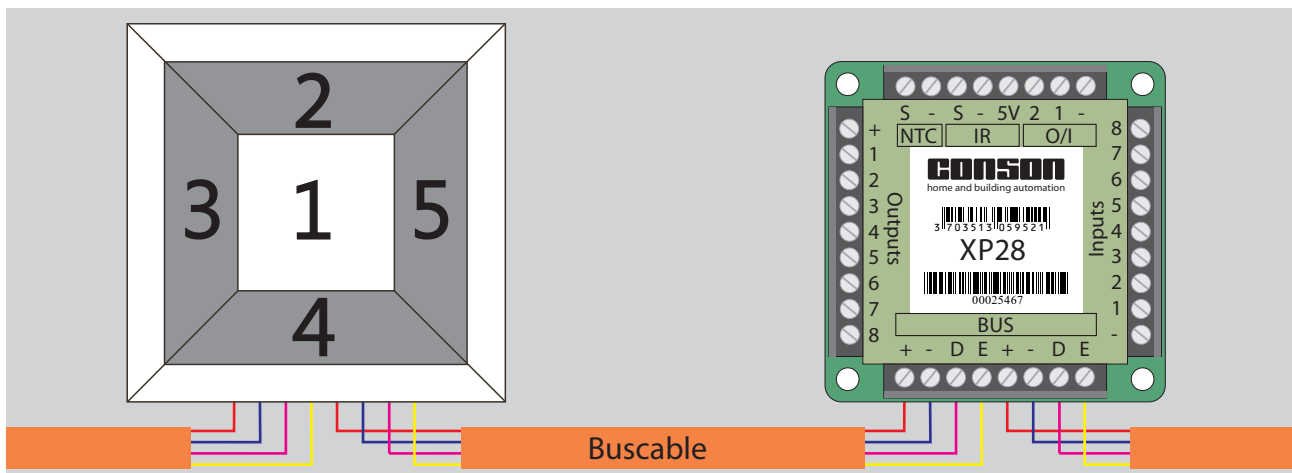## Bus-pushbuttons XP2506

XP2506   5703513056223
Bus-pushbutton with five buttons, five LEDs
and input NTC, Sesame-function

XP2506A 5703503056353
Bus-pushbutton with five buttons, five LEDs and
input NTC, Sesame-function
but with IR-eye for remote control 38kHz

XP2506B 5703503056483
Bus-pushbuttons with five buttons, five LEDs and
input NTC, Sesame-function
but with IR-eye for remote control 455kHz
(for example, Beo4 remote control)

Interfaces for bus-pushbuttons XP28

XP28   5703513059521
Interface with 8 inputs for pushbuttons and other
8 outputs to drive LEDs and other
NTC for temperature measuring
two I/O's

XP28A 5703503059781
same characteristics as the XP28 but for
reception infra-red remote controls 38kHz

XP28B 5703503059781
same characteristics as the XP28 but for reception
infra-red remote controls 455kHz (Beo4)

Buscable

The bus-pushbuttons have two 4-pin connectors. In the Concept 2000XP, one has the freedom to start multiple buses from the electrical enclosure. There can be a bus for the ground floor, one for the first floor, one for the attic rooms, one for the closed porch, etcetera. The use of multiple buses has a great advantage in terms of operational reliability. One bus cannot disturb the other and there is a better power distribution when using LED-feedback or other.

