

8W ALTEA AND ALFA DRIVER DATASHEET



IP 20 SELV          **RoHS**

PRODUCT DESCRIPTION

- Leading and trailing edge dimming LED constant current independent driver
 - $\pm 5\%$ output current accuracy (under maximum load)
 - 90° C Maximum case operation temperature (Tc-point ¹)
 - Reliable, Class II, SELV output according EN 61347
 - Permissible AC cable $0.75-2.5\text{mm}^2$ wire gauge, 3.5~10mm PVC jacket diameter
 - Grow wire tested 650° for 30S and 850° for 5S
 - Operating temperature ¹: -25° C ~ $+45^\circ$ C, the humidity: 20% ~ 85%
 - Over 50,000 hrs nominal lifespan at Tc= 70° C
 - Protection for output open load, short circuits, over voltage and over temperature
 - Five-year factory guarantee and lifetime technical support ¹
- ¹ Detailed data please refer to the "Specification" table .

PARAMETERS

| MODEL | | 8W Triac dimming LED Driver |
|--------|-----------------------------|-----------------------------|
| Output | Output voltage | 30-40V |
| | Rated current | 180mA |
| | Maximum power | 7.2W |
| | Current tolerance | $\pm 5\%$ |
| | Dimming Range | Triac dimming |
| | Ripple voltage ² | 1.02Vp-p |
| | Ripple current | 100mA _{p-p} |
| | Line regulation | $\pm 5\%$ |
| | Load regulation | $\pm 5\%$ |
| | Starting time | <500mS |
| | Turn off time | <1.0S |

| | | | |
|--|---|---|--------------------|
| | Noise ³ | <22dB | |
| Input | Voltage | Rated:220-240Vac; Range:198-264Vac; | |
| | Frequency | Rated:50-60Hz; Range:47-63Hz; | |
| | Power factor | ≥0.9 @ 36V Output voltage | |
| | I-THD ⁴ | ≤20% | |
| | Efficiency ⁵ | ≥80% | |
| | AC current | 80mA max. | |
| | Inrush current ⁶ | 4A | |
| | Inrush current time | 100uS | |
| | Leakage current | <1mA | |
| | ON/OFF switches cycle | >100,000 | |
| | Stand by power | ≤0.5w | |
| Protection | Over current | Constant current limiting, recovers automatically after fault condition is removed | |
| | Over voltage | Shut down output voltage, with auto-recovery or re-power on to recovery | |
| | Over temperature | Shut down output voltage, recovers automatically after temperature goes down | |
| | Short circuit | Constant current limiting, recovers automatically after fault condition is removed | |
| Safety & EMC | Safety standards | EN61347-2-13; Design refer to TUV EN60950-1, TUV EN61347-1 | |
| | Withstand voltage | I/P-O/P:3KVac I/P-FG:1.5KVac O/P-FG: 500Vdc | |
| | Isolation resistance | I/P-O/P, I/P-FG, O/P-FG:100M Ohms/500Vdc/25°C/75%RH | |
| | EMC emission ⁷ | EN55015B, EN55022 Class B, EN61000-3-2, EN61000-3-3 | |
| | EMC immunity | EN61000-4-2, EN61547, EN55024, EN-61000-4-5 Surge immunity Line-Earth: Line-Earth:1KV, L Line- N Line:0.5KV | |
| Environment | Ambient temperature range ⁹ | -25°C ~ +50°C | |
| | Max. case temperature(tc) ¹⁰ | 90°C | |
| | Relative humidity range | 20% ~ 85%RH | |
| | Storage temperature range | -30°C ~ +75°C | |
| Max. No. of PSUS(Driver supply unit) on miniature circuit breaker(MCB) | MCB TYPE B | 10A | 81pcs @ full load |
| | | 13A | 130pcs @ full load |
| | | 16A | 162pcs @ full load |
| | MCB TYPE C | 10A | 93pcs @ full load |
| | | 13A | 150pcs @ full load |
| | | 16A | 187pcs @ full load |
| Others | Dimming control mode | Triac dimming | |
| | Lifetime(hrs)@tc=60°C | >60,000H | |
| | MTBF [MIL-HDBK-217F(ta=25°C)] | 187.2K Hrs min | |
| | Glow wire test | 850°C for 5S; 650°C for 30S | |
| | Dimension L x W x H | 118 x 45 x 25mm | |
| | Warranty years | 5 years | |

"2" Ripple voltage is measured at 20MHz of bandwidth by using a 12" twisted pair-wire terminated with a 100nF & 47uF parallel capacitor.

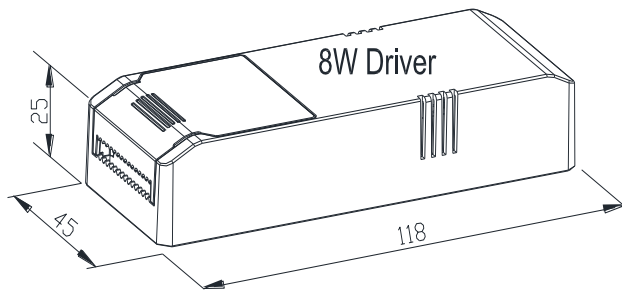
"3" The flicker for frequencies of 200 Hz or below, input voltage 230Vac , at 100% output current level and 20% output current level with dimmer attached, output current ripple is defined as $[(I_{max} - I_{min}) / (I_{max} + I_{min})] * 100\%$, (CEC-400-2016-018-FS, Title 24 part 6 JA8).

"4" The noise of LED driver is defined as test data when driver tested in noise room with 50~60dB environment, and been hang in 1ft

(305mm) inside chamber.

- "5" Rated voltage input, rated output current, maximum output current.
- "6" The typical efficiency is test data of output current at input @230Vac with 36V output voltage, maximum output current.
- "7" The inrush current is test data of 230Vac input, cold start, measured at input current peak.
- "8" The driver is considered as a component that will be operated in combination with final equipment. Since EMC performance will be affected by the complete installation, the final equipment manufacturers must re-qualify EMC directive on the complete installation again.
- "9" For other than independent use, higher ta of the control gear possible as long as highest allowed tc point temperature is not exceeded.
- "10" The tc is defined as the highest permissible temperature which may occur on the outer surface of the power under normal operating conditions and at the rated voltage/current/power or the maximum of the rated voltage/current/power range, refer to "output power vs temperature" section.

MECHANICAL



| Dimension | Gross Weight | Net Weight | Qty/Carton |
|---------------|--------------|------------|------------|
| 320x275x180mm | 9.0kg | 7.6kg | 50pcs |