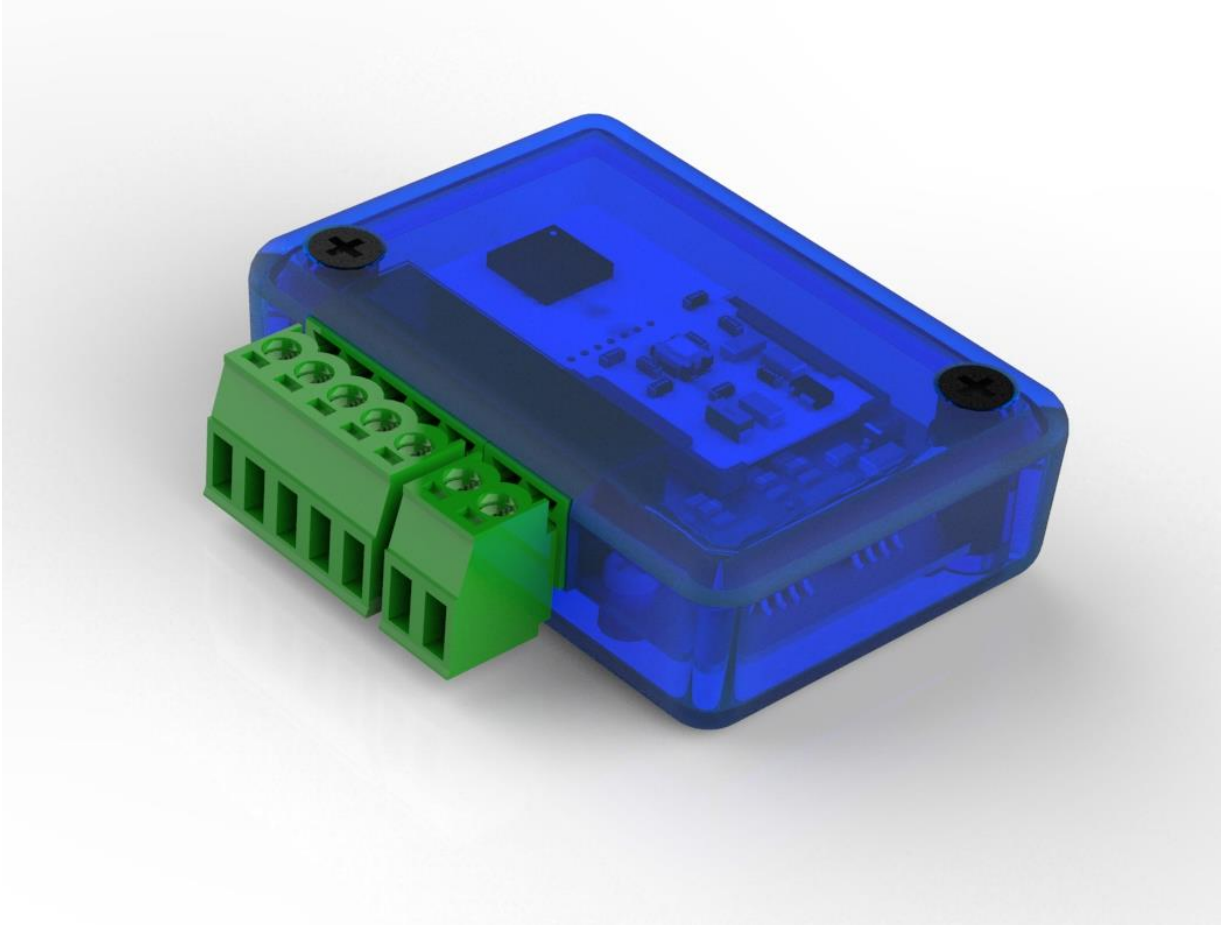
BLUEMITY HM

Instrucion manual



BLUEMITY HM

Please read this manual carefully and keep it in a save place!

1. Introduction

Bluemity is an advanced LED driver. It consists of up to 4-channels and can be controlled via Bluetooth from almost any tablet or smartphone with Android (4.4+) or iOS (7.0+) operating system.

Bluemity was designed so that sophisticated illuminations in the field of decoration and wellness can be attained even without programming. The unit is equipped with various colour effects by default such as: colours, calming colour changes, even show effects. Several **Bluemity** devices can be controlled successively via intuitive app, but only individually. Operating range depends on the environment and position of the device.

2. Usage

Drivers were designed for indoor use in dry places. The LEDs might also be used in wet environments or outdoors if additional protective housing is used. Drivers must be operated with a power supply that is matched to the used LEDs! Non-LED loads (especially inductive loads like motors, coils, etc.) might damage or destroy the driver. If any of the before mentioned points is not observed short circuit or electric shock might occur. In such cases guarantee may be lost and we don't take any responsibility for any losses or damage resulting from improper use of drivers.

