

LED DRIVER SPECIFICATIONS

Customer's Part Number:

MOONS' Part Number:

Model:

PU030AXXAQ

P/N:

CUSTOMER'S APPROVAL STAMP

Please sign back after your approval. The specifications will come into force when we receive purchase order.

DWG	CHK.	APPD.

Rev.	Date	Contents	ECO NO.	DWG	CHK	APPR
A0	2015/10/28					



■ **Features**

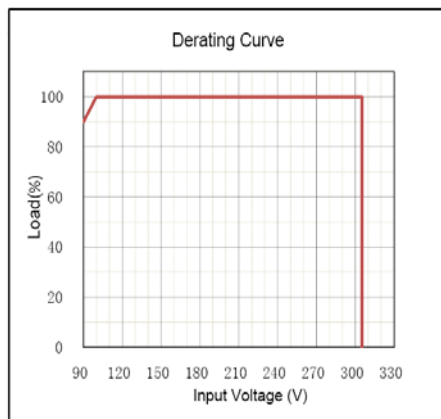
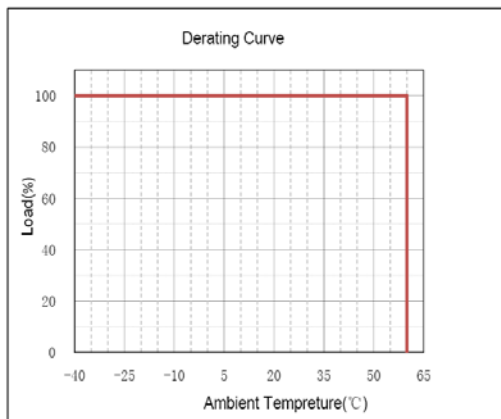
- Input voltage: 90-305VAC
- Built-in active PFC function: 0.99 Typ.
- Low THD: 10% Typ.
- High efficiency: 90% Typ.
- High surge immunity
- Compliance to worldwide safety regulations for lighting
- Suitable for dry/damp locations

■ **Specification**

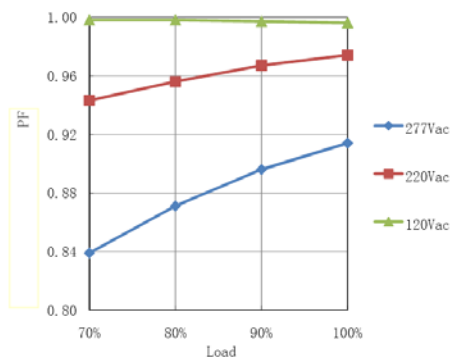
Model		PU030A070AQ	PU030A081AQ	PU040A140AQ
Input	Efficiency (120Vac)(Typ.) _{Note.1}	88%	89%	87%
	Efficiency (230Vac)(Typ.) _{Note.1}	89%	90%	88%
	Voltage Range (V) _{Note.2}	90 ~ 305Vac, OR 127~ 430Vdc		
	Voltage Rated (V) _{Note.2}	100Vac-277Vac		
	Frequency Range (Hz)	47~63		
	Power Factor	0.99 (Typ.), with full load, at 120Vac		
		0.97 (Typ.), with full load, at 230Vac		
		0.88(Min.), with full load, at 277Vac		
	THD	10% (Typ.), at 220Vac input, with 80%~100% load conditions		
		15% (Typ.), at 110/277Vac input, with 80%~100% load conditions		
Output	AC Current (Max.)	0.4A at 100VAC input, 0.2A at 230VAC		0.55A at 100VAC input, 0.3A at 230VAC
	Inrush Current (Max.)	15A at 230Vac input 25℃ Cold Start (time wide=500uS, measured at 50% Ipeak,Not applicable for the inrush current to Noise Filter for less than 0.2ms)		
	Leakage Current (Max.)	0.75mA at 277Vac/60Hz		
	Voltage Range (V)	24-42	24-36	16-31
	Rated Current (mA)	700	810	1400
	Rated Power (W)	29.4	29.2	40.0
	Ripple Current((PK-AV)/AV) with LED default mode full load(Typ.)	30%	40%	50%
	Current Tolerance	5%		
	Line Regulation	5%		
	Load Regulation	5%		
Protection	Current ADJ. Range	-	0.2-1.2	-
	Turn on Delay Time	<3s, at 120Vac; <1.5s, at 230Vac		
	Over Voltage (V)	60	54	48
Environment	Short Circuit	Protection type : Limit the output voltage , recovers automatically after fault condition is removed		
	Operating Temp.	-40~+60℃(Refer to 'Derating Curve')		
	Tc	90℃ max	80℃ max	90℃ max
	Operating Humidity	20~95%RH		
	Storage Temp., Humidity	-40~+85℃, 10-95%RH		
	Temp. Coefficient	0.03%/℃ (0~50℃)		
	Vibration	5~55Hz, 2G 5min/cycle, period for 30min each along X、Y、Z axes		
Safety & EMC	Safety Standard	UL8750, EN61347-1, EN61347-2-13		
	Withstand Voltage	I/P-O/P:3.75kVac, I/P-FG:1.875kVac, O/P-FG:1.5kVac		
	Isolation Resistance	I/P-O/P, I/P-FG, O/P-FG:100M Ohms/500Vdc/25℃/70%RH		
	EMC Emission	EN55015/FCC Part 15 Class B, EN61000-3-2 Class C, EN61000-3-3		
	EMC Immunity	EN61000-4-2,3,4,5,6,8,11, EN61547 (Surge: L-N 2kV, L/N-Earth 4kV)		
Others	MTBF	300,000 Hours, measured at full load, 25℃ ambient temperature		
	Lifetime	50,000 Hours at Tc 75℃ (Refer to"Life Time VS. Tcase (Ref.)")		
	Dimension	120 x 46 x 30 (mm) (LxWxH)		
	Weight (Typ.)	0.17kg		

