

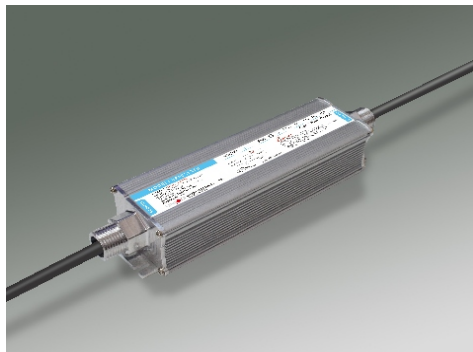
S.M.P.S

LED Converter

Water Proof Converter

60TH Series

60W single output
with constant voltage circuit



- **Constant voltage design(C.V. mode)**
- AC Input voltage 90-305V
- **Protections:**
Overload/Over voltage /Short circuit/
Over temperature
- IP68 design for outdoor installations
- Dry , damp and wet locations
- 100% full load burn-in test
- Suitable for LED lighting and moving
sign applications
- 1/2" NPT threaded connector to simplify
electrical wiring
- Metal case
- Class 2 power unit
- Safety standards : UL879 recognized U.S
and canada certified
- EMC standards : FCC Part 15 classB
- 5years warranty

IP68



ITEM		UP60S12TH
INPUT	VOLTAGE RANGE	AC90~305V
	FREQUENCY RANGE	47~63Hz
	EFFICIENCY(typ.)	84%
	AC CURRENT(typ.)	0.9A/115VAC (typ) 0.5A/230VAC(typ)
	INRUSH CURRENT(typ.)	COLD START 40A/230VAC
	LEAKAGE CURRENT	<1.5mA / 230VAC
OUTPUT	DC VOLTAGE	12V
	RATED CURRENT	5A
	RATED POWER	60W
	RIPPLE&NOISE(max.) Note2	170mVp-p
	VOLTAGE ADJ. RANGE	±5%
	VOLTAGE TOLERANCE Note3	±3%
	LINE REGULATION Note4	±1%
	LOAD REGULATION Note5	±2%
	SETUP,RISE TIME(max.)	3000ms,100ms/115VAC 3000ms,100ms/230VAC at full load
PROTEC-TION	HOLD UP TIME(typ.)	10ms/115VAC 60ms/230VAC at full load
	SHORT CIRCUIT	Hiccup mode ; recovers automatically after fault condition is removed
	OVERLOAD	Over 110% of rating ; recovers automatically after fault condition is removed
	OVER VOLTAGE	115~140% of rating
ISOLA-TION	OVER TEMPERATURE	90±10℃(temp. Sensor) ; recovers automatically after fault condition is removed
	WITHSTAND VOLTAGE	I/P-O/P:AC3.75KV, I/P-F.G:AC2KV, O/P-F.G:AC1.5KV
ENVIRON-MENT	ISOLATION RESISTANCE	I/P-O/P, I/P-F.G, O/P-F.G:DC500V 100Mohms(At room temp. & humid.)
	WORKING TEMP.&HUMID.	-40~+70℃(Refer to "DERATING CURVE"),20~95%RH
	STORAGE TEMP.&HUMID.	-40~+75℃,10~95%RH
OTHERS	VIBRATION	10~500Hz, 5G 12min./1cycle, period for 72min. each along X, Y, Z axes
	DIMENSION/WEIGHT	197*56.7*42.3mm(L*W*H)/0.75Kg

NOTE

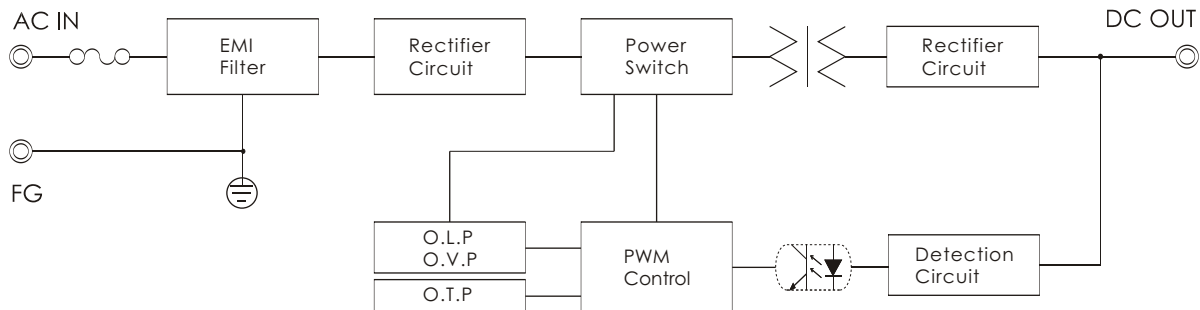
1. All parameters not specially mentioned are measured at 220vac input, rated load and 25℃ of ambient temperature.
2. Ripple & noise are measured at 20MHz of bandwidth by using a 12" twisted pare-wire terminated with 0.1 uF & 47uF parallel capacitor.
3. Tolerance : includes set up tolerance, line regulation and load regulation.
4. Line regulation is measured from low line to high line at rated load.
5. Load regulation is measured from low 0% to 100% rated load.

