

## ELEMENT 120/220-240/24 G2

### 24V Constant Voltage LED driver

A simple choice for the decorative lighting, well tested by OSRAM quality standard, fits 24V flex & Signage applications in retails, hotel, restaurants industries etc.

#### Benefits

- Well design for Flex and Signage
- High efficiency up to 89%
- Class II design for wide application
- Excellent price/quality/watt ratio

#### Applications

- Hospitality – decorative lighting, night light
- Restaurants – decorative lighting
- Shops – decorative lighting, shelf lighting
- Residential – cove lighting, under cabinet lighting

#### Approval marks



In preparation, if not already printed on product label



L	260mm
L1	252mm
B	40mm
H	31mm

#### Product Features

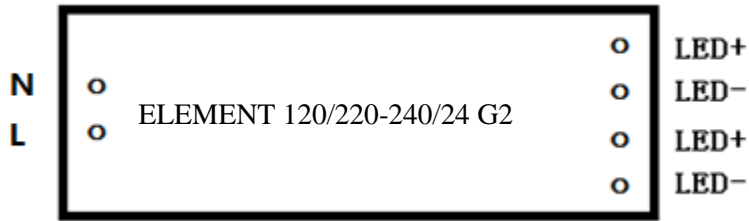
- 24V constant output voltage
- Output power up to 120W
- SELV
- Main voltage 220-240V
- High efficiency up to 89%
- PF>0.95
- Screw terminal
- Cable clamp integrated
- Over load protection
- Over temperature protection
- Short circuit protection
- Suitable for Class I/II luminaires, build-in & independent installation
- Wide Ta range -20 - +50 °C
- 30'000 h @ Tc max
- 3Y guarantee

## Electrical specifications

	Item	Value	Unit	Remarks
Input	Nominal voltage	220 – 240	V	
	Mains frequency	50 / 60	Hz	
	Input voltage AC	198 – 264	V	
	Maximum voltage	280	Vac	2 h maximum, unit might not operate in this abnormal Condition
	Nominal current	0.64	A	At 230 Vac
	Total Harmonic Distortion (THD)	< 15	%	Full load, 230 Vac, 50 Hz / 60 Hz see graphs
	Power factor $\lambda$	0,95		Typical, Full load, 230 Vac, 50 Hz / 60 Hz, see graphs
	ECG Efficiency	89	%	Typical, Full load, 230Vac, 50Hz, see graphs
	Power loss	14.8	W	Full load, 230 Vac, 50Hz / 60Hz
	Power loss in no load condition	<1	W	230Vac, 50Hz typical
	Protection class	II		Suitable for safety class I and II luminaires
	Suitable for fixtures with prot. Class	I / II		
	Inrush current	<32 Apk / 520 us		
	Max ECG no. on circuit breaker 10A	B:5 C:8		
	Max ECG no. on circuit breaker 16A	B:8 C:12		
Max ECG no. on circuit breaker 25A	B:12 C:20			
Output	Nominal output voltage	24	V	
	Voltage accuracy	+/- 3	%	
	Voltage ripple	< 3	%	Ripple / average @ 100 Hz; Full load
	Nominal output power	120	W	Power Factor, Harmonics and EMI TBD W
	Maximum power	120	W	LED output
	Capacitive load	20	uF/A	
	Galvanic isolation	SELV		
	U-OUT	25	V	
ENVIRONMENTAL	Ambient temperature range	-20 - +50	°C	
	Max. temperature at tc test point operation	90	°C	Measured on tc point indicated of the prod label, ta not exceeded
	Max. case temp. in fault condition	110	°C	
	Storage temperature range	-40 - +85	°C	
	Permitted rel. humidity during	5 – 85	%	Not condensing
	Surge capability (L/N)	1	kV	L/N acc to. EN 61547
	Environmental rating	Indoor		
	IP protection class	IP 20		
	Mains switching cycles	> 50'000		
	Expected lifetime	30'000 50'000	h	At tc max with 10% failure rate At tc-10°C with 10% failure rate
	No-load proof	Yes		
	Overheating protection	Yes		Automatically restart
	Overload protection	Yes		Automatically restart
	Short-circuit protection	Yes		Automatically restart
	Dimension	260x40x31	mm	L x W x H
Weight	386	g		
Casing material	Plastic			

