

OT SLIM 160/220-240/24

Constant Voltage LED driver

Benefits

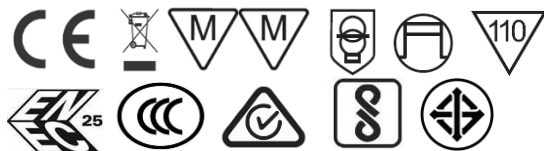
Long lasting and high reliability.
Super slim cross section for installation flexibility.
Independent housing design to fit any applications.
Through loop input connection

Applications

Cove lighting, handrail, light boxes
Compact luminaires, tracks.
Suitable for indoor
CLASS II protection



Approvals



Valid only if printed on product. When not printed on product label, they are under evaluation.

L	404 mm	Total length
L1	356 mm	Holes interaxis
B	30 mm	Width
H	21,5 mm	Height

Housing material: plastic, white

* image for information purpose only

Product Features

- Independent (Class II protection)
- SELV, V_{out} : 24,2 V
- t_a range -25...+45°C
- Overload/Over temperature/Short circuit protection, automatic, reversible
- T_c max = 75°C
- Low THD < 5%
- Low ripple < 5%
- Input voltage: 220–240 V_{AC} / 220–240 V_{DC}
- 50'000 h lifetime at T_c max *
- 5 years guarantee**

* 24 h = 14 h ON 10 h Standby

** 10% cumulated failure

Inventronics integrated OSRAM Digital Systems into the new Inventronics Global.

Electrical specification

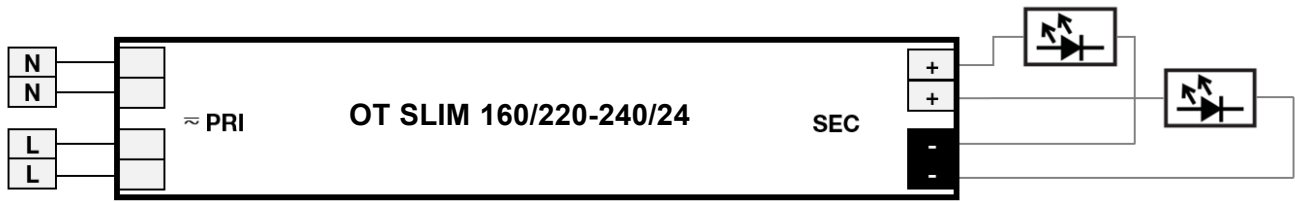
	Item	Value	Unit	Remarks
INPUT	Nominal line voltage	220 – 240	Vac	EMI filter to be applied by installer if VDC is used, to keep CE approval. (1)
		220 – 240	VDC	
	Mains line frequency	0 / 50 / 60	Hz	
	AC voltage range	195.5 – 276	V	Permitted voltage range
	DC voltage range	176 – 250	V	Permitted voltage range
	Nominal current	0.775	A	Full load, 230 Vac, 50 Hz
	Total Harmonic Distortion (THD)	< 5	%	Full load, 230 Vac, 50 Hz, see graphs
	Power factor λ	> 0,95		Full load, 230 Vac, 50 Hz, see graphs
	Efficiency in full load	92	%	Typical, Full load, 230 Vac, 50 Hz, see graphs
	Device power loss	13.9	W	Full load, 230 Vac, 50 Hz, Typical
	Intended for no-load application	No		Secondary switching not allowed
	Protection class	II		
	Suitable for fixtures with prot. Class	I & II		
	Inrush current	60	A	Full Load, 240 Vac, Cold Start Duration = 600 μ s, 50% / 50% Ipk
	Max. units per circuit breaker:			
	Max. ECG no. on circuit breaker 25 A (B)	5		
	Max. ECG no. on circuit breaker 16 A (C)	5		
	Max. ECG no. on circuit breaker 25 A (C)	9		
Max. ECG no. on circuit breaker 32 A (C)	11			
OUTPUT	Nominal voltage	24.2	V	
	Voltage accuracy	\pm 5	%	@ 220 – 240 Vac
	Open circuit voltage Max.	25	V	
	Voltage range	23.3 - 25	V	
	Voltage ripple	\pm 5	%	Ripple / average @ 100 Hz; Full load
	Nominal output power	160	W	
	Maximum output power	160	W	
	Power range	0 – 160	W	PF (λ), THD and EMI verified between 64-160 W
	TLA (Flicker and strobe effects)	PST < 1		Actual value \leq 0.015
		SVM < 0,4		Actual value \leq 0.001
Leakage current	< 0.7	mA	240 Vac	
Galvanic isolation	SELV			
ENVIRONMENTAL	Ambient temperature range	-25...+45	°C	
	Max. temperature at Tc test point	+75	°C	Measured on Tc point, Ta not exceeded
	Storage temperature range	-40...+85	°C	
	Permitted rel. humidity during operation	5 – 85	%	Not condensing
	Surge capability (L vs N)	1	kV	acc to. EN 61547
	Environmental rating	Indoor		
	IP protection class	IP 20		
	Mains switching cycles	> 50000	cycles	@ Ta = 25°C
	Expected ECG lifetime	50000	h	@ Ta = 45°C, Tc = 75°C and 10% failure rate, 14 h ON and 10 h stand-by per day
	Intended for no-load operation	No		
	Overheating protection	Yes		Auto reversible
	Overload protection	Yes		Auto reversible
	Short-circuit protection	Yes		Auto reversible
	Type of connection	Cables		
	Dimensions	404 x 30 x 21.5	mm	L x W x H
	Holes interaxis	356	mm	
Weight	250	g		
Casing material	Plastic		White RAL9010	

