

Features

- Input Voltage 90~305V AC
- Built-in Active PFC Function
- Cooling by free air convection
- Approved to UKCA, CE
- Efficiency up to 90%
- Safety Approved to IEC 62368-1 BS EN/EN 62368-1
- Protection: OLP, OVP, OTP SCP
- Three Years Warranty



Ideal Power's 56YEP75-xy 75W Enclosed AC/DC Power Supply (PSU) Series is certified to UKCA, CE & IEC 62368-1/BS EN62368-1/EN 62368-1 Standards and complies with the relevant Efficiency Regulations. These are primarily used in ITE, Audio & Video Industries and customised solutions are available upon request.

Models

Model Number	DC Voltage (V)	Rated Current (A)	Rated Power (W)	Efficiency (%)	Voltage Adj. Range (V)	Ripple & Noise (mVp-p)
56YEP75-05	5	15	75	82	4.5~5.5	80
56YEP75-7.5	7.5	10	75	88		
56YEP75-12	12	6.25	75	85	11.4~13.2	120
56YEP75-13.5	13.5	5.6	75.6	88		
56YEP75-15	15	5	75	86	14.3~16.5	120
56YEP75-24	24	3.12	74.9	87	22.8~26.4	120
56YEP75.27	27	2.8	75.6	88		
56YEP75-48	48	1.25	60	89	45.6~52.8	120
56YEP75-60	60	1.25	75	88		

Input Specifications

Input Voltage	90-305VAC/127-370VDC
Frequency Range	47-63Hz
Power Factor	PF>0.93/230V AC at full load / PF>0.98/115V AC at full load
AC Current	0.9A/115V AC – 0.5A/230V AC
Inrush Current	Cold Start 35A at 230V AC
Leakage Current	< 35A/230V AC
Connection	I/P: 3 poles terminal Block

Output Specifications

Voltage Tolerance	±2.0%	5v
	±1.0%	Others
Line Regulation	±0.5%	
Load Regulation	±1.0%	5v
	±0.5%	Others
Set up, Rise Time	600ms, 30ms at full load	
Hold up Time	16ms at full load	
Connection	O/P: 4 poles terminal Block	

Protection

Over Load	105%-135% Rated Output Power	
	Protection type: Constant current limiting, recovers automatically after fault condition is removed.	
Over Voltage	5.75~ 6.75V	5v
	13.2~16.2V	12v
	16.5~20.25V	15v
	26.4~32.4	24v
	52.8~64.8V	48v
	Protection type: Shut down o/p voltage, re-power on to recover.	
Over Temperature	Shut down o/p voltage, recovers automatically after temperature comes down	

Environmental Characteristics

Working Temp	-25~+70°C (Refer to "Derating Curve")	
Working Humidity	20~90% RH non-condensing	
Storage Temp., Humidity	-40~+85°C, 10~95% RH non-condensing	
Temp. Coefficient	±0.05%/°C (0~50°C)	
Vibration	10 ~ 500Hz, 2G 10min. /1cycle, period for 60min. each along X, Y,Z axes	
Over Voltage Category	III; According to BS EN/EN61558, BS EN/EN50178, BS EN/EN60664 BS EN/EN62477-1; altitude up to 2000 meters	
MTBF	1845.8K hrs min. Telcordia SR-332 (Bellcore)	

Safety & EMC

Safety Standards	BS EN/EN 62368-1, BS EN/EN 61558-1	
Withstand Voltage	I/P-O/P:4KVAC I/P-FG:2KVAC O/P-FG:0.5KVAC	
Isolation Resistance	I/P-O/P, I/P-FG, O/P-FG:100M Ohms/ 500VDC/25 °C/70% RH	
EMC Emission	Compliance to BS EN/EN55032 (C1SPR32) Class B, BS EN/EN61000-3-2-3	
EMC Immunity	Compliance to BS EN/EN61000-4-2,3,4,5,6,8,11, BS EN/EN55035	

Function

Remote Control	CN: <0~0.8V DC Power on, 4~10V DC Power off
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Notes:

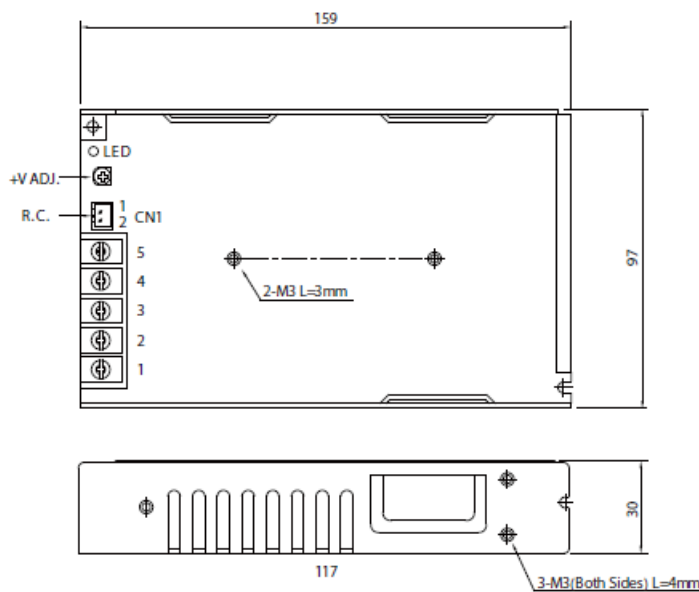
1. All parameters NOT specially mentioned are measured at 230VAC input, rated load and 25°C of ambient temperature.
2. Ripple & noise are measured from peak to peak with band width limit of 20MHz (0.1uf and 47uf /50V parallel capacitor under DC output full load, AC nominal input 25 °C ambient temperature).
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°C/1000m is needed for operating altitude greater than 2000m(6500ft).

Dimensions & Weight

Size	159x97x30mm / 6.26x3.82x1.18in
Weight	440g

Packaging

Carton Size	36x31.5x17.5cm / 14.17x12.40x6.89in
Master Carton Quantities	30pcs/Carton

Dimensions and Recommended Layout

Output

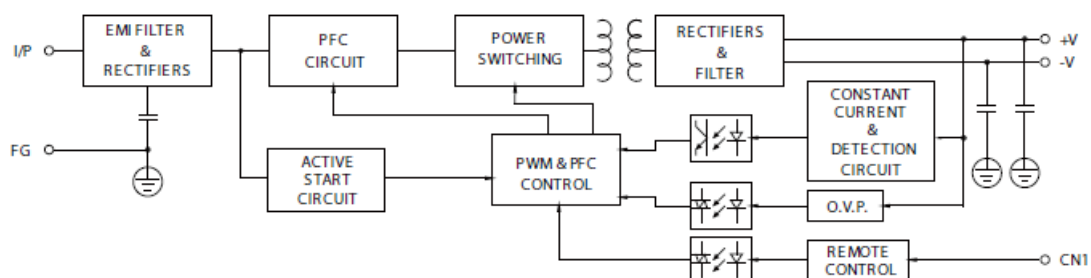
No.	Description
4	DC OUTPUT -V
5	DC OUTPUT +V

Input

No.	Description
1	AC/L
2	AC/N
3	FG ⚡

Remote ON/OFF (CN): JST S2B-XH or equivalent(optional)

No.	Description	Mating Housing	Terminal
1	RC+	JST XHP or equivalent	JST SXH-001T-P0.6 or equivalent
2	RC-		

Block Diagram


Derating Curve

