YSDS100 SERIES 100W

Our step shape power family are designed with ultra-slim plastic housing and for full range.

The series are isolation Class II Level, achieving high efficiency and low no-load power consumption. They provide adjustable DC output voltage.

The good performance can be used for building automation, household and industrial control systems etc.

Features

- Isolation Class II
- Class 2/Pass LPS
- Ultra Slim Step Shape
- DC Output Voltage Adjustable
- Protection: Short Circuit/Overload/ Over Voltage
- Over voltage category III
- Three Years Warranty

Model Information

Part number	DC VOLTAGE	RATED CURRENT	RATED POWER
YSDS-100-12 (LPS)	12V	7.1A	85.2W
YSDS-100-15 (LPS)	15V	6.13A	92W
YSDS-100-15	15V	6.5A	97.5W
YSDS-100-24 (LPS)	24V	3.83A	92W
YSDS-100-24	24V	4.17A	100W
YSDS-100-48 (LPS)	48V	1.92A	92.2W
YSDS-100-48	48V	2.08A	100W

Input

VOLTAGE RANGE	90 ~ 264VAC	
	127 ~ 370VDC	
FREQUENCY RANGE	47 ~ 63Hz	
INRUSH CURRENT	COLD START 35A/115VAC 70A/230VAC	
AC CURRENT	3A/115VAC	
	1.6A/230VAC	
EFFICIENCY	88%	YSDS-100-12 (LPS)
	89%	YSDS-100-15 (LPS)
	89%	YSDS-100-15
	90%	YSDS-100-24 (LPS)
	90%	YSDS-100-24
	90%	YSDS-100-48 (LPS)
	90%	YSDS-100-48

Output

RIPPLE & NOISE	120mVp-p	YSDS-100-12 (LPS)
	120mVp-p	YSDS-100-15 (LPS)
	120mVp-p	YSDS-100-15
	150mVp-p	YSDS-100-24 (LPS)
	150mVp-p	YSDS-100-24
	240mVp-p	YSDS-100-48 (LPS)
	240mVp-p	YSDS-100-48
VOLTAGE ADJ. RANGE	10.8 ~ 13.8V	YSDS-100-12 (LPS)
	13.5 ~ 18V	YSDS-100-15 (LPS)
	13.5 ~ 18V	YSDS-100-15
	21.6 ~ 29V	YSDS-100-24 (LPS)
	21.6 ~ 29V	YSDS-100-24
	43.2 ~ 55.2V	YSDS-100-48 (LPS)
	43.2 ~ 55.2V	YSDS-100-48
VOLTAGE TOLERANCE	±2.0%	
LINE REGULATION	±1.0%	
LOAD REGULATION	±1.0%	
SETUP, RISE TIME	500ms, 50ms/100-240VAC at full load	
HOLD UP TIME (Typ.)	30ms/100-240VAC at full load	

Protection

OVER LOAD	102 ~ 110% rated output power; 105 - 150% rated output power Hiccup mode when output voltage <50%, recovers automatically after fault condition is removed Constant current limiting within 50%~100% rated output voltage, recovers automatically after fault condition is removed.	
OVER VOLTAGE	12-13V	YSDS-100-12 (LPS)
	15-17V	YSDS-100-15 (LPS)
	13.8-18V	YSDS-100-15
	24-25.5V	YSDS-100-24 (LPS)
	21.6-29V	YSDS-100-24
	48-48.7V	YSDS-100-48 (LPS)
	43.2-55.2V	YSDS-100-48

Environment

WORKING TEMP.	-20℃ ~ +70℃
Working Humidity	20 ~ 90% RH Non-Condensing
STORAGE TEMP., HUMIDITY	-40℃ ~ +85℃, 10 ~ 90% RH non-condensing
TEMP. COEFFICIENT	±0.03%/℃ (0 ~ 50℃) RH non-condensing
VIBRATION	10 ~ 500Hz, 2G 10min./1cycle, period for 60min. each along X, Y, Z axes; Mounting: Compliance o IEC60068-2-6
OPERATING ALTITUDE	2000 meters
OVER VOLTAGE CATEGORY	Ⅲ; According to EN61558, EN50178, EN60664-1, EN62477-1; altitude up to 2000 meters

SAFETY & EMC

SAFETY REGULATIONS	UL62368-1, BS EN/EN62368-1
WITHSTAND VOLTAGE	I/P-O/P:3KVAC
INSULATION RESISTANCE	I/P-O/P:100M Ohms / 500VDC / 25℃ / 70% RH
EMC EMISSION	BS EN/EN 55032 class B, BS EN/EN IEC 61000-3-2,3
EMC IMMUNITY	BS EN/EN61000-4-2,3,4,5,6,8,11

Note

1. All parameters NOT specially mentioned a 230VAC input, rated load and 25℃ of ambient temperature.
2. Ripple&noise are measured from peak o 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. Installation clearances: op with 40mm, bottom with 20mm, left and right with 5mm. Increase he space o 10-15mm when the adjacent device is heat source.
4. Derating may be needed under low input vol age. Please check the derating curve for more de ails.
5. Efficiency es after 30 minutes of burn-in.
6. The ambient temperature derating of 3.5 ℃/1000m for operating altitude higher than 2000m(6500f).

