

SB-DN-D0403

Leading Edge Dimmer 4Ch 3A

Instruction Manual



Features

4 x 3A Leading Edge Dimming

Suitable for use with incandescent lamps and most types of dimmable electronic transformers, Total box Load is 10 A

Surge Protection

Each module has capacitors and voltage-sensitive resistors for surge protection power line

Green Product

Bus enabled , Powered by 15-32 VDC Consumption 30mA/24VDC

Data line Short Protection

Protection for Bus Power Polarity Change, or connect to data terminal

Broadcast Address Button

To broadcast the Module Address to the Programming software

Life statues LED

LED Indicator, blinking to indicate that Module powered and bus connected

Areas and Scenes

Up to 4 independent areas, each with up to 12 scenes, with Fade time of 0 seconds to 60 minutes

Channel Maximum Level

Low threshold, high threshold and maximum threshold available to suite different loads of each channel.

Single Phase Input 85-260 VAC

1 phase at 10A
Frequency 50/60 HZ
Suitable for 220 / 110 VAC Lighting

Over Heat Protection

Big Heat sink with Built in temp sensor when temp exceed 81±2 C, module will limit output to 80% of original

Overload Protection

Each channel is protected by a replaceable 4 A time delay fuse.

Emergency bypass switch

4 Momentary Button to switch each channel ON/OFF

LED Indicator

To Indicate the Channel statues ON or OFF

Simple Installation

Din Rail Mount, Standard 35mm guide rail mounting, with Elegant Plastic Labeling Tag for Module Name

Sequence Feature

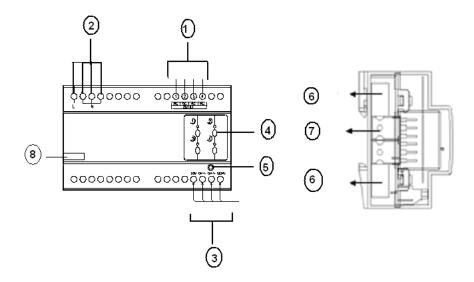
Up to 6 Sequence of 12 steps each 1.0 to 60 minutes With Optional steps times, and Running modes.

Restore Function

Device restored to previous scene or Specific scene after Power Restore to the Module



Layout description



- 1- 1-4: 4 channel output terminal to connect to the Lights Load
- 2- L/N: is input terminal of AC 85V 260 V
- 3- Com, Data-, Data +, DC 24 V 485 S-bus connection terminal.
- 4- Keystroke and indicator light bypass switch to control. 1-4 channels.
- 5- Module broadcast address keystroke and Life statues LED.
- 6- Heat sink
- 7- Temperate Sensor for Over heat Protection
- 8- Labeling Plastic place

Important Notice:



- Safety warning: Please Power OFF before any installation.
- Installation Place: in a dry, well-ventilated damp-proof, shake-proof, and dust-proof location. Controllers may emit some mechanical noise. Take this into account when deciding the mounting location.,
- Input Power: module Load power must be connected via suitable breaker of 10A.
- Output Circuits: The load on a circuit should not exceed the specified per channel capacity of 3 Amps.

- RS485 data cable with four twisted pairs. Connect devices in a 'daisy chain' or "Star". A data cable that is connected to an energized device is live. Do not cut or terminate live data cables.
- Power Sources This device should only be operated from the S-Bus Power supply.
- Regularly check: test the circuitry and other related circuit or cables and replace the disqualified on time.
- **For Maintenance**: Please contact Qualified Person.



Installation Steps

- 1. Mount the device on a DIN rail inside an approved enclosure.
- 2. Calculate loads to ensure any channels are not overloaded, and then connect loads to the output channels. The maximum loading of this device is as follows: Maximum channel load: 3 Amps Maximum device load: 10 Amps
- 3. It is recommended to Put Fast Fuse Extra Protection of 4 A between the Load and the channel output.
- 4. Connect a single phase 10A with suitable breaker to feed to the supply terminals.
- 5. Connect data cables to the device as per diagrams below.
- 6. Insert the Labeling Sticker of Module Name on the Plastic Labeling Place
- 7. This device will only operate in basic modes unless programmed via a computer.. Once the data cable is connected to the devices, the factory default settings will allow any control panel to operate all channels in all controllers, If programming is required, contact your local agent for details, or see the *S-Bus Lighting Motor and HVAC Programming Guide* e-Book for more Details.

Recommended Wiring:

- Module power input cable: 2.5mm² Electrical copper wire
- Load output wire: 2.5mm² Electrical copper wire
- 485 BUS connection cable: Cat5e

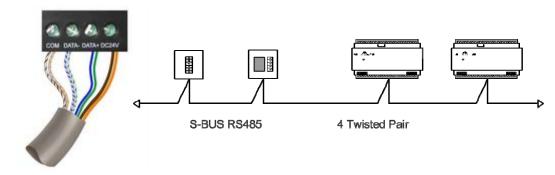
Recommended cable color coding

COM → Brown white, Orange white

Data - → Blue white, Green white

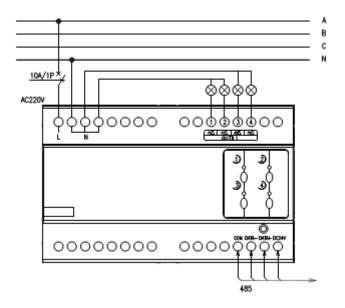
Data + → Blue, Green

DC24V → Brown, Orange





Load Connection



Product specifications

Load Supply input: 85 - 260V 50/60Hz Single Phase at 10A

Power consumption: 30mA/24V

Control Outputs: 4 x Leading Edge dimmed outputs at 3A. Maximum device load of 10A

Overload Protection: Each channel protected by a 4A time delay fuse **Control Inputs:** 1 x RS485 S-Bus, Module Powered by Bus connection

Working Ambient Temperature: -10° to 45°C, Ambient Humidity, 20% to 85% RH

Storage Temperature: -20° to 60°C, Ambient Humidity, 20% to 90% RH

Dimensions: W 144mm× H 88mm× D 66mm

Packed Weight: 0.56Kg

Smart-HDL, China. Guangzhou , NO.24 Jianzhong Road, Tianhe Development Zone of High & New Technology Estate, Guangzhou, 510665, Tel: +86 20 8552 1566 Fax: +86 20 8552 3252 Digitcom Technology Canada, ME office UAE. Dubai , Sheikh Zayed Road , Smarthome and Showtime Building Next to Villa Rotana Hotel . Mezzanine floor M-06, M07, M08 , P.O.Box 31255, DUBAI, UAE , Tel: +9714-3431323 Fax: +9714-3431939 www.smart-hdl.com