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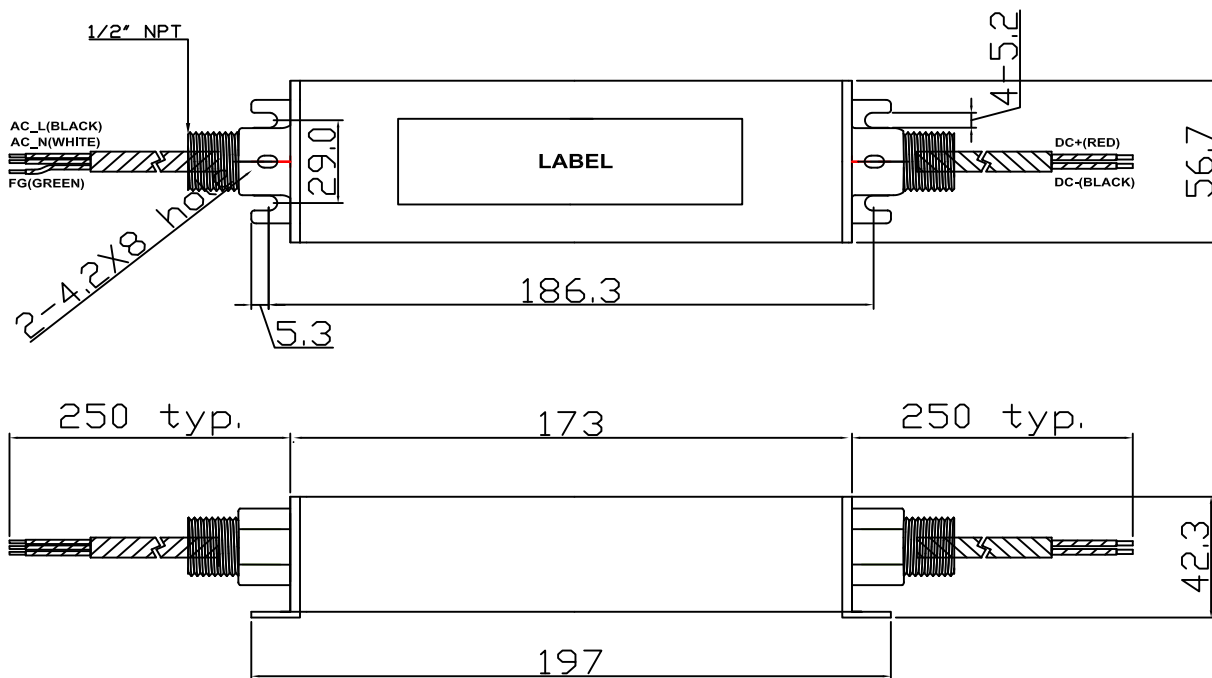
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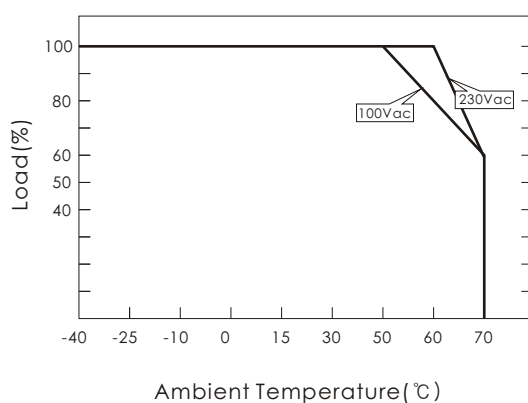
BLOCK DIAGRAM



DIMENSIONS(unit:mm)



DERATING CURVE



STATIC CHARACTERISTICS

