



**Product Highlights:**

- Designed for LED lighting and signage applications
- Universal AC input (100~305Vac)
- Built-in active PFC provide PF>0.90 over entire input range
- Class 2 power supply
- Plastic case cooled by air convection
- Protections: Short circuit / Over voltage / Over Current / Over temperature
- Dimmable output with flexible architecture
  - DC Dimming (0-10V) (2 wire dimming input)
  - PWM Dimming
- 5 year warranty

**Compliance:**

- Materials: RoHS Compliant
- Safety: UL8750, CAN/CSA-C22.2 No. 250.13-12 , Class 2 power
- EMI: FCC Part 15 Class B and EN55015 Compliant
- IP66: Suitable for indoor or outdoor applications in dry, damp and wet locations
- Noise Rating: Class A

**IP65 RoHS**

**Orderable Part Numbers**

**Constant Current Variants**

Part Number	Output Current (mA)	Output Voltage Range (V)	Load Reg.	Max. Effic.	Max. Output Power (W)
XEL-A050B-024-C2X00	2000	16 ~ 24	±5%	86%	48
XEL-A050B-042-C1X50	1500	20 ~ 33	±5%	86%	50
XEL-A050B-042-C1X40	1400	25 ~ 36	±5%	87%	50
XEL-A050B-042-C1X05	1050	30 ~ 42	±5%	88%	45
XEL-A050B-056-C1X00	1000	36 ~ 48	±5%	89%	48
XEL-A050B-056-CX850	850	40 ~ 56	±5%	89%	48
XEL-A050B-056-CX700	700	40 ~ 56	±5%	89%	40

For dimmable units add a -ZA suffix to the part numbers above

If the variant you need is not listed, please contact EHWZ ([Sales@ehwz.com](mailto:Sales@ehwz.com)) and we can arrange for a customized solution

Units with output voltage >42V are not cUL compliant at the driver level but may qualify for fixture level compliance

**General Specification**

SERIES		XEL-A050B
OUTPUT	DCVOLTAGE RANGE	16~ 56Vdc (see orderable parts table for details)
	RATED CURRENT RANGE	700mA ~ 2.00A (see orderable parts table for details)
	RATED POWER	up to 50W
	LOAD REGULATION <sup>1</sup>	±5%
	TURN ON TIME	< 1s
INPUT	VOLTAGE RANGE	100 ~ 305Vac
	FREQUENCY RANGE	The input frequency range will be 47 to 63 Hz.
	POWER FACTOR (Typ.)	PFC >0.90 at 80% load with input range from 120-277Vac
	EFFICIENCY (Typ.)	≥ 85 % when the load is greater than 80%
	AC CURRENT	0.8A max @ 120Vac and 277Vac
	INRUSH CURRENT (Typ.)	After AC power is applied to the power supply (cold start), any initial inrush current surge or spike of 10msec or less shall not exceed 15A at 25°C, DC output Full load at 120 Vac input, and shall not exceed 20A at 25°C, DC output Full load at 277Vac input.
	LEAKAGE CURRENT	<500µA (400µA typical)
THD (TOTAL HARMONIC DIST.)	Compliance to EN61000-3-2 Class C Standards, THD ≤ 20% with DC output at full load and nominal input voltages.	
DIMMING	MODES	DC Dimming Control: 0-10 Vdc PWM Dimming Adjustable Control Input: Duty 0%-100% (PWM frequency 200HZ-1KHZ, 10-24V Range) Have both sinking and sourcing
PROTECTION	SHORT CIRCUIT	Hiccup mode protection. Recovers automatically after fault condition is removed
	OVER VOLTAGE	< 30% above the maximum output voltage listed for the specific part number
	OVER CURRENT	< 30% above the maximum output current listed for the specific part number
	OVER TEMPERATURE	If temperature at Tc (the surface temperature of the case )is >90°C, the light should automatically dim to 5%- 15% light output. Then if the temperature drops below 80°C-50°C, the unit should go back to 100% automatically.

