## $\mid 2$ vice SYSTEM


(Index at the beginning of section)

(Index at the beginning of section)


Sinthes
CALL MODULE
Sec. 3B
(Index at the beginning of section)


Sec. 3C
(Index at the beginning of section)


Exigo push button panel
Sec. 3D
(Index at the beginning of section)

VIDEO DOOR PHONE APARTMENT STATIONS
Sec. 4A
(Index at the beginning of section)


DOOR PHONE APARTMENT STATIONS
Sec. 4B
(Index at the beginning of section)

ACCESSORIES Sec.4C
(Index at the beginning of section)
CONCIERGE SWITCHBOARD
Sec. 4D
(Index at the beginning of section)

POWER SUPPLY UNITS AND VARIOUS DEVICES
Sec. 5
(Index at the beginning of section)

CONNECTION DIAGRAMS
Sec. 6
(Index at the beginning of section)
PROGRAMMING EXAMPLES FOR BASIC SYSTEMS
Sec. 6A
(Index at the beginning of section)


|  | INDEX 2VOICE SYSTEM | vOICe |
| :---: | :---: | :---: |
| 1145/50 | Sinthesi directory module | . 3 a ............... 8 |
|  |  | 3b ............... 4 |
| 1145/52 | Sinthesi flush mounting box for 2 modules. | .3a ............... 8 |
|  |  | 3b ............... 4 |
|  |  | 3d ............... 7 |
| 1145/53 | Sinthesi flush mounting box for 3 modules. | .3a ............... 8 |
|  |  | 3b ............... 4 |
|  |  | 3d ............... 7 |
| 1145/54 | Sinthesi flush mounting box for 4 modules. |  |
|  |  | 3b ............... 4 |
|  |  | 3d ............... 7 |
| 1145/59 | Sinthesi blind module. |  |
|  |  | 3b ............... 4 |
| 1145/62 | Sinthesi frame and module holser for 2 modules. | .3a ............... 8 |
|  |  | 3b ............... 4 |
| 1145/63 | Sinthesi frame and module holser for 3 modules. |  |
|  |  | 3b ............... 4 |
| 1145/64 | Sinthesi frame and module holser for 4 modules. | .3a .............. 8 |
|  |  | 3b ............... 4 |
| 1145/65 | Sinthesi blue headers | .3a ............. 11 |
| 1145/312 | Sinthesi hooded housing frame for 2 modules. | .3a .............. 8 |
|  |  | 3b .............. 4 |
| 1145/313 | Sinthesi hooded housing for 3 modules. | .3a ............... 8 |
|  |  | 3b ............... 4 |
| 1145/314 | Sinthesi hooded housing for 4 modules. | .3a .............. 8 |
|  |  | 3b ............... 4 |
| 1145/324 | Sinthesi hooded housing for 4 modules (2 module holders with 2 modules) | .3a ............... 8 |
|  |  | 3b .............. 4 |
| 1145/326 | Sinthesi hooded housing for 6 modules (2 module holders with 3 modules) | .3a .............. 8 |
| 1145/328 | Sinthesi hooded housing for 8 modules (2 module holders with 4 modules) | .3a .............. 8 |
| 1145/332 | Sinthesi hooded housing for 12 modules (3 module holders with 4 modules) | .3a .............. 8 |
| 1145/339 | Sinthesi hooded housing for 9 modules (3 module holders with 3 modules) | .3a ............... 8 |
| 1145/342 | Sinthesi hooded housing for semi-flush mounting in gate pillar for 2 modules | . $3 \mathrm{a} . . .1 . . . . . . . . . . . ~ 8 ~$ |
|  |  | 3b ............... 4 |
| 1145/343 | Sinthesi hooded housing for semi-flush mounting in gate pillar for 3 modules | .3a ............... 8 |
|  |  | 3b ............... 4 |
| 1145/612 | Sinthesi rain hood for 2 modules. |  |
| 1145/613 | Sinthesi rain hood for 3 modules. | . 3 a ............... 8 |
| 1145/614 | Sinthesi rain hood for 4 modules.. | .3a .............. 8 |
| 1145/624 | Sinthesi rain hood for 4 modules (2 module holders with 2 modules) | . $3 \mathrm{a} . . .1 . . . . . . . . . . . ~ 8 ~$ |
| 1145/626 | Sinthesi rain hood for 6 modules (2 module holders with 3 modules) | .3a .............. 8 |
| 1145/628 | Sinthesi rain hood for 8 modules (2 module holders with 4 modules) | . $3 \mathrm{a} . . .1 . . . . . . . . . . . ~ 8 ~$ |
| 1145/632 | Sinthesi rain hood for 12 modules (3 module holders with 4 modules) | .3a .............. 8 |
| 1145/639 | Sinthesi rain hood for 9 modules (3 module holders with 3 modules) | . 3 a ............... 8 |
| 1145/712 | Sinthesi embedding frame for 2 modules ......... | . 3 a ............... 8 |
|  |  | 3b ............... 4 |
| 1145/713 | Sinthesi embedding frame for 3 modules | .3a ............... 8 |
|  |  | 3b ............... 4 |
| 1145/714 | Sinthesi embedding frame for 4 modules | .3a ............... 8 |
|  |  | 3b .............. 4 |
| 1145/724 | Sinthesi embedding frame for 4 modules (2 module holders with 2 modules). | .3a .............. 8 |
|  |  | 3b ............... 4 |
| 1145/726 | Sinthesi embedding frame for 6 modules (2 module holders with 3 modules) | .3a .............. 8 |
| 1145/728 | Sinthesi embedding frame for 8 modules (2 module holders with 4 modules) | . $3 \mathrm{a} . . . . . . . . . . . . . . . ~ 8 ~$ |
| 1145/732 | Sinthesi embedding frame for 12 modules (3 module holders with 4 modules) | .3a .............. 8 |
| 1145/739 | Sinthesi embedding frame for 9 modules (3 module holders with 3 modules). |  |
| 1183/1 | Atlantico door phones ....................... | 4b .............. 7 |
| 1183/2 | Signo door phones.. | 4b .............. 2 |
| 1183/3 | Signo door phone with 10 additional buttons ......... | 4b ............ 11 |
| 1332/85 | Power line protection device........... | .. 5 ............. 17 |
| 1332/86 | Power line filter | . 5 ............. 17 |
| 1706/5 | Folio flush-mounted colour hands free video door phone (black).. | .4a ............ 11 |
| 1706/6 | Folio flush-mounted colour hands free video door phone (white)., | 4a ............. 11 |
| 1706/60 | Embedding box for Folio video door phone........ | 4a ............ 12 |
| 1706/61 | Kit for Folio video door phone intallation ion plasterboard | .4a ............. 12 |
| 1716/1 | Aiko colour hands free video door phone (black)......... | . $4 \mathrm{a} . . . . . . . . . . . . . ~ 18$ |
| 1716/2 | Aiko colour hands free video door phone (white)........ | . 4 a ............. 18 |

