



150W Single Output Switching Power Supply

LPV-150 series



■ Features :

- Constant voltage design
- 180~305VAC input only
- Fully encapsulated with IP67 level (Note.8)
- Class II power unit, no FG
- Protections: Short circuit/Overload/Over voltage/Over temperature
- Fully isolated plastic case
- Cooling by free air convection
- 100% full load burn-in test
- Low cost, high reliability
- Suitable for use in Dry, Damp and Wet Locations
- Suitable for LED lighting and moving sign applications(Note 7.)
- 2 years warranty

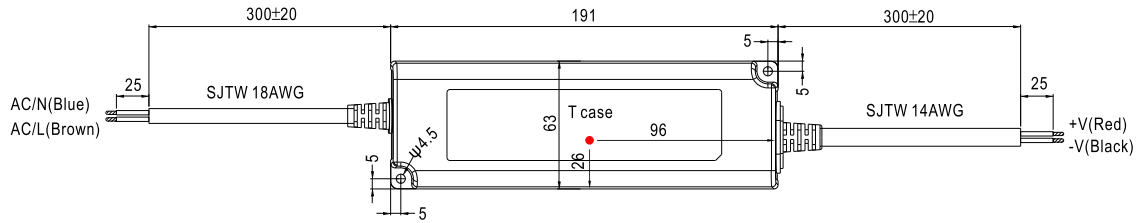
□ IP67 cULus CE

SPECIFICATION

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MODEL		LPV-150-12	LPV-150-15	LPV-150-24	LPV-150-36	LPV-150-48
OUTPUT	DC VOLTAGE	12V	15V	24V	36V	48V
	RATED CURRENT	10A	8A	6.3A	4.2A	3.2A
	CURRENT RANGE	0 ~ 10A	0 ~ 8A	0 ~ 6.3A	0 ~ 4.2A	0 ~ 3.2A
	RATED POWER	120W	120W	151.2W	151.2W	153.6W
	RIPPLE & NOISE (max.) Note.2	200mVp-p	200mVp-p	200mVp-p	200mVp-p	200mVp-p
	VOLTAGE TOLERANCE Note.3	±5.0%				
	LINE REGULATION	±1.0%				
	LOAD REGULATION	±2.0%				
	SETUP, RISE TIME Note.6	500ms, 50ms / 230VAC 500ms, 50ms / 277VAC				
HOLD UP TIME (Typ.)	18ms/230VAC 20ms/277VAC at full load					
INPUT	VOLTAGE RANGE Note.4	180 ~ 305VAC 254 ~ 431VDC				
	FREQUENCY RANGE	47 ~ 63Hz				
	EFFICIENCY (Typ.)	87%	88%	89%	89%	90%
	AC CURRENT	1.7A/230VAC 1.5A/277VAC				
	INRUSH CURRENT(Typ.)	COLD START 60A(twidth=900μs measured at 50% Ipeak) at 230VAC				
	LEAKAGE CURRENT	0.25mA / 240VAC				
PROTECTION	OVERLOAD	110 ~ 150% rated output power Protection type : Hiccup mode, recovers automatically after fault condition is removed				
	OVER VOLTAGE	13.5 ~ 17V	17 ~ 25V	27 ~ 35V	40 ~ 49V	52 ~ 63V
	OVER TEMPERATURE	Shut down o/p voltage, recovers automatically after temperature goes down				
		Protection type : Shut down o/p voltage, re-power on to recover				
ENVIRONMENT	WORKING TEMP.	-25 ~ +65°C (Refer to "Derating Curve")				
	WORKING HUMIDITY	20 ~ 90% RH non-condensing				
	STORAGE TEMP., HUMIDITY	-40 ~ +80°C, 10 ~ 95% RH				
	TEMP. COEFFICIENT	±0.03%/°C (0 ~ 50°C)				
	VIBRATION	10 ~ 500Hz, 2G 10min./1cycle, period for 60min. each along X, Y, Z axes				
SAFETY & EMC	SAFETY STANDARDS	UL8750,CSA C22.2 No 250.13-12,UL879,CSA C22.2 No.207-M89,IP67 approved. Design refer to EN60950-1				
	WITHSTAND VOLTAGE	I/P-O/P:3KVAC				
	ISOLATION RESISTANCE	I/P-O/P:>100M Ohms / 500VDC / 25°C/ 70% RH				
	EMC EMISSION	Compliance to EN55022 (CISPR22) Class B, EN61000-3-2 Class A(≤80% load), EN61000-3-3				
	EMC IMMUNITY	Compliance to EN61000-4-2,3,4,5,6,8,11; EN55024, light industry level, criteria A				
OTHERS	MTBF	703Khrs min. MIL-HDBK-217F (25°C)				
	DIMENSION	191*63*37.5mm (L*W*H)				
	PACKING	0.74Kg;20pcs/15.8Kg/0.95CUFT				
NOTE	1. All parameters NOT specially mentioned are measured at 230VAC input, rated load and 25°C of ambient temperature. 2. Ripple & noise are measured at 20MHz of bandwidth by using a 12" twisted pair-wire terminated with a 0.1uf & 47uf parallel capacitor. 3. Tolerance : includes set up tolerance, line regulation and load regulation. 4. Derating may be needed under low input voltage. Please check the static characteristics for more details. 5. 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. 6. Length of set up time is measured at first cold start. Turning ON/OFF the power supply may lead to increase of the set up time. 7. The unit might not be suitable for lighting applications in EU countries. Please check with your local authorities for the possible use of the unit. 8. Suitable for indoor use or outdoor use without direct sunlight exposure.					