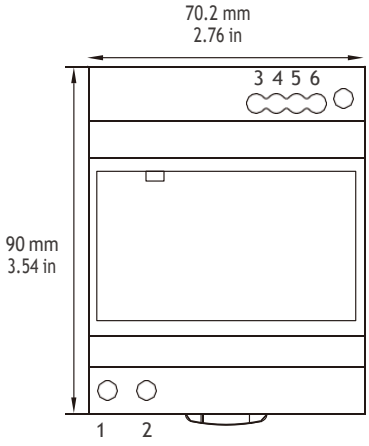
Dimensions & Weight

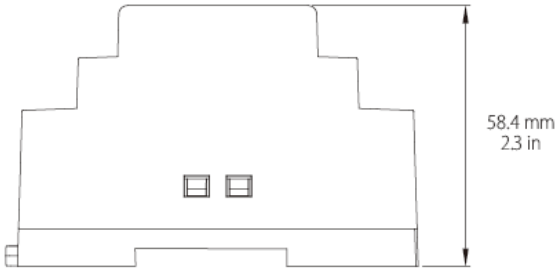
Length:	90mm/3.54in
Width:	70.2mm/2.76in
Height:	58.4mm/2.3in
Weight:	270g

Packing

Carton Size:	42 x 22 x 38 CM 16.54 x 8.66 x 14.96 in
Master Carton Quantities:	50pcs / Carton

Dimensions and Installation





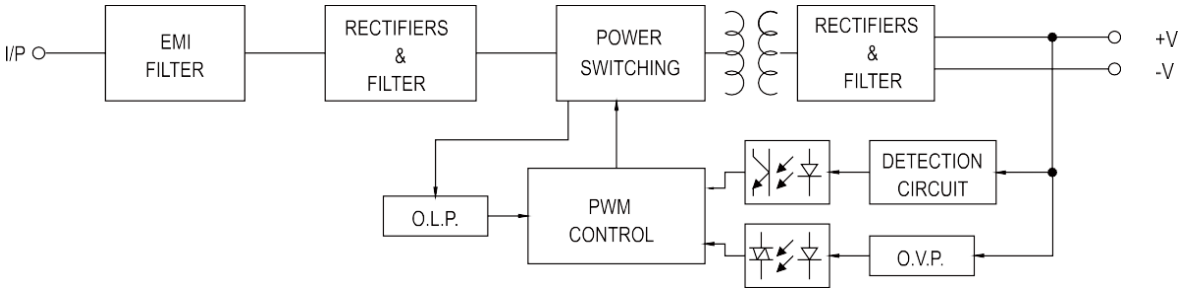
Input

No.	Description
1	AC/L
2	AC/N

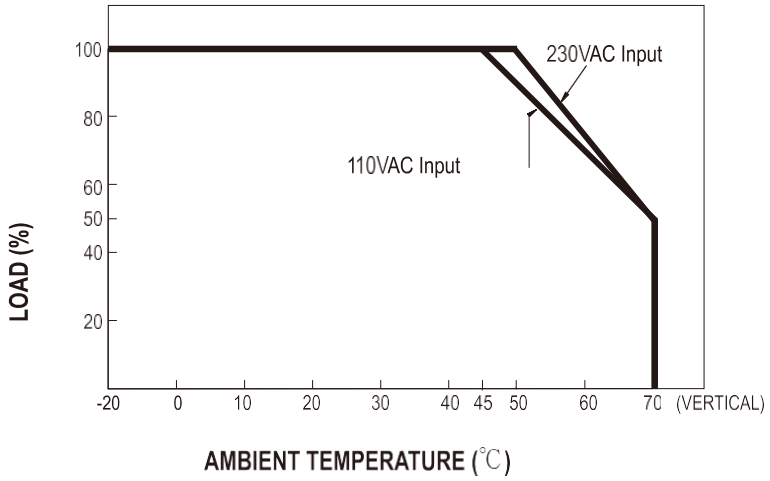
Output

No.	Description
3,4	-V
5,6	+V

BLOCK Diagram



Deduction Curve And Temperature



Minus Output And Input Voltage Curves