**Protections**

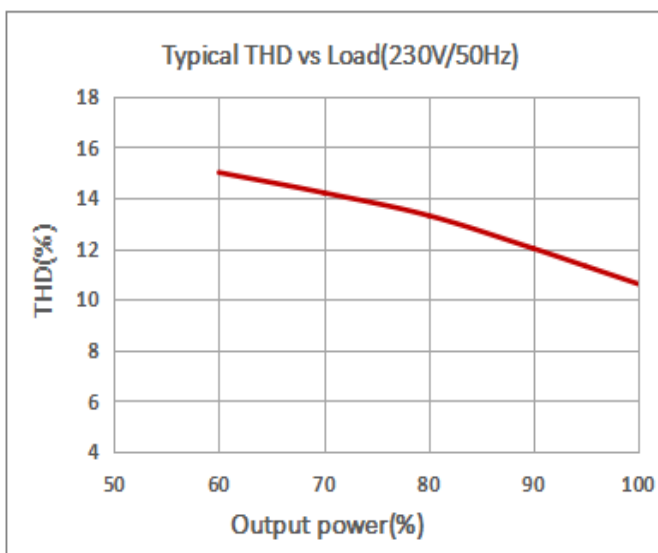
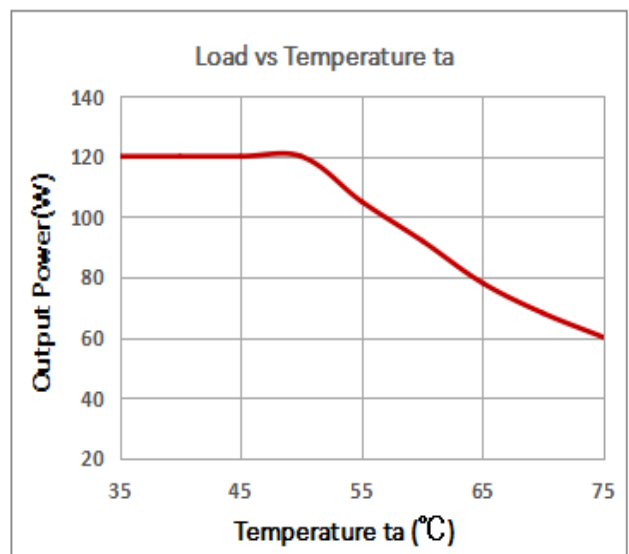
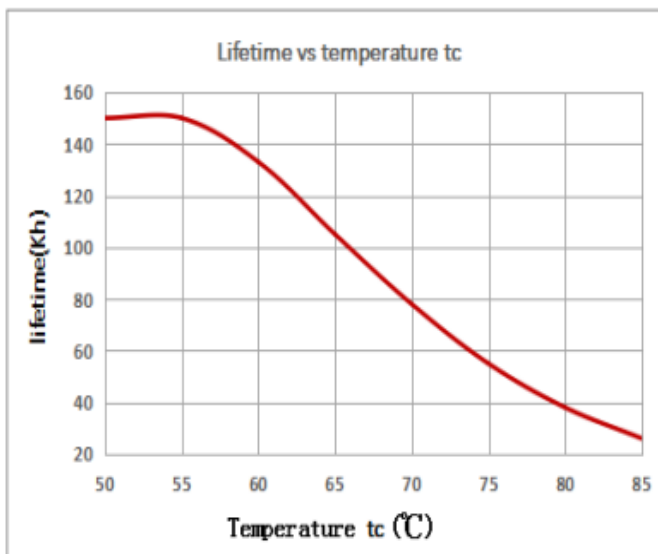
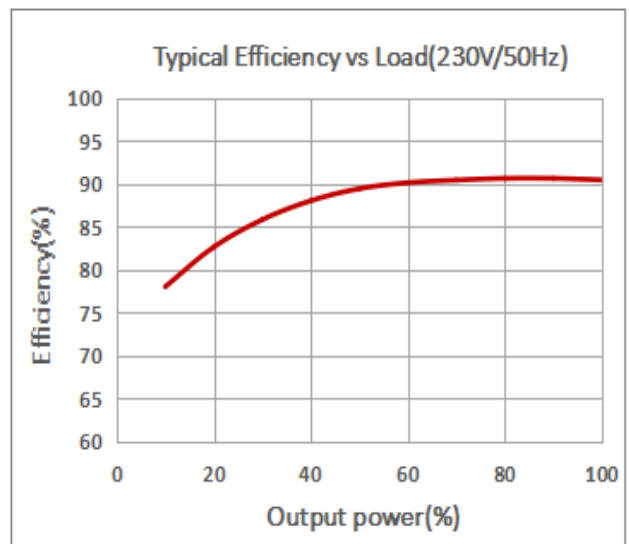
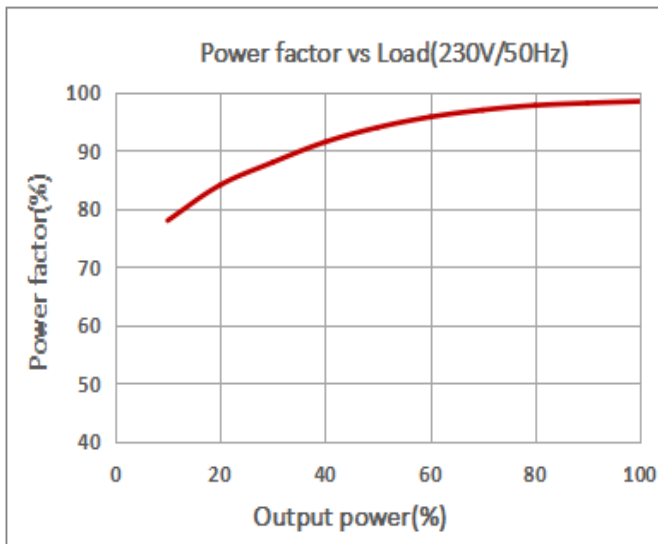
Over temperature, Overload, Short-circuit. Reversible