## INDEX

| 1716/51 | Colour glasses for customize Aiko video door phone.......................................................................... 4 a ............ 24 |
| :---: | :---: |
| 1716/60 | Embedding box with frame for Aiko video door phone........................................................................4a ............ 19 |
| 1721/53 | Exigo flush mounting box ............................................................................................................3d .............. 9 |
| 1721/54 | Exigo flush mounting box ............................................................................................................3d .............. 9 |
| 1721/55 | Exigo flush mounting box ................................................................................................................3d .............. 9 |
| 1721/56 | Exigo flush mounting box .............................................................................................................3d .............. 9 |
| 1721/60 | Exigo flush mounting box ............................................................................................................3d .............. 9 |
| 1721/61 | Exigo flush mounting box ...............................................................................................................3d .............. 9 |
| 1721/62 | Exigo flush mounting box ............................................................................................................3d .............. 9 |
| 1721/63 | Exigo flush mounting box ............................................................................................................3d .............. 9 |
| 1721/64 | Exigo flush mounting box ................................................................................................................3d .............. 9 |
| 1721/65 | Exigo flush mounting box ................................................................................................................3d .............. 9 |
| 1721/66 | Exigo flush mounting box ............................................................................................................3d .............. 9 |
| 1721/67 | Exigo flush mounting box ............................................................................................................3d .............. 9 |
| 1721/68 | Exigo flush mounting box ............................................................................................................3d .............. 9 |
| 1721/103 | Exigo video door phone panel with 3 buttons on 1 row.......................................................................3d ............. 9 |
| 1721/104 | Exigo video door phone panel with 4 buttons on 1 row........................................................................3d .............. 9 |
| 1721/105 | Exigo video door phone panel with 5 buttons on 1 row.......................................................................3d .............. 9 |
| 1721/106 | Exigo video door phone panel with 6 buttons on 1 row.......................................................................3d .............. 9 |
| 1721/204 | Exigo video door phone panel with 4 buttons on 2 rows......................................................................3d .............. 9 |
| 1721/206 | Exigo video door phone panel with 6 buttons on 2 rows......................................................................3d .............. 9 |
| 1721/208 | Exigo video door phone panel with 8 buttons on 2 rows......................................................................3d .............. 9 |
| 1721/210 | Exigo video door phone panel with 10, buttons on 2 rows....................................................................3d .............. 9 |
| 1721/212 | Exigo video door phone panel with 12 buttons on 2 rows....................................................................3d .............. 9 |
| 1721/214 | Exigo video door phone panel with 14 buttons on 2 rows....................................................................3d .............. 9 |
| 1721/216 | Exigo video door phone panel with 16 buttons on 2 rows.....................................................................3d .............. 9 |
| 1721/218 | Exigo video door phone panel with 18 buttons on 2 rows.....................................................................3d .............. 9 |
| 1721/220 | Exigo video door phone panel with 20 buttons on 2 rows.....................................................................3d .............. 9 |
| 1732/41 | Colour video module for switchboard ................................................................................................4d .............. 4 |
| 1732/91 | Bracket for video module .............................................................................................................4d ............. 4 |
| 1740/1 | Black and white Signo video door phone ..........................................................................................4a ............. 2 |
| 1740/40 | Colour Signo video door phone (white)............................................................................................ 4 a .............. 3 |
| 1740/41 | Colour Signo video door phone (anthracite)...................................................................................... 4 a .............. 3 |
| 1740/42 | Colour Signo video door phone (platinum)....................................................................................... 4 a .............. 3 |
| 1740/83 | Bracket for Signo video door phones.............................................................................................. 4 a .............. 4 |
| 1743/101 | Exigo video door phone panel with 1 button .....................................................................................3d .............. 7 |
| 1743/102 | Exigo video door phone panel with 2 buttons....................................................................................3d ............. 7 |
| 1743/103 | Exigo video door phone panel with 3 buttons....................................................................................3d .............. 7 |
| 1743/104 | Exigo video door phone panel with 4 buttons....................................................................................3d .............. 7 |
| 1743/105 | Exigo video door phone panel with 5 buttons.....................................................................................3d .............. 7 |
| 1743/106 | Exigo video door phone panel with 6 buttons....................................................................................3d .............. 7 |
| 1743/107 | Exigo video door phone panel with 7 buttons....................................................................................3d .............. 7 |
| 1743/108 | Exigo video door phone panel with 8 buttons.....................................................................................3d .............. 7 |
| 1743/109 | Exigo video door phone panel with 9 buttons....................................................................................3d .............. 7 |
| 1743/110 | Exigo video door phone panel with 10 buttons.................................................................................3d .............. 7 |
| 1745/40 | Sinthesi color camera module.........................................................................................................3b .............. 3 |
| 1745/70 | Sinthesi black and white camera module...........................................................................................3b .............. 3 |
| 1745/107 | Sinthesi 1 -button front unit..............................................................................................................3a .............. 7 |
| 1783/1 | Mikra push buttn panel with colour camera......................................................................................3c .............. 2 |
| 1783/2 | Mikra push buttn panel with black and white camera..........................................................................3c .............. 2 |
| 1783/69 | CCTV bus interface ...................................................................................................................... 5 ............ 12 |
| 1810/40 | TV camera unit for Exigo panel ......................................................................................................3d ............. 5 |
| 4311/13 | Wireless call repeater .................................................................................................................4c ............. 2 |
| 9000/230 | Safety transformer....................................................................................................................... 5 ............ 15 |
| 9854/40 | 12Vac electronic additional ringer..................................................................................................4c ............. 4 |

