## 0-10V to DALI Converter

Datasheet Interface

Module for the control of a DALIline with analogue 0-10V signals

Art. Nr. 86468353-1-HS (1 channel) Art. Nr. 86468353-2-HS (2 channels) Art. Nr. 86468353-3-HS (3 channels)



## 0-10V to DALI Converter Interface

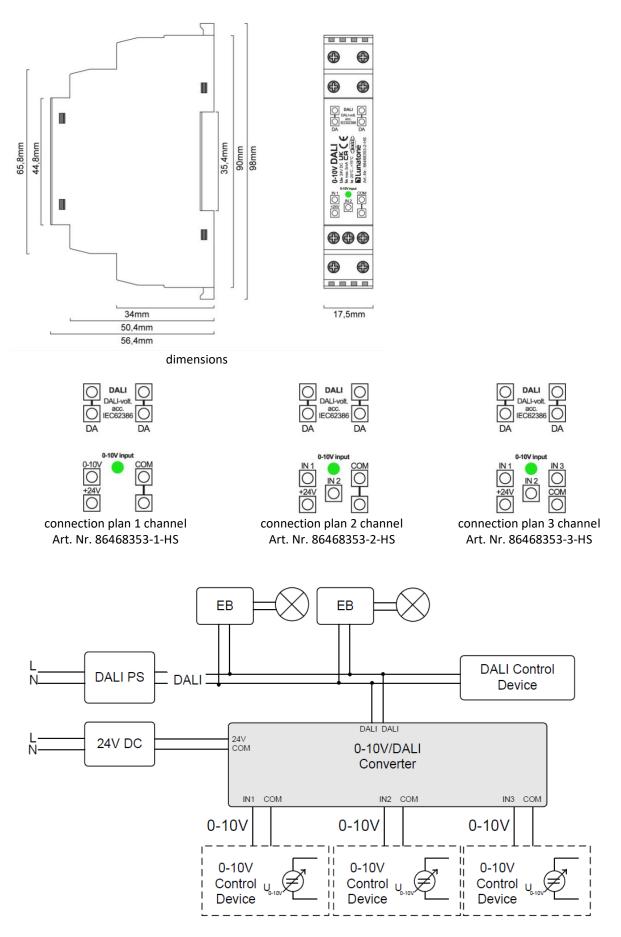
#### Overview

- Small interface module for the conversion of 0-10V control signals to DALI dim levels
- Devices with 1, 2 and 3 channels available
- The 0-10V voltage is transformed to a a DALI dim level and DALI-command Off and sent to the defined effective range on the DALI line
- A change on the 0-10V input voltage (<1%) is used as event trigger
- Supply voltage 12V to 24V DC (e.g. 24V/300mA Art.Nr. 24166012-24HS), multiple devices can be supplied by the same supply voltage

- Configuration of effective range and conversion characteristic (conversion curve and behaviour below 1V input voltage) via DALI-Cockpit and DALI-USB-interface
- Passive input: the module does not supply any voltage to the input, suitable for control with a 0-10V analogue signal (e.g. Siemens LOGO)
- External DALI power supply (e.g. DALI PS) required, multiple devices can be connected to the same DALI-line
- Galvanic isolation between DALI-Bus and 0-10V input respectively 24Vsupply voltage

#### Specification, Characteristics

Туре	0-10V to DALI Converter				
article number	86468353-1-HS	86468353-2-HS	86468353-3-HS		
Electrical data:					
supply		12V-24V DC			
typ. input current 24V		5mA			
input	1x 0-10V / 0,1mA	2x 0-10V / 0,1mA	3x 0-10V / 0,1mA		
output		DALI	•		
Function	converter, function configurable via DALI				
Technical data: storing and transportation temperature		-20°C +75°C			
operating ambient temperature		-20°C+75°C			
protection class		IP20			
connecting wire cross section	up to 2.5 mm <sup>2</sup>				
mounting	Din rail				
dimensions	1TE, 98mm x 17.5mm x 56mm				



typical installation 3channel 0-10V to DALI converter

#### Installation

- Supply: 12V-24V DC (e.g., 24V/300mA Art.Nr.: 24166012-24HS)
- Galvanic isolation between DALI and 0-10V input / supply
- The 0-10V input voltage has same potential as the supply voltage
- the connection to the DALI-line is polarity free, the DALI-line is powered by an external DALI power supply