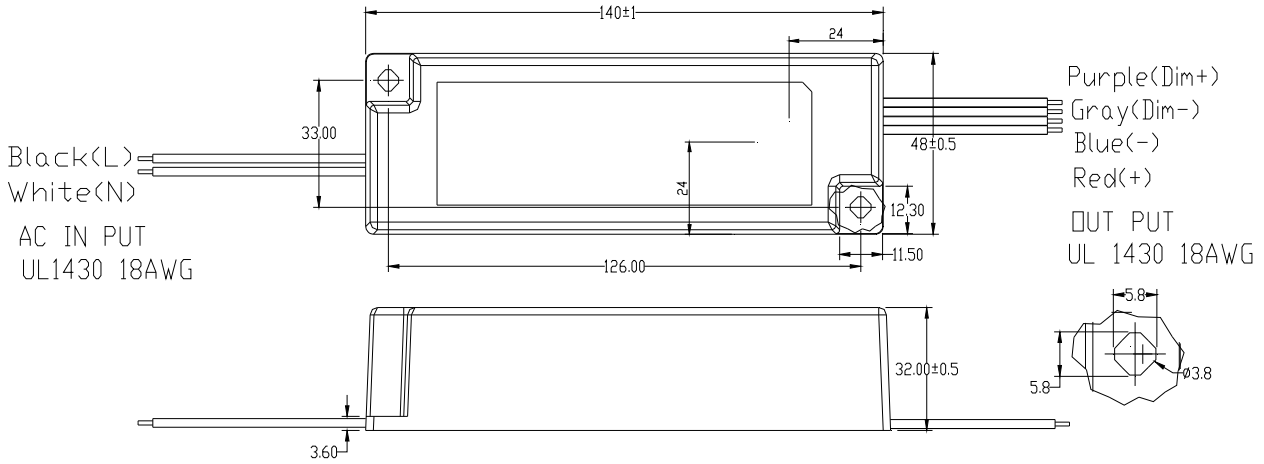
ENVIRONMENT	WORKING TEMPERATURE (Typ.)	-40°C ~ +70°C ambient (Tcase rated for 90C)
	WORKING HUMIDITY	5% ~ 95% RH non-condensing
	STORAGE TEMPERATURE	-40°C ~ + 85°C
	STORAGE HUMIDITY	5% ~ 95% RH non-condensing
	Waterproof Rating	IP65 Compliant
	IMPACT RESISTANCE	1 g/s
	VIBRATION	5-55Hz/2g, 30 minutes
SAFETY & EMC	SAFETY STANDARDS	UL8750, CAN/CSA-C22.2 No. 250.13-12 , Class 2 power supply
	EMI CONDUCTION & RADIATION	Compliance FCC Part 15 Class B and EN55015 Compliant
	HARMONIC CURRENT	Compliance to GB4343-2003+A1, CISPR 14-1:EN61000-3-2:1995
	EMS IMMUNITY	Compliance to GB/T13926.3, IEC61000-4-3 & 4-4, PrEN55014-2 Section 6.2 & 6.5, IEC61000-4-11.
TRANSIENT SUPPRESSION	4kV (100kHz ring wave at 4kV common mode and differential)	
OTHERS	LIFETIME	50,000 hours @ Tcase ≤ 90C

### Mechanical Details

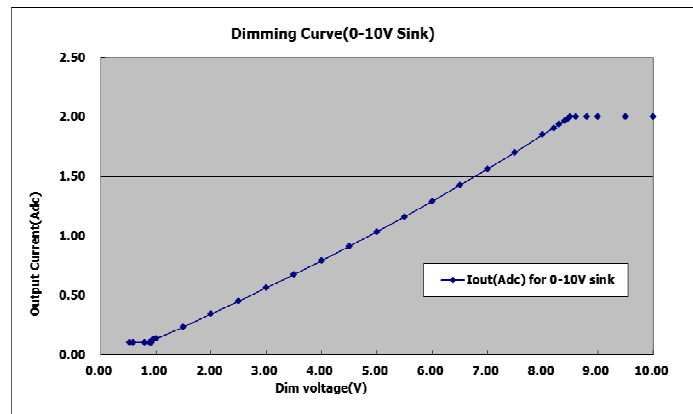
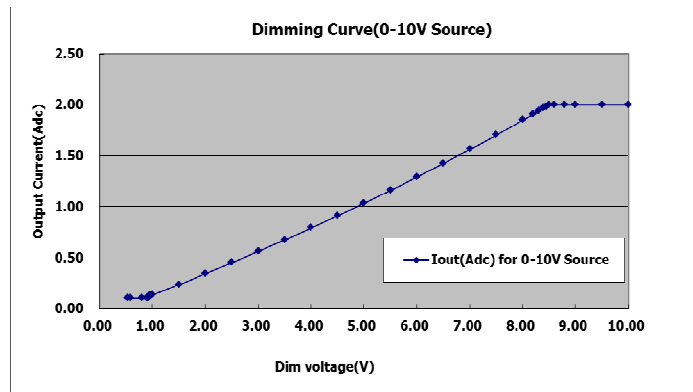
Wires	Colors	Type
Input	White (Neutral)	UL1015
	Black (Line)	AWG18
Output	Red (LED+)	UL1430
	Blue (LED-)	AWG18
Dimming (optional)	Purple (Dim+10V Input)	UL1430
	Groy (Dim- 0V Input)	AWG18

Case	
Material	Black/White PC, PBT, PPO, Plastic
Unit Weight	TBD
Dimensions	140.0mm (L) x 48mm (W) x 32.0mm (H)

Drawing not to scale



Dimming graph: (24V/2A)



For more detailed information about this product please contact EHYZ (sales@ehyz.com)

Xenerqi Limited

Email: [Sales@ehyz.com](mailto:Sales@ehyz.com)

Website: [www.ehyz.com](http://www.ehyz.com)

Phone: +1 (704) 746-9246

+(852) 3050-9292

+(65) 6494-8832

The information and specifications contained in this summary sheet are believed to be accurate and reliable at the time of publication, however EHYZ assumes no responsibility for damages caused due to potential errors. Also, EHYZ assumes no responsibility for the use of this product in such way that it infringes on patents or other rights of third parties. No license is granted by implication or otherwise under any patent or patent rights of EHYZ. Specifications are subject to change without notice and it is the user's responsibility to ensure they have the latest version.