## $\mid 2$ <br> SYSTEM

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## SECTION CONTENTS

GENERAL CHARACTERISTICS ..... 2
Glossary ..... 2
SYSTEM TYPES ..... 3
EXAMPLES OF SYSTEMS WITH DIFFERENT CAPACITY ..... 4
SYSTEM OPERATION ..... 6
CALL AND BUSY STATE MANAGEMENT ..... 6
CALL STATIONS FEATURES ..... 8
Call sending ..... 8
Pedestrian electric lock management .....  8
Driveway door lock release management ..... 8
APARTMENT STATIONS FEATURES ..... 9
Call receiving ..... 9
Auto-on. ..... 9
Intercom ..... 9
Floor call ..... 9
Additional ringer ..... 9
Open door signal .....  9
Automatic door lock release ..... 9
VIDEO SURVEILLANCE AND ACCESS CONTROL FEATURES ..... 10
Auto-on function on surveillance cameras ..... 10
Open door sensor management for "open door" function. ..... 10
FEATURES TABLES ..... 11
Call station features ..... 11
Apartment station features ..... 11

## GENERAL CHARACTERISTICS

2VOICE video door phone system is extremely easy to install, thanks to the use of only 2 non-polarized wires to connect all the system devices.
Its modularity allows to create little systems for one or two families or large sized systems of different types: door phone, video door phone or mixed devices, offering solutions for any requirement.
With 2VOICE video door phone system it is possible to create video door phone installations with up to 128 users for each column, for a total of 32 column max., each one with 2 secondary call stations max. Up to 4 main call stations and possibly one concierge switchboard may be present.
2VOICE video door phone system characteristics are the following:

## System

- Capability to manage up to 4 automatic switching main door units.
- Capability to manage up to 32 columns, each one with 2 secondary call stations max.
- Capability to manage up to 128 apartment stations for each column with a single power supply unit.
- Capability to manage up to 4 apartment stations in parallel for each user.
- Only 2 non-polarized wires in each system part.
- No local power supply needed for call stations or apartment stations.
- Wiring for derived branches made with 4-user distributor or directly in in/out mode on devices terminal pins.
- Short circuit protection on derived branches (use the 4-user distributor Ref. 1083/55).
- Electric lock activation from all apartment stations; programmable activation time and mode (free/secret).
- Activation of a second lock (driveway) from all apartment stations.
- A concierge switchboard can be connected to the system.
- Electric loads activation with special decoder.

Video surveillance and Access control

- Capability to connect directly to call stations up to 2 cameras, that can be 5 using an optional video switch.
- Open door signal by a led in each apartment station.
- Door lock release codes can be programmed on call modules.


## Video door phone call stations with buttons

- Standard colour camera.
- Capability to connect up to 64 buttons, using 4 add-on buttons units.
- Designed and ready for installation of devices for hard of hearing people.
- Facilitated programming with dip-switches.


## Door phone call stations with buttons

- Capability to connect up to 64 buttons, using 4 add.-on buttons units.
- Designed and ready for installation of devices for hard hearing people.
- Facilitated programming with dip-switches.
- An external camera can be connected to obtain a video door phone call station.


## Call stations with name directory

- Call to users by code entering or by name search in directory
- Interface with display and alphanumeric keyboard.
- Preset for colour or black/white cameras connection.
- Designed and ready for installation of devices for hard hearing people.
- Programming via keyboard or bluetooth


## Apartment stations

- Colour, black/white, video door phone apartment stations, handsfree or with handset
- 5 door phone call ring tones selectable by the user.
- Different timing for door phone ring tones (with the same melody) identifies the call source (main or secondary call station, intercom apartment station, switchboard).
- Auto-on cyclic function on call stations and surveillance cameras, if present.
- Intercom call freely programmable in the column or in the apartment.
- Floor call button with differentiated call ring tones, selectable by the user among 5 tones.
- Capability to connect to the apartment station, to repeat all the calls, an additional self-powered ringer, a call repeater relay or a wireless call repeater.
- Entrance door opened state displayed by a led.
- Capability to connect to the video apartment station an addon buttons unit with 6 keys (for intercom function and special functions), open door led and button/led for automatic door lock release function.
- Facilitated programming with dip-switches.


