LTSYS

LED Intelligent Driver (Constant Voltage)

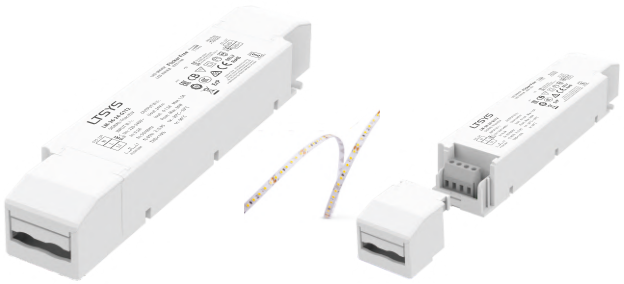
LM-36-24-G1T2
LM-36-12-G1T2

Triac/ELV Push DIM

- Small size and light weight. Adopt SAMSUNG/COVESTRO V0 flame resistant polycarbonate protective housings.
- The design of dismountable end cap allows you to adjust the length of housing depending on your needs.
- With soft-on and fade in function, visual more comfortable.
- Dimming range: 0~100%, dimming down to 0.1%.
- 0-100% flicker-free, High frequency exemption level.
- Leading edge (Triac), Trailing edge (ELV) phase-cut and Push DIM.
- The secure and reliable design for signal isolation.
- Innovative thermal management technology intelligently protects the lifetime the driver.
- Over load / Over temp. / Short circuit / Over voltage protection, recover automatically.
- Suitable for internal lights application for Ⅰ/Ⅱ/Ⅲ.
- Up to 50000-hour life time.
- 5 year warranty (Rubycon capacitor).

Flicker-free
IEEE 1789
Achieve high frequency exemption level.

Dimmable:
0.1%-100%



SELV RoHS ErP

IS15885 R-41129631

Triac/ELV Push DIM | Overheat protection | Short circuit protection | Overload protection | Over voltage protection

