



FEATURES

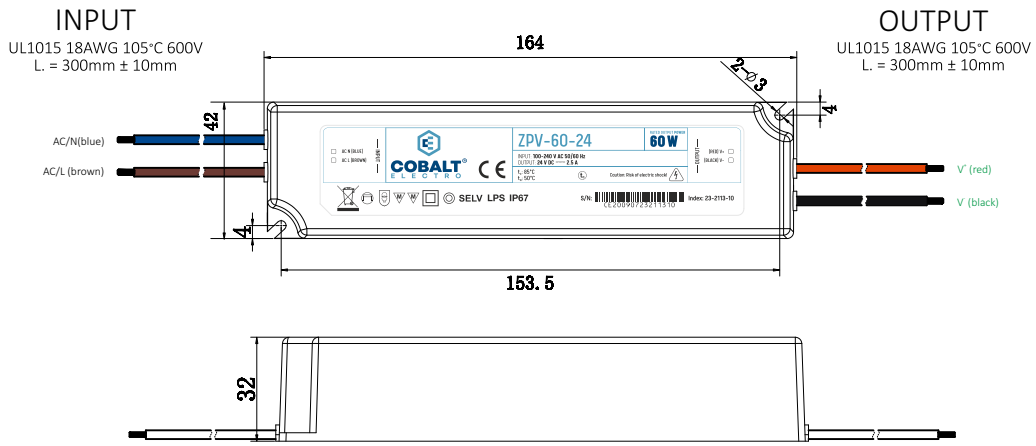
- Stable constant voltage output
- Universal AC input / Full range
- Overvoltage, overload, short circuit, over temperature protection
- Suitable for dry and wet conditions (note 7.)
 - Isolation class II
 - IP67 protection
- Cooling by free air convection
- 3 years warranty

SPECIFICATION		ZPV-60-12	ZPV-60-24
OUTPUT	DC Voltage	12V	24V
	Rated Current	5A	2.5A
	Current Range	0 ÷ 5A	0 ÷ 2.5A
	Rated Power	60W	60W
	Line Regulation	± 1%	± 1%
	Load Regulation	± 2%	± 2%
	Setup, Rise Time (note 6.)	2000ms, 50ms / 230VAC; 1000ms, 50ms / 230VAC at full load	
	Hold up time	15ms / 115VAC, 50ms / 230VAC at full load	
	Ripple & Noise (note 2.)	120mVp-p	
	Voltage Tolerance (note 3.)	5%	
INPUT	Voltage Range	90 ÷ 264VAC 127 ÷ 370VDC	
	Frequency Range	47 ÷ 63Hz	
	Efficiency (Typ.)	115VAC 85% 230VAC 86%	115VAC 86% 230VAC 88%
	AC Current (Typ.)	1.05A/115VAC 0.5A / 230VAC	
	Inrush Current (Typ.)	COLD START 30A / 115VAC 60A / 230VAC	
	Leakage Current (Max.)	0.25mA / 240VAC	

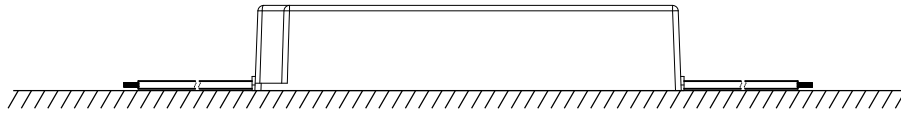
PROTECTION	Overload	110 ÷ 200% rated output current Hiccup mode, auto-recovery after fault condition is removed	120 ÷ 200% rated output current Hiccup mode, auto-recovery after fault condition is removed
	Over Voltage	14 ÷ 16V Hiccup mode, auto-recovery after fault condition is removed	27 ÷ 35V Hiccup mode, auto-recovery after fault condition is removed
	Short Circuit	Hiccup mode, auto-recovery after fault condition is removed	
WORKING ENVIRONMENT	Working Temp.	-30 ÷ +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	± 0.03% / °C (0°C ÷ 50°C)	
	Vibration	10 ÷ 500Hz, 2G, 10min / cycle, period for 60min. each along X, Y, Z axes	
SAFETY & EMC	Safety Standards	EN62368-1:2014+A11:2017, IP67	
	Withstand Voltage	I/P-O/P: 3kVAC	
	Isolation Resistance	I/P-O/P: 100MΩ/500VDC/25°C/70%	
	EMC Immunity	EN 55032:2015/AC:2016 EN 61000-3-2:2014 EN 61000-3-3:2013/A1:2019	
	EMC Emission	EN61000-4-2,3,4,5,6,8,11 EN55035:2017	
OTHERS	Dimension	162 x 42x 32 mm (L x W x H)	
	Weight and Packing	0.4KG, 60PCS/CTN/24KG/0.036CBM Master Carton: 44.5 x 31 x 26.5cm	