## Regulations

- IMQ, VDE certified power supply.
- All devices are compliant with EC directives concerning electromagnetic compatibility and low voltage.
- The system is intrinsically protected against electromagnetic static and impulsive noise.


## GLOSSARY

For a better comprehension of this manual, these are the definitions of some specific terms:

APARTMENT: house unit with up to 4 apartment stations which can be called at the same time.
IN/OUT CONNECTION: connection among devices in which the terminal pins LINE act as junction between the input pair and the output pair.
COLUMN: group of risers derived by a column interface or by a door units interface.
DERIVED BRANCH: double-wire line starting from a distributor, used to reach apartment stations.
RISER: double-wire line starting from two terminal pins of a column interface or a power supply. Devices are connected to this line. A column can be composed by several risers.
STREET SIDE RISER: double-wire line starting from a door units interface; it brings the signal to column interfaces.
SYSTEM DIMENSION: sum of all the connection segments which constitute the system.
LINE END: the last device connected to a riser or to a derived branch.
CALL STATIONS: devices able to send a door phone or video door phone call to apartment stations.
TERMINATION: impedance to be installed at each line end with a jumper to adapt a riser or a derived branch.

$\square$

## SYSTEM TYPES

2VOICE system minimum configuration includes: one power supply unit Ref. 1083/20, one call station and at least one apartment station. The maximum number of devices and users is the following:

| Device | Maximum number |
| :--- | :--- |
| 4 users distributor Ref. 1083/55 | $32 \times 32$ columns |
| Power supply Ref. 1083/20 | 34 |
| Column interface Ref. 1083/50 | 32 |
| Door units interface Ref. 1083/75 | 1 |
| Special decoder Ref. 1083/80 | 2 including column <br> interface and door <br> units interface and <br> 128 in column |
| Concierge switchboard Ref. 1083/40 | 1 |


| Call stations | Maximum number |
| :--- | :--- |
| Main door phone or video door phone call <br> stations | 4 |
| Secondary door phone or video door phone <br> call stations | $64 \quad(2 \quad$ x column <br> interface $)$ |
| Total number of call stations in the system | 68 |


| Apartment stations | Maximum number |
| :--- | :--- |
| Number of users (apartments) for each <br> column | 128 |
| Number of apartment stations in parallel (in <br> the same apartment) | 4 |
| Total number of apartment stations for each <br> column (apartment stations in parallel are <br> included) | 128 |
| Total number of apartment stations <br> connected in in/out mode for each riser (*) | 32 |

(*) If the configuration is mixed (apartment stations + distributors connected in in/out mode), the max. number of devices is 16. Apartment stations connected on the derived branches of a distributor are not included in this number.
L. If column interface Ref.1083/50 or door units interface Ref. 1083/75 are used, the word "column" means the group of the 4 risers.

## Connection with 4-user distributors

32 distributors max.
per column


## In/out connection



In/out connection of door phones only


Connection of door phones only with electric junction


This connection is allowed only in systems without video. If even one video device is present, this will compromise the correct operation of the system.

## Mixed connection with distributors and in/out connection



Special decoders Ref. 1083/80 can only be connected on a 4-
user distributor derived line. In-out connection is not allowed.


Connection of 16 columns max．to one main call station and to one or two secondary call stations for each column．


Connection of 32 columns max．to 4 main call stations and to one or two secondary call stations for each column．


## SYSTEM OPERATION

## CALL AND BUSY STATE MANAGEMENT

2VOICE system allows several simultaneous conversations on different columns and one additional conversation between a main call station and an apartment station belonging to a column not in conversation.
After receiving a call, the system perform the following operations:

- When a call is received from a main call station, the other main call stations and the column of the called apartment station are busy for the off-hook waiting time (60s max.). During this time the system (main and secondary call stations of the used column) is busy. When the user answers and starts a conversation, the busy time is extended for the guaranteed communication time. This time can be configured during installation from 1 to 70 s . Once the guaranteed communication time is elapsed, another call can interrupt the conversation. The max. conversation time is 10 minutes. At the end of conversation, for timeout or because the user hangs the handset up, the system goes back to standby mode.


5\% For reading clarity, these diagrams do not show system power supply units that are installed in parts of the system not involved in busy conditions.

- When receiving a call coming from a secondary call station, the system operates in a similar way, but only the concerned column is involved, included the second secondary call station, if present. The other call stations, main or secondary, are not involved.


Main call stations

- When an apartment station performs an auto-on function on a call station, all the main call stations and all the apartment station column are busy for the off-hook waiting time (60s max.). The secondary call stations of the other columns are not in busy state. If the apartment station starts a conversation (by picking the handset up or by pressing the dedicated button on hands-free door phones), the busy time can be extended for the guaranteed communication time (this time can be configured during installation from 1 to 70 s ). The max. conversation time is 10 minutes. During busy time, all the other system apartment stations can not use the auto-on function. At the end of conversation, for timeout or because the user hangs the handset up, the system goes back to standby mode.


