Features

- Input Voltage 90~132V AC/180~264V DC with switch
- Forced air cooling by built-in DC fan
- Efficiency up to 92%
- Protection: OLP, OVP, SCP, OTP
- 3 Years Warranty

56YEL600-xx-RS AC-DC PSU Series

600W Enclosed AC/DC Power Supply (PSU)

The 56YEL600-xx-RS Series is a reliable and efficient 600W Enclosed AC/DC Power Supply. Designed for use in applications such as telecoms, computing and multimedia systems. This series is supplied with a Screw Terminal Block input connection and supports input voltages of 90~132V AC 47~63Hz.

Models

Model	Voltage (V) DC	Rated Current	Rated Power	% Efficiency	Voltage range	Ripple and Noise mVp-p
56YEL600-12-RS	12	50	600	87	11.4~13.2	200
56YEL600-15-RS	15	40	600	90	14.25~16.5	200
56YEL600-24-RS	24	25	600	90	22.8~26.4	200
56YEL600-36-RS	36	16.6	597.6	90.5	34.2~39.6	240
56YEL600-48-RS	48	12.5	600	92	45.6~52.8	360

Input Specifications

Input Voltage	90-132VAC / 180-264VAC by switch	127-370VDC (switch on 230VAC)
Frequency Range	47-63Hz	
AC Current	12A/115VAC 7.5A/230VAC	
Inrush Current	Cold Start 60A/400us at 230VAC 50Hz	Cold Start 40A/400us at 115VAC 50Hz
Leakage Current	<2mA/240VAC	

Output Specifications

Voltage Tolerance	+1.5% 12v	+1.0% Others
Line Regulation	±0.5%	
Load Regulation	+1.0% 12v	+0.5% Others
Set up Rise Time Hold up	1.3s,50ms,20ms/230VAC(at full load)	1.3s,50ms,16ms/115VAC(at full load)

Protection

Over Load	105~150%Rated Output Power
	Constant current limiting, unit will shutdown after 3 sec. re-power on to recover
Over Voltage	115~135%Rated Output Voltage
	Shut down o/p voltage, re-power on to recover
Short Circuit	Hiccup mode, recovers automatically after fault condition is removed
Over Temperature	Shut down o/p voltage, re-power on to recover.

Environmental Characteristics

Working Temp	-25~+65℃ (Refer to "Derating Curve")
Working Humidity	20 ~ 90% RH Non-condensing
Storage Temp., Humidity	-40~+85℃, 10~95% RH non-condensing
Temp. Coefficient	±0.03%/(0 ~ 50℃) on load output
Vibration	Component: 10 ~ 500Hz, 5G 10min./1cycle, 60min. each along X, Y, Z axes
Over Voltage Category	OVC II / According to BS EN/EN61558, BS EN/EN50178,BS EN/EN60664-1,BS EN/EN62477-1;altitude up to 2000 meters
MTBF	287.6Khrs min. MIL-HDBK-217F(25℃)
Safety Protection	Class I
Function	RTH3≥50℃ FAN ON, RTH3≤40℃ FAN OFF

Safety & EMC

Safety Standards	BS/EN62368-1
Withstand Voltage	I/P-O/P:3KVAC/1min I/P-FG:2KVAC/1min O/P-FG:0.5KVAC/1min
Isolation Resistance	I/P-O/P:100M Ohms / 500VDC / 25℃/ 70% RH
EMC Emission	Compliance to BS EN/EN55032 (CISPR32) Class B,BS EN/EN55035 BS EN/EN61000-3-2, BS EN/EN61000-3-3
EMC Immunity	Compliance to BS EN/EN61000-4-11 Criteria B, BS EN/EN61000-4-2,3,4,5,6,8 Criteria A

Notes:

1. All parameters NOT specially mentioned are measured at 230VAC input, rated load and 25℃ of ambient temperature.
2. Ripple & noise are measured from peak to peak with band width limit of 20MHz (0.1uf and 47uf /50V parallel capacitor under DC output full load, AC nominal input 25 ℃ ambient temperature).
3. Derating may be needed under low input voltages. Please check the derating curve for more details.
4. The power supply is considered a component which will be installed into a final equipment. The final equipment must be re-confirmed that it still meets EMC directives. For guidance on how to perform these EMC tests, please refer to “EMI testing of component power supplies."
5. The ambient temperature derating of 5℃/1000m is needed for operating altitude greater than 2000m(6500ft).