3. Technical data

Description	Characteristics			
Number of channels	1	2	3	4
Operating voltage	8-26V DC			
Field of application	LED stripes and modules			
Output Type	OC - PWM			
Output current	8A	10A (2x5A)	9A (3x3A)	10A (4x2,5A)
Max. power	208W	260W	234W	260W
Ambient temp. t_a	0-50°C (recommended ≤30°C) (dry conditions with sufficient air circulation)			
Dimension LxWxH	50 x 44 x 15mm			
Current consumption without LEDs	10-30mA			
Radio frequency	2.4 GHz			
Description	To control LED stripes or modules via Bluetooth (e.g. using a smartphone/tablet with Android or iOS and integrated Bluetooth – interface. Control of up to 4 channels for RGBW and RGBA application **Bluemity** App available in Google Play Store and Apple App Store,			

4. Safety instructions

Drivers might produce some heat during control of even small loads. Care must be taken to provide optimal air ventilation. The unit is equipped with a limited protection against reverse polarity. Connecting the power in reverse polarity can destroy the driver, even if connected for a short period of time only.
Important: It is guaranteed by design that the units will never generate any higher voltage than the supply voltage. This driver is ideal solution for use in low-voltage areas, like pools, steam baths, SPAs, etc.
Electronics must not be modified. Observe the official regulations for electrical devices (like DIN, VDE, EN), especially when LEDs are used in wet areas!
This product is not a toy, keep away from children!
We decline any liability, loss or damage caused by improperly used drivers! Guarantee is also lost in such cases.

WARNING #1: LED light may have very high intensity even when dimmed. Some modern LEDs are classified by the lasers marking obligation. Particularly in connection with optics also weak LEDs may be very dangerous. Staring into LEDs may cause irreversible damage to the eye's retina. Hence: NEVER STARE INTO THE BEAM. Use diffusers to spread the intensity or move the light beam in direction that it is not visible directly!
WARNING #2: Please be aware of the fact that LED light may cause side effects. This light changes intensity very fast! Fast changing light may affect the perception and is also known to trigger epileptic seizures in persons who are photosensitive.

5. Installation

The electric wiring/connection must comply with all current and valid national requirements, be constructed by a certified electrical tradesman, and, comply with all the requirements set forth in this planning manual. Connection scheme see below.

Attention: Disconnect the system and the device before doing any work!

Driver is suitable for wall and ceiling assembly. Make sure that the unit is mounted on a stable, plain, non-tilting base. In operation the unit might produce heat. Care must be taken to provide unrestricted air ventilation.

5.1. Dimensions

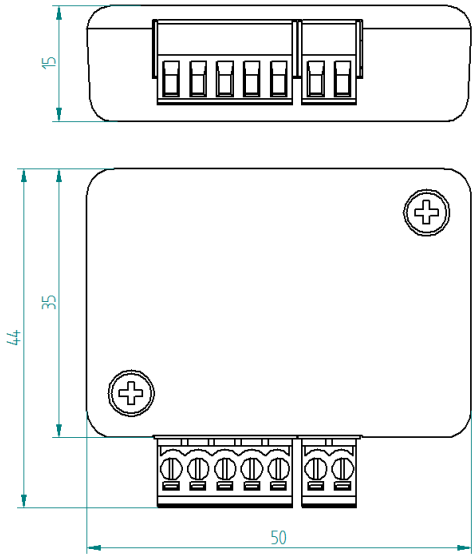


Fig. 1. Dimensions.

6. Connection

Important: **Bluemity** Driver must be operated with a power supply that is suitable for the used LED modules or stripes!

Important: Improper power supplies may lead to malfunctions, unwanted flickering effects, destruction of LED modules, destruction of electronics or in worst case overheating and fire. We strongly recommend using high-quality (stabilized) switching power supplies!

We warn against using non-stabilized power supplies. We recommend switching power supplies. Even LED power supplies are not recommended, because some are already equipped with control electronics for constant current, which will destroy the driver.

One power supply can be used for several units in parallel if the maximum output power of the power supply unit is observed.

The minimum voltage for correct operation is 8 volts; maximum voltage is 26 volts (+ 5%).

Important: The power supply should have an equivalent pulse load. Improper power supplies may lead to malfunctions and unwanted flickering effects in the colour changes.

