



- **Features**
- ◆ Input voltage: 108-305Vac
 - ◆ Built-in active PFC function 0.95 Typ.
 - ◆ High efficiency: up to 90% Typ.
 - ◆ Built-in Lightning protection
 - ◆ Constant Current / 0-10V Dimming
 - ◆ Protection: OVP, SCP,OTP
 - ◆ Full potting: material Asphalt



■ **Specification**

Model (MU100PxxxAQ_0-10V)		200	240	250
Input	Efficiency(230Vac)	90.0%	89.0%	89.0%
	Voltage Range (Vac)	108 ~ 305		
	Rated Input Voltage (Vac)	120-277		
	Frequency Range (Hz)	47~63		
	Power Factor	0.95 (Typical) at 230Vac		
	THD	<20% with 80%~100% load, at 230Vac		
	AC Current(Typ.)	0.65A MAX at 230VAC		
	Inrush Current(Typ.)	60A 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 50Hz input		
Output	Output Voltage Range (V)	35-50	35-41	30-38
	Rated Current(mA)	2000	2400	2500
	Maximum Power (W)	100	100	95
	Ripple Current((PK-AV) /AV)	5% max. (peak-to-average value) at 100% lout		
	Current Tolerance ^{Note.1}	±5%		
	Setup, Rise Time	0.5s(typ.), measured at 230Vac input		
Dimming Control	0~10V/DIM+ Voltage	Absolute maximum voltage -20Vmin~20Vmax		
	0~10V/DIM+ Short Current	<2mA		
	DIMMING FUNCTION	0~10V/10%lo~100%lo ref. Dimming curve		
Protection	Over Voltage(V)	60	60	60
	Short Circuit	Hiccup mode.The power supply shall be self-recovery when the fault is removed.		
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Environment	Operating Temp.	-30~+50℃ (Refer to 'Derating Curve')		
	Tcase	80℃ max		
	Operating Humidity	20~95%RH, non-condensing		
	Storage Temp., Humidity	-40~+85℃, 10-95%RH		
	Temp. Coefficient	0.03%/℃ (0~50℃)		
	Vibration	10~500Hz, 5G 12min/cycle, period for 72min each along X、 Y、 Z axes		
Safety & EMC	Safety Standard	EN61347-1, EN61347-2-13		
	Withstand Voltage	I/P-O/P:3.0KVAC I/P-FG(Case):1.5KV O/P-FG(Case):0.5KV		
	Isolation Resistance	I/P-O/P ,I/P-FG,O/P-FG:100M Ohms/500VDC/25℃/70%RH		
	EMC Emission	EN55015, EN61000-3-2 Class C, EN61000-3-3		
	EMC Immunity	EN61000-4-2,3,4,5,6,8,11, EN61547 (Surge L,N-FG 2KV, L-N 1KV) Power supply shall comply with IEEE C.62.41-1991,Class A operation.The line transient shall consist of seven strikes of a 100 kHz ring wave,2.5kV level for both common mode and differential mode.		
Others	MTBF	200,000 hours, measured at full load, 25℃ ambient temperature MIL-HDBK-217F(25℃)		
	Lifetime	>=100 KHrs lifetime (continous) at Tcase = 65 ℃		
	Dimension	241.3*43.4*30 mm (LxWxH)		
	Weight	640 g		

Note.1: At Rated Current ,Includes set up tolerance, line regulation and load regulation.

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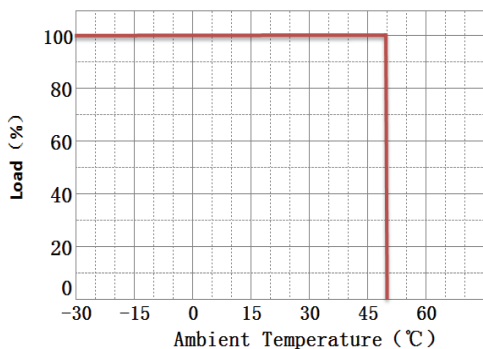
SHANGHAI MOONS' AUTOMATION CONTROL CO., LTD.

Add: No.168, Mingjia Road, Minbei Industrial Park, Shanghai 201107, P.R.China

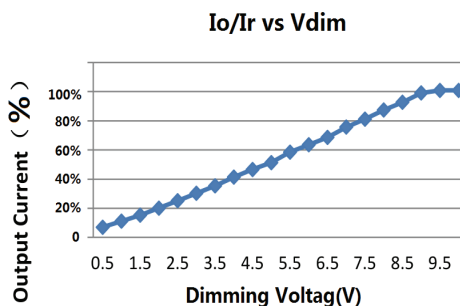
Tel: +86 (0)21 52634688 Website: www.moons.com.cn

