eelectron

Inwall Room Thermostat

TM11A01KNX – Varnished Light Grey
TM11A11KNX – Dark Grey
TM11A21KNX – White

Product and Applications description

The Inwall Room Thermostat TM11A01KNX is an EIB/KNX wall mounting device designed for HVAC applications in Home and Building installations (i.e. offices, hospitals, hotels, private houses, etc..).
The device is equipped with one binary input (potential free contact) that can be used, for instance, to control the HVAC units whether a window has been opened (or closed) or for a general purpose usage and one binary output relay to control fan coils or for any different purposes.
The LCD on the front side displays the following information:
- Actual temperature from 0 to 50.0 ℃ (or ℉)
- Fan coil speeds
- Thermostat current status

The control elements available on the front are:
- A push button to increase the temperature setpoint
- A push button to decrease the temperature setpoint
- A push button to increase the fan coil speed
- A push button to decrease the fan coil speed

The device configuration for commissioning in terms of physical address, group addresses and parameters is done with ETS (Engineering Tool Software) through a download of the Application Program.

Display and Icons
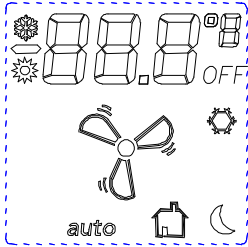
❄	Cooling Mode
☀	Heating Mode
☾	Night Mode (Economy)
auto	Automatic mode
⌂	Room busy o Stand-by Mode
⚙	Fan Coil speeds
OFF	Thermostat OFF
❄	Antifreeze

Application Program

See Eelectron product Database: "Eel_db01.VD2".

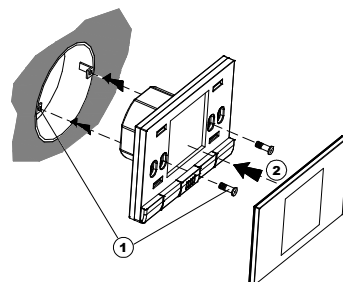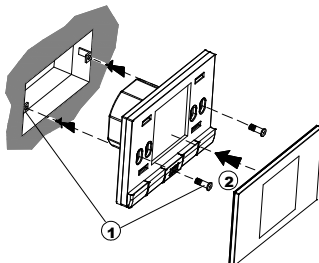### Dati tecnici

Power Supply

- Via bus EIB/KNX cable

Inputs

- Number: 1 potential free contact
- Input signal voltage Un = 24V
- Input signal current at close contact = 1mA

Outputs

- Number: 1 relays NO 48 V AC, 1A (AC1)

Mounting instructions

Control Elements

- 1 programming push button (back side)
- 1 push button to increase temperature setpoint
- 1 push button to decrease temperature setpoint
- 1 push button to increase fan coil speed
- 1 push button to decrease fan coil speed

Display Elements

- 1 LED red (back) for ETS programming
- 1 LCD display B/W, size 43,5X43,5 mm

Connections

- Bus line:
  bus terminal connector block, single core max 0,8mm Ø
- Output relay
  Screw terminal block
  Conductor cross section max.1,5 mm²
- Input signal (potential free)
  Screw terminal block
  Conductor cross section max.1,5 mm²

Wiring Diagram
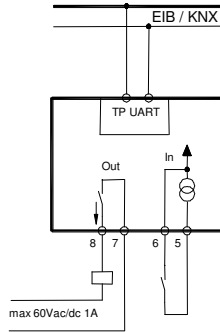
Physical specifications and Dimensions

- Housing: plastic
- Colours: Light Grey Varnished (TM11A01KNX),
  Dark Grey (TM11A11KNX)
- Dimensions: (W x H x D): 110 x 78 x 39,8 mm
- Weight: approx. 65 g.
- Installation: Flash mounting in 2 or 3 modules or wall round box Ø60mm, 40mm deep
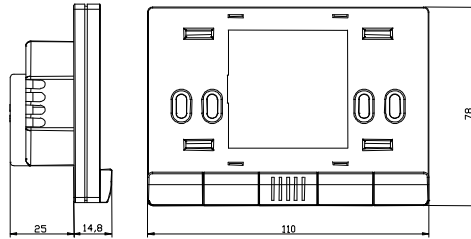
Electrical Safety

- Pollution degree : 2 (according to EN 60664-1)
- Protection class IP20 (according to EN 60529)
- Safety class: II (according to EN 61140)
- Overvoltage category: II (according to EN 60 664-1)
- Bus: safety extra low voltage SELV DC 24 V
- Device complies with EN 50090 e EN 60664-1

Electromagnetic compatibilità

Complies with EN 50081-1, EN 50082-2 e EN 50090-2.2

Environmental specifications

- Climatic conditions: complies with EN 50090-2.2
- Ambient operating temperature: 0 ℃ + 50 ℃
- Storage temperature: - 20 + 55 ℃
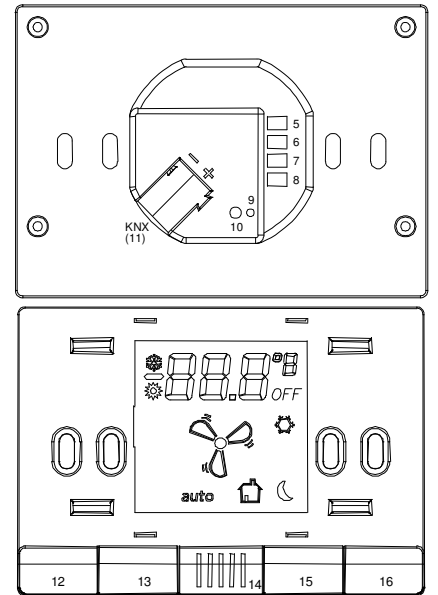- Relative humidity: max 90 % without condensation

Certification

KNX/EIB certificate

CE Mark

In accordance with the EMC guideline and low voltage guideline

Location and Function operating and display elements

Terminals and Operating Elements:

5   COM input
6   Input 1 (potential free)
7   COM Output
8   Output terminal relay 1 (NO)
9   Programming LED
10 Programming push button
11 Bus Connection Terminal:
         Black = bus polarity (-)
         Red = bus polarity (+)
12 Set point -
13 Set point +
14 Temperature Sensor
15 Fan Speed -
16 Fan Speed +

Installation Instructions

The device may be used for permanent indoor installations in dry locations within wall box mounts.

WARNING

- The device must not be connected to 230V cables
- The prevailing safety rules must be heeded.
- The device must be mounted and commissioned by an authorised installer.
- The applicable safety and accident prevention regulations must be observed.
- The device must not be opened. Any faulty devices should be returned to manufacturer.
- For planning and construction of electric installations, the relevant guidelines, regulations and standards of the respective country are to be considered.

Mounting and Wiring hints

General Description
The device configuration (KNX physical address assignment) is done by pressing the programming push button (10) located in the back side of the housing. Please take care during installation to leave connection wires long enough in order to remove the device easily from the wall box for commissioning.

Connecting bus cables
- Connect each single KNX/EIB bus core inside the terminal block (11) observing bus polarity .
- Slip the bus connection block (11) into the guide slot placed on the back side of this device and press the block down to the stop.

Wall box mounting
Use for mounting only screws included