The application of the bus-pushbuttons XP2506 offers many benefits in terms of wiring and
possibilities. The combination pushbutton and its frame has a modern look. Where
it does not fit in the interior, a different type can be simply chosen.
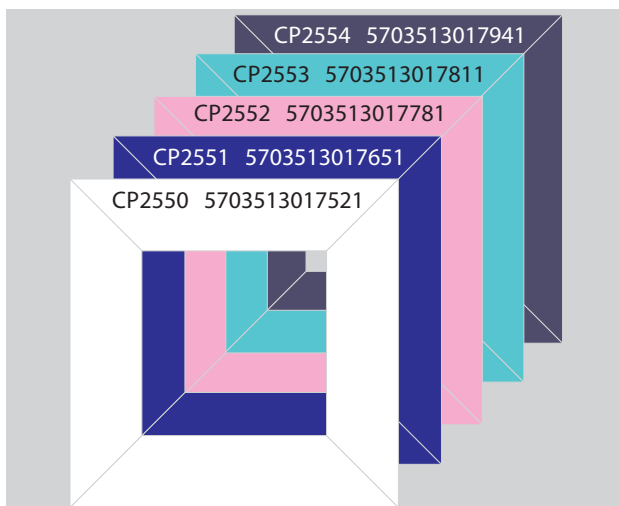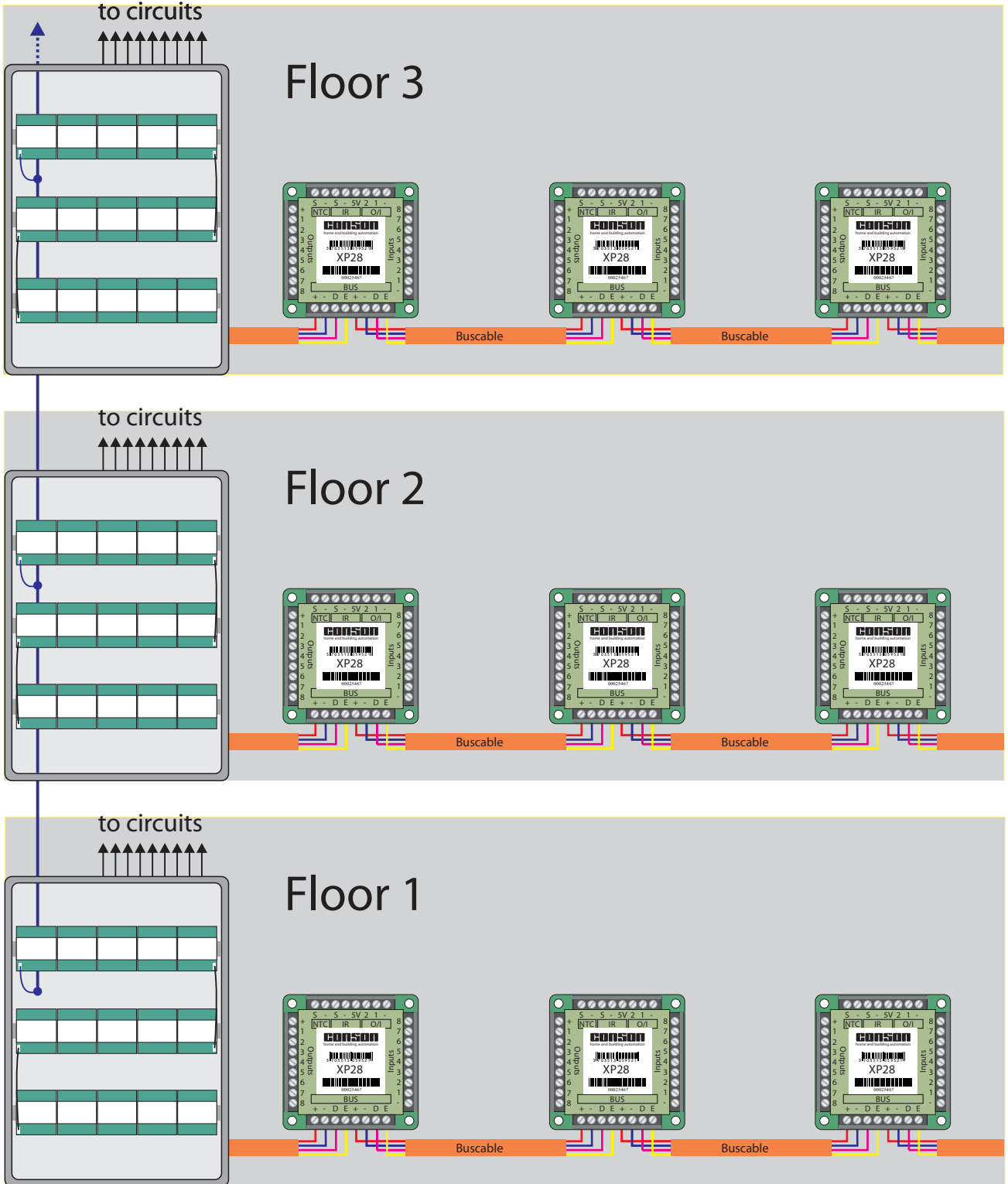
There are plenty of manufacturers of pushbuttons on the market such as Niko, CJC Systems, BTicino, Legrand, Simon, Berker, Gira, etcetera, and, commissioned by an architect, it is possible that one of those types is assigned.

