

Phase Cut / Triac Dimmable Driver
PWM Output (KVF - TDW Series 120W)



Features

- Output constant voltage
- UL, cUL listed, Class P, Type HL
- Universal AC input: 100-277VAC
- Power Factor: up to 0.99
- High efficiency : up to 82%
- Dimming range: 0-100%
- Load: 10-100%
- Protection:short circuit/over loading/ Over temperature
- PWM output, does not change the color index
- Full protection aluminum housing, for dry, damp, wet location
- Flicker-free
- Compatible with Forward phase, Reverse phase, Triac, MLV, ELV Dimmers
- Cooling by free air convection
- Suitable for LED lighting and moving sign applications



Class 2 Class P

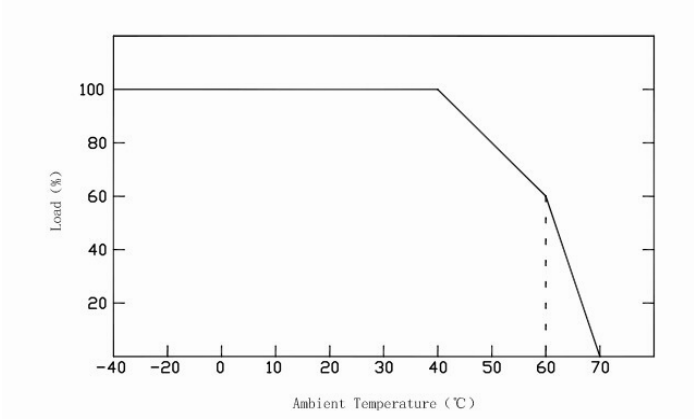
Specifications

Model		KVF-12120-TDW	KVF-24120-TDW
Certificates		FCC UL cUL	FCC UL cUL
Output	DC Voltage	12V	24V
	Rated Current	10A	5A
	Rated Power	120W - 480W	
	Voltage Tolerance	±0.5V	
	Voltage Regulation	±0.5%	
	Load Regulation	±2%	±1%
Input	Voltage Range	100-277VAC	
	Frequency Range	47-63Hz	
	Power Factor (Typ.) @ full load	0.99@120VAC 0.96@277VAC	0.98@120VAC 0.96@277VAC
	THD (Typ.) @ full load	<20%	
	Efficiency (Typ.) @ full load	82%	82%
	AC Current (Max.)	1.7A@100VAC	
	Inrush Current (Typ.)	20A, 50%, 1.6ms	
	Leakage current	<0.50mA	
Protection	Short Circuit	shut down o/p voltage, re-power on to recover after fault condition is removed	
	Over Loading	≤120% constant current limiting, auto-recovery	
	Over temperature	100℃±10℃ shut down o/p voltage, automatically recover after cooling.	
Environment	Working TEMP.	-40~+60℃ (see below derating curve)	
	Working Humidity	20~90% RH, non-condensing	
	Storage TEMP. Humidity	-40~+80℃, 10~95%RH	
	TEMP .coefficient	±0.03%/℃ (0~50℃)	
	Vibration	10~500Hz, 5G 10min./1 cycle,period for 60min. each along X,Y,Z axes	
Safety & EMC	Safety standards	UL8750	
	Withstand voltage	I/P-O/P:1.88KVac	
	Isolation resistance	I/P-O/P:100MΩ/500VDC/25℃/70%RH	
	EMC EMISSION	FCC Part 15 B	
others	Net. Weight	1.05Kg	
	Size	230*70*43mm (L*W*H)	
	packing	10PCS/CTN	

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Notes	1. All Parameters are done on 120VAC input and a ambient temperature of 25 degrees Celsius (77 degrees Fahrenheit)
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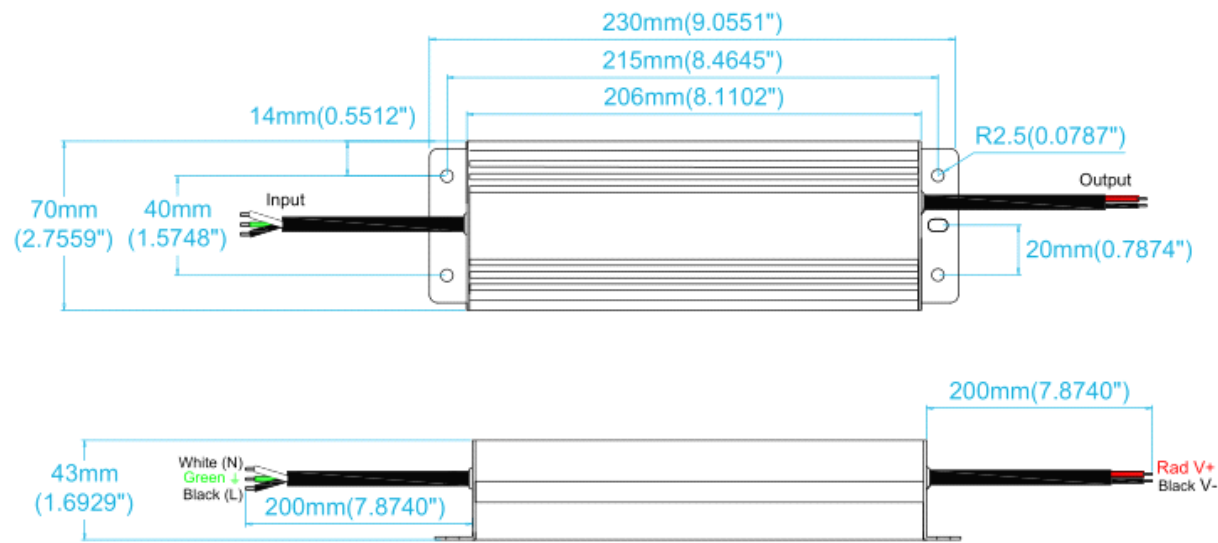
Derating Curve



※IMPORTANT. Read carefully. The driver MUST be installed on a well ventilated location. Do not locate the driver in a box without active ventilation.The driver should have at least 50mm/2 inch space from any wall. Create at least 15mm/0.5" space between the bottom of the power supply and the wall/floor. See the derating curve on how heat impacts the drivers' performance.

