



30W High Efficiency Dimmable Driver

Features

- · For LED Indoor Office & Retail Application
- \cdot 1-10V / PWM Dimming Function
- · High Reliability & Long Life 50,000hrs
- · Compact Size/ Optimized Performance
- · Constant Current Design/ Low Inrush Current/ Low Ripple Current
- · Wide Input Range for Worldwide use (up to 305Vac)
- · Low energy comsumption at standby
- · Protections: Short Circuit / Over Voltage / Over temperature
- · Class 2 power unit
- · 100% Burn-in Test
- · Safety: Meet IEC61347-2-13, UL8750 & EMI EN55015













Model Name	FSP30-ZZAP(050)M	FSP30-ZZAP(060)M	FSP30-ZZAP(070)M	FSP30-ZZAP(105)M	FSP30-ZZAP(125)M
Rated Power	33W	33W	33W	33W	33W
Output Voltage	24-50V	24-50V	24-48V	14-32V	12-26V
Rated Current	500mA	600mA	700mA	1050mA	1250mA
Efficiency (typ.)	85%	86%	88%	88%	88%
Input Voltage/ Frequency	120~277Vac / 47~63Hz				
Power Factor (typ.)	PF≥0.9				
Turn On Delay Time, Rise time	≤0.5s max / ≤50ms max.				
Inrush Current (typ.)	5A cold start				
Life Time [2]	50,000 hours				
Operating Temperature	-20°C~+45°C				
Output Current Accuracy	±5%	±5%	±5%	±5%	±5%
Output Ripple Current[3]	±5%	±5%	±5%	±5%	±5%
Line Regulation	±0.5%	±0.5%	±0.5%	±0.5%	±0.5%
AC Current (typ.)	<0.37A				
Leakage Current	≤0.25mA				
Operating Humidity	20 ~ 95%RH				
Storage Temperature	-40 ~ +85℃				
Storage Humidity	10 ~ 95%RH				
Vibration	0.01g² / Hz at 5 Hz sloping to 0.02g² / Hz at 20 Hz, and maintaining 0.02g² / Hz from 20 Hz to 500 Hz at a constant acceleration of 3.13G for 20 minutes per axis for all three axes				
IP Level	IP20				
Over Voltage Protection	<60V	<60V	<60V	<60V	<60V
	Auto Recovery				
Other Protections	SCP; OTP; OLP				
Surge Voltage	Differential Mode≧1KV : Common Mode≥2KV				
Withstand Voltage (Hipot)	I/P-O/P 3750Vac, I/P-FG 1875Vac				
Isolation Resistance	I/P-O/P I/P-FG: 100M ohm @ 500Vdc / 25°C				
Safety Standards	EN61347-1, EN61347-2-13, UL8750				
EMC Standard	Compliant with EN55015 CLASS B				
Dimension (LxWxH)	148 x 40 x 30mm				
Net Weight / Packing	165g; 36 pcs / box				

- 1. Data that didn't mention is tested under 230Vac/ 50Hz full load condition
- 2. Data at full load and rated voltage, 230Vac / 50Hz input, and 35°C ambient temperature unless otherwise specified.
- 3. The ripple current must be measured under the condition of AC coupling & 20MHz bandwidth. (Rated input and rated output)
 4. The power supply is considered as a component that will be operated in combination with final equipment. Since EMC performance will be affected by the complete installation,
- the final equipment manufacturers must re-qualify EMC Directive on the complete installation again.



75%

80%

85%

90%

Load

95%

Unit: mm M Type: FSP30-ZZAP(XXX)M AC L (Brown) 18AWG/18AWG AC N (Blue) DIM- (Purple) 18AWG/18AWG 30±0,5 Blank Type: FSP30-ZZAP(XXX) 18AWG AC L (Brown) 18AWG AC N (Blue) V- (Black) 18AWG → V+ (Red) 18AWG Efficiency 92.0 90.0 Efficiency (%) 88.0 277Vac 86.0 230Vac 120Vac 84.0 75% 95% 100% PFC vs Loading THD vs Input Voltage 25% 20% 0.90 15% 0.85 모 PFC 0.80 10% **→**THD 277Vac 0.75 230Vac 5% 0.70

FSP TECHNOLOGY INC.

100%

120Vac

www.fsp-group.com / sales@fsp-group.com.tw NO.22,Jianguo E. Rd., Taoyuan City, Taiwan, R.O.C. TEL: +886-3-375-9888 / FAX: +886-3-375-6966

120

140

170

200

Input Voltage (V)

230

260

277