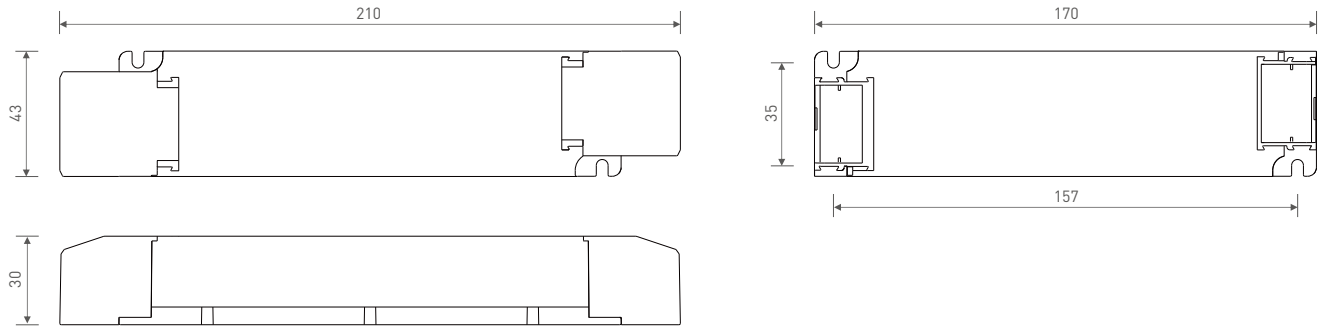
Technical Specs

Model		LM-36-24-G1T2			LM-36-12-G1T2
OUTPUT	Output voltage	24Vdc			12Vdc
	Output voltage range	24Vdc ± 0.5Vdc			12Vdc ± 0.5Vdc
	Output current	Max. 1.5A			Max. 3A
	Output power	Max. 36W			
	Output power range	0~36W			
	Strobe level	High frequency exemption level.			
	Dimming range	0~100%, dimming down to 0.1%			
	Overload power limitation	≥102%			
	Ripple & Noise	≤200mV			
	PWM frequency	3600Hz			
INPUT	Dimming interface	Leading edge (Triac), Trailing edge (ELV) phase-cut and Push DIM.			
	Input voltage	220-240Vac			
	Frequency	50/60Hz			
	Input current	≤0.2A/230Vac			
	Power factor	PF>0.95/230Vac , at full load			
	THD	230Vac@THD＜10%, at full load			
	Efficiency (typ.)	85%			84%
	Inrush current(typ.)	Cold start 30A at 230Vac			
	Control surge capability	L-N: 2kV			
	Leakage current	Max. 0.5mA			
ENVIRONMENT	Working temperature	ta: -20 ~ 50°C tc: 90°C			
	Working humidity	20 ~ 95%RH, non-condensing			
	Storage Temperature humidity	-40°C ~ 80°C, 10~95%RH			
	Temperature coefficient	±0.03%/°C(0-50°C)			
	Vibration	10~500Hz, 2G 12min./1cycle, 72 min for X, Y and Z axes respectively .			
PROTECTION	Over-heat protection	Intelligently adjust or turn off the output current if the PCB temperature ≥110°C, and recover automatically .			
	Over load protection	Shut down the output when current load≥102%, and recover automatically .			
	Short circuit protection	Shut down automatically if short circuit occurs, and recover automatically .			
	Over voltage protection	Shut down the output when non-load voltage≥26V, re-power on to recover after fault condition is removed.			Shut down the output when non-load voltage ≥13V, re-power on to recover after fault condition is removed.
SAFETY & EMC	Withstand voltage	I/P-O/P: 3750Vac			
	Isolation resistance	I/P-O/P: 100MΩ/500VDC/25°C/70%RH			
	Safety Standards	CCC	China	GB19510.1, GB19510.14	
		TUV	Germany	EN61347-1, EN61347-2-13, EN62493	
		CE	European Union	EN61347-1, EN61347-2-13, EN62384	
		KC	Korea	KC61347-1, KC61347-2-13	
		RCM	Australia	AS61347-1, AS61347-2-13	
		CB	CB member states	IEC61347-1, IEC61347-2-13	
		BIS	India	IS 15885 (PART 2/SEC 13)	
	EMC Emission	EAC	Russia	IEC61347-1, IEC61347-2-13	
		CCC	China	GB/T17743, GB17625.1	
		CE	European Union	EN55015, EN61000-3-2, EN61000-3-3, EN61547	
		KC	Korea	KN15, KN61547	
		RCM	Australia	EN55015, EN61000-3-2, EN61000-3-3, EN61547	
		EAC	Russia	IEC62493, IEC61547, EH55015	
	EMC immunity	EN61000-4-2,3,4,5,6,8,11, EN61547			
	Strobe test standard	IEEE 1789			
OTHERS	Weight(G.W.)	210g±10g			
	Dimension	210×43×30mm(L×W×H)			
	Package Size	213×44×33mm(L×W×H)			
	Carton Size	440×218×235mm(L×W×H) 40pcs/ctn 9kg±5%/ctn			

※ The driver is suitable for connecting resistor current-limiting LED fixture (e.g. LED strip). The inrush current will be dozens of times increased if connecting built-in constant current IC current-limiting LED fixtures, the driver will activate the overloaded protection (hiccups flickering). When you order, please remark controlling the constant current LED fixture (e.g. MR16 lamp, underground light, LED wall washer, constant current LED strip, etc.), then we can prepare the special programs.

Dimensions

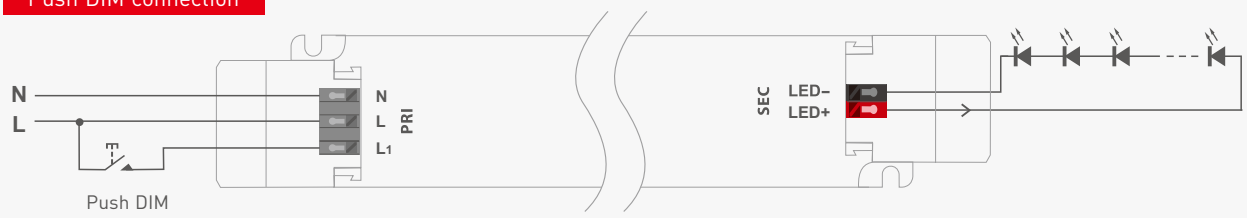
Unit: mm



Wiring Diagram

Triac connection

Push DIM connection



✻ Push DIM is invalid for DC voltage input.
Dimming interface priority: Triac first, Push DIM next.

Push Dimming

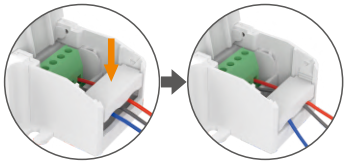
Reset switch

- On/off control: Short press.
- Stepless dimming: Long press.
- With every other long press, the brightness goes to the opposite direction.
- Dimming memory: The lights will return to its previous brightness value when short press on PUSH DIM button.

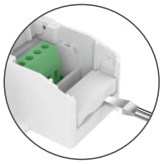
  Power on again after power cut, the output brightness is subjected to the input voltage of drivers.

Protective Housing Application Diagram

Tension plate



Push the tension plate down to fix the electric wires.

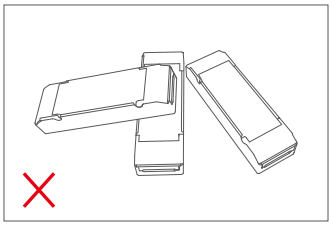


Push the side plate outwards and remove the tension plate by prying it up with a tool at the same time.

