

Triac Dimming LED Driver

LT-240-xxT



Features



- Independent ultra-slim design
- Dimmable constant voltage driver
- Flicker-free
- Dimming with leading edge or trailing edge dimmer
- Smooth dimming compatible with most dimmer
- Dimming range 1...100%
- Push wire connections
- Support loop-through wiring
- Differential mode 2kV and common mode 4kV surge immunity
- Protections: opencircuit, shortcircuit, overload, overtemperature
- DC input compatible (176-280VDC)
- SELV equivalent
- Suitable for protection class II luminaires
- Protection class II



Selection Guide

Model No.	Nominal Voltage (V)	Nominal Current (A)	Power Factor (λ)	THD Full load (%)	Max. Output (W)	Output Current (A)	Output Voltage (V)	No Load Voltage (V)	Efficiency Full Load (%)
LT-240-24T	220-240	1.5	0.95	15	240	3.33-10	24	25.2	91
LT-240-48T	220-240	1.5	0.95	15	240	1.67-5.0	48	50.4	92

Input Parameters

Parameter	Condition	Min.	Typ.	Max.																				
Input Voltage Range	AC Input	198VAC	--	264VAC																				
	DC Input	176VDC	--	280VDC																				
Rated Input Frequency	AC Input	--	50/60Hz	--																				
No-load Power Consumption		--	--	2.0W																				
Inrush Current	Cold Start@230V	65A/500us																						
Max.units Per Circuit Breaker																								
<table><tr><td>Circuit Breaker</td><td colspan="4">Circuit Breaker Current</td></tr><tr><td>Typ.</td><td>10A</td><td>13A</td><td>16A</td><td>20A</td></tr><tr><td>B</td><td>2</td><td>2</td><td>3</td><td>4</td></tr><tr><td>C</td><td>4</td><td>5</td><td>6</td><td>8</td></tr></table>					Circuit Breaker	Circuit Breaker Current				Typ.	10A	13A	16A	20A	B	2	2	3	4	C	4	5	6	8
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B	2	2	3	4																				
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Output Parameters

Parameter	Condition	Min.	Typ.	Max.
Output Accuracy	Full Load@230V	--	±5%	--
Ripple & Noise	Low Frequency < 120Hz, Full Load@230VAC	--	--	3%
Pst LM		--	--	1

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SVM		--	--	0.4
Galvanic Isolation	SELV			
Short-Circuit Protection (SCP)	Auto-Recovery If Fault Is Removed			
Over-Voltage Protection (OVP)	N/A			
Over-Current Protection (OCP)	Auto-Recovery If Fault Is Removed			

General Parameters

Parameter	Condition	Value
Ambient Temperature Range t_a		-20...+45 °C
Maximum Case Temperature t_c	Measured on t_c point indicated of the product label	90 °C
Max.Case Temp.In Fault Condition		110 °C
Storage Temperature Range		-20...+70 °C
Relative Humidity	Non Condensing	5...85%
Withstand Voltage	I/P-O/P	3.75kVAC, I leakage < 5mA, 60s
Surge Transient Protection	L-N, L/N-PE	2kV, 4kV
Environmental Rating		Indoor
IP Rating		IP20
Mains Switching Cycles		> 100,000
Expected Lifetime	$t_{cmax}=90^{\circ}\text{C}$, 0.2%/1000h failure rate	50,000h

Dimming Parameters

Dimmable	Yes
Dimming control	Leading/Trailing edge
Dimming range	1-100%

Physical Parameters

Housing Material	PC
Type of connection	Push terminal
Dimensions (LxWxH)	450x32x23mm
Mounting hole spacing	443mm
Weight	500 ± 25g

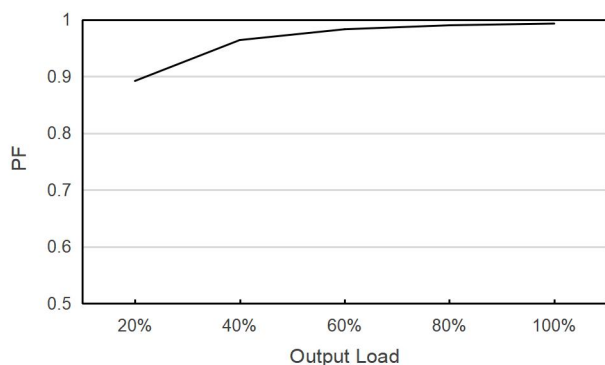
Standards

Safety Standards	EN 61347-1, EN 61347-2-13
Performance	EN 62384
EMC Standards	EN 55015, EN 61000-3-2, EN 61000-3-3, EN 61547

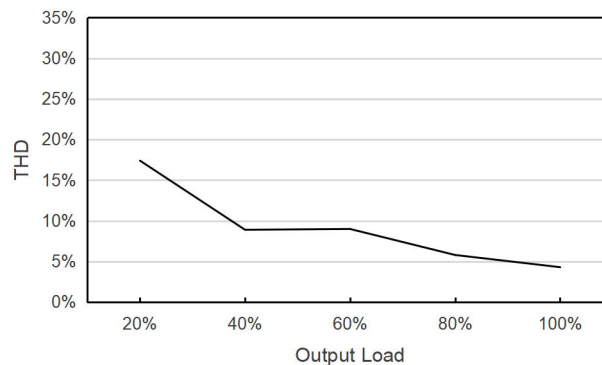
*ALL parameters NOT specially mentioned are measured at 230VAC input, rated current and 25 °C of ambient temperature.

