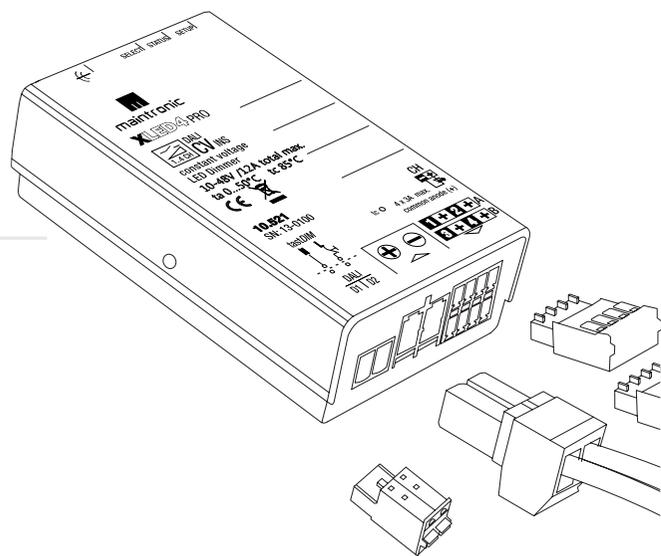


XLED4 CV DALI

DALI LED-Dimmer 4CH 10-48V INS

Art.Nr. 10.521

Installation guide EN

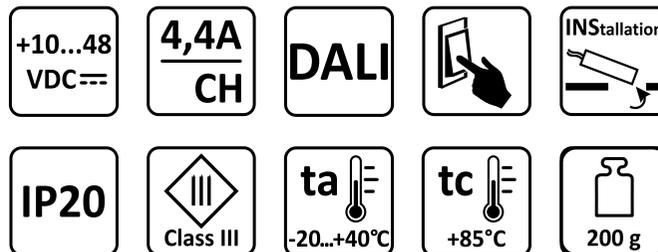


Hardware:	H3c	Firmware:	F1.1.3
Document:	10521_IN_en_XLED4CVDALI_20200131		



1. Functions and features

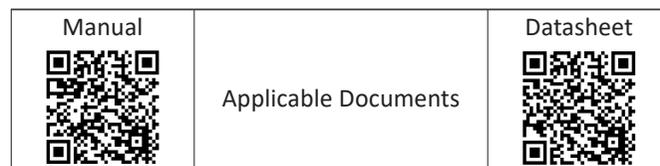
- PWM LED-Dimmer for constant voltage LEDs
- 1-4 Outputs, common anode (+)
- Output current: 4,4A | CH, 17,6A max.
- Operation modes: Tuneable white, RGB+W, 1...4CH
- Control: Casambi, DALI / PushButton
- Plus Features: variable Fade-Time, Soft-Off, Dimm-Speed



2. Intended use

For brightness control of 1 to 4 channel LED strips in conjunction with a suitable constant voltage power supply. Can be controlled with Casambi and DALI parallel to each other.

- Only approved for indoor use
- Installation in wall, ceiling, cavity, switch boxes or alternatively with enclosed bracket on DIN rail



3. Installation

ATTENTION: Do not cover the device to avoid overheating. Minimum distances of 25mm when mounting must be ensured for an air exchange. A sufficient distance to flammable materials is necessary.

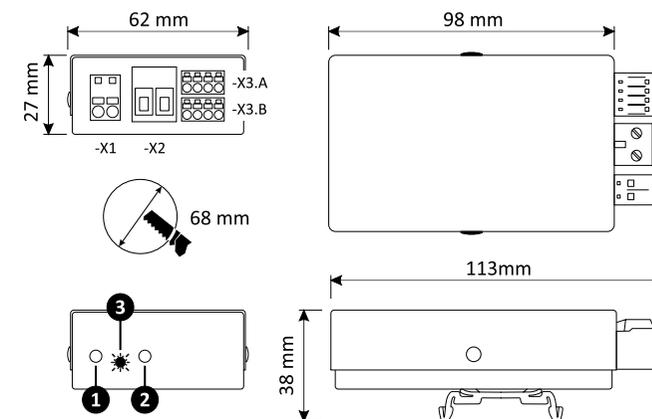


Fig. 1 - Housing dimensions and connections

The scope of delivery includes DIN rail brackets. Press the locking lugs (a) into the holes on the back of the device and engage.

Indentation (b) must face outwards in order to be able to apply a screwdriver when disassembling.

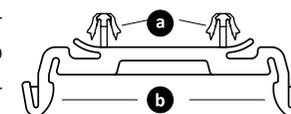


Fig. 2 - DIN rail brackets

4. Bedienelemente und Anzeigen

Siehe Abbildung 1

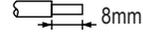
1	SETUP-button	Manual dimming
2	SELECT-button	Channel selection
3	Status-LED	

5. Connections

ATTENTION: Disconnect the mains voltage before connecting LEDs.

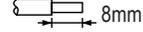
5.1 DALI (-X1)

For connection to a DALI bus (DA; DA)

 0,2...2,5mm² fine/ single-wire  8mm

5.2 Power supply (-X2)

The dimmer is powered by a constant voltage power supply (pulse-proof and voltage-stable) 10-48V DC, with at least 20% higher power than the rated power of the connected LEDs.

 0,2...4mm² fine/ single-wire  8mm

ATTENTION: The device is equipped with a protection against reverse polarity. Pay attention to the correct connection of positive and negative pole, otherwise the unit is shut down for safety reasons and must be returned for repair to the manufacturer.

5.3 Outputs LED (-X3)

Connection for LED-Stripes with common anode (+).

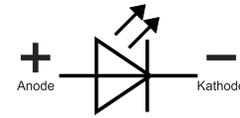
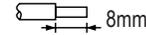


Fig. 3

 0,2...1,5mm² fine/ single-wire

 8mm

5.3.1. Application with 4 independent outputs

- Each channel match with one DALI short address (DT 6).
- The max. current consumption per color is 4,4A.

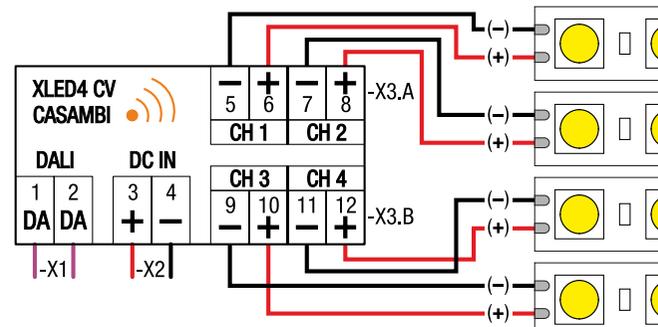


Fig. 4 - Independent Outputs

5.3.2. Application as RGB+W light

- Bridge positive poles (pins 6,8,10,12)!
- The max. current consumption per color is 4,4A.
- Each color match with one DALI short address (DT 6).

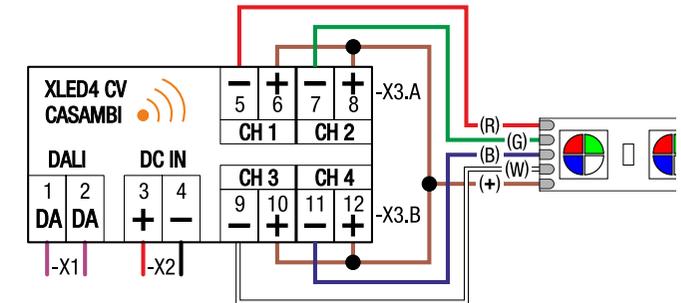


Fig. 5

5.3.3. Channel-Link (bundled channels)

For tuneable white, 1- or 2-channel operation, the outputs must be bridged. These bridges add up the maximum connected load per color.

Step by step:

1. Restore to delivery state (RESET)
2. Bridge outputs
3. Connect LED's at the linked channel
4. Select a profile proper profile for 1, 2 CH or TW

After the power-on, the outputs are getting measured. If channels are physically bridged, the dimmer recognizes and sets a channel link on these channels.

ATTENTION: For a channel link, the total load of the bundled channels must be over 4.4A (= max. Power of an individual channel). Its not allowed to link channels below a total output of 4.4A.

5.3.4. Application as a tunable white light

- Bridge positive poles (pins 6,8,10,12)!
- Bridge minus poles (pins 5,7 and pin 9, 11)!
- The max. current consumption per color is 8,8A.
- Tunable white match with one DALI short address (DT 8).

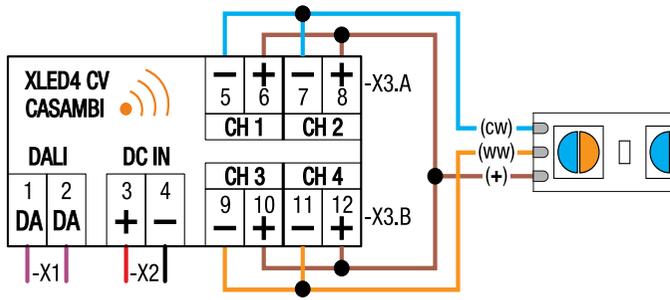


Fig. 6 - 2 CH TW

5.3.5. Application with 2 independent outputs

- Bridge positive poles (pins 6,8,10,12)!
- Bridge minus poles (pins 5,7 and pin 9, 11)!
- The max. current consumption per color is 8,8A.
- Each color match with one DALI short address (DT 6).

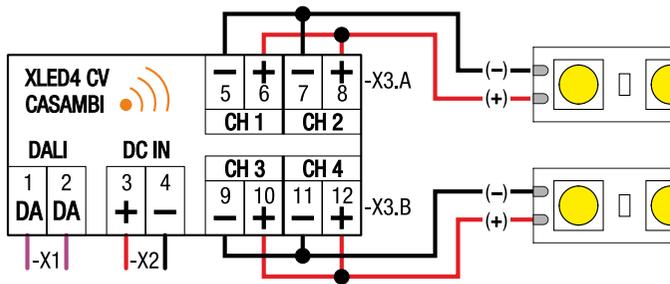


Fig. 7 - 2 CH DIM

5.3.6. Application with 1 Output

- Bridge positive poles (pins 6,8,10,12)!
- Bridge minus poles (pins 5,7 and pin 9, 11)!
- The max. current consumption is 17,6A.
- Application matches with one DALI short address (DT 6).

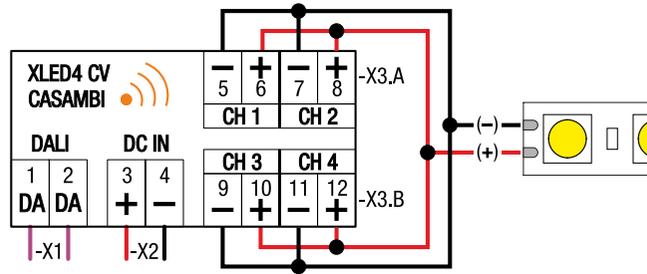


Fig. 8 - 1 CH DIM

6. Control

6.1 Control with DALI

The dimmer is equipped with a DALI interface and works according to the DALI standard.

For detailed information, please refer to the document „Building automation manual“.

6.2 Control with SELECT-Button

Functions SELECT-Button	keystroke
Channel selection (starting with channel 1 or the first linked channel group) for manual dimming with SETUP-Button. Confirmation through a flashing STATUS LED	1...4 x short press select CH 1-4 or channel group (Channel-Link)
Physical selection over DALI Procedure for physical selection: 1. Select DALI command „PHYSICAL SELECTION“ 2. Press the SELECT button once (select channel 1) 3. Press again to select the next channel (or linked channel group), after channel 4 channel 1 starts again 4. Confirmation through a flashing STATUS LED	1...4 x short press select CH 1-4 or channel group (Channel-Link)
Factory Reset Es erfolgt eine Rücksetzung aller Parameter in den Auslieferungszustand. Ein erfolgreicher Reset wird durch die Status LED signalisiert. All parameters are reset to delivery state. A successful reset is confirmed through a flashing STATUS LED.	10 sec. press and hold
! Start a reset within 30 min after the POWER_ON.	

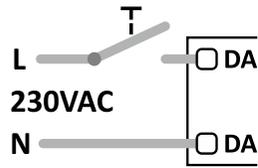
6.3 Control with SETUP-Button

Operation with the SETUP-Button is always possible and has a higher priority than a DALI telegram.

Functions SETUP-Button	keystroke
Switch On- / Off	short press
Dimming Up and Down (Start at Min Level)	long press
Switching to Max Level	2x short press

7. 230V PushButton input (**)

It's possible to alternatively use the DALI input as a PushButton input. Therefore the mains voltage (L and N) must be connected to the DALI-contacts. All channels respond together and the dimming is equal.



IMPORTANT - When using the DALI input as a 230V pushbutton input, its not allowed to connect another DALI operating device in the same circuit, due to 230V is present!

(**) Push button 230V towards N at the DALI input (not SELV)!
Several push buttons possible in parallel, and several devices with a 230V PushButton input can be operated in parallel.

Functions with external PushButton	keystroke
Switch On- / Off	short press
Dimming Up and Down (Start at Min Level)	long press
Switching to Max Level	2x short press
Synchronization of the connected devices	10 sec. press and hold

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