

## ELEMENT 60/220-240/24 G2

### 24V Constant Voltage LED driver

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

#### Benefits

Compatible with OSRAM 24V Flex and Signage products  
High efficiency up to 88%  
Class II design for wide application possibilities  
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



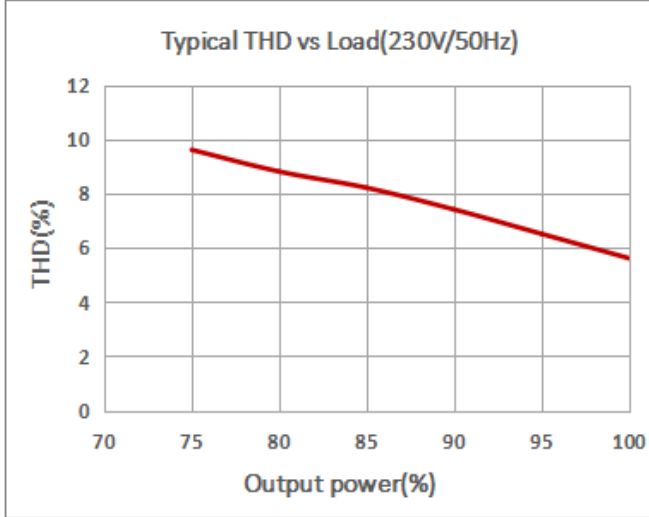
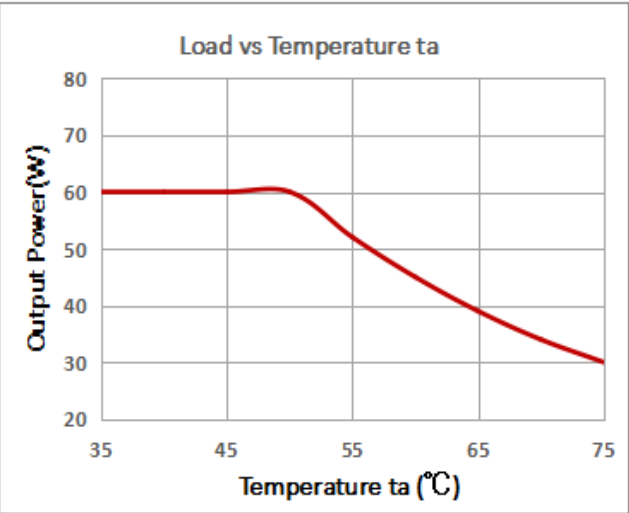
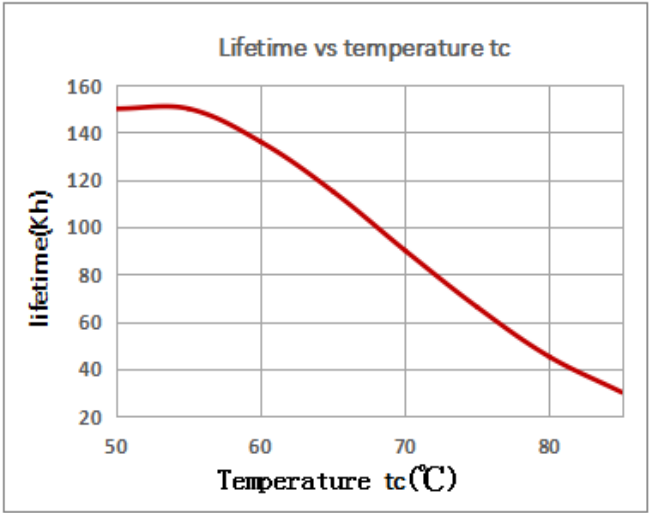
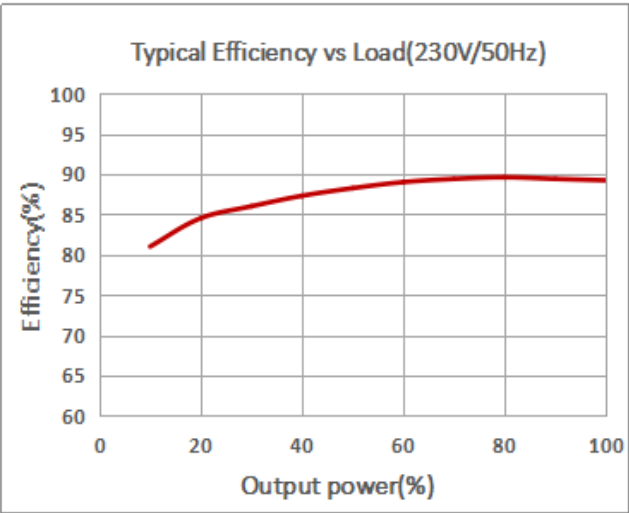
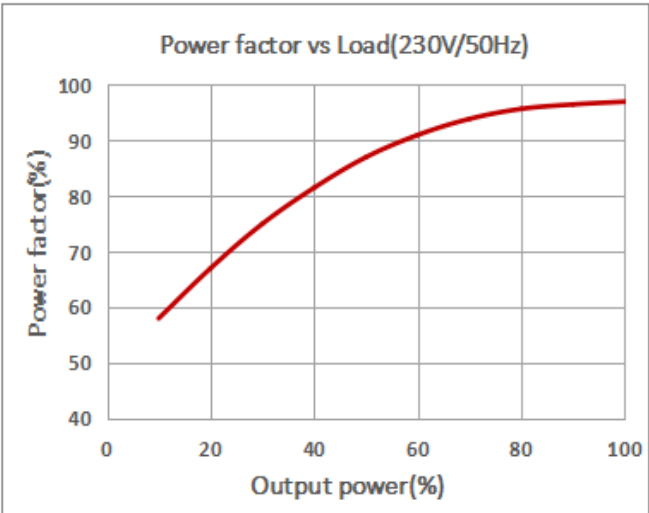
|    |        |                 |
|----|--------|-----------------|
| L  | 200 mm | Length          |
| L1 | 192 mm | Holes interaxis |
| B  | 40 mm  | Width           |
| H  | 31 mm  | Height          |

