warranty





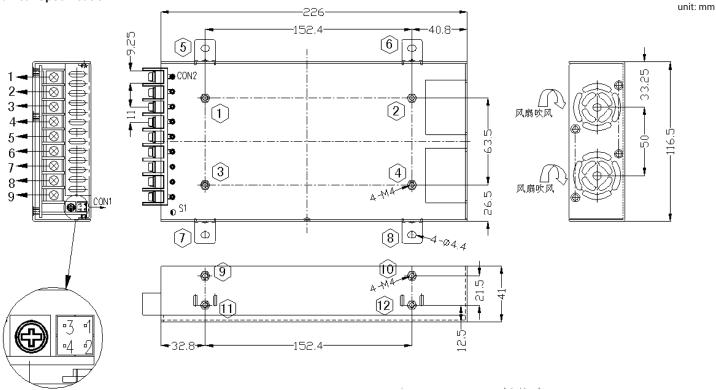
#### **Specifications** PDF-800-24 PDF-800-48 24V

OUTPUT	Doodtpat		1.01
	Rated Current (100 ~ 127Vac) (NOTE 1)	27A	14A
	Rated Current (128 ~ 264Vac)	33A	16.5A
	Ripple and Noise (NOTE 2)	≤ 200mV	≤ 240mV
	Voltage ADJ. Range	-5% ~ +10% of rated output voltage	
	Voltage Accuracy	±2%	
	Line Regulation	±0.5%	
	Load Regulation	±2%	
	Set-up Time	≤ 3S (220Vac input, Full load)	
	Hold up Time	≥ 8mS (220Vac input, Full load)	
	Temperature Coefficient	±0.03%/°C	
	Overshoot and Undershoot	< 5.0%	
INPUT	Voltage Range	90Vac ~ 264Vac	
	Frequency Range	47Hz – 63Hz	
	Power Factory (Typical)	PF ≥ 0.96/230VAC PF ≥ 0.98/115VAC Full Load	
	Efficiency (Typical)	≥ 88%	≥ 89%
	AC Current (Max.)	≤ 12A	
	Inrush Current (Typical)	≤ 20A@220Vac Cold Start	
	Leakage Current	Input – output: ≤ 0.25mA Input – PG: ≤ 3.5mA	
PROTECTION	Over Load	110% ~ 135% of rated output current, constant current, auto recovery	
	Over Power	110% ~ 135% of rated output power, constant current, auto recovery	
	Over Temperature	105°C ± 5°C (detect on Mosfet temperature); shut dwn, auto recovery after temperature goes down to 70°C	
	Over Voltage	110% ~ 150% of rated output voltage, constant voltage, auto recovery	
	Shorted Circuit	Long-term mode, constant current, auto recovery	
ENVIRONMENT	Operating amb. Temp. & Hum.	-30°C ~ 70°C; 20% ~ 90%RH No Condensing (refer to the derating curve)	
	Storage Temp. & Hum.	-40°C ~ 85°C; 10% ~ 95%RH No Condensing	
SAFETY & EMC (NOTE 3)	Safety Standards	UL60950-1 2nd Ed; IEC 60950-1: 2005 (2nd Ed); EN60950-1:2006	
	Withstand Voltage	Primary - Secondary: 3.0KVac; ≤10mA Primary - PG: 1.5KVac; ≤10mA Secondary - PG: 0.5KVac; ≤10mA	
	Isolation Resistance	≥100M ohms	
	EMI Conduction & Radiation	Compliance to EN55022, Class B	
	Harmonic Current	Compliance to EN61000-3-2, Class D	
	EMS Immunity	Compliance to EN61000-4-2,3,4,5,6,8,11; heavy industry level	
OTHERS	MTBF (MIL-HDBK-217F)	More than 200,000Hrs (25°C, Full load)	
	Dimension (L*W*H)	226 x 116.5 x 41 mm	
	Packing	6PCS/CTN, 8.9KGS, 0.04CBM	
	Cooling Method	Force air cooling (built-in fan, the fan speed is controlled by load and internal temp.)	
NOTE	<ol> <li>All parameters NOT specially mentioned are measured at rated input, rated load and 25°C of ambient temperature</li> <li>Measured at 20MHz of bandwidth by using a 12" twisted pair-wire terminated with a 0.1 uF &amp; 47uF parallel capacitor</li> <li>The SPS is considered a component which will be installed into final equipment. The equipment must be re-confirmed that it still meets EMC directives</li> </ol>		

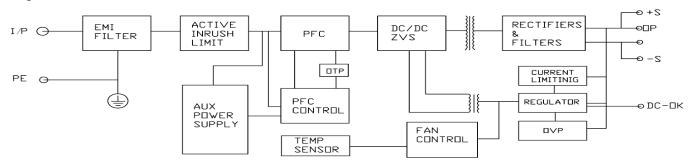
# PDF-800 Series | 800 Watt Embedded Power Supply







# **Block Diagram**



## **Derating Curve**

