net4more comMODULE Thread DALI

Wireless comMODULE for net4more system

Product description

- Wireless communication module as a building block of the net4more system
- Robust, self-healing mesh network
- Integrated DALI power supply
- Enables integration of DALI LED drivers into the net4more system
- 2 channels for direct / indirect luminaires, floor lamps or lighting strip solutions
- Up to 10 DALI devices on 2 DALI broadcast channels (max. 5 DT6 Driver per channel)
- DALI channel 1 can be used as a momentary-action switch input
- Sensor interface enables energy savings through daylight control / presence detection and additional notifications of room use
- Suitable for luminaire installations or ceiling installations
- Uses the above 2.4 GHz wireless standards 6LoWPAN and Thread
- net4more articles are part of the net4more toolbox consisting of hardware and software and can be ordered with the system via your local sales team
- 5-year guarantee

Standards, page 4

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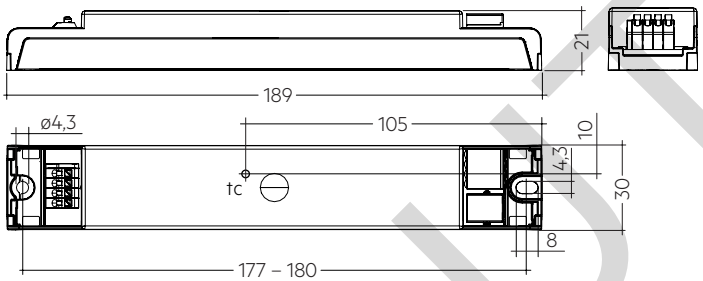
Technical data

Rated supply voltage	220 – 240 V
Mains frequency	0 / 50 / 60 Hz
Typ. current	0.03 A
Power consumption	6.9 W
Wireless range indoor / outdoor	up to 10 m / 100 m
Max. DALI wiring length	20 m
Max. DALI output current per channel	15 mA
Operating temperature	-25 … +60 °C
tc point	67 °C
Storage temperature	-40 … +80 °C
Dimensions L x W x H	189 x 30 x 21 mm
Type of protection	IP20



Ordering data

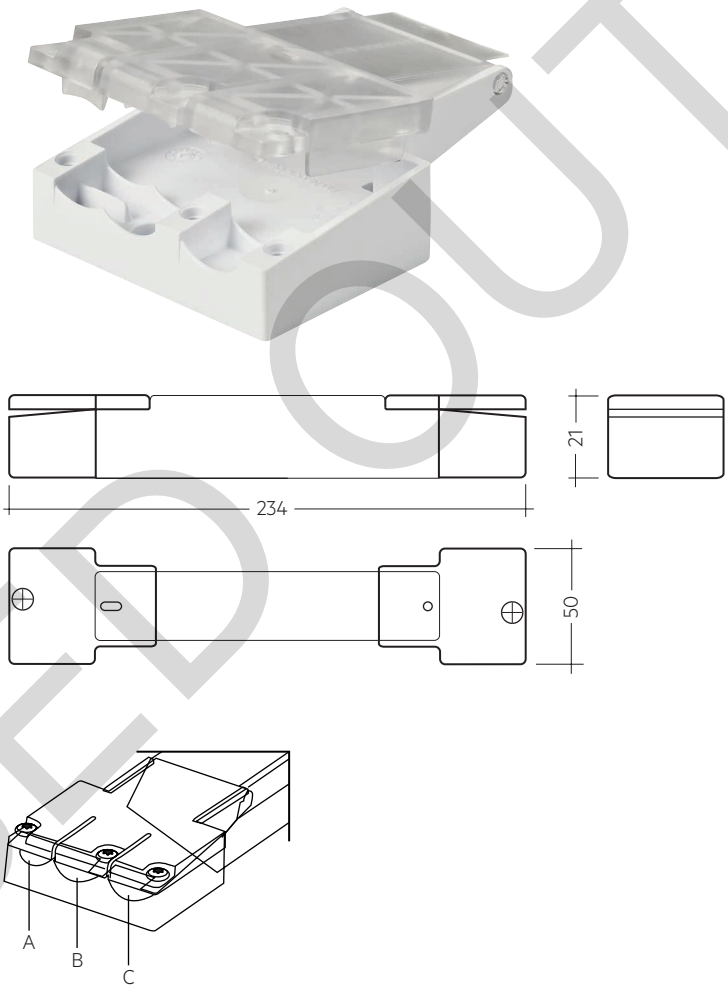
Type	Article number	Packaging, carton	Weight per pc.
net4more comMODULE Thread DALI	**28002382**	100 pc(s).	0.082 kg

