

120W Triac Dimmable constant voltage LED driver

SMARTS POWER
Quanzhou Smarts Electronic & Technology Co., Ltd



■ Features:

- Output constant voltage
- Input voltage range 100-130VAC/170-265VAC
- Built-in PFC function, PF> 0.70
- Efficiency > 84%
- Protections:short circuit/over voltage/over heat
- IP67 design for indoor or outdoor installations
- Cooling by free air convection
- Work with leading edge and trailing edge TRIAC dimmers
- Strong compatibility, flicker-free dimming
- Suitable for LED lighting and moving sign applications
- Compliance to worldwide safety regulations for lightings.
- 3 years warranty



FC

CE

IP67

RoHS

590/95/EE



FC

CE

IP67

SELV

CE

IP67

CE

IP67

CE

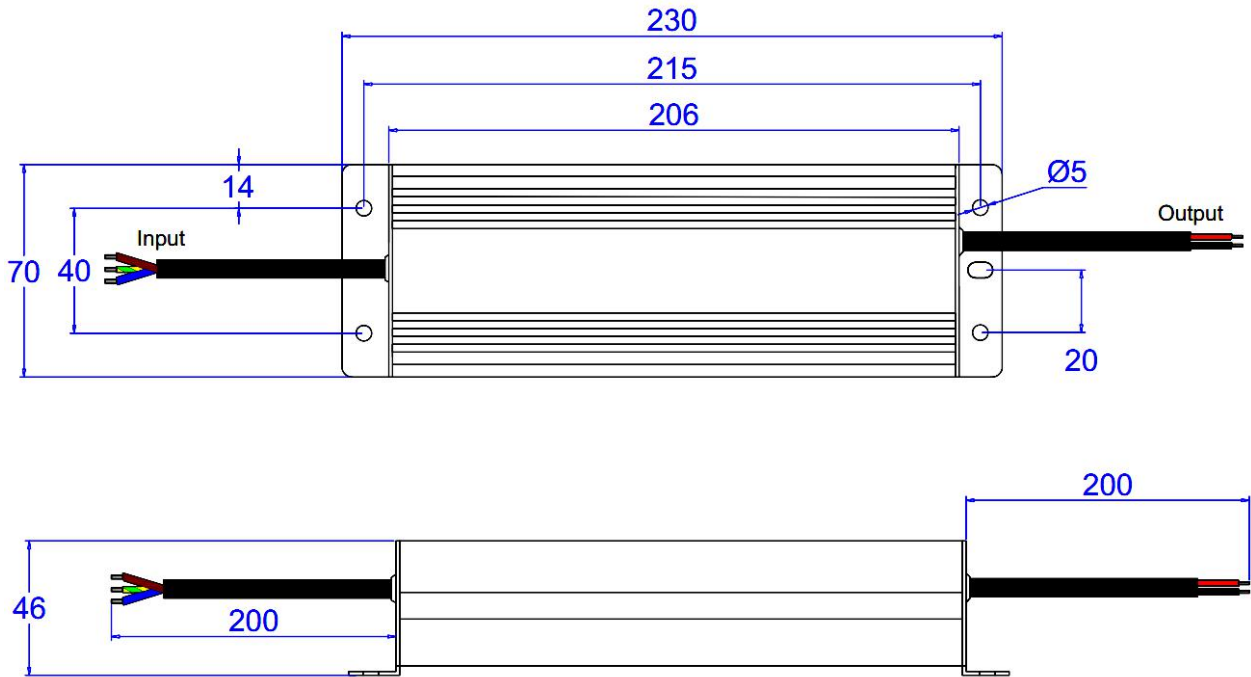
IP67

Specification

model		SMT-012-120VT	SMT-024-120VT	SMT-036-120VT	SMT-048-120VT
Output	DC Voltage	12V	24V	36V	48V
	Voltage Accuracy	±0.5V	±0.5V	±0.5V	±0.5V
	Rated current	10.00A	5.00A	3.33A	2.50A
	Rated power	120W			
Input	Voltage Range	100~130V AC/170~265V AC			
	Frequency Range	47~63HZ			
	Power Factor (Typ.)	PF ≧ 0.70/110V, PF ≧ 0.70/170V, PF ≧ 0.70/220V, PF ≧ 0.70/265V			
	Full Load Efficiency (Typ.)	>84%	>84%	>84%	>84%
	AC Current (Typ.)	1.86A/110VAC	1.20A/170VAC	0.93A/220VAC	0.77A/265VAC
Protection	Leakage current	< 0.27mA/110V/220VAC			
	Short Circuit	Hiccup mode, recovers automatically after fault condition is removed.			
Environment	Over voltage	≧ 140VAC(100~130V) , ≧ 270VAC(170~265V)			
	Working TEMP.	-40~+60℃			
	Working Humidity	20~90%RH, non-condensing			
	Storage TEM., Humidity	-40~+80℃ , 10~95%RH			
	TEMP. coefficient	±0.03%/℃ (0~50℃)			
Safety & EMC	Vibration	10~500Hz, 2G 10min./1 cycle, period for 60min. each along X,Y,Z axes			
	Safety standards	EN-60950-1, EN61347-1 EN61347-2-13			
	Withstand voltage	I/P-O/P:3.75KVAC I/P-FG:1.88KVAC O/P-FG:0.5KVAC			
	Isolation resistance	I/P-O/P: 100MQ/500VDC/25℃/70%RH			
	EMC EMISSION	Compliance to EN55015, EN61000-3-2 (≧ 50%load)			
Others	EMC IMMUNITY	Compliance to EN61000-4-2,3,4,5,6,8,11, EN61547 Align industry level (surge4KV)			
	Weight	1.3Kg			
	Size	230*70*46mm (L*W*H)			
	packing	329*279*176mm , 10PCS/ctn			

Notes	1. All parameters NOT specially mentioned are measured at 110V/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 us tolerance,line regulation and load regulation .

■ Mechanical Specification

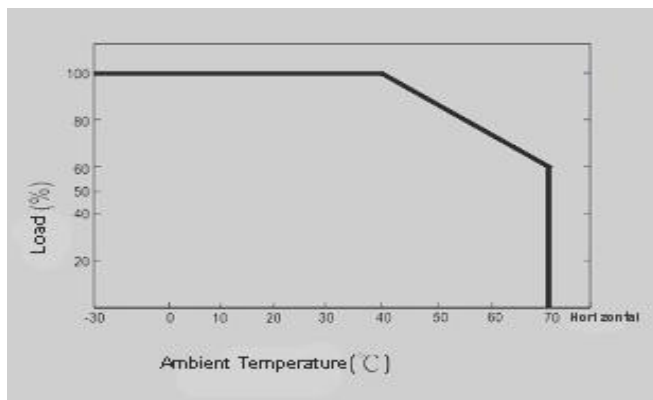


- ※Input with AC (L), (N), earth wire(G)
- ※Output cord: Red is (DIM+) ,Black is (DIM-)

■ Dimming Operation

- ※Output constant current level can be adjusted through input terminal of the AC phase line(L) by connection a triac dimmer.
- ※Compatible with Leading edge or tailing edge triac dimmers.
- ※please try to use the small power dimmers, which have access to a wider dimming range, high-power dimmer is difficult to achieve the output current to zero

■ Derating Curve



- ※Load carried in accordance with the load derating curve, according to the ambient temperature derating, in order to extend the working life.

■ Simple Connection Diagram



■ Connecting Diagram