Curve

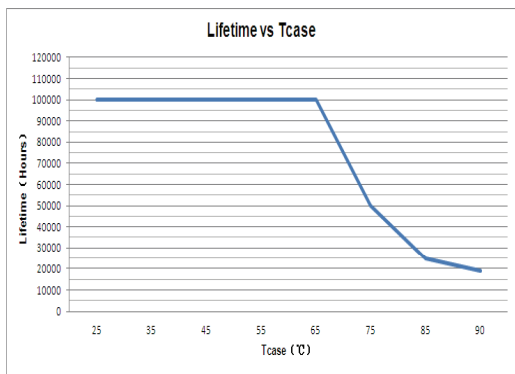
Derating Curve



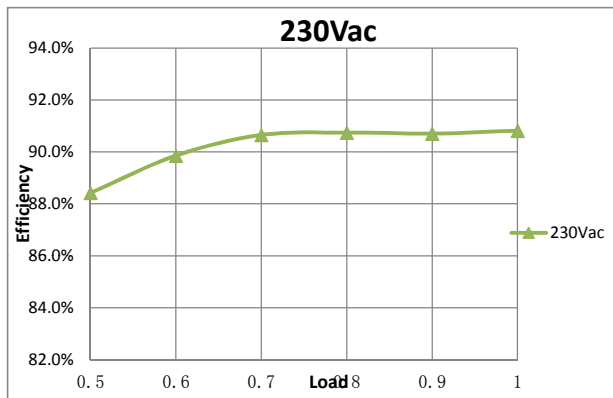
Dimming Curve



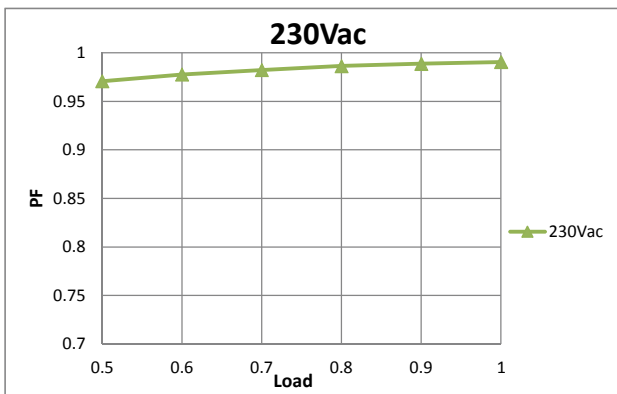
Life Time VS. Tcase (Ref.)



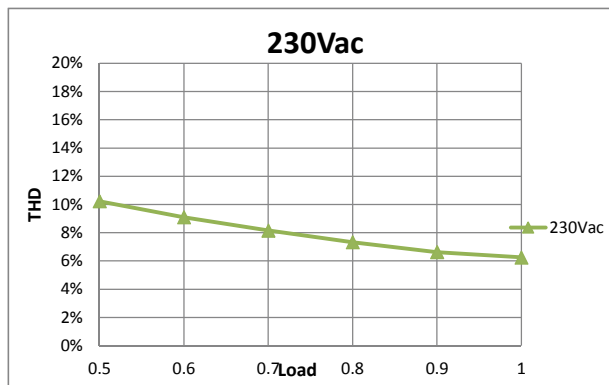
Efficiency VS. Load Curve (MU100P200AQ_0-10V)



Power Factor VS. Load Curve

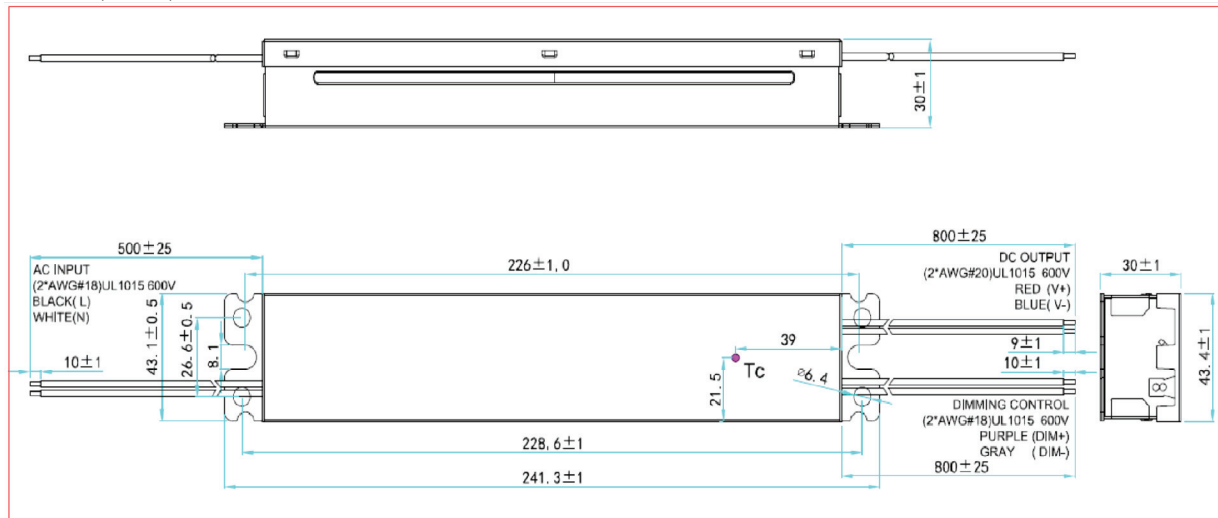


THD Curve



■ Mechanical Specification

Dimensions(Unit:mm)



RoHS Compliance:

Our products comply with the European Directive of LVD (2014/35/EU), WEEE (2012/19/EU) and ROHS (2011/65/EU and (EU) 2015/863), calling for the elimination of lead and other hazardous substances from electronic products.