

SPECIFICATION FOR APPROVAL

Customer:		
Product Material	No.:	
Model No.	LF-GIR060YM	
Version:	V3.1	
Manufacturer:	Sichuan Ledfriend Technology C	Co., Ltd
Customer Approval		
Tested by	Checked by	Approved by
Ledfriend Approval		
Tested by	Checked by	Approved by
The full model numbers req	uired by customers	
Full model No.	Full model No.	
Full model No.	Full model No.	

E.C. List

Version	Description of change	Engineer	Date
3.0	Original release	Song Haiquan	2016-7-8
3.1	Revised picture	Song Haiquan	2016-7-14

Shenzhen Ledfriend Optoelectronics Co., Ltd.

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www.lifud.com, China service hotline: 400-096-6815 (China technical support: 13410244507)

Model	LF-GIR060YM	Series	AC220-240V typical plastic case series
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Shenzhen Ledfriend Optoelectronics Co., Ltd.

1. Product description



Isolated LED driver suitable for class II LED luminaires.

Category: typical AC220-240V plastic case series.

Product properties: active PFC, high performance, high efficiency, low THD.

Application: commercial, residential and decorative lighting. Warranty: 3 years (please refer to the warranty condition).

Certifications:







2. Technical data (1)

	Full model number	LF-GIR060YM 1200H	LF-GIR060YM 1300H	LF-GIR060YM 1400H	LF-GIR060YM 1500H				
	Output voltage	25-42 VDC							
	Output current	1200mA	1300mA	1400mA	1500mA				
	Ripple voltage	≤5V							
Output	Current tolerance	±5%							
	Time to light	230Vac <0.5S							
	Temperature drift	±10%							
	Output Line regulation	±5%							
	Input Line regulation	±5%							
	Input voltage	oltage 220-240 Vac, (Max input voltage: 180-264Vac)							
	Frequency	47Hz-63Hz							
	Input current	0.5A Max							
Input	Power factor	≥0.90/230Vac	≥0.90/230Vac	≥0.90/230Vac	≥0.90/230Vac				
Input	THD	≤20%							
	Efficiency	≥89%/230Vac	≥89%/230Vac	≥89%/230Vac	≥89%/230Vac				
	In-rush current (peak /duration)	I<60A/350uS@230Vac							
	Typ. power input on stand-by	Pin<1W							
Protective	No-load	Max. output voltage ((no-load voltage) 55V						
features	Short-circuit	Hiccup mode (auto-re	ecovery)						
	Working temperature	-30°C ~ +50°C							
Environment	Working humidity	20-90%RH (no condensation)							
condition	Storage temperature/humidity	-40°C ~ +80°C (6 months under the class I environment); 10-90%RH (no condensation)							
	Atmospheric pressure	86-106KPa							
	Certifications	TUV, RCM, CE, CB							
	Hi-pot test	I/P-O/P: 3.75KVac, <5mA, 60S							
Safety and	Insulation resistance	I/P-O/P: 500VDC, >100MΩ							
norms	Surge level	Comply with IEC61000-4-5 (L/N: 1KV)							
	EMI	Comply with EN55015, EN61000-3-2.							
	EMS	Comply with EN6100	00-4-2, 3, 4, 5, 6, 8, 11;	EN61547.					
	Packing (weight)	Net weight: 136g±5%/pc; 66pcs/carton; 10.0KG±5%/carton. Carton size: 39 x 29 x 21 cm (L xWxH).							
Others	IP level	IP20							
	Warranty condition	3 years (Max. case te	mperature must not exc	eed 80°C).					
Testing equipment	AC power source: CHROMA6530, digital power meter: CHROMA66202, Oscilloscope: Tektronix DPO3014, DC electronic load: M9712B, LED board, constant temperature and humidity chamber, lightning surge generator: Everfine EMS61000-5B, rapid group pulse generator: Everfine EMS61000-4A, spectroanalyzer: KH3935, hi-pot tester: TH9201B, flicker-free tester (flicker-free coefficient tester) 60N-01, etc.								
Test conditions	The parameters above including the power factor, THD, efficiency are all tested under the ambient temperature 25°C and humidity 50%, AC input 230V and 90% output load.								
Additional Remark	1. In the power supply circuit, it is recommended that the customer should install an over-under-voltage protection and surge protection device to ensure the safety of using electricity. 2. The PC cover, shell, end caps used together with the LED driver inside the LED lamp must meet the UL94V-0 fire rating level or above. 3. As a part of the LED lamp, the LED driver is not the only factor determining the EMC performance of the LED lamp. And the EMC performance is also related to the LED lamp's structure and the wire routing. Thus we strongly recommend the manufacturer of the finished LED lamp must re-confirm the EMC of the LED lamps.								