Main call stations

5During the busy time generated by an auto-on function, standard door phone calls can interrupt the communication, according to call station programming (interruption parameter - AUX dip 4)

- During an intercom call, column apartment stations and column secondary call stations, if present, are busy for the off-hook waiting time (60s max.). Once the user has answered, the busy time can be extended for the guaranteed communication time (this time can be configured during installation from 1 to 70 s ). The max. conversation time is 10 minutes. At the end of conversation, for timeout or because the user hangs the handset up, the system goes back to standby mode.
Intercom calls can only be performed between users of the same column.


5y During the busy time generated by an intercom, standard door phone calls can interrupt the communication, according to call station programming (interruption parameter - AUX dip 4).

- When the switchboard is called from a main call station, all the other main call stations go in busy state for the off-hook waiting time ( 60 sec. max.). When the switchboard attendant answers and starts the conversation, the busy state is extended to the guaranteed communication time. This time can be configured during installation from 1 to 70 sec . When the guaranteed communication time is elapsed, another call can break the conversation. The max. communication time is 10 minutes. At the end of conversation, for timeout or after the user has hung up, the system goes back to standby mode.

- When the switchboard calls a user, all the main call stations and all the column of the apartment station go in busy state for the offhook waiting time ( $60 \mathrm{sec} . \mathrm{max}$.). When the switchboard attendant starts the conversation by picking the handset up, the busy state can be extended to the guaranteed communication time (this time can be configured during installation from 1 to 70 sec .). The max. communication time is 10 minutes. During busy time, all the other system apartment stations can not perform the auto-on function and can not call the switchboard. At the end of conversation, for timeout or after the user has hung up, the system goes back to standby mode.
4
When a user calls the switchboard, the system will operate in the same way, but the busy condition will start only when the conversation starts.


Main call station

5
In one-column systems, any call coming from or addressed to the switchboard puts the whole system in busy state.


- A floor call does not affect the busy state of the system.


## CALL STATIONS FEATURES

## CALL SENDING

After a call has been performed (for a door units, after pressing the call button), the following cases can occur, according to the status of the call station and the called column:

- System free: the call station emits a tone indicating that the call has been sent (1 beep)
- System busy: the call station emits an alert tone (3 consecutive beeps). At the end of busy time, press the call button to send again the call.


## PEDESTRIAN ELECTRIC LOCK MANAGEMENT

Call stations are provided with 2 terminal pins (SE-, SE+) used to manage a pedestrian electric lock (capacitive discharge type with holding current). In this way, no separated power supply source must be used to activate the electric lock
The electric lock is activated in the following cases:

- Each time the entrance hall button is pressed (PA, CT terminal pins).
- After receiving a door lock release command from an apartment station, according to operation mode 'free' or 'secret':
- 'Secret': when pressed, the door lock release button of an apartment station can activate the call station electric lock only if the apartment station is in conversation with the call station or also if, after a call or auto-on function, the apartment station is involved in a video connection with the call station or is waiting for an answer.
- 'Free': when pressed, the door lock release button of an apartment station can activate the call station electric lock if the call station is configured as main or is configured as secondary and the user belongs to the same column as the call station. This feature is typically used on secondary call stations.
- When a call is sent to an apartment station which is provided with "automatic door lock release" feature and this function is active.

5 During electric lock activation, additional name holders, if powered by door unit ILL terminal pins, turn off.

## DOOR LOCK RELEASE CODES

On call stations with name directory, it is possible to program door lock release codes without time bands for each user and general codes with time band.
Door lock release codes must be numbers composed by 4 digits from 0001 to 4999 for pedestrian lock activation or from 5000 to 9999 for gate lock activation.

## DRIVEWAY DOOR LOCK RELEASE MANAGEMENT

Some door units are provided with two terminal pins connected to the contacts of a normally open relay, that can be used to command a gate opening control panel. The relay is activated for 1 sec . after receiving a driveway door lock release command from an apartment station, according to the configured operation mode, "free" or "secret", as for the pedestrian electric lock.

This relay is NOT suitable to manage directly power loads, but can only be used as command relay. See the section concerning call stations for electrical characteristics.

## APARTMENT STATIONS FEATURES

Some features described below are only available for some devices. Please see the sections concerning apartment stations to check if they are available.

## CALL RECEIVING

After receiving a call, the user apartment station rings with the selected call ring tone (one of the 5 available ones), according to the following timing:

| Call source | Time | Ring total <br> duration |
| :--- | :--- | :--- |
| Main call station | 3 s ON | 3 s |
| Secondary call <br> station | $0,4 \mathrm{~s}$ ON $0,2 \mathrm{~s}$ OFF <br> for 5 times | $2,8 \mathrm{~s}$ |
| Intercom | 0,5 s ON 0,5 s OFF <br> for 3 times | $2,5 \mathrm{~s}$ |
| Switchboard | $0,1 \mathrm{~s}$ ON $0,05 \mathrm{~s}$ OFF <br> for 3 times pause 0,2 <br> s repeated 5 times | $2,8 \mathrm{~s}$ |
| Floor | 3 s ON | 3 s |

。
The floor call ring tone has the same length as the one performed from a main call station, but the call ring tone is different.

To select the call ring tone among the 5 available ones, see the sections concerning apartment stations.
When receiving a video door phone or door phone call, the door unit electric lock can always be activated, also without starting a conversation.
If in the apartment there are more apartment stations in parallel, the stations ring in sequence. If the call comes from a video door phone call station, the internal code with INT=0 of the user also switches the video door phone on.
In this case, during off-hook waiting time (60s starting from the call), the other internal codes can switch their video door phone on by pressing the auto-on button ('video switching' function), until a video door phone of the called user answers.