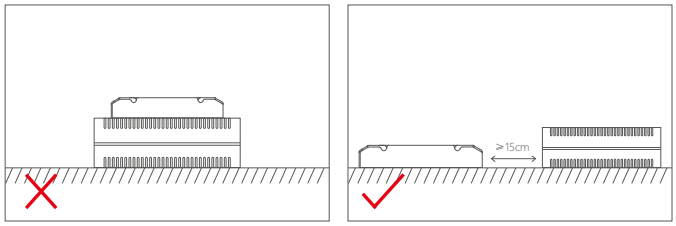
Remove the protective housing

Pull the bottom left and right from the bottom to remove it.

Installation Precautions

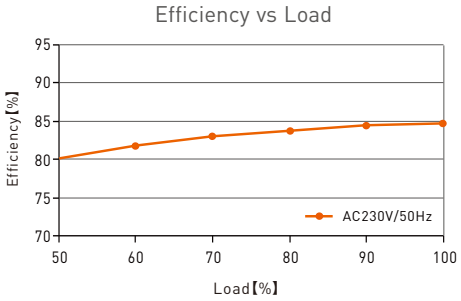


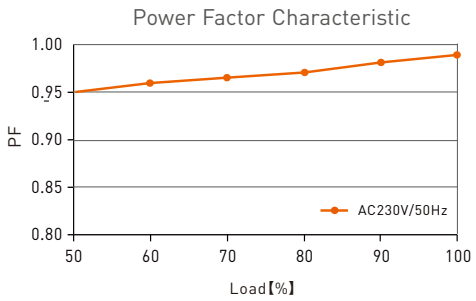
Please do not stack the products. The distance between two products should be≥15cm so as not to affect heat dissipation and the lifespan of the products.

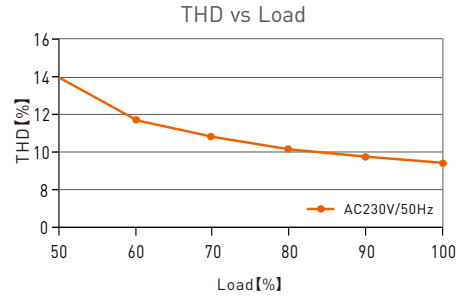


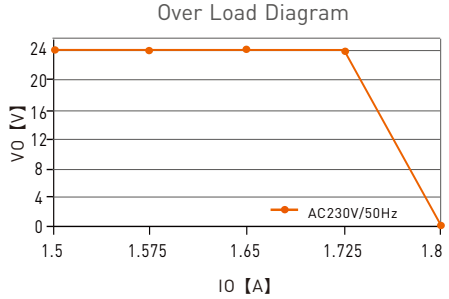
Please not place the products on LED drivers. The distance between the product and the driver should be ≥15cm so as not to affect heat dissipation and shorten the lifespan of the products.