The solution is then the use of the XP28 interface. Conson is essentially about what happens in the electrical enclosure.

Whether the choice is a single or multiple pushbutton-panel with or without LEDs, the XP28 interface provides the solution. The XP28 can, for example, control four pushbuttons in the entrance hall, one at the door of the toilet and three in the garage. It suffices to place only one interface in the wall box of the entrance hall and to wire the other locations from this interface.

Kaders voor de XP2506

CP2554 5703513017941
CP2553 5703513017811
CP2552 5703513017781
CP2551 5703513017651
CP2550 5703513017521

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Example of the application of the Concept 2000XP in a building

Imagine the following situation: There are several floors in a building that should be operated in their entirety. On each floor there is a switch, but each has its own power supply and various relay- and dimmer-modules. In the electrical enclosure of level 1 is a gateway XP130 or a gateway XP230. In the Contool-software, different floor plans can be brought in. Each floor allows to be programmed and controlled. The communication between the different electrical enclosures happens through the Conbus (local bus) of each enclosure in order to connect with each other. This can be done with e.g. UTP cable. Connect only the minus, the data and the data-XP. At long distances, it is necessary to close both data-busses with two resistors of 4.7kOhm to the plus.

to circuits

Floor 3

Buscable   Buscable

to circuits

Floor 2

Buscable   Buscable

to circuits

Floor 1

Buscable   Buscable

Example of programming IR 38 kHz

The interfaces of type A can be used to control an installation via an IR remote control 38 kHz. The coding of this standard infra-red signal originates from an industrial standard developed by Siemens. In total, there are 512 codes (IR-commands). Conson has divided these codes into 16 groups of 32 channels. Group 1 corresponds to the IR-links 1, 2, 3 and 4. Being the channels 1 to 8, 9 to 16, 17 to 24 and 25 to 32. The programming CP79 operation of the old Concept 2000 can send out these 32 channels. There are several providers on the market that have these codes, including a Logitec touch-screen remote control or remote controls with the learn-function-code. A special remote control is the Siemens IR-64K STC6120. It has the ability to set the different groups and the channel range from via coding jumpers. For example: Group 2 and codes 40-47. See table below. The remote control with this code will thus react with the A-interface programmed with the selection circuit 2 and the allocated channels 9 till 16. If, for example the 8-channel remote control is used, up to 64 controllers can be used in a system (512 divided by 8).

Table Group 1 for an 8-channel remote control

Toets Nr	1	2	3	4	5	6	7	8
Code	0	1	2	3	4	5	6	7
Kanalen	1	2	3	4	5	6	7	8
Code	8	9	10	11	12	13	14	15
Kanalen	9	10	11	12	13	14	15	16
Code	16	17	18	19	20	21	22	23
Kanalen	17	18	19	20	21	22	23	24
Code	24	25	26	27	28	29	30	31
Kanalen	25	26	27	28	29	30	31	32

Table Group 2 for an 8-channel remote control

Toets Nr	1	2	3	4	5	6	7	8
Code	32	33	34	35	36	37	38	39
Kanalen	1	2	3	4	5	6	7	8
Code	40	41	42	43	44	45	46	47
Kanalen	9	10	11	12	13	14	15	16
Code	48	49	50	51	52	53	54	55
Kanalen	17	18	19	20	21	22	23	24
Code	56	57	58	59	60	61	62	63
Kanalen	25	26	27	28	29	30	31	32

When placing an XP28A interface or an XP2506A pushbutton-panel on the floor plan, a window "XP2506A Configuration IR-eye" appears. The group is set default to group 1. Changing this group is only necessary when multiple remote controls are used. For special applications, a change is required.

XP2506A Configuratie oog
Groep 1
Ok   Cancel
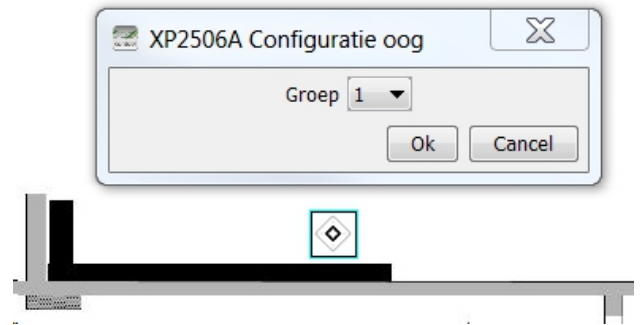
After pressing OK the window disappears. Place the programming-control CP79 on the floor plan. Go to "Programming" and click on the control. You will be asked to select an IR-eye the floor plan. Thereupon, a connection between the control and the IR-eye appears and in the right window the list of the 32 control-channels opens.