Note.1: Measured at full load and steady-state temperature in 25℃ ambient; Note. 2: Derating may be needed under low input voltage, Please Refer to 'Derating Curve' ; Note. 3: All parameters NOT specially mentioned are measured at 230VAC input, rated load and 25℃ ambient temperature;

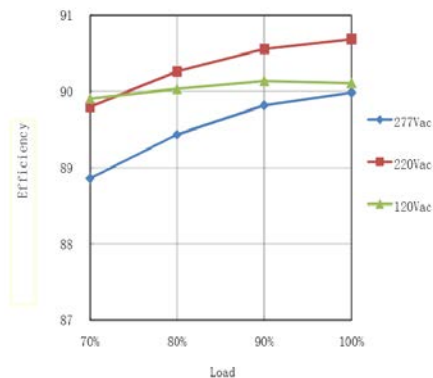
Derating Curve



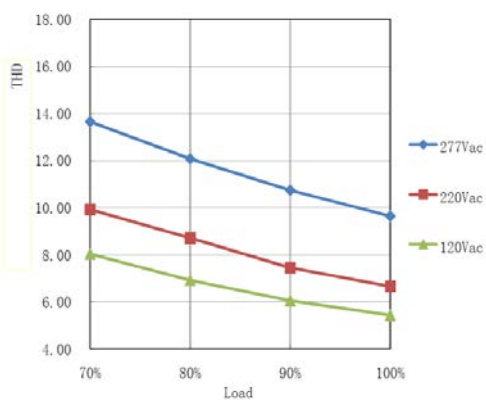
Power Factor VS. Load Curve(Model:810mA)



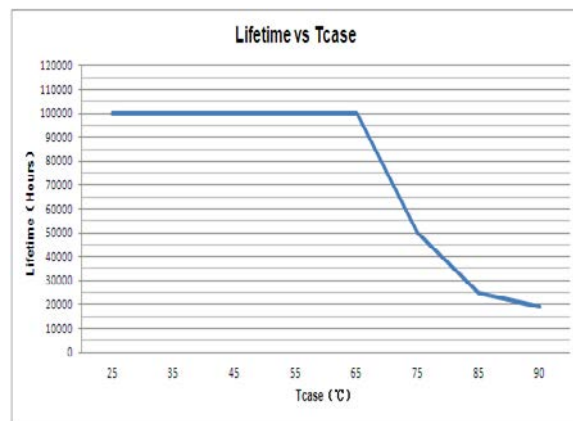
Efficiency VS. Load Curve(Model:810mA)



THD Curve(Model:810mA)

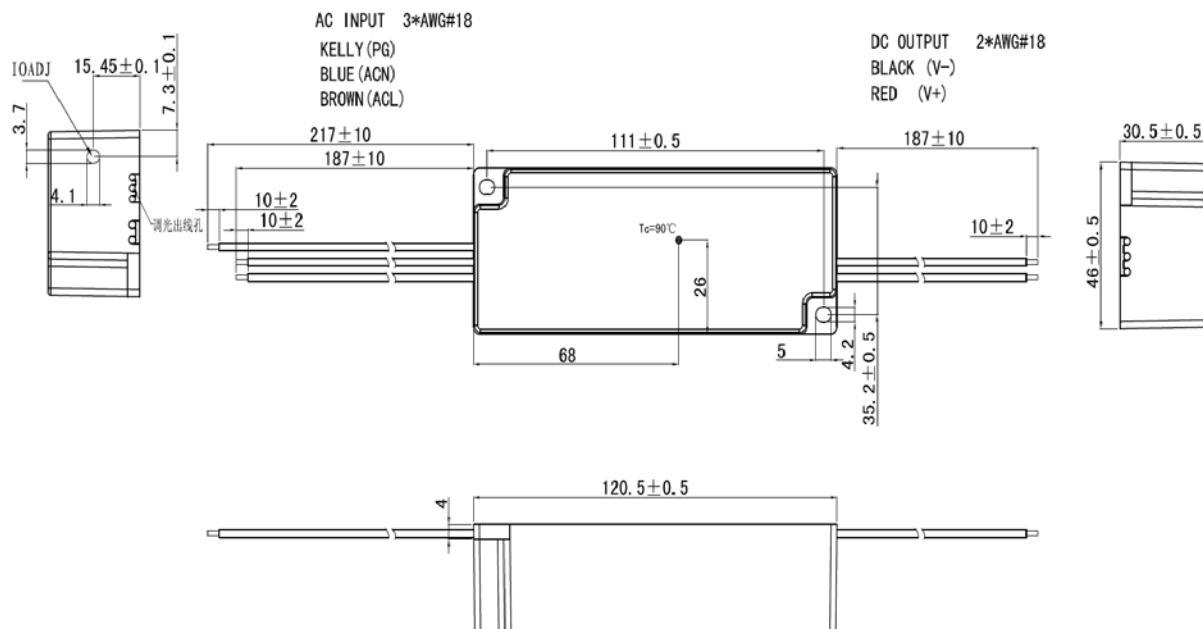


Life Time VS. Tcase (Ref.)



■ Mechanical Specification

Dimensions (Unit: mm)



RoHS Compliance:

Our products comply with the European Directive 2002/95/EC, calling for the elimination of lead and other hazardous substances from electronic products.