(1): EMI filter to be installed only on DC operation to keep CE approbation. ENEC is not valid in DC operation

(2): Stand-by and secondary switching is not allowed

Protection

Over temperature, Overload, Short-circuit. Auto reversible.

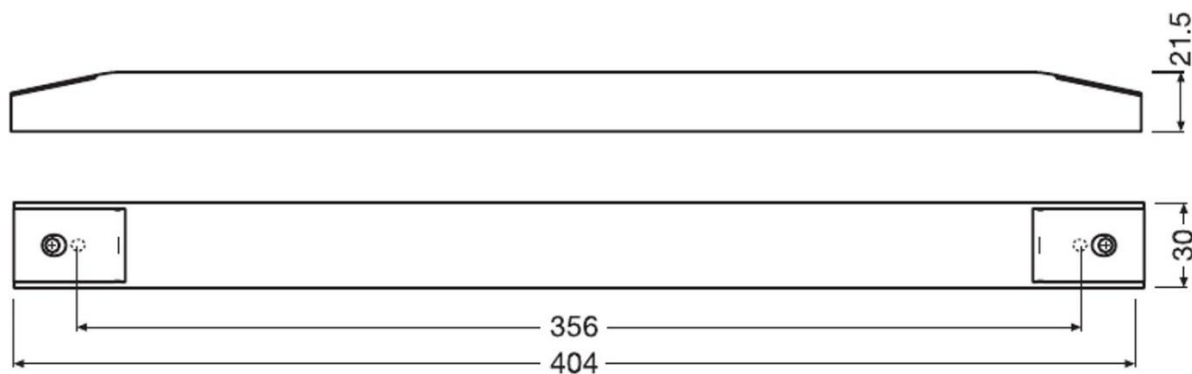


INPUT	Terminal	Screw terminal		Through loop 2L / 2N
	Wire peeling length	5	mm	
	Cable cross section	0.75 - 1.5	mm ²	H03VV-F 2x0.75 mm ² H05VV-H2/F 2X0.75 mm ² H03VV-H2/F 2x0.75 mm ² H05VV-F 2x1.5 mm ²
OUTPUT	Terminal	Screw terminal		2 LED+ / 2 LED-
	Wire peeling length	5	mm	
	Cable cross section	0.75 - 1.5	mm ²	H03VV-F 2x0.75 mm ² H05VV-H2/F 2X0.75 mm ² H03VV-H2/F 2x0.75 mm ² H05VV-F 2x1.5 mm ²
		20	AWG	