Product Characteristic Curve

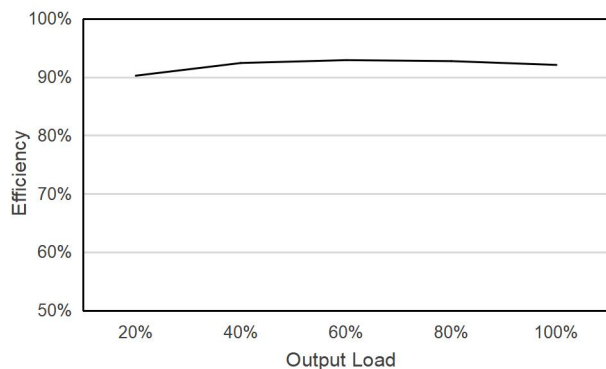
Power Factor vs Load



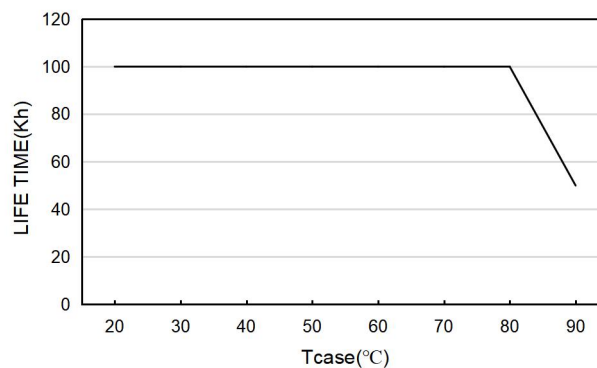
Total Harmonic Distortion vs Load



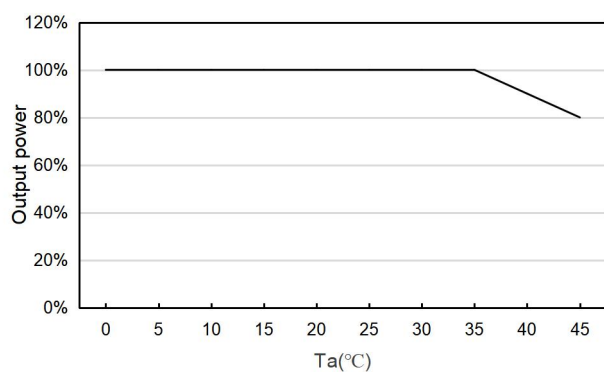
Efficiency vs Load



Life Time vs Case Temperature



Output power vs Ambient temperature



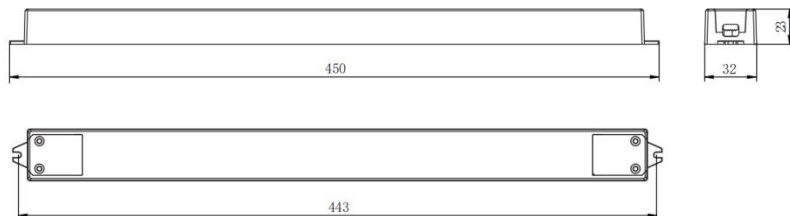
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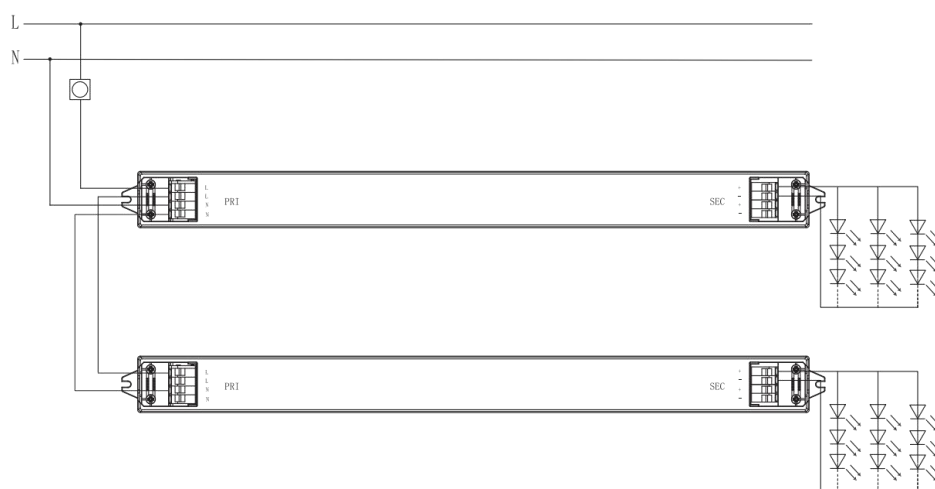


Appearance of Size

Dimension Drawing(mm)



Wiring Diagram



PRI

Cable cross-section: 0.75-1.5mm²

Stripping: 11mm

SEC

Cable cross-section: 0.5-1.5mm²

Stripping: 11mm

Hot plug-in or secondary switching of LEDs is not permitted and may cause a very high current to the LEDs.