

SpaceLogic KNX Control unit 0-10 V REG-K/3-gang with manual mode

Operating instructions



Art. no. MTN646991

For your safety

⚠️ ⚠️ DANGER

HAZARD OF ELECTRIC SHOCK, EXPLOSION, OR ARC FLASH

Safe electrical installation must be carried out only by skilled professionals. Skilled professionals must prove profound knowledge in the following areas:

- Connecting to installation networks
- Connecting several electrical devices
- Laying electric cables
- Connecting and establishing KNX networks
- Safety standards, local wiring rules and regulations

Failure to follow these instructions will result in death or serious injury.

⚠️ CAUTION

The device may be damaged!

- Only operate the device according to the specifications stated in the Technical data.
- All the devices that are installed next to the binary input must be equipped with basic insulation at the very least.

Failure to follow these instruction can result in equipment damage.

Control unit introduction

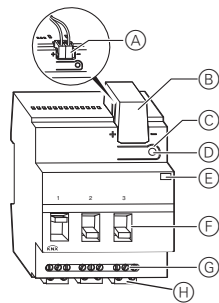
The control unit 0-10 V REG-K/3-gang with manual mode dims and switches fluorescent lamps using electronic ballasts with a 0-10 V/1-10 V interface and LV halogen lamps using transformers with a 0-10 V/1-10 V interface.

i The control voltage range can be set with the ETS via a parameter.

You can also manually switch the connected loads with the manual switches on the control unit without bus voltage.

The control unit has a bus coupler. It is installed on a DIN rail acc. to EN 60715, with the bus connection made via a bus connecting terminal. A data rail is not required.

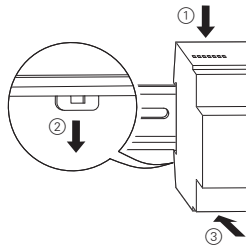
Connections, displays and operating elements



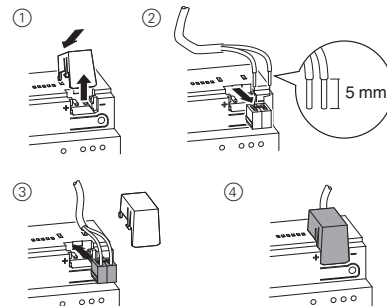
- (A) Bus connecting terminal
- (B) Cable cover
- (C) Programming button
- (D) Programming LED (red)
- (E) Operating LED "RUN" (green)
- (F) Manual switch
- (G) Channel terminals for load voltage
- (H) Outputs 1-10 V

Installing the control unit

- ① Set the control unit onto the DIN rail.

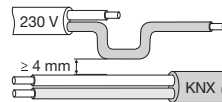


- ② Connect KNX.



⚠️ WARNING
Risk of fatal injury from electrical current. The device could become damaged.

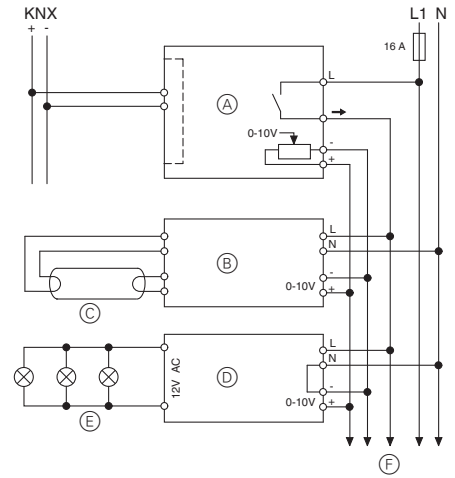
Safety clearance must be guaranteed in accordance with IEC 60664-1. There must be at least 4 mm between the individual cores of the 230 V supply cable and the KNX line.



⚠️ WARNING
Risk of fatal injury from electrical current. The device could become damaged.

Disconnect the mains voltage before connecting the device to the load. Terminals may not be inserted under load.

- ③ Connect the bus voltage.



- (A) Control unit
- (B) Electronic ballast with 0-10 V/1-10 V interface
- (C) Fluorescent lamp
- (D) Electronic transformer with 0-10 V/1-10 V control input
- (E) LV halogen lamps
- (F) To other devices with 0-10 V/1-10 V interface

- ④ Connect the load.
- ⑤ Connect the load voltage.

Putting the actuator into operation

- ① Press the programming button. The programming LED lights up.
- ② Load the physical address and application into the device from the ETS. The programming LED goes out. The operating LED lights up: The application was loaded successfully, the device is ready for operation.

Technical data

Supply from KNX:	DC 24 V / approx. 17.5 mA
Insulation voltages:	AC 4 kV bus/mains voltage and bus/0-10 V AC 4 kV 0-10 V - mains voltage
Switch contact:	Make contact, floating

Connection data for each channel:

Nominal current:	16 A, inductive $\cos \varphi = 0.6$
Incandescent lamps:	AC 230 V, 3600 W
Halogen lamps:	AC 230 V, 2500 W
LV halogen lamps:	max. 2000 VA via electronic transformers
Fluorescent lamps:	AC 230 V, 5000 W, uncompensated AC 230 V, max. 2500 VA parallel-compensated
Capacitive load:	AC 230 V, 3600 W, 200 μF
Protection:	The switch contact must be protected by a 16 A series-connected circuit-breaker.
Service life:	> 50,000 switching cycles at nominal load
0-10V/1-10V Interface:	0-10 V for dimming electronic ballasts
Loading capacity:	max. 100 mA (max. 50 electronic ballasts, depending on EB)
Min. control voltage:	0 V

Ambient temperature

Operation:	-5 °C to +45 °C
Storage:	-25 °C to +55 °C
Transport:	-25 °C to +70 °C
Max. humidity:	93 %, no moisture condensation
Environment:	Can be used at up to 2000 m above sea level (MSL)
Operating elements:	1 programming button 1 manual switch per channel
Display elements:	1 red LED: programming check 1 green LED: ready for operation, "RUN"

Connections

Bus:	via two 1 mm pins for bus connecting terminal
Live conductor and switch output:	3-gang screw terminals for max. 2.5 mm ²
1-10 V output:	2-gang pluggable screw terminals for max. 2.5 mm ²
EC directives:	complies with Low-Voltage Directive 73/23/EEC, complies with EMC Directive 89/336/EEC
Device width:	4 modules = approx. 72 mm

Schneider Electric -Contact

Schneider Electric Industries SAS
35 rue Joseph Monier
Rueil Malmaison 92500
France

If you have technical questions, please contact the Customer Care Centre in your country.

se.com/contact



UK Representative
Schneider Electric Limited
Stafford Park 5
Telford, TF3 3 BL, UK