Mechanical Specification

Unite: mm
Tolerance:P 0.5-2mm

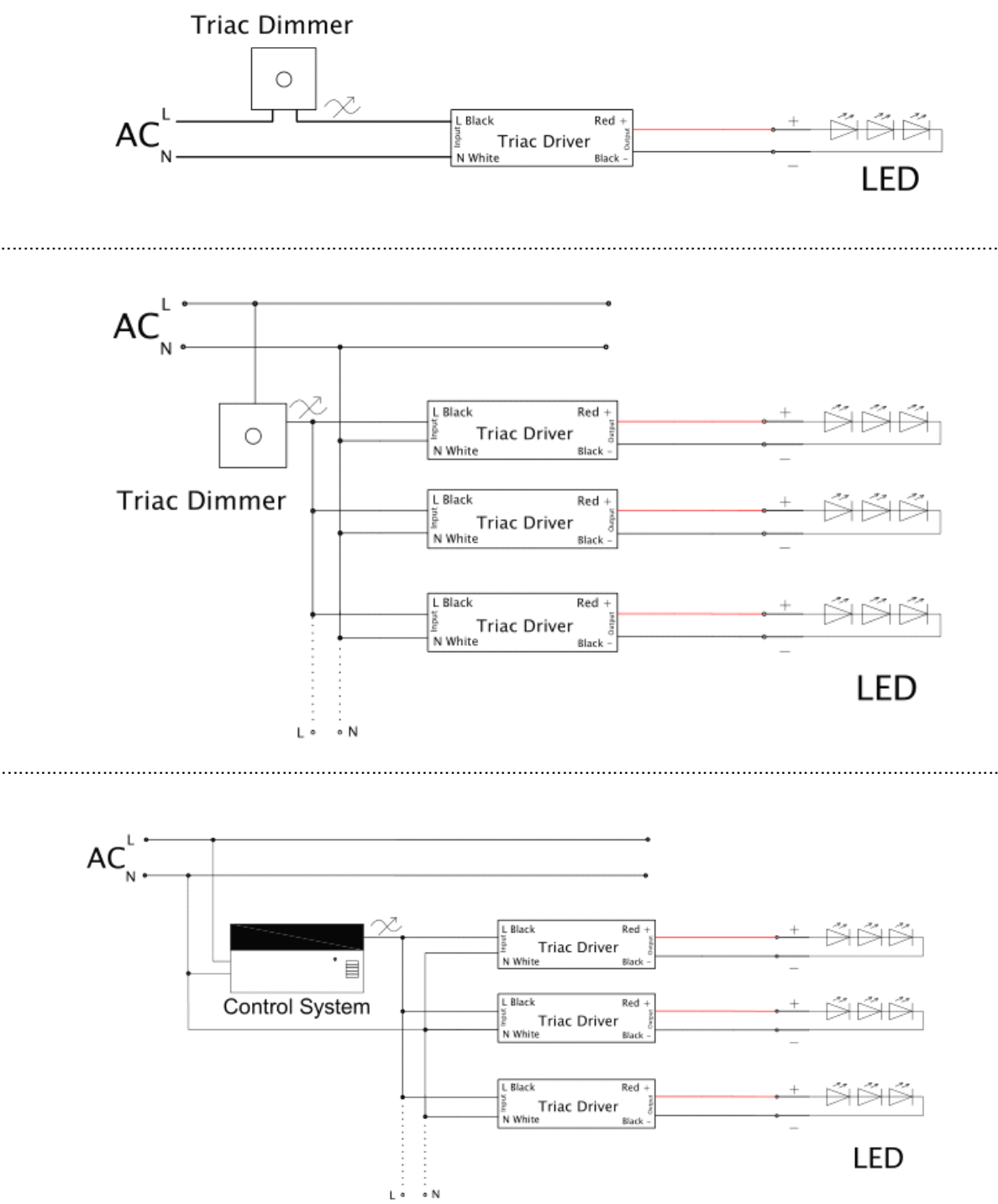


- ※ Input Rubber wire 3*18AWG Black and White to be connected to AC L and N ,Green wire go ground,
- ※Output Rubber wire, 2*16AWG Red to LED Positive side (+) , Black to LED Negative side (-).

Dimming Operation

- ※The Pulse-Width Modulation (PWM) of output voltage can be adjusted through input terminal of the AC phase line(L) by connection a phase/triac dimmer.
- ※Usually matching with Forward phase , leading edge , Magnetic low voltage, triac dimmers, or Reverse phase, trailing edge ,Electric low voltage Dimmers.
- ※Please try to use dimmers with power at least 1.5 times as the output power of the driver.

Connecting Diagram



Instruction:

- 1) This driver must be installed by a licensed electrician only.
- 2) Ensure that there is adequate ventilation around the driver. Do not install in a box or enclosure without active ventilation.
- 3) Keep the driver out of direct sun light and install in a dry place only.
- 4) Ensure the wiring and connections are correct before turning on.