Mechanical Specification

Case No. LPC-150 Unit:mm



※ T case: Max. Case Temperature.

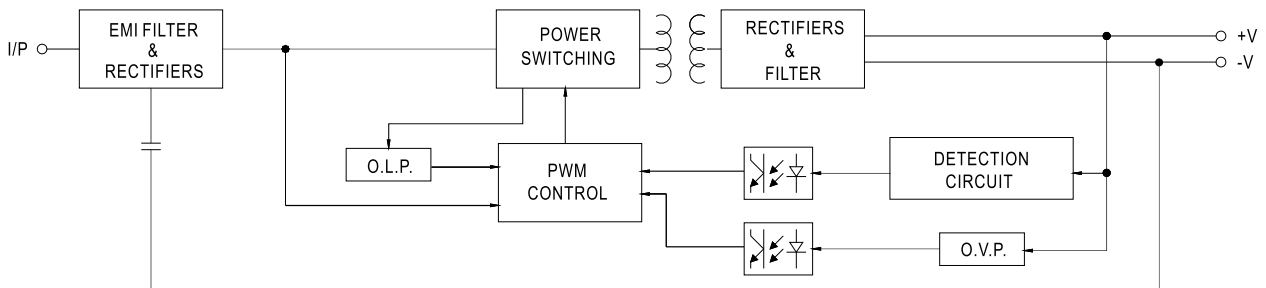


Recommend Mounting Direction

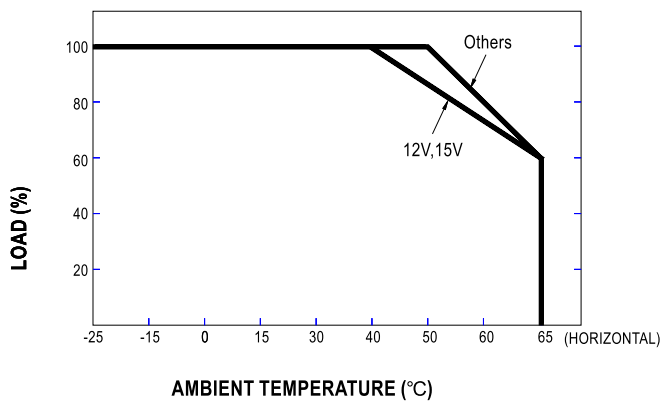


Block Diagram

PWM fosc : 47KHz



Derating Curve



Static Characteristics

