



Document

How to dim LED

There are several ways to Dim and change LED color or intensity depending on LED type and controllers.

Some LED Fixtures come with controllers; in this case you can simply control the controller and not the LED fixture.

The features in this case depend on the LED and its controller capabilities.

List of examples of integrate-able controllers:

1. DMX 48
2. DMX 512
3. DALI
4. 0 to 10 V
5. Smart-Bus
6. Others

There are two types of fixtures:

- 1- NON dimmable LED fixture 110/220 Vac
- 2- Dimmable Ready LED Fixtures 110/220 Vac

Regarding the first type, It requires custom trailing edge Dimmer to be able to control intensity without flickering.

For the second type: it is very simple to dim the dimmable Ready LED fixture types using the conventional 220V leading edge Dimmer and flicker module by S-BUS G4

There are two categories for LED

1- Constant voltage (12Vdc, 24Vdc and rarely 36Vdc):

This is easy to dim directly using the S-Bus LED Driver

2- Constant current (350 mA = 1 watt (Rare), 550 mA = 3 watt (common), 700 mA = 5 watt (old tech))

This requires special drivers or custom trailing edge Dimmers.



Dimmable LED spot

Easily Dimmed using the Leading edge Dimmers

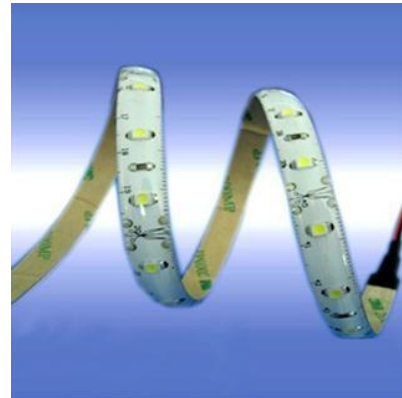


Figure 1 LED strip lights

Runs in DC power, 12Vdc as an example. This is controlled directly by S-BUS G4 LED driver.

