

QL-DSP30

■ Application

AC/DC 30W Dimmable LED Driver Module

■ Size

87*65*30 mm (L*W*H)

■ Features

- Universal AC input / Full range (Up to 277V)
- 1-10V Dimmable
- Built-in active PFC (Power Factor Correction) function
- Adjustable Output Current(350mA/500mA/700mA) by Dip Switch
- Protections: Short circuit / Over Voltage
- Class 2 power supply unit, no FG
- Isolated
- Suitable for dry / damp locations
- Made in Taiwan
- 5 years warranty



■ Specifications

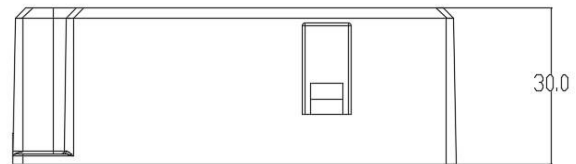
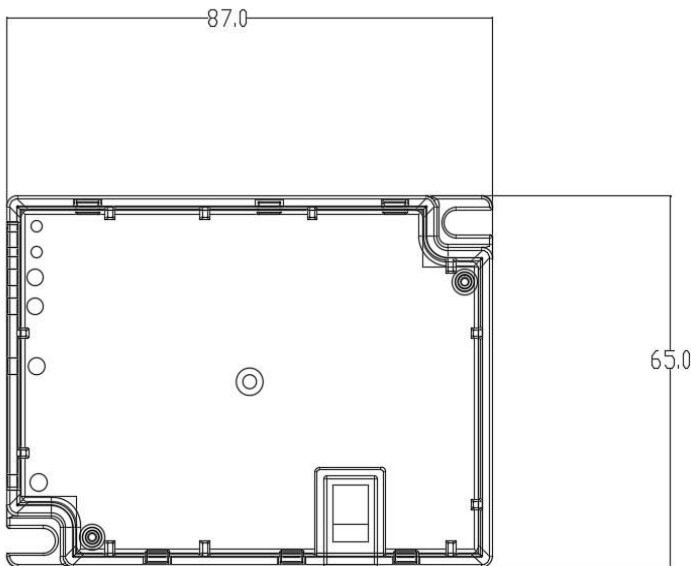
MODEL		QL-DSP30	QL-DSP30H
OUTPUT	DC Voltage Range Note.3	20-40V	20-40V
	Rated Current Range Note.6	350/500/700mA	350/500/700mA
	Output Voltage at no Load (Max)	50V	50V
	Ripple&Noise (Max.)	4Vp-p	4Vp-p
	Max Power	30W	30W
	Current Accuracy	±5%	
	SETUP time	500ms / 230VAC at full load	
INPUT	Voltage Range	100~277V AC	
	Frequency Range	47 ~ 63Hz	
	THD	<10% / 230V/50Hz at full load	
	Power Factor	PF >0.9 @100-277VAC at full load	
	Efficiency (Typ.)	87%	87%
	AC Current (Max.)	0.4A at 115VAC / 0.2A at 230VAC / 0.15A at 277VAC	
	Inrush Current (Max.)	45A at 230V AC	
	Leakage Current	<0.5mA / 240V AC	
PROTECTION	Short Circuit	Hiccup Mode ; After the fault condition is removed, automatic recovery	
	Over Voltage	Hiccup Mode ; After the fault condition is removed, automatic recovery	
ENVIRONMENT	Operating Temp.	-20~50°C at full load	
	Operating Temp.(Life-time 40000h)	Tc: 79°C	
	Operating Humidity	20% ~ 90% RH non-condensing.	
	Storage Temp., Humidity	-40~80°C, 10 ~ 95% RH	
	Vibration	10~500 Hz, 2G 10 min./1 cycle, period for 60 min. each along X, Y, Z axe	
SAFETY & EMC	Safety Standards	EN61347-1,EN61347-2-13 , UL 8750 Class2	
	Withstand Voltage	I/P - O/P: 3.75K VAC	
	Isolation Resistance	I/P - O/P:100M ohms / 500VDC at 25°C, 70% RH	
	EMI Conduction & Radiation	Compliance to EN55015 Class B	
	Harmonic Current	EN61000-3-2 Class C,EN61000-3-3	
	EMS Immunity	EN61000-4-2,3,4,5,6,8,11, EN61547, Light industry level,criteria B	

QL-DSP30

OTHERS	MTBF	>50K hours min. MIL-HDBK-217F (50°C)
	Dimension (L*W*H)	87*65*30 mm
	Packing	
	Weight	133g
NOTE	1. All parameters without specially mentioned are measured at input 230VAC, rated load, and 25°C of ambient temperature.	
	2. Please power on LED driver after LEDs are well connected	
	3. Constant current operation is in rated output voltage. This is suitable for LED applications. Any special electrical requirements for the specific application, please reconfirm with us.	
	4. The LED driver module is considered as a component to final equipment operation. The final equipment manufacturers must re-qualify EMC test on total installation again due to EMC performance will be affected by the total installation.	
	5. Please connect to LEDs directly, not suitable for using additional drivers.	
	6. Any fixed output current can be customized during rated current range.	

