

# Instruction Manual

## 1. Marking

Bluetooth® Module VU121
ATEX certificate: CSANe 23ATEX1157X IECEX certificate: IECEX CSAE 23.0044X
Types of protection: Ex ia, Ex db, Ex db eb, Ex ec, Ex ta/tb, Ex tb, Ex tc Equipment protection levels: Ga, Ga/Gb, Gb, Gc, Da/Db, Db, Dc

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## 2. Device Versions

Device type	Basic specifications	Optional specifications
LVL-M4	-XXXXXX-XXXXXX-XX	+XX

The X-marked letters of the type code are placeholders for versions of the device.

The following specifications reproduce an extract from the product structure and are used to assign.

### Basic specifications

Option	Housing, material
A	Single compartment, aluminum, coated
D	Dual compartment, L-shape, aluminum, coated
G	Single compartment, 316L, cast

Option	Electrical output
A	FEL61, 2-wire, 19 to 253 V AC with test button
B	FEL64DC, relay DPDT, 9 V DC to 20 V DC, contact 253 V/6 A with test button
E	FEL62, 3-wire PNP, 10 V DC to 55 V DC with test button
N	FEL64, relay DPDT, 19 V AC to 253 V AC/19 V DC to 55 V DC, contact 253 V/6 A with test button
M	FEL68, 2-wire NAMUR with test button

### Optional specifications

Option	Accessory mounted
BL <sup>1</sup>	Bluetooth module VU121
VB <sup>2 3</sup>	Bluetooth module VU121 for NAMUR output

<sup>1</sup> Only in connection with feature **Electrical output**, option **A, B, E, N**, feature **Housing, material**, option **A, D, P**

<sup>2</sup> Only in connection with feature **Electrical output**, option **M**, feature **Housing, material**, option **A, D, P**

<sup>3</sup> In connection with feature **Electrical output**, option **M**: The temperature classes change to T4...T1.

## 3. Target Group, Personnel

Responsibility for planning, assembly, commissioning, operation, maintenance, and dismantling lies with the plant operator.

The personnel must be appropriately trained and qualified in order to carry out mounting, installation, commissioning, operation, maintenance, and dismantling of the device. The trained and qualified personnel must have read and understood the instruction manual.

Prior to using the product make yourself familiar with it. Read the instruction manual carefully.

## 4. Reference to Further Documentation

Observe directives, standards, and national laws applicable to the intended use and the operating location.

The corresponding datasheets, manuals, declarations of conformity, EU-type examination certificates, certificates, control drawings, and temperature tables if applicable are an integral part of this document. You can find this information under [www.pepperl-fuchs.com](http://www.pepperl-fuchs.com).

For specific device information such as the year of construction, scan the QR code on the device. As an alternative, enter the serial number in the serial number search at [www.pepperl-fuchs.com](http://www.pepperl-fuchs.com).

Refer to the relevant EU-type examination certificate to see the relationship between the connected circuit type, the maximum permitted ambient temperature, the temperature class, and the effective inner reactances.

If you use the device in safety-related applications, observe the requirements for functional safety. You can find these requirements in the functional safety documentation under [www.pepperl-fuchs.com](http://www.pepperl-fuchs.com).

## 5. Intended Use

The device is only approved for appropriate and intended use. Ignoring these instructions will void any warranty and absolve the manufacturer from any liability.

The device is a Bluetooth module for remote operation via a smartphone app or tablet app.

The device complies with the relevant national and international laws and regulations on radio approval.

Use the device only within the specified ambient and operating conditions.

The EU-type examination certificate in accordance with ATEX Directive applies only to the use of apparatus under atmospheric conditions.

If you use the device in safety-related applications, observe the information for safety function and safe state.

## 6. Improper Use

Protection of the personnel and the plant is not ensured if the device is not used according to its intended use.

## 7. Mounting and Installation

Do not mount a damaged or polluted device.

Mount the device in a way that the device is protected against mechanical hazard.

Only use accessories specified by the manufacturer.

Observe the instruction manuals for the associated devices.

If you install the device in safety-related applications, observe the requirements for functional safety.

Include the device into the equipotential bonding.

Avoid electrostatic charges which could result in electrostatic discharges while installing, operating, or maintaining the device.

Avoid impact effect or friction during mounting.

### Requirements for Cables and Connection Lines

Only use cables and connection lines with a temperature range appropriate to the application.

Install cables and cable glands in a way that they are not exposed to mechanical hazards.

Observe the minimum bending radius of the conductors.

Observe the permissible core cross section of the conductor.

Crimp wire end ferrules on the conductor ends.

When installing the conductors the insulation must reach up to the terminal.

Close all unused cable glands with the appropriate sealing plugs.

## 8. Operation, Maintenance, Repair

If you operate the device in safety-related applications, observe the requirements for functional safety. In case of operating in low demand mode, plan appropriate intervals for the proof test.

Do not use a damaged or polluted device.

The device is maintenance-free.

Do not repair, modify, or manipulate the device.

If there is a defect, always replace the device with an original device.

Observe the instruction manuals for the associated devices.

Connection or disconnection of energized circuits is only permitted in the absence of a potentially explosive atmosphere.

Include the device into the equipotential bonding.

Avoid electrostatic charges which could result in electrostatic discharges while installing, operating, or maintaining the device.

Avoid impact effect or friction during operating.

### Basic specification, feature Electrical Output, option A, B, E, N

If you equip the device with the Bluetooth® module, a battery is not required.

### Basic specification, feature Electrical Output, option M

If you equip the device with the Bluetooth® module, a battery is required. Only remove or replace the battery in the non-explosion-hazardous area.

## 9. Delivery, Transport, Disposal

Check the packaging and contents for damage.

Check if you have received every item and if the items received are the ones you ordered.

Store the device in a clean and dry environment. The permitted ambient conditions must be considered, see datasheet.

The device, built-in components, packaging, and any batteries contained within must be disposed in compliance with the applicable laws and guidelines of the respective country.