The rest of the programming is the same as explained earlier and has each time the following steps:

Enter the location of the control and the various functions of the keys used.

If e.g. button 8 (Channel 8) "Mode Entrance hall light on".

When selecting, this turns purple.

Click on the light from the entrance hall and the window "Functions for actor: Entrance hall" opens.

Select "On" and click on "Add" and next on OK. Repeat for the other channels.

1	Zithoek mode TV
2	Zithoek mode bezoek
3	Eethoek lichten 95%
4	Eethoek lichten 20%
5	Buitenverlichting aan
6	Buitenverlichting uit
7	Keukenlicht aan/uit
8	Inkomhall licht aan
9	CP 79 - 9
10	CP 79 - 10
11	CP 79 - 11
12	CP 79 - 12
13	CP 79 - 13
14	CP 79 - 14
15	CP 79 - 15
16	CP 79 - 16
17	CP 79 - 17
18	CP 79 - 18
19	CP 79 - 19
20	CP 79 - 20
21	CP 79 - 21
22	CP 79 - 22
23	CP 79 - 23
24	CP 79 - 24
25	CP 79 - 25
26	CP 79 - 26
27	CP 79 - 27
28	CP 79 - 28
29	CP 79 - 29
30	CP 79 - 30
31	CP 79 - 31
32	CP 79 - 32

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Example of programming IR 455 kHz

The interfaces of type B can be used to operate an installation via an IR remote control type Beo4 of Bang & Olufsen.
In the Concept 2000XP was thought off a wider and easier supply of control options.

The orders were divided into 5 groups. In a group, an order consists of a number combined with an action-button. The action-buttons are the pushbuttons with the single and double arrows (wind, rewind and step up and step down) and the Go-pushbutton.
In each group there are 12 numbers, of which each number can be combined with an action-button. This means that there are 12 x 5 = 60 orders possible for each group. For group 0, five orders are added by the symbol keys green, yellow, blue, red and stop, that behave like a normal five-piece pushbutton-panel. A total of 60 x 5 +5 = 305 commands can thus be performed with a Beo4-control.

Group	Available keys
0	Symbol keys groen - geel - blauw - rood - Stop Keys 0 - 11 in combination with actions keys wind - rewind - step up - step down - Go
12	Keys 12 tot 23 in combination with actions keys
24	Keys 24 tot 35 in combination with actions keys
36	Keys 36 tot 47 in combination with actions keys
48	Keys 48 tot 59 in combination with actions keys

Start the Contool software and upload a ground plan. Go to the tab "Design" and place a triple dimmer XP33LR on the floor plan, an interface XP28B, a 6-way pushbutton-panel and a Beo4 remote control.

When placing the interface XP28B the window „Configuration of the IR-eye" appeared and the default installation "Group 0" was mentioned. Usually one group is sufficient. In a larger house, for example, one can select a group for the living room, a group for the bedroom, a group for outside, etcetera.

Select the „Program"-tab and click on the Beo4 remote control on the floor plan. The control is circled in red and in the window on the right appears the question „Select an IR-eye on the floor plan".

Click on the XP28B-interface and a connection between the control and the interface will appear. An image of the keypad of a Beo4 appears at the same time.

Select the green symbol-key. This turns purple. Click on one of the lights controlled by the XP33LR. The actor window opens and now add the action „Select Scene 1".

Do the same for the yellow, blue and red key, but for the scenes 2, 3 and 4 respectively. Select the button „Stop" and click on a light. Add the action „Off", optionally with time. In this way, the symbol-keys were commissioned.

Next steps include a numeric key in combination with an action.

Select key 1. This turns blue. Then, select the step up key. This turns brown.
Select the lamp of the output 1 of the XP33LR. The actor window opens.
Add the action „Light level up" and press OK. Select again key 1 and next the step down key.
Click again on the lamp of which the output 1 is one of the XP33LR.
The actor window opens again and add the action „Light level down" and press OK. Repeat the process for the numbers 2 and 3 but respectively for the outputs 2 and 3 of the XP33LR. This allows the user to dim and to switch off the 3 elements of XP33LR separately using the stop-key or the user can call up the different scenes and adjust them by using the keypad.

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