**Cable and wire preparation**

- Input wires cross section: 0.75 - 1,5 mm<sup>2</sup>
- Output wires cross section: 0.75-1.5 mm<sup>2</sup>
- Wire peeling length: input 5 mm; output 5 mm
- Load wires length: 3 m verified
- Cable recommendation:

H05VVH2-F 2\*0.75mm<sup>2</sup>; H05VVH2-F 2\*1.0mm<sup>2</sup>; H03VVH2-F,2x0.75mm<sup>2</sup>



## 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 shut down the unit, auto reversible when fault removed
- **Dimming compatibility:** The Element driver is able work with OSRAM dimmer as dimmable solution. For example: OTi DALI DIM, OT DIM, OT RGBW DIM, OT BLE DIM. It is recommended to check the performance of total system in design-in stage.

## Ordering information

Product name	EAN 10	EAN 40	Pieces / box
ELEMENT 120/220-240/24 G2	4052899605541	4052899605558	20

## Standards

### Safety:

EN/IEC 61347-1,  
EN/IEC 61347-2-13

### Performance:

EN/IEC 62384

### Harmonic content:

EN/IEC 61000-3-2

Radio interference: CISPR 15

### Immunity:

EN/IEC 61000-3-3

EN/IEC 61547

OSRAM GmbH

### Head Office:

Marcel-Breuer-Strasse 6  
80807 Munich, Germany  
Phone +49 89 6213-0  
Fax +49 89 6213-2020  
www.osram.com