NOTE:

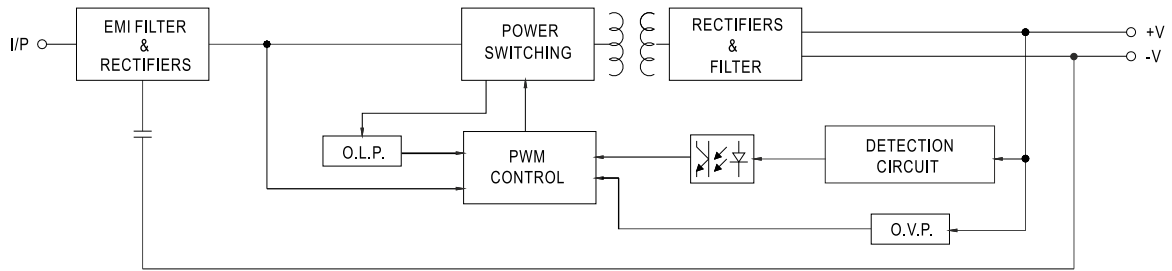
1. All parameters NOT specially mentioned are measured at 230VAC input, rated load and 25°C of ambient temperature.
2. Ripple & noise are measured at 20MHz of bandwidth by using a 12" twisted pair-wire terminated with a 0.1 uf & 47uf parallel capacitor.
3. Tolerance: includes set up tolerance, line regulation 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. Suitable for indoor use or outdoor use without direct sunlight exposure. Please avoid direct exposure to sunlight and immersion in water for over 30 minutes.



RECOMMEND MOUNTING DIRECTION

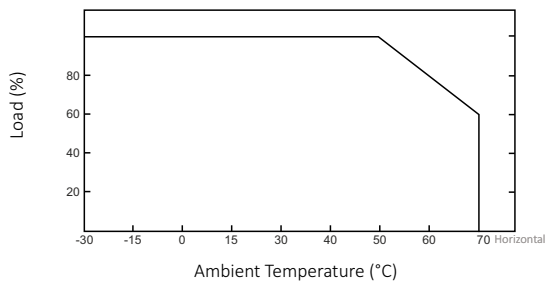


BLOCK DIAGRAM

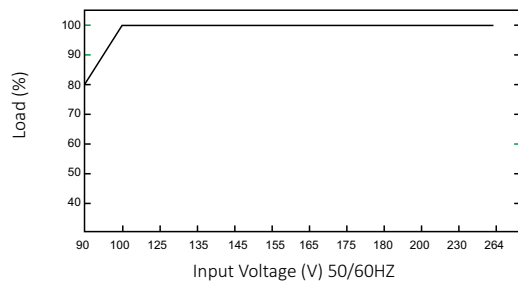


DERATING CURVE










OUTPUT LOAD & TEMPERATURE DERATING



STATIC CHARACTERISTICS



EXPLANATION OF THE SYMBOLS USED ON THE DEVICE

-  Short-circuit proof safety transformer
-  II IEC protection class
-  The device is designed to be placed on wooden surfaces in accordance with: DIN VDE 0710-14
-  Switching connection button
-  Risk of electric shock
-  SELV Safe low voltage output not exceeding 50V AC or 120V DC
-  LPS The end product does not need the fire enclosure
-  IP Rate of protection against access to dangerous parts inside the housing, ingress of solids and water
-  Independent electronic transformer: it can be installed separately outside the luminaire without any additional housing