Led wire length

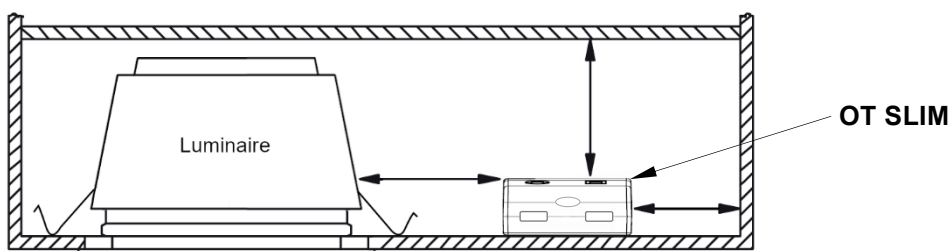
EMI pass verified with wire length of 2 m, from the ECG to the LED module at full load. Wiring longer than 2 m from ECG to LED module is possible, but site installation conditions may interfere with EMI with these longer cables. EMI is therefore not verified in this condition. For longer lengths than 2 m, appropriate cable cross section must be carefully selected to reduce voltage drop.

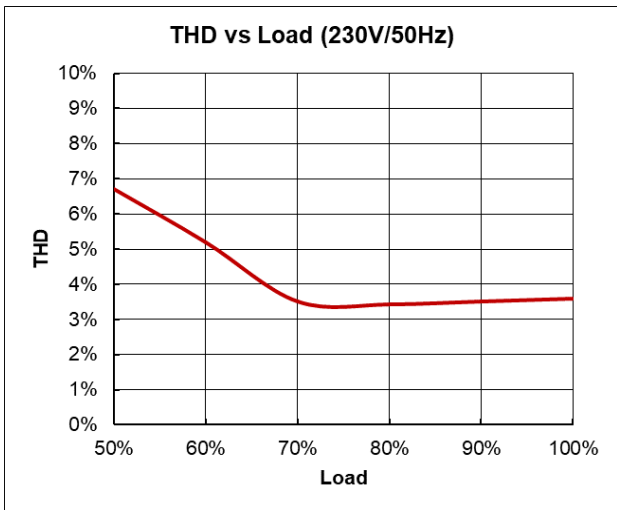
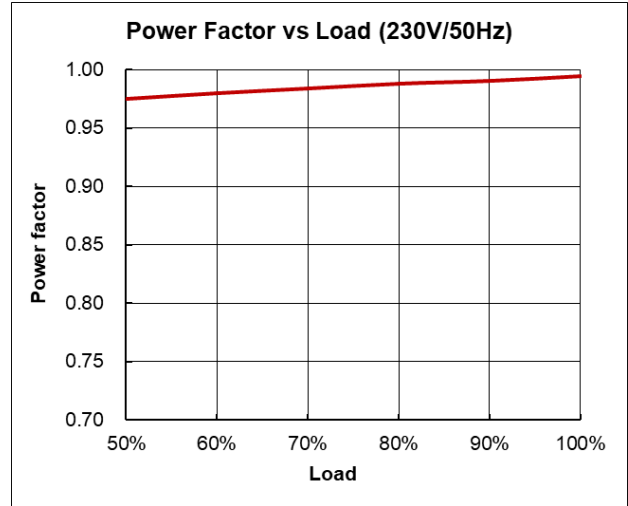
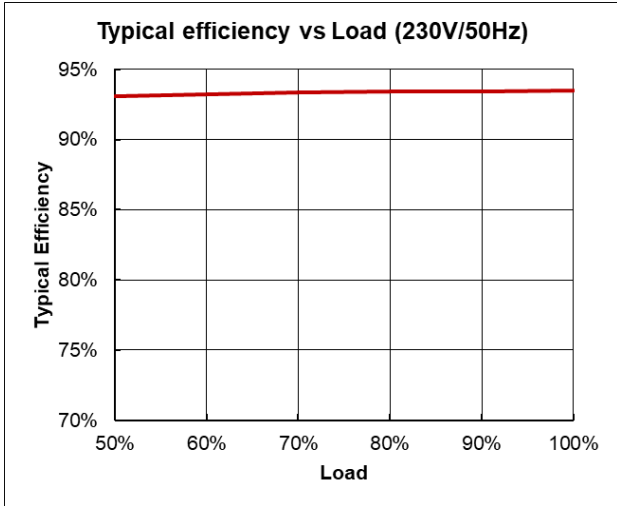
Product drawing



