Introduction

During start-up for the Gira door communication system, the assignment process introduces the devices to each other.

In normal operation of the Gira door communication system it is not important to know which bus participant transmits or which bus information is exchanged between the devices. When the DCS-IP-gateway is used together with the Gira HomeServer, transmitted bus information becomes more important because the HomeServer can assign the individual activities of the door communication system of the KNX.

In addition to the KNX functions, other functions of the HomeServer can also be controlled (e.g. entering an authorised person into the message archive).

Identifying door communication telegrams

Door communication telegrams can be identified according to two methods for later use in the HomeServer.

1st possibility (DCS-IP-gateway cheat sheet)

During start-up of the DCS-IP-gateway, all call buttons (e.g. ringing at the front door) are introduced to the DCS-IP-gateway. With this process the installer assigns freely selected names to the previously pressed buttons.

The assignments for the bus address and call button are saved and made available in a document, the so-called cheat sheet, for further processing in the logic of the HomeServer.

2nd possibility (visualisation project of the Home-Server)

Some bus telegrams, for example switching actions of KeylessIn devices, are not taught in in the DCS-IP-gateway.

These bus telegrams can be analysed and displayed in a visualisation project (DCS_IP_GW_sample_project) of the HomeServer on the "basic parameters" visualisation page so that they can then be processed in the logic blocks.

DCS logic modules of the HomeServer

The HomeServer receives the complete communication of the bus system via the DCS-IP-gateway. The logic modules are split into two general functions. The receiving logic modules filters the bus information. The bus telegrams of a door station contain the following information:

• bus address,
• module address,
• button number.

The filter in the logic module is set according to the specific application.

Application examples

Switching on light

The light in the entrance area should automatically switch on when any button of the door station is pressed.

For this application the filter is only set to the bus address of the door station. When therefore any door station button is pressed, the corresponding logic module triggers the "Switch on light" KNX function.

Signalising the door call with light

In the flat of a deaf person, a light source should visualise the bell.

In this case, in addition to the bus address of the door station, the module address and the button number must be filtered so that only the pressed door station call button of the desired flat is evaluated.

Application examples from the DCS brochure

Application example 1
Time-controlled access control

The cleaning personnel is only granted access to the building on certain days of the week and at certain times. The Gira Keyless In keypad opens the door when a personal code is entered. Access is denied outside the defined periods.

Application example 2
Access at anytime

The home owner is granted access to the building at any time by entering his personal code using the Gira Keyless In keypad.

Any other switching processes in the building can be linked to opening the door. Programming is simple using the Gira Control 9 and Gira Control 19 operating devices or on the computer.

Application example 3
One-time access

The parcel carrier wants to deliver a package, but no one is in the building. He can contact the recipient per mobile phone. The recipient than creates a universal code with one-time validity and sends it to the parcel carrier per text message. After the code is entered, the Gira Keyless In keypad opens the door. Access is denied if this code is entered a second time.

Application example 4
Controlling access to areas

In a company, a certain area such as the development department should only be accessible to a defined group of people. These people are given a transponder key or a transponder card for this. Access is controlled by the Gira Keyless In Transponder with long-range transponder technology. The reader reacts to the signal of the active transponder key or transponder card – already at a distance of approx. 1.5 metres to the door, depending on the setting. Up to 250 keys or cards can be managed per transponder device. The keys or cards are assigned to the readers once when starting up the system.