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Technical data (2)

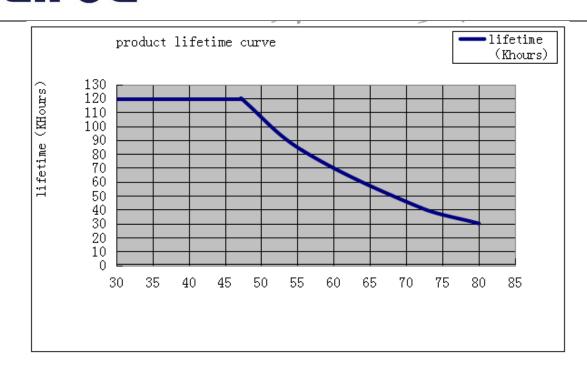
	Full model number	LF-GIR060YM 0900H	LF-GIR060YM 0950H	LF-GIR060YM 1000H	LF-GIR060YM 1050H	LF-GIR060YM 1100H		
	Output voltage			40-55 VDC				
Output	Output current	900mA	950mA	1000mA	1050mA	1100mA		
	Ripple voltage	≤5V						
	Current tolerance	±5%						
	Time to light	230Vac <0.5S						
	Temperature drift $\pm 10\%$							
	Output Line regulation	±5%						
	Input Line regulation	±5%						
	Input voltage	220-240 Vac, (Max input voltage: 180-264Vac)						
	Frequency	47Hz-63Hz						
	Input current	0.5A Max						
Input	Power factor	≥0.90/230Vac	≥0.90/230Vac	≥0.90/230Vac	≥0.90/230Vac	≥0.90/230Vac		
Input	THD	≤20%	•	•	•	•		
	Efficiency	≥89%/230Vac	≥89%/230Vac	≥89%/230Vac	≥89%/230Vac	≥89%/230Vac		
	In-rush current (peak /duration)	I<60A/350uS@2	230Vac					
	Typ. power input on stand-by	Pin<1W						
Protective	No-load	Max. output volt	age (no-load voltag	ge) 70V				
features	Short-circuit	Hiccup mode (au	Hiccup mode (auto-recovery)					
	Working temperature	-30°C ∼ +50°C						
Environment	Working humidity	20-90%RH (no condensation)						
condition	Storage temperature/humidity	-40°C ~ +80°C (6 months under the class I environment); 10-90%RH (no condensation)						
	Atmospheric pressure	86-106KPa						
	Certifications	TUV, RCM, CE						
	Hi-pot test	I/P-O/P: 3.75KVac, <5mA, 60S						
Safety and	Insulation resistance	I/P-O/P: 500VD	C, >100MΩ					
norms	Surge level	Comply with IE	C61000-4-5 (L/N:	1KV)				
	EMI	Comply with EN55015, EN61000-3-2.						
	EMS	Comply with EN	161000-4-2, 3, 4, 5	, 6, 8, 11; EN61547	7.			
	Packing (weight)	Net weight: 136g±5%/pc; 66pcs/carton; 10.0KG±5%/carton. Carton size: 39 x 29 x 21 cm (L xWxH).						
Others	IP level	IP20						
	Warranty condition	3 years (Max. case temperature must not exceed 80°C).						
Testing equipment	AC power source: CHROMA electronic load: M9712B, Ll EMS61000-5B, rapid group p flicker-free tester (flicker-free	6530, digital power ED board, constant ulse generator: Eve	meter: CHROMA temperature and hu rfine EMS61000-4	66202, Oscilloscop umidity chamber, li	e: Tektronix DPO3	erator: Everfine		
Test	The parameters above including	ng the power factor	THD, efficiency a	re all tested under	the ambient temper	rature 25°C and		
conditions	humidity 50%, AC input 230\							
Additional Remark	1. In the power supply circuit, it is recommended that the customer should install an over-under-voltage protection and surge protection device to ensure the safety of using electricity. 2. The PC cover, shell, end caps used together with the LED driver inside the LED lamp must meet the UL94V-0 fire rating level or above. 3. As a part of the LED lamp, the LED driver is not the only factor determining the EMC performance of the LED lamp.							
	And the EMC performance is also related to the LED lamp's structure and the wire routing. Thus we strongly recommend the manufacturer of the finished LED lamp must re-confirm the EMC of the LED lamps.							

3. Product Referenced Lifetime Curve

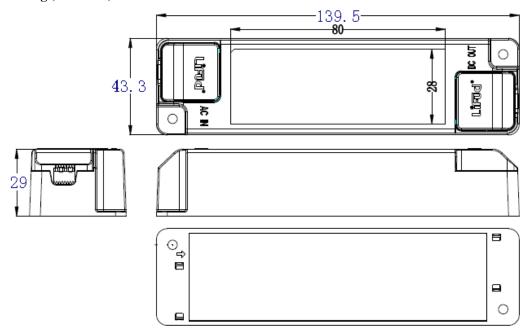
The curve below illustrates the driver's lifetime data when the LED driver's Max. case temperature reaches 40°C, 50°C, 60°C, 70°C, 80°C, 90°C.

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4. Dimensional Drawing (unit: mm)



5. Wire Connection Diagram:

