ESS1025 Series

High Power Constant Current LED Driver	
Total Power	25 Watts max.
Input Voltages	120 ~ 240VAC, 277VAC
Number of Outputs	One

Preliminary Product Specifications

ANZ#: Z186, August 20, 2012

SPECIAL FEATURES

- Universal Input range from 110VAC~304VAC, 50/60Hz
- Stud-mount and Tab-mount design maximize design flexibility.
- Size: 4.25" (L) x 3.00" (W) x 1.18" (H)
- Suitable for dry and damp location applications
- Standard 0-10V dimming; compatible with fluorescent dimmers
- UL8750 and CE compliant - **Pending**
- Wide selection of pre-adjusted C/C outputs

The picture shown is not to scale

ENVIRONMENTAL

Operating temperature:	-20 to +50 ° C, Tc: 80 ℃
Storage temperature:	-40 to +85 ° C
Humidity (Non-Condensing):	5% to 95%
Cooling:	Convection
Vibration Frequency:	5 to 50 Hz
MTBF:	>100,000 Hours at full load and 25ºC ambient conditions (MIL-217F)

SPECIFICATIONS :

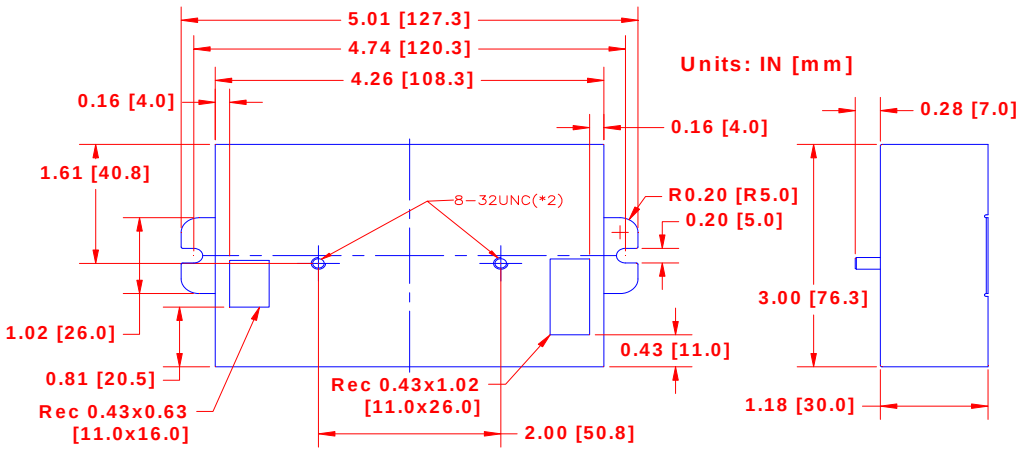
Input Range : 100 ~ 264VAC; 277VAC	Frequency : 47 to 63Hz
Power Factor: > 0.92 at full load, 115VAC or 230VAC	Inrush Current : 20.0 Amps max. at 230VAC, cold start 25°C
Input Current : 0.4 Amps max. at 115VAC	Efficiency : 83% Typical full load
Output Current Regulation : ±5%	Maximum Power : 25W
Protection : OCP, SCP, OLP – Auto Recovery	Leakage Current : 300uA typ.
Dimming method : 0-10V dimmer / fluorescent dimmer	Dimension: 108mm (L) x 76mm (W) x 30mm (H)
Hold up time: Half cycle min. at 120VAC and 80% rated load	Regulation Compliance: UL8750 or EN61347, EN55015, EN61547

MODEL SELECTION :

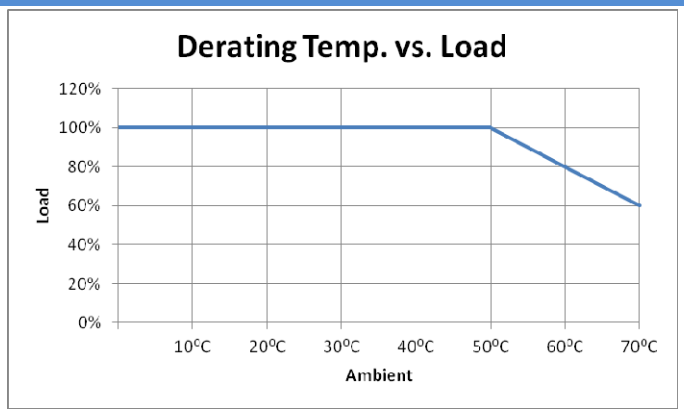
Model Number	Constant Voltage Mode			Model Number	Constant Current Mode		
	V (DC)	A (mA)	Max. W		A (mA)	V (DC)	Max. W
ESS1025-24	24, ±5%	1000	25	**ESS1025-24-C1400**	1400 - 1000	14 – 25	25
ESS1025-36	36, ±5%	700	25	**ESS1025-36-C1000**	1000 - 700	24 – 36	25
ESS1025-48	48, ±5%	500	25	**ESS1025-48-C0750**	750 - 500	30 – 50	25
Note: Constant Voltage models are not dimmable				**ESS1025-72-C0500**	500 - 300	40 – 72	25