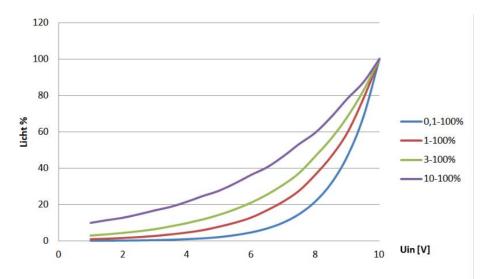
#### Default Settings and Configuration

• After connecting the device it is ready to use, dependent on the type different factory default settings apply:

Туре	1 channel (86468353-1-HS)	2 channel (86468353-2-HS)	3 channel (86468353-3-HS)
Effective Range	Broadcast	channel1: G0	channel1: G0
		channel2: G1	channel2: G1
			channel3: G2
Dimming range		1%-100%	
Behaviour for input voltage below 1V		OFF	
Fade Time		0.7s	

• Changes on the default settings can be done with the help of the DALI-Cockpit:

#### 0-10V / DALI conversion



Light level of a DALI-ballast connected to the converter (corresponding to IEC62386-102). The light values in% are to be seen in connection with a DALI control gear.

#### **Conversion Characteristic:**

The input voltage in the range of 1V-10V is converted into DALI dimming levels.

The figure above shows the characteristics for the different dimming levels (0.1% - 100%, 1% -100%, 3% -100%, 10% -100%). The light values in % are to be seen in connection with a DALI control gear. In the DALI-Cockpit the following parameters can be changed:

#### Light Level Range:

0.1%-100%, 1%-100% or 10%-100%

#### **On/Off-Behaviour:**

the behaviour below 1V input voltage: DALIcommand OFF or RECALL MIN

Name 3x0-1	IOV to DA	LI Article Number	86468353-3-HS	Firmware Ver 0.
Manufacturer Luna	tone	Serial Number	3	
DALI Device Type N/A		Short Address	eA2 ~	Set
Channel 1 Channel 2	Channel	3		
Destination Addresses				
1: Group	~ 0	iroup 0 (G0)	~	
2: none	~			
3: none	~			
4: none	~		~	
Input Function:				
1%-100% conversion		~		
Low Voltage Behavior:				
OFF below 1V	~			
Fade Time				
[1] 0.7 sec	~			

Cockpit Settings Overview

#### **Purchase Order Information**

**Art. Nr.: 86468353-1-HS:** 1 channel 0-10V to DALI Konverter, conversion of a 0-10V analog voltage to a DALI dim level, input passive, 24V DC supply, input and supply electrically isolated to DALI-line, suitable for external DALI power supply, din rail

**Art. Nr.: 86468353-2-HS:** 2 channel 0-10V to DALI Konverter, conversion of a 0-10V analog voltage to a DALI dim level, input passive, 24V DC supply, input and supply electrically isolated to DALI-line, suitable for external DALI power supply, din rail **Art. Nr.: 86468353-3-HS:** 3 channel 0-10V to DALI Konverter, conversion of a 0-10V analog voltage to a DALI dim level, input passive, 24V DC supply, input and supply electrically isolated to DALI-line, suitable for external DALI power supply, din rail

Art. Nr.: 24166012-24HS, 24VDC/300mA power supply, dinrail, 1TE

## Additional Information and Equipment

DALI-Cockpit – free configuration tool from Lunatone for DALI systems http://lunatone.at/de/dali-systeme/software/

Lunatone DALI products http://www.lunatone.at/de/

Lunatone datasheets and manuals <a href="http://lunatone.at/de/downloads/">http://lunatone.at/de/downloads/</a>

#### Contact

Technical Support: <a href="mailto:support@lunatone.com">support@lunatone.com</a>

Requests: sales@lunatone.com

www.lunatone.com





#### Disclaimer

Subject to change. Information provided without guarantee. The datasheet refers to the current delivery.

The compatibility with other devices must be tested in advance to the installation.