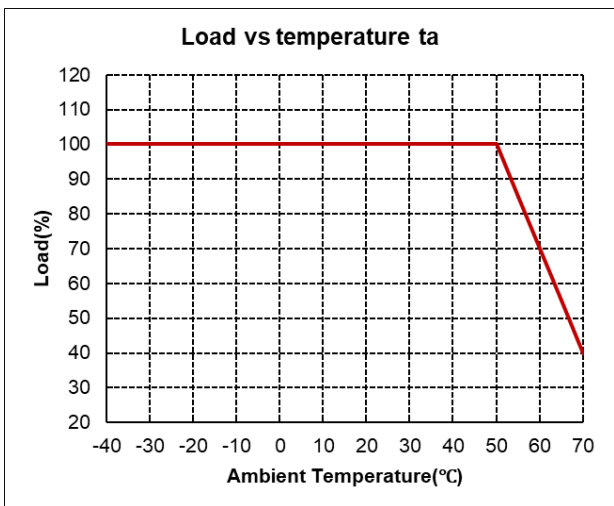
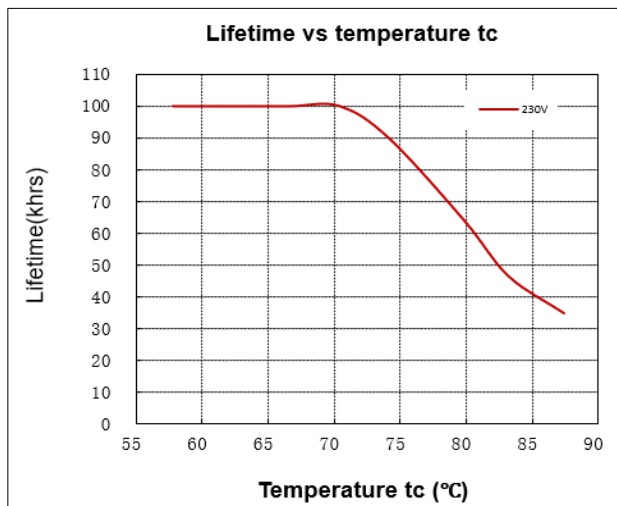
Installation requirements

It is suggested to keep the side and top of the driver at sufficient distance from other surfaces or other devices to avoid overheating.





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Remarks

- **Output short circuit protection:** auto reversible when fault removed
- **Output overload protection:** auto reversible when fault removed
- **Over temperature protection:** the unit is protected against temporary overheating by shutting the unit down, auto reversible when temperature decreases
- **Dimming compatibility:** : the OT SLIM driver is able work with inventronics dimmer as dimmable solution. For example: OTi DALI DIM, OT DMX DIM, OT Wi DIM. It is recommended to check the performance of total system in design-in stage.
- **Application:** the driver is intended for supply power to 24 V LED light sources like – but not limited to – inventronics LINEARlight FLEX® and Tec Flex LED flexible strips, inventronics BackLED® and BoxLED® 24 V modules, inventronics LINEARlight® Rigid FINESSE systems.
- **Use of product under V_{DC}:** EMI filter to be applied by installer if V_{DC} is used, to keep CE approval. ENEC approbation is not valid in DC operation
- **No-load conditions:** hot plug-in or secondary switching of LEDs is not permitted. Please take care to switch the driver off via L.
- Intended for use with LED modules.
- The forward voltage of the LED light source shall be within the defined operating window of the control gear in all operating conditions including dimming if applicable.
- **Ecodesign regulation information:**
Intended for use with LED modules. The forward voltage of the LED light source shall be within the defined operating window of the control gear in all operating conditions including dimming if applicable. Separate control gear and light sources must be disposed of at certified disposal companies in accordance with Directive 2012/19/EU (WEEE) in the EU and with Waste Electrical and Electronic Equipment (WEEE) Regulations 2013 in the UK. For this purpose, collection points for recycling centres and take-back systems (CRSO) are available from retailers or private disposal companies, which accept separate control gear and light sources free of charge. In this way, raw materials are conserved and materials are recycled.

Standards

EN 61347-1

EN 61347-2-13

EN 55015

EN 61547

EN 61000-3-2

EN 61000-3-3

EN 60598-1

EN 62384

Ordering information

Product name	EAN 10	EAN 40	Pieces / Shipping carton
OT SLIM 160/220-240/24	6977770438750	6977770438767	30

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