Relationship Diagrams

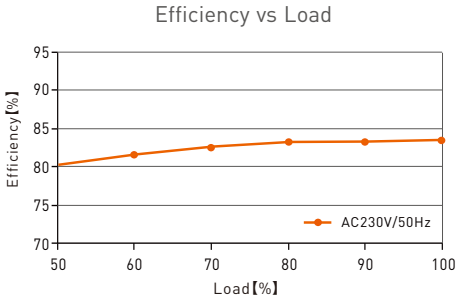


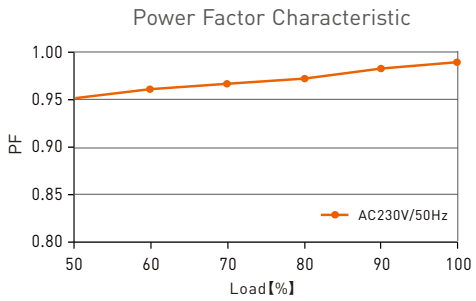


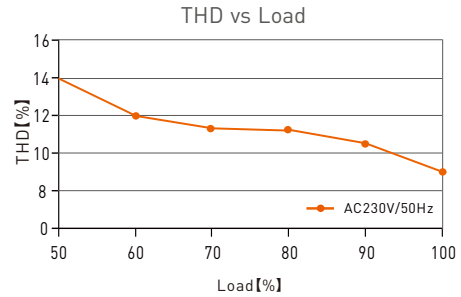


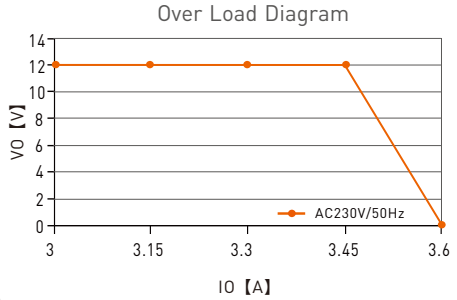


LM-36-24-G1T2







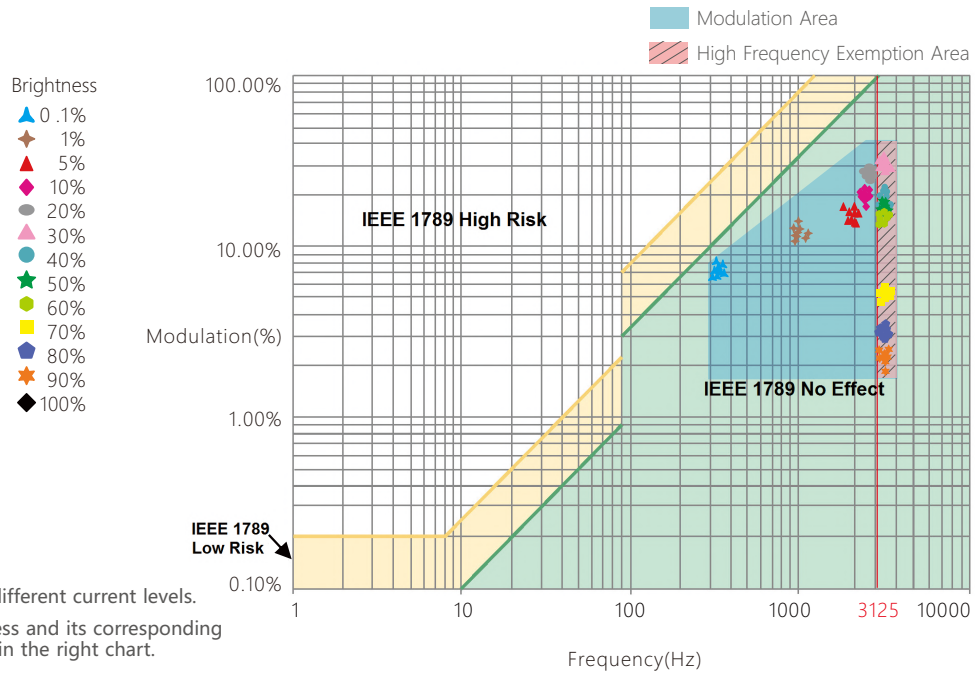


LM-36-12-G1T2

Flicker Test Table

IEEE 1789

Limit Value of Modulation in Low Risk Areas	
Waveform frequency of Optical output	Limit value (%)
$f \leq 8Hz$	0.2
$8Hz < f \leq 90Hz$	$0.025 \times f$
$90Hz < f \leq 1250Hz$	$0.08 \times f$
$f > 1250Hz$	Exemption assessment
Limit Value of Modulation in No Effect Areas	
Waveform frequency of Optical output	Limit value (%)
$f \leq 10Hz$	0.1
$10Hz < f \leq 90Hz$	$0.01 \times f$
$90Hz < f \leq 3125Hz$	$(0.08/2.5) \times f$
$f > 3125Hz$	Exemption assessment (High frequency exemption)



Marks in the right chart are tested results of different current levels.

The output frequency is 0Hz in 100% brightness and its corresponding modulation is 0%, which could not be shown in the right chart.

Attentions

- Products shall be installed by qualified professionals.
- LTECH products are non-waterproof (special models excepted). Please avoid the sun and rain. When installed outdoors, please ensure it is mounted in a water proof enclosure.
- Good heat dissipation will extend the working life of products. Please ensure good ventilation.
- Please check if the working voltage used complies with the parameter requirements of products.
- The diameter of wire used must be able to load the light fixtures you connect and ensure the firm wiring.
- Before you power on products, please make sure all the wiring is correct in case of incorrect connection that causes damage to light fixtures.
- If a fault occurs, please do not attempt to fix products by yourself. If you have any question, please contact your suppliers.

✻ This manual is subject to changes without further notice. Product functions depend on the goods. Please feel free to contact our official distributors if you have any question.

Warranty Agreement

- Warranty periods from the date of delivery : 5 years.
- Free repair or replacement services for quality problems are provided within warranty periods.

Warranty exclusions below:

- Beyond warranty periods.
- Any artificial damage caused by high voltage, overload, or improper operations.
- Products with severe physical damage.
- Damage caused by natural disasters and force majeure.
- Warranty labels and barcodes have been damaged.
- No any contract signed by LTECH.

1. Repair or replacement provided is the only remedy for customers. LTECH is not liable for any incidental or consequential damage unless it is within the law.
2. LTECH has the right to amend or adjust the terms of this warranty, and release in written form shall prevail.

Update Log

Version	Updated Time	Update Content	Updated by
A0	2021.04.12	Original version.	Xu Shujun
A1	2021.12.27	Updated the silkscreen on the product.	Xu Shujun
A2	2026.01.19	Update company logo and laser engraving/screen printing	Li Haipeng