MECHANICAL SPECIFICATION : ESS1025-XX-YYY

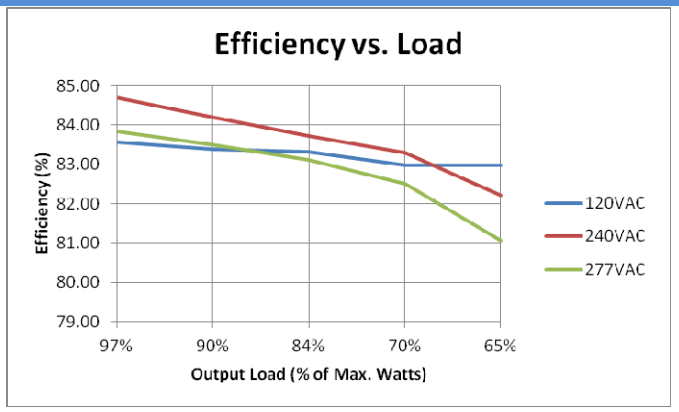
XX = Maximum Forward Voltage (Vf)
YYY = Constant Current Output (If)
AC input terminal block
DC output terminal block
0-10V dimming control terminal block



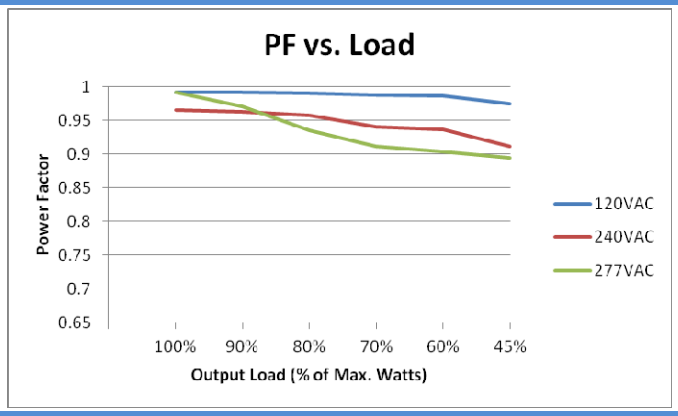
De-rating Temp. vs. Load



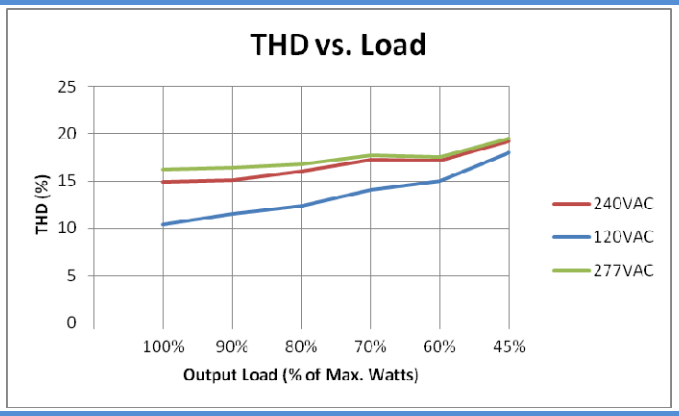
Efficiency vs. Load



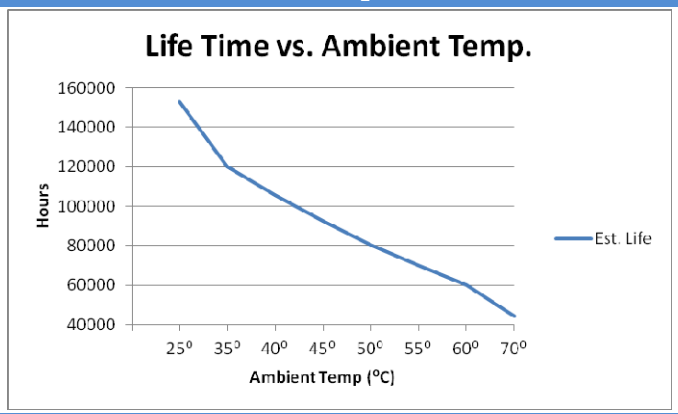
Power Factor vs. Load



THD vs. Load



Life Time vs. Ambient Temp.



Dimming Wiring Diagram