#### Product Features

- 24V constant output voltage
- Output power up to 60W
- SELV
- Main voltage 220-240V
- High efficiency up to 88%
- PF>0.95
- Screw terminal
- Cable clamp integrated
- Overload protection
- Over temperature protection
- Short circuit protection
- Suitable for Class I / II luminaires, Wide Ta range -20 / +50 °C
- 30'000 h @ Tc max
- 3Y guarantee
- Matching with OSRAM dimmers

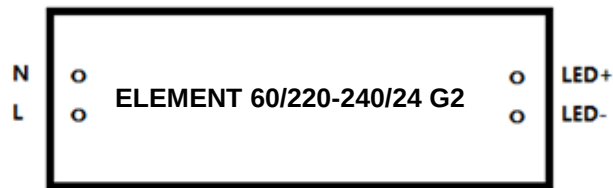
## Electrical specifications

|               | 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                             | 0.31             | A    | At 230 Vac                                                          |
|               | Total Harmonic Distortion (THD)             | < 10             | %    | 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                              | 88               | %    | Typical, Full load, 230Vac, 50Hz, see graphs                        |
|               | Power loss                                  | 8.2              | W    | Full load, 230 Vac, 50Hz / 60Hz                                     |
|               | Power loss in no load condition             | <500             | mW   | 230Vac, 50Hz typical                                                |
|               | Protection class                            | II               |      | Suitable for safety class I and II luminaires                       |
|               | Suitable for fixtures with prot. Class      | I / II           |      |                                                                     |
|               | Inrush current                              | <25Apk / 340 us  |      |                                                                     |
|               | Max ECG no. on circuit breaker 10A          | B:10<br>C:16     |      |                                                                     |
|               | Max ECG no. on circuit breaker 16A          | B:15<br>C:26     |      |                                                                     |
|               | Max ECG no. on circuit breaker 25A          | B:24<br>C:40     |      |                                                                     |
| Output        | Nominal output voltage                      | 24               | V    |                                                                     |
|               | Voltage accuracy                            | +/- 3            | %    |                                                                     |
|               | Voltage ripple                              | < 3              | %    | Ripple / average @ 100 Hz; Full load                                |
|               | Nominal output power                        | 60               | W    |                                                                     |
|               | Maximum power                               | 60               | 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 | 85               | °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<br>50'000 | h    | At tc max with 10% failure rate<br>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                                   | 200x40x31        | mm   | L x W x H                                                           |
|               | Weight                                      | 296              | 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 60/220-240/24 G2 | 4052899605527 | 4052899605534 | 30           |

## 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

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