If the image is already displayed, press the button to display cyclically the images coming from the surveillance cameras of the calling station only.
After picking up the handset or audio activation in case of hands-free stations, the image coming from the main camera will be displayed only on the apartment station which has answered.
So the image is always displayed on a single apartment station.

## AUTO-ON

If the apartment station is in standby mode, press the dedicated button on the video door phone to perform an auto-on function (see the section concerning apartment stations).
When the auto-on function is activated, the user sees the images coming from the camera of the main call station with $I D=0$. It is suggested to set $I \mathrm{D}=0$ on a video door call station, otherwise the auto-on function will not be available. Press repeatedly the button to display images coming from all additional cameras (if present) connected to the main call station, then those connected to the other main call stations and at last those of secondary call stations present in the column. Additional cameras must be included. At the end, the cycle starts again from the main call station 0 .
By picking the handset up or activating audio in case of hands-free call stations, the user starts a conversation with the selected call station. With audio conversation active, the user can open the door at any time. If the user does not activate the audio signal, the auto-on function is terminated 60s after its activation.
For further information, see the paragraph Auto-on function on surveillance cameras.

## INTERCOM CALLS

After programming an apartment station button for intercom function (see programming section), activate audio by picking the handset up or pressing the audio activation button in case of hands-free apartment station. Then press the intercom call button.
The following cases can occur, according to column state:

- Column free: the calling apartment station emits a confirmation tone (1 beep) and the called apartment station rings. When the user picks the handset up, the conversation can start.
- Column busy: the apartment station emits an alert tone (4 fast beeps). Hang up and try again later.


## FLOOR CALL

Apartment stations are provided with two terminal pins (CP) used to connect the floor call button. If the button is pressed, the apartment station emits a 3 s ring, according to the selected call ring tone (different from those of the other calls). If the user has several apartment stations in parallel, connect this button only to one apartment station. However, apartment stations will ring in sequence.

## ADDITIONAL RINGER

Apartment stations are provided with two terminal pins (S+, S-) used to connect an additional ringer, a relay or a wireless call repeater. This ringer is activated at the same time as any call ring tone.

## OPEN DOOR SIGNAL

If a door sensor is connected to terminal pins SP and CT on call stations, apartment stations can check the door physical state. When the door of a main call station is open, the red led is steady on; when the door of a secondary call station is open, the led blinks.
This feature is active only on the last called door phone or video door phone, where the door lock release button has been activated and is related to the last door unit which has called. For further information, see the paragraph Door sensor management for 'open door' function.

## AUTOMATIC DOOR LOCK RELEASE

This feature can be activated or deactivated with the dedicated switch on the apartment station. With the fonction active, a signal led is turned on and, after receiving a call, a pedestrian door lock command will be sent. If the user has several apartment stations in parallel, activate this function on internal code 0 only.

## VIDEO SURVEILLANCE AND ACCESS CONTROL FEATURES

## AUTO-ON FUNCTION ON SURVEILLANCE <br> CAMERAS

Users can perform auto-on function on video door phone call stations by pressing the dedicated button on the apartment station (see sections concerning apartment stations). 2 surveillance cameras can be connected to call stations (terminal pins V3A, V5A, V3B, V5B). Using a video switching device Ref. 1038/69, up to 5 external cameras can be connected to the call station.
When the auto-on function is active, if the user presses repeatedly the button, he can see cyclically in his video door phone the images coming from the camera of the main call station with ID $=0$, then in sequence those connected to the other main call stations and at last those of secondary call stations present in the column.
5 Some call stations are provided with only one auxiliary video input (V3, V5), to which a single control camera or a video switching device can be connected. With the video switching device it is possible to see images coming from up to 4 external cameras.

For example, in the system shown below, camera images will be displayed in the described sequence:


Secondary call station
ID = n AUX dip2 = 1


Secondary call station
$\mathrm{ID}=\mathrm{n}$ AUX dip2 = 0


Main call station ID = 0



Main call station
ID = 1

4 Each time this function is activated, the cycle starts again from the camera of the main call station $I D=0$.

## OPEN DOOR SENSOR MANAGEMENT FOR ‘OPEN DOOR' FUNCTION

Apartment stations have two terminal pins (SP, CT) to manage a normally close sensor used to signal an open door. Apartment stations provided with a signalling led can display with the red led the state of the door of the last calling station, from which the door lock release button has been activated.
When the door of a main call station is open, the red led is steady on; when the door of a secondary call station is open, the led blinks.

FEATURES TABLES
CALL STATION FEATURES

|  | $\sim$ | $\sim$ | $\sim$ | $\sim$ | $\sim$ |
| :--- | :--- | :--- | :--- | :--- | :--- |
|  | $\sim$ | $\sim$ | $\sim$ | $\sim$ | $\sim$ |
| $\sim$ |  |  |  |  |  |