ACCES-SORIES

Strain-relief set

Product description

- Strain relief for up to 3 cables suitable for cable with diameter from 2.5 up to 9 mm
- A: 2.5 – 5 mm diameter
- B: 5 – 9 mm diameter
- C: 5 – 9 mm diameter
- 5-year guarantee



Ordering data

Type	Article number	Packaging carton
Strain-relief set	**28000881**	10 pc(s).

1. Standards

EN 50364
EN 55015
EN 55024
EN 55032
EN 61347-2-11
EN 61547
EN 62311
EN 301 489-1 V2.2.0
EN 301 489-3 V2.1.1

1.1 Glow wire test

according to EN 61347-2-11 with increased temperature of 850 °C passed.

2. Common

2.1 net4more comMODULE Thread DALI

This communication module has an integrated DALI power supply.
This makes it easy to integrate existing retrofit luminaires or new luminaires with DALI LED drivers into the net4more system. The communication module is supplied with mains voltage. It has 2 DALI channels and a un:c input. Via the un:c input, luminaire installation sensors or surface-mounted sensors can be connected in order to save energy or receive notifications about room use.

3. Thermal details and life-time

3.1 Expected life-time

Expected life-time						
Type	**ta**	**30 °C**	**40 °C**	**50 °C**	**55 °C**	**60 °C**
net4more comMOD Thread DALI	tc	40 °C	50 °C	60 °C	64 °C	67 °C
	Life-time	>100,000 h	>100,000 h	88,000 h	60,000 h	44,000 h

The device is designed for a life-time stated above under reference conditions and with a failure probability of less than 10 %.

4. Interfaces / communication

4.1 un:c interface

Parameter	Value
Output voltage	5 V
Min. output voltage	4,2 V
Max. output voltage	5,5 V
Max. output current	400 mA
Max. cable length①	1.5 m
Bus frequency	100 / 400 kHz
Devices per bus	5

① The max. cable length corresponds to the sum of all lines in un:c interface.

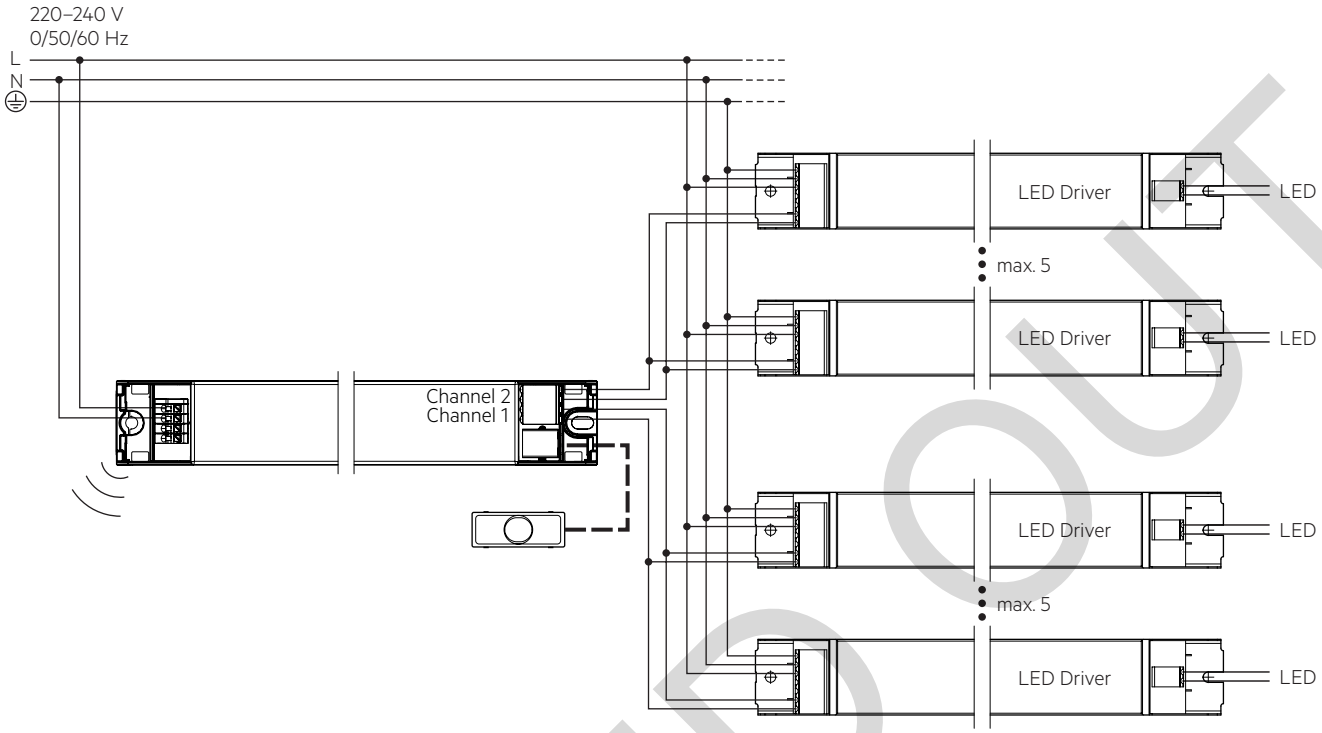
4.2 un:c interface / RJ10

The connection between communication module must be done via a straight through un:c interface cable.

un:c (RJ10)	
pin 1	STR
pin 2	5V
pin 3	GND
pin 4	SCL

5. Installation / wiring

5.1 Wiring diagram



Caption:

LED / mains

un:c

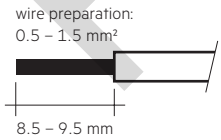
5.2 Installation note

Max. torque at the clamping screw: 0.5 Nm / M4.

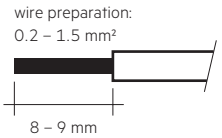
To ensure a good radio connection, do not cover the comMODULE completely with metal!

5.3 Wiring type and cross section

Mains supply wires
The wiring can be in stranded wires with ferrules or solid with a cross section of 0.5–1.5 mm² (14–22 AWG).
Strip 8.5–9.5 mm of insulation from the cables to ensure perfect operation of the push-wire terminals.
Use one wire for each terminal connector only.
Use each strain relief channel for one cable only.

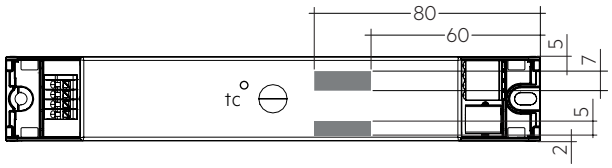


DALI wires
The wiring can be in stranded wires with ferrules or solid with a cross section of 0.2–1.5 mm² (14–24 AWG).
Strip 8–9 mm of insulation from the cables to ensure perfect operation of the push-wire terminals.
Use one wire for each terminal connector only.
Use each strain relief channel for one cable only.



5.4 Placement

The device has two integrated antennas for easy integration.
In order to maximize the range in every direction some design guidelines should be taken into consideration when mounting the device.
The antennas are located at the top of the housing.
When the device is mounted on a metal plate (e.g. frame of a luminaire), it may efficiently block the radio frequency signal. In this case, a cut-out underneath the antenna may be needed for the RF signal to exit the structure. The cut-out area should be as large as possible. Also the device should be placed as far away from any vertical metal structures as possible.



Antenna locations

The range of the communication signal is depending on the environment e.g. luminaire, construction of the building, furnitures or humans and needs to be tested and approved in the installation.

To ensure a good radio connection, do not cover the device completely with metal!

6. Miscellaneous

6.1 Additional information

Additional technical information at www.tridonic.com → Technical Data

Guarantee conditions at www.tridonic.com → Services

Life-time declarations are informative and represent no warranty claim.
No warranty if device was opened.