

## L.E.D DRIVER SURGE PROTECTION MODULES CLASS II TYPE MSLC

These Led Driver surge protectors are typically used in Outdoor and commercial LED Lighting, including traffic lighting, Service entrance lighting, flood lighting , tunnel lighting , parking garage lighting, street lighting , roadway lighting, and digital signage. This range is available for Series as well as Parallel connection. and include Thermal disconnect with built in indicators to monitor protection status.

**SAVE YOUR INVESTMENT  
IN LED LIGHTING !!!**



### LED DRIVER SURGE PROTECTOR MSLC Series Connected with built in Indicator MSLC-A

In this arrangement in the event of failure of the surge protection, the monitoring led will go out and the and the Luminaire will be disconnected

### LED DRIVER SURGE PROTECTOR MSLC Parallel Connected with built in Indicator MSLC-B

In this arrangement in the event of failure of the surge protection, the monitoring led will go out and the surge protection will be disconnected . The Luminaire will continue to operate without protection

#### Parallel connected

##### Connection.

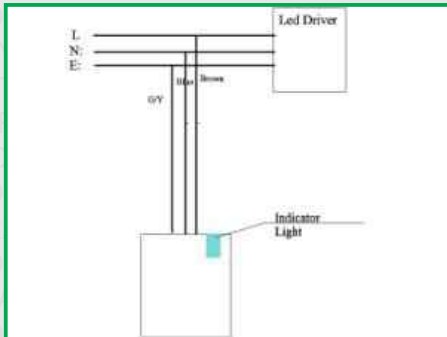
The brown, blue and Green and Yellow wires are to be connected to the mains Live , Neutral and Earth respectively They should be situated where the LED is visible so as to allow replacement as soon as possible

#### Series connected

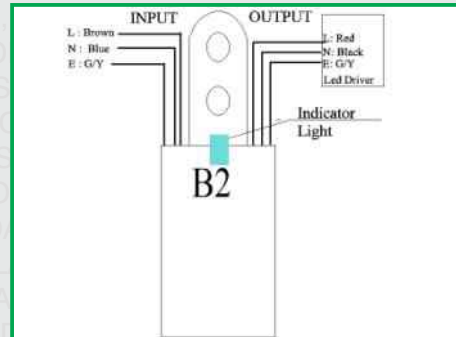
##### Connection.

The brown, blue and Green and Yellow wires are to be connected to the mains Live , Neutral and Earth respectively and the Red , Black and Green and yellow are to be con-nected to the Led Lights or LED driver Live , Neutral and Earth respectively.

The 2 Grey or White wires in the centre are isolated from the mains and can be con-nected as a normally closed switch to control 6 amps for switching or illumination of a fault condition



45/035 for low exposure level



45/034 for low exposure level(6kA) rated current 10A

45/016 for high exposure level(6kA) rated current 10A



Status Indicator or 5A relay contact for remote monitoring, tripping etc



## L.E.D LIGHTING SURGE PROTECTION MODULES WITH ADDED FILTERS MSLB

Due to the fact that most LED Drivers do not have surge suppression between earth ground and any of the input wires due to the effect these have during the hi-pot testing, it has been established that it is more practical to install these devices in the fixture or external to the LED Driver.

The Maximum surge rating required is 10Ka for the high exposure level. These devices are fitted with 4 10KA Varistors and connected so as to improve the differential mode surge capability.



### LED DRIVER SURGE PROTECTOR WITH FILTER

These LED Driver Surge Protectors are additionally fitted with Emi filters containing X and Y capacitors and Specially wound Inductors to eliminate the flickering effect sometimes found when using LED Light dimmers as well as when using emergency generators during blackout periods. They provide additional Surge Protection for Long Term reliability to minimise failure of L.E.D Lighting Systems. In addition they suppress the noise generated causing interference to Electronic equipment and Entertainment systems.

### DIMENSIONS

Rated Current Amps	Housing	Od mm	L mm	Stud mm	Wire Length	Stock Code
5	B2	31.5	43.1	Bracket	185	45/031
10	RS	44	76	M8	185mm	45/003
15	RS	44	76	M8	185mm	45/011
20	RS	44	76	M8	185mm	45/012

### Specifications Type MSLB

Part No	Current Rating in Series (A)	Max Continuous operating Voltage	Clamping Voltage (Max)	Maximum Peak Current (8/20us)
		Ac Rms (V)	Vc(V)	I <sub>max</sub> (kA)
45/031	5	275	710	20 (2x10)
45/003	10	275	710	30 (3x10)
45/011	15	275	710	30 (3x10)
45/012	20	275	710	30 (3x10)

5Amp version



10,15 and 20 Amp version



### INSTALLATION INSTRUCTIONS

Connect the Brown and Blue wires of the Units to the Mains Supply Live and neutral and the Green and Yellow Wire to the Mains Earth.

Connect the Red (Live) and Black (Neutral) wire to the Led Light Circuit Red to Brown and Black to Blue.