APARTMENT STATION FEATURES

|  | $\underset{\underset{\sim}{\infty}}{\stackrel{\Gamma}{\sim}}$ | $\begin{aligned} & \underset{(N)}{N} \\ & \stackrel{\infty}{\sim} \end{aligned}$ | $\begin{aligned} & \stackrel{\infty}{\infty} \\ & \stackrel{\infty}{\sim} \end{aligned}$ | $\begin{aligned} & \text { 饣o } \\ & \stackrel{\circ}{\circ} \\ & \stackrel{1}{2} \end{aligned}$ | $\begin{aligned} & \stackrel{0}{\circ} \\ & \stackrel{\circ}{\circ} \end{aligned}$ | $\frac{\Gamma}{0}$ | $\begin{aligned} & \stackrel{N}{0} \\ & \stackrel{N}{N} \end{aligned}$ |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Call reception | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Intercom calls |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Pedestrian door lock release activation | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Gate lock release activation | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Call to switchboard | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Preset for additional ringer |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Preset for floor call |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| User directory |  |  |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |  |  |  |  |
| Open door signal |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ (*) | $\left.\checkmark{ }^{*}\right)$ | $\left.\checkmark{ }^{*}\right)$ | $\checkmark$ (*) |
| Automatic door lock release during call |  |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ (*) | $\checkmark$ (*) | $\checkmark$ (*) | $\checkmark$ (*) |
| Call volume adjustment with Mute function |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Capability to connect apartment stations in parallel |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Operation with hearing aid for hard of hearing people |  |  |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Colour display |  |  |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |  | $\checkmark$ | $\checkmark$ | $\checkmark$ |
| Black/white display |  |  |  |  |  |  |  | $\checkmark$ |  |  |  |
| Hands-free audio |  |  |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |  |  |  |  |

(*) Available only with add-on buttons unit Ref. 1083/96..

## SYSTEM

## INSTALLATION AND ACTIVATION

SYSTEM INSTALLATION 2
REGULATIONS AND NOISE IMMUNITY ..... 2
SYSTEM POWER SUPPLY ..... 2
ALLOWED CABLES ..... 2
WIRING ..... 2
MAX. DISTANCES AND EXTENSIONS .....  3
SYSTEM ACTIVATION ..... 11
LINE TERMINATIONS SETTING ..... 11
DEVICES CONFIGURATION ..... 11
Call stations ..... 11
Apartment stations (door phones and brackets) ..... 12
Column interfaces ..... 13
POWER-UP AND SUPPLY VOLTAGE CHECK ..... 13
SYSTEM CHECK ..... 13
How to split the system ..... 13
ASSOCIATION OF DOOR UNITS BUTTONS TO USERS ..... 14
Main doors unit. ..... 15
Secondary doors unit ..... 15
OPTIONAL PROGRAMMING ..... 15SECTION CONTENTS

## SYSTEM INSTALLATION

## REGULATIONS AND NOISE IMMUNITY

All devices must be perfectly installed and wired, observing national installation rules.
Pay attention to power supply units and transformers, that must be placed in suitable electrical service panels and provided with properly dimensioned protection switches and circuit breakers.
All system devices are compliant with EC Directives concerning electromagnetic compatibility and electric safety. The power supply unit is also provided with IMQ and VDE approval marks.
However, to improve noise immunity, do not lay system wires near power supply cables, that generate strong electromagnetic fields.
If the above described rules are not observed, the following problems, typical for all video door phone systems, could occur with unforeseeable frequency and importance:

- Errors during data transmission among devices, with possible problem when performing calls.
- Low image quality: loss of details, double vision, ...
- Noisy video image.
- Noisy audio signal.


## SYSTEM POWER SUPPLY

In brief, to evaluate the number of system power supply units Ref. 1083/20, consider that 1 power supply unit is enough for a onecolumn system with 1 or 2 call stations, up to 128 apartment stations and 1 column interface.
In systems with more than one column, 1 power supply must be added for each column.
In systems with more than one main call station and door units interface, add one power supply.

## ALLOWED CABLES

The 2VOICE bus is NON polarized. The cable (Ref.1083/90 or Ref.1083/92) has been designed to ensure the maximum distance and dimensions of the system. Because this cable is twisted, a good noise immunity is ensured.

Ly
For system max. extensions and types when different kinds of cables are used, see the next paragraphs.

WARNING ! If multi-pole cables are used, it is absolutely forbidden to short-circuit several conductors in order to increase the cable section.

For long distance branches, it is suggested to reduce to the minimum joint points between cables. For joints, use devices ensuring a good and lasting connection between cables, protecting the joint against humidity and bad weather.

## WIRING

To improve noise immunity, do not lay system wires near power supply cables, that generate strong electromagnetic fields.


Besides main devices (for allowed distances, see the paragraph "Max. distances and dimensions", the system can be composed by other additional devices. To connect these devices, the max. distances (in metres) are shown in the following tables, provided that suitable sections cables are used.

| Cable section [mm²] |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| From call station <br> to.. | 0,28 | 0,5 | 1 |  |  |  |
| Pedestrian electric lock | 10 m | 20 m | 30 m |  |  |  |
| Gate opening control unit | 30 m | 50 m | 100 m |  |  |  |
| Entrance hall button | 25 m |  |  |  |  |  |
| Door sensor | 25 m |  |  |  |  |  |
| Surveillance camera switch | 300 m |  |  |  |  |  |


|  | Cable section $\left[\mathrm{mm}^{2}\right]$ |  |  |
| :--- | :---: | :---: | :---: |
| From call station <br> to $\ldots$ | 0,75 | 1,5 | 2,5 |
| Name holder lighting transformer | 100 m | 200 m | 300 m |


| Cable section [mm²] | 0,28 | 0,5 | 1 |
| :--- | :---: | :---: | :---: |
| From ap. stations to... | 10 m |  |  |
| Floor call button (CP) | 10 m |  |  |
| Additional ringer (S+,S-) |  |  |  |

Follow the instructions below for a correct wiring, in order not to change cables specifications:

- Use only the cable indicated in the previous paragraphs;
- The min. radius of curvature must not be shorter than 10 times the external diameter of the cable (about 7 cm );
- The system cable must be unsheathed only for the needed segment. This allows to minimize the separation of the wire pair of the double-wire line;
- Do not perform electrical junctions to connect devices out of the devices terminal pins, except for column segments only composed by door phones.