Dimensions & Weight

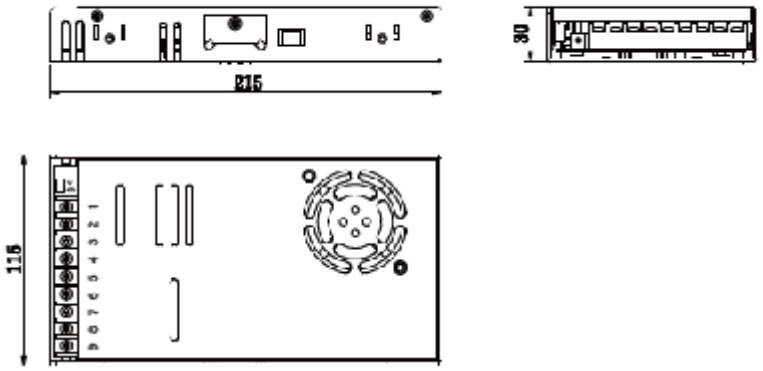
Size	215 x 115 x 30 mm
Weight	860g/pcs

Packaging

Carton Size	38 x 20 x 25.5 cm
Master Carton Quantities	15pcs/carton

Dimensions and Recommended Layout

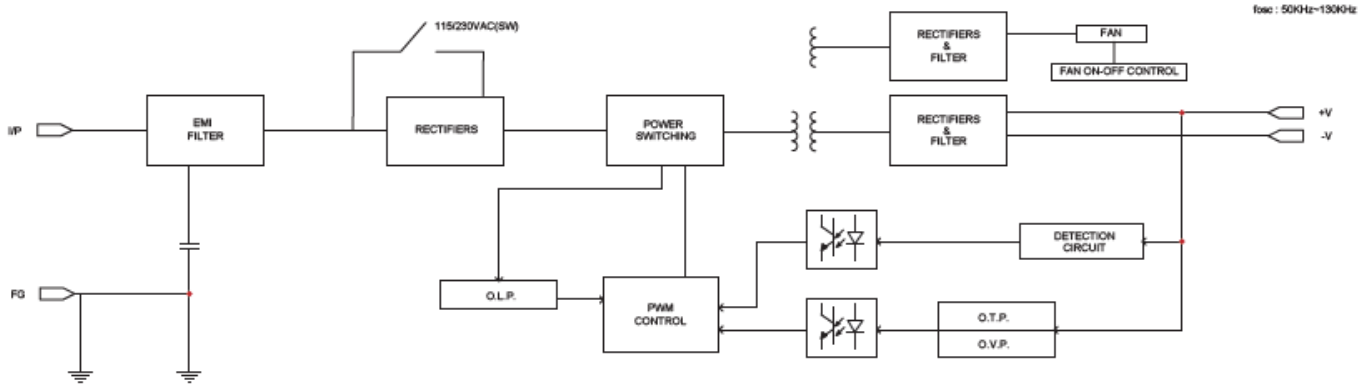
(Unit: mm , tolcrancc: ±1mm)



Terminal Pin No. Assignment

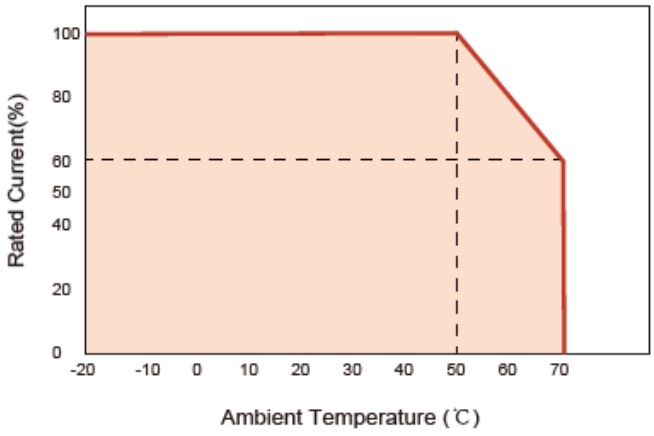
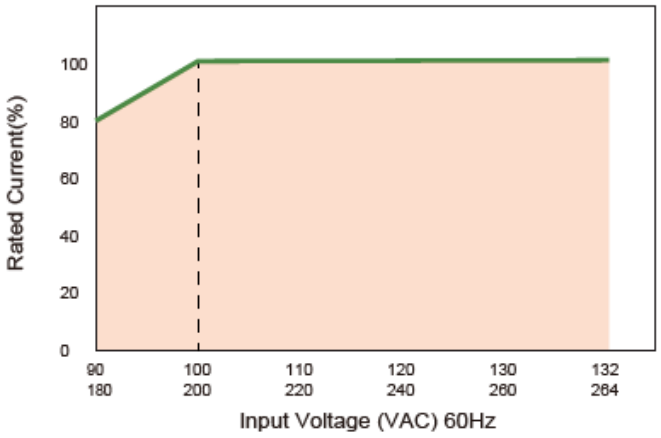
Pin No.	Assignment
1	DC OUTPUT +V
2	DC OUTPUT +V
3	DC OUTPUT +V
4	DC OUTPUT -V
5	DC OUTPUT -V
6	DC OUTPUT -V
7	PG
8	AC/N
9	AC/L

Block Diagram



Derating Curve

Derating Curve



Static Characteristics