

## **FSP400-60EGN**

# (80PLUS Gold, RoHS Compliant) 400 Watts ATX12V 2.3 Switching Power Supply Meet 2010 ErP

#### **Features**

- Complied with ATX12V 2.3 standard
- Active Power Factor Correction (PFC) meet EN61000-3-2
- · High efficiency and reliability
- Compatible with European Union Directive 2002/95/EC (Restriction on Hazardous Substances).
- Remote ON/OFF function
- Internal 12V DC fan included
- Noise Killer (thermal fan speed control function)
- Low noise and ripple
- Output over voltage, short circuit, and over current protection
- 100% Hi-pot, ATE, and burn-in tested
- Re-settable power shut down
- Complies with FCC part 15 subpart J class B 115Vac operation, and CISPR 22 class B at 230Vac operation
- Approved by CUL/UL60950-1, TUV EN60950-1, CB 60950-1 report, FCC,EMC.

#### **Input Characteristics**

Input Range: 90 ~ 264Vac, Full Range Input

Frequency: 47 ~ 63Hz

Input Current: Max 6A @ 115Vac, 3A @ 230Vac

**Inrush Current:** No damage.

### **Output Characteristics**

	MINIMUM LOAD	NORMAL LOAD	MAXIMUM LOAD	LOAD REG.	LINE REG.	RIPPLE & NOISE
+3.3V	0.1A	12A	24/3A	±5%	±1%	50mV P-P
+5V	0.2A	12A	8/22A	±5%	±1%	50mV P-P
+12V1	0.1A	8A	18A	±5%	±1%	120mV P-P
+12V2	0A	8A	18A	±5%	±1%	120mV P-P
-12V	0A	0.15A	0.3A	±10%	±2%	200mV P-P
+5Vsb	0A	1.5A	3A	±5%	±1%	50mV P-P





#### **Specification**

- Temperature Range: Operating: +0°C ~ +40°C on full load
   Storage & Shipping: -40°C ~ +70°C
- Humidity: 5-85% on operating, 5-95% on storage
- Dielectric Withstand: Primary to frame ground 1800V<sub>AC</sub> for 1 second
- Efficiency: 87% minimum, typical up to 90%
- Rise time: Less than 20ms
- Hold-up Time: 17ms minimum at nominal input voltage
- Power Good Signal: Power on delay time 100 ~ 500ms, off delay
   1ms minimum (TTL and CMOS compatible)
- Leakage Current: Less than 3.5mA at 264Vac, 50Hz
- MTBF: 100,000 hours on maximum load at +25°C
- **Dimensions** (LxWxH):140x150x85.8mm / 5.5x5.9x3.4inch

\*+12V1,2,3,4 Peak current is 20A (less than 10mS)

\*+5V<sub>sb</sub> peak current is 4A (less than 0.5S)

\*+3.3V & +5V total output does not exceed 120W when +5V is loaded to 22A, then +3.3V maximum load is 3A when +3.3V is loaded to 24A, then +5V maximum load is 8A

\*+12V1 & +12V2 total output does not exceed 384W(32A)

Sparkle Power Inc. Main Office

1000 Rock Avenue San Jose, CA 95131 TEL: 408-519-8888 FAX: 408-519-9999

E-MAIL: info@sparklepower.com

Sparkle Power Inc. Los Angeles Office

17071 Green Drive City of Industry, CA 91745 TEL: 626-839-7180 FAX: 626-839-3395