## MAX. DISTANCES AND EXTENSIONS

## DOOR PHONE RISERS CONNECTION

This chapter describes the different connection modes of an audio only riser, regardless if it is derived from a system power supply, a column interface or a door units interface.
The following indications are valid for audio only systems; these distances can not be applied if even one video device is present (video door entrance panel or video door phone).

Connection of a door phone riser with electric nodes.
128 apartment stations
max. in column

$A=$ distance between the node and the door phone
$\mathrm{Bc}=$ distance between the device from which the riser is derived and the most distant node

| Cable | No. of <br> users | distance |  |  |
| :--- | :---: | :---: | :---: | :---: |
|  |  | Bc | A+Bc |  |
| 2Voice cable | 128 | 50 m | 600 m | 600 m |
| Ø 0,6mm telephone pair <br> without sheath | 64 | 50 m | 300 m | 300 m |
| CAT5 UTP (one twisted pair) | 64 | 50 m | 200 m | 200 m |
| HVV05-F 1,5 mm <br> covered | rubber | 128 | 50 m | 300 m |
| 7057/235 Urmet cable (blue/ <br> red) | 64 | 50 m | 300 m | 300 m |
| $1 \mathrm{~mm}^{2}$ section single cable | 32 | 50 m | 300 m | 300 m |

For system extensions and connection of street side branch and call stations see the next paragraphs.

In-out connection for a door phone riser

$\mathrm{Bc}=$ distance between the device from which the riser is derived and the most distant door phone

| Cable | No. of | distance |
| :--- | :---: | :---: |
|  | users | Bc |
| 2Voice cable | 128 | 600 m |
| $\varnothing 0,6 \mathrm{~mm}$ telephone pair without sheath | 128 | 300 m |
| CAT5 UTP (one twisted pair) | 128 | 200 m |
| HVV05-F 1,5 $\mathrm{mm}^{2}$ rubber covered | 128 | 300 m |
| $7057 / 235$ Urmet cable (blue/red) | 128 | 300 m |
| $1 \mathrm{~mm}^{2}$ section single cable | 128 | 300 m |

5or system extensions and connection of street side branch and call stations see the next paragraphs.

## Connection of a door phone riser with distributors


$A=$ distance between the 4-user distributor and the door phone $\mathrm{Bc}=$ distance between the device from which the riser is derived and the most distant 4-user distributor

| Cable | No. of | distance |  |  |
| :--- | :---: | :---: | :---: | :---: |
|  | users | A | Bc | A+Bc |
| 2Voice cable | 128 | 50 m | 200 m | 200 m |
| $\varnothing$ <br> Sheath | $0,6 \mathrm{~mm}$ telephone pair without | 64 | 50 m | 150 m |
| CAT5 UTP (one twisted pair) | 64 | 50 m | 125 m | 125 m |
| HVV05-F 1,5 $\mathrm{mm}^{2}$ rubber covered | 128 | 50 m | 125 m | 125 m |
| $7057 / 235$ Urmet cable (blue/red) | 64 | 50 m | 125 m | 125 m |
| $1 \mathrm{~mm}^{2}$ section single cable | 32 | 50 m | 50 m | 75 m |

## 5

For system extensions and connection of street side branch and call stations see the next paragraphs

## CONNECTION OF ONE-COLUMN DOOR PHONE SYSTEMS

This chapter describes different connection modes of door phone call stations in systems with only one riser column of door phones


The following indications are valid for audio only systems; these distances can not be applied if even one video door phone device is present (video door entrance panel or video door phone).

One-column with one door phone call station
$C$ = distance between the power supply and the call station
For connection and distances of the riser, see the paragraph "Door phone risers connection"

| Cable | distance | estension <br> (*) |
| :--- | :---: | :---: |
| 2Voice cable | 600 m | 800 m |
| $\varnothing 0,6 \mathrm{~mm}$ telephone pair without sheath | 300 m | 600 m |
| CAT5 UTP (one twisted pair) | 200 m | 800 m |
| HVV05-F 1,5 mm² rubber covered | 300 m | 300 m |
| $7057 / 235$ Urmet cable (blue/red) | 300 m | 300 m |
| $1 \mathrm{~mm}^{2}$ section single cable | 300 m | 300 m |

(*) the system extension is the sum of all the single segments which compose it:
$\mathrm{C}+\mathrm{Bc}+\mathrm{A} 1+\mathrm{A} 2+\ldots+\mathrm{An}$


Devices derived from a column interface with one or two door phone call stations


Cx = distance between the column interface and the call station $D=$ distance between the column interface and the power supply
4. For connection and distances of the riser, see the paragraph "Door phone risers connection"

| Cable | distance |  | estension (*) |
| :---: | :---: | :---: | :---: |
|  | Cx | D |  |
| 2Voice cable | 400m | 5 m | 800m |
| Ø $0,6 \mathrm{~mm}$ telephone pair without sheath | 100m | 5 m | 600m |
| CAT5 UTP (one twisted pair) | 100m | 5 m | 800m |
| HVV05-F 1,5 mm ${ }^{2}$ rubber covered | 50 m | 5 m | 300 m |
| 7057/235 Urmet cable (blue/red) | 50 m | 5 m | 300 m |
| $1 \mathrm{~mm}^{2}$ section single cable | 50 m