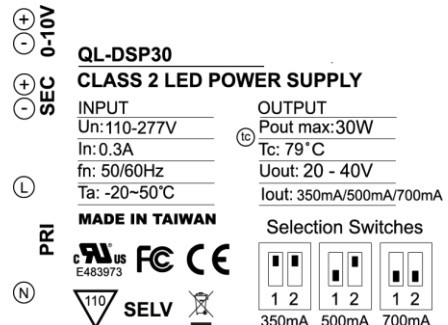
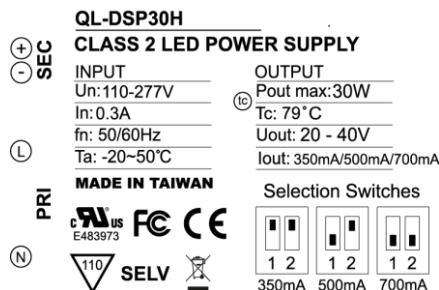
■ Mechanical Specification

Unit : mm



Connector Number	Wire Type	Pin Number	Signal
Input	UL 1015	Pin1	NEUTRAL
		Pin2	LINE
Output	UL 1015	Pin1	LED-
		Pin2	LED+
Output	UL 1007	Pin3	DIM-
		Pin4	DIM+

■ Marking & Label Specification



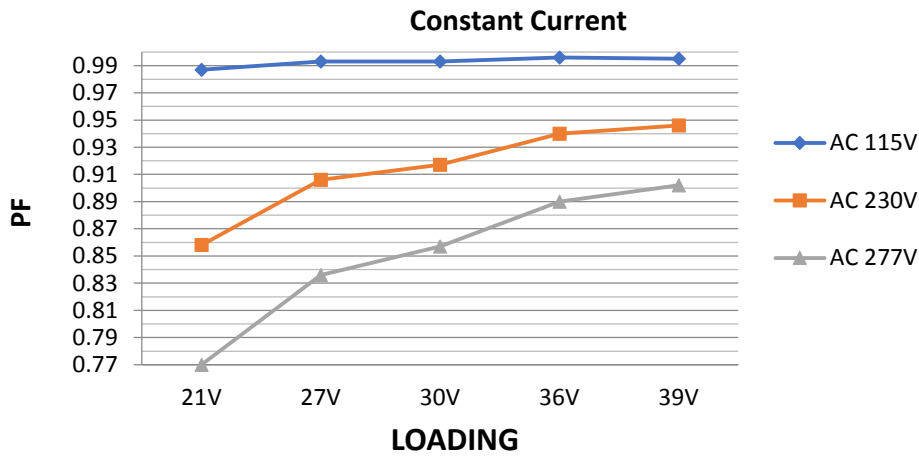
■ Dip Switch - One driver offers 3 choosable output current

	Switch 1	Switch 2
350 mA	OFF	OFF
500 mA	ON	OFF
700 mA	ON	ON

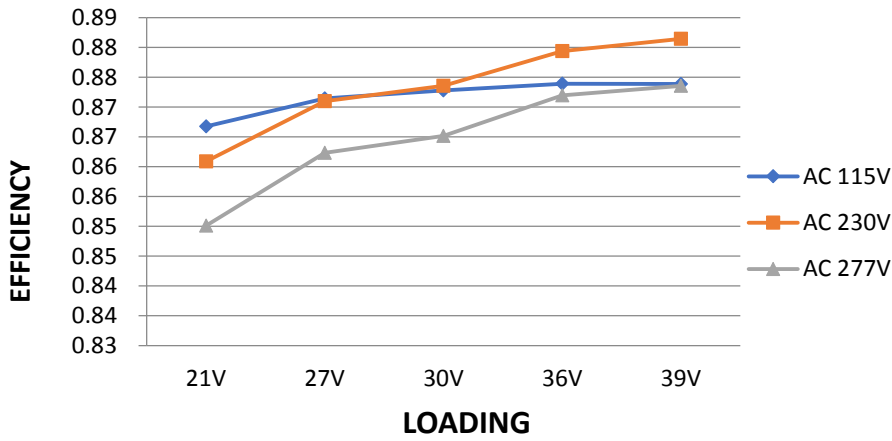
Selection Switches



Power Factor Characteristic (700mA)



Efficiency vs Load (700mA)



1~10V Dimming Curve (40V/700mA)

