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INSTRUCTIONS MANUAL

LED MODULE FOR OPERATION IN CONSTANT CURRENT

Type: eLED LINE 3

The eLED modules use sensitive electronic components and should be handled carefully as any other electronic equipment. In order to achieve a long life and correct functioning, it is necessary to follow these manufacturer recommendations.

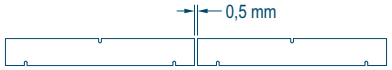
INSTALATION

The module must be fixed into dry and clean surfaces that are free from dust, oil, silicone or other soiling.

Handle eLED products in protected zones against static electricity. (ESD Electro Static Discharge).

eLED modules should be taken by the edges of the printed circuit board, never by the top side where the LED components are. Handling should be done with dissipative and dirt-free gloves, avoiding direct contact with the surface of the LEDs.

Agap between consecutive modules is recommended to facilitate the thermal expansion.



The luminaire must be built in such a way that the eLED cannot be touched by an end-user.

FIXATION

Fixing the eLED LINE 3 module to the luminaire by means of adhesive tape. We recommend the use of the tape 3M™ VHB™ Tape RP25 (F) or similar.

The VHB™ tapes have been put under accelerated aging tests in a climatic chamber, including high and low temperature exposures, humidity andUVradiation, keeping well their adhesion properties.

MAINTENANCE

Maintenance and parts changing must be carried out by qualified people having mains disconnected. Instructions and current regulations must be strictly followed.

It is recommended that IsopropylAlcohol (IPA) must be used as a solution for cleaning the eLED.

Do not use other chemical substances as they may damage the product. These chemical reactions can lead to a change in colour, luminous flux decrease or total failure of the module caused by the electrical connections and the phosphor coating corrosion.

ELECTRIC POWER SUPPLY

eLED modules are not protected against overcurrent and electrostatic discharges.

Any operation at module connection must be made without electrical supply.

Do not apply mains power to the eLED module directly.

The safe and reliable operation of eLED modules can only be guaranteed if the control gear is used in suitable constant current. Operation with a constant voltage LED control gear leads to irreversible damage of the modules.

The suitable constant current control gear must be able to supply the same current or smaller than the maximum current of the module, and the voltage of the assembly formed by these eLED modules is within its range of output voltage.

The supply current value of the module will influence both the module lifetime and its photometric values.

TEMPERATURE

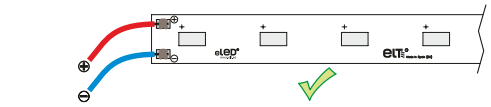
Under no circumstances must the Tc temperature indicated by manufacturer be exceeded, due to the fact that continued operation at higher temperatures produces a progressive reduction in life expectancy and a deviation of the photometric values.

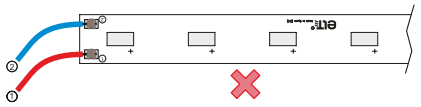
WIRING

To connect the eLED LINE 3 modules to the suitable constant current gear, solder the two wires onto the positive ⊕ and negative ⊖ pads marked at the beginning of the module, respecting polarity. Never start the connection in positions ① and ②.

These pads will be always the input pads for the connection. Never start the connection in ① and ②.

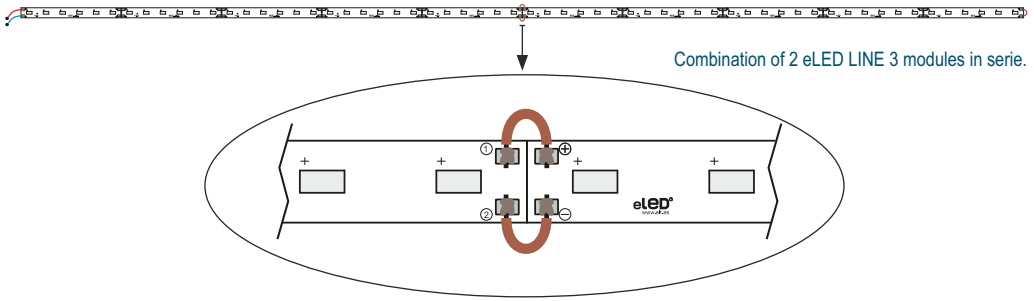
Therefore, the pads where the electric connection to the driver is esta-blished are located to the left of the module, where the correct position of the module is that in which its printing is legible.





In the case of a system with several modules connected, they must be always connected in series and respecting their polarity (positive, negative).

To connect the eLED LINE 3 modules in series, solder the pads at the end of each eLED, ① and ②, with the inputs of the next positive ⊕ and ⊖, by welding. As shown in the following diagram:



To close the circuit, short-circuit the two pads at the end of the circuit by soldering ① and ②.

To cut the eLED LINE 3 modules, do so along the grooved areas every 100mm.