



🛛 Light 📲 Temperature 🛋 Air quality 📄 Glare protection

# onework controller

With cross-functional room automation, the onework controller improves the indoor comfort, and energy efficiency in commercial buildings. It is able to take advantage of all the devices and components available in a room, for its automated control of **lighting**, **temperature**, **air quality** and **glare protection**. It is a certified KNX device and all communication with peripherals is done exclusively via the KNX bus. The automations can be overridden at any time, for example using a local button.

## Automations

**Lighting** Q Automatic lighting control is triggered by room occupancy. It consists of daylight control and supports Human Centric Lighting (HCL) according to DIN SPEC 67600 to help improve the daily performance of people in the workplace.

**Temperature** Active temperature control supports active heating and cooling systems through the use of windows and shades. Air quality 
♣ The controller monitors air quality and regulates it by automatically opening windows or can provide a signal to manually ventilate the room.

#### Glare protection 🗏 By

controlling the blinds, it can create a glare-free work environment while still providing the best possible view.

## Areas of application

Offices, administrative buildings, schools, universities, industrial buildings, hospitals as well as retirement- and nursing homes.

### Manufacturer independent

It can operate manufacturer-independently based on the KNX standard.

### **Cross-functional**

Enables cross-functional control between heating, ventilation, air conditioning, and electronic systems, as well as windows, shading, and facade elements.

## Energy efficiency

Improves the energy efficiency of buildings by integrating shading systems and windows with its temperature control system.

## Extensible

Controls up to 30 rooms and can be expanded with an unlimited number of additional onework controllers in a single KNX system.

## Future proof

The lifetime of the controller is based on the life span of the building, independent of the life cycle of individual manufacturers.

## Reliable

Operates locally without a cloud connection. Compliant with privacy regulations. Provides KNX functionality even if devices fail.

## No programming

Automations can be completely set up using the standard KNX configuration software (ETS) without the need for any additional programming.

## Controlling devices and components

To automate **lighting** Q, **temperature**  $\downarrow$ , **air quality**  $\neq$  and **glare protection**  $\square$  the following devices and components are controlled by the onework controller.

## Lighting $\bigcirc$

The controller has a comprehensive **lighting** control system that controls lighting systems in accordance to workplace policies. For lamps with tunable white functionality, it provides a fully featured HCL control with predefined light curves for a wide range of cases. To maintain a pleasant environment, adjacent rooms are dimmed when not in use.

## Windows 考

To improve **air quality** the device takes control of motorized windows, skylights, and smoke vents, which are available to the KNX system. A manual window opening signal can be configured for non-automated windows. This can be, for example, the LEDs of a KNX switch.

## Shadowing 🌡 🗏

The controller's built-in sun tracking and shading automation provides the foundation for **glare** and **temperature** control. Shading is controlled by room occupancy and external solar and wind conditions. For **temperature** control, blinds are opened to use the solar energy to directly heat a room (energy harvesting). Summer heat protection prevents rooms from overheating by closing blinds when necessary.

## Buttons and switchable plugs $\bigcirc$ $\rightleftharpoons$ ] 🗄

Using human interface devices such as switches, an end user can interact with the onework controller and setup personalized settings such as activating a custom scene. For example, a switchable plug can be used to turn on an air filtration device.

## Sensors 🖓 考 🜡 🗖

To automate accordingly, indoor sensor readings and external conditions such as occupancy, brightness, temperature, humidity,  $CO_2$ - or VOC- concentration, as well as wind, and rain are taken into account.

## Technical data

### Power supply

- 21 57 V DC
- Power over Ethernet (PoE)
- Redundant, back-up power supply
- Power consumption ≤ 10 W

#### Ports

- KNX Twisted Pair (TP)
- Power supply via TP
- Ethernet with PoE over RJ-45 jack
- Ethernet over RJ-45 jack
- USB-C (data transfer)

#### Environment

- Operating temperature: 0°C to +50°C
- Relative humidity: 5% to 85%, noncondensing
- Protected according to IEC 60529: IP 20

#### Installation

- E-Ink display with touch functionality
- Assembly on DIN-Rail TS-35 (EN 50022)

#### Dimensions

- 108 (w) × 91 (h) × 59 (d) mm
- 6 division units



Do you have any questions? We are happy to help!



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