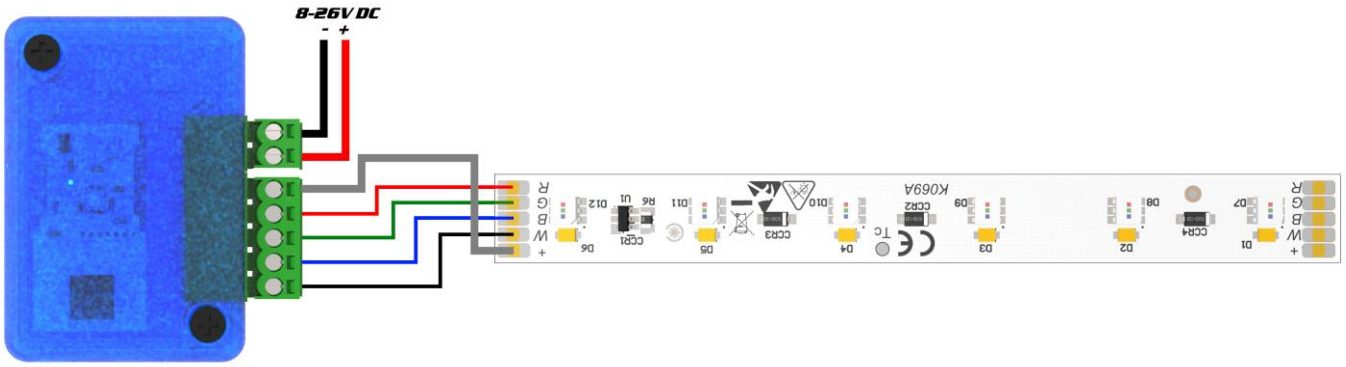


Fig. 2. Connections for RGBW system.

6.1 Bluemity

Bluemity is designed to control constant voltage LED stripes and modules. It doesn't have any internal current regulator. Supply voltage is passed through and the voltage of the power supply must match the voltage of the LED stripe or module.
Note: LED stripes and modules of 10 volts, 12 volts and 24 volts are offered on the market. LEDs might need very high currents. Depending on the cable length and its diameter, maximum current may be limited.

7. Operation

Please operate this unit only when it is working properly. In case of an error, switch off the unit immediately. Do not operate the unit until it was verified electronically by a qualified electrician. A case of error is:
- visible signs of damage on the unit
- the unit is not operating properly,
- fume rising or crackling sounds from the unit
- visible signs of overheating

Maintenance and service which require access to live components inside the unit must be carried out by an authorized electrician.
Warning: risk of electric shock!
How to avoid malfunctions or fire risk:
- Do not affect air circulation by covering the unit.
- Do not attach anything to the unit e.g. decoration items etc.
- Do not let your children play unattended with electrical equipment. Children cannot always perceive possible dangers correctly.

7.1 Start-up

Connect LEDs and power supply. Make sure that LED stripes are connected to **Bluemity** and the correct power supply was chosen. At first, all channels are slowly rising to 100% of intensity.

7.2 Networking

Bluemity is working on a radio frequency of 2.4 GHz. This frequency is often used for other radio controls and wireless sensors. Very strict regulations ensure that operation, free from interference, is possible.
The control is carried out using an app, which is available in Google Play Store and Apple App Store. Only one device can be controlled at a time. Networking between the devices or working in mesh is not possible.
The default pin for the connection is: 123456.

7.3 Pin resetting

For resetting the pin you have to open the device. After that you can reset the pin with blue button. Simply press it and whole device will have all settings restored to defaults.

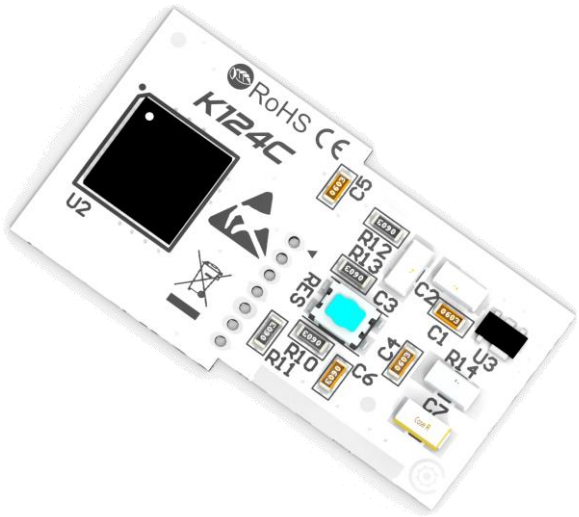


Fig. 5. View on a Reset button

8. Contents

Every **Bluemity** unit is shipped with this manual. The instructions are an integral part of the equipment to which they relate and must be handed to the user.
Important note: Complete manuals for any other drivers or LED modules can be downloaded at www.cezos.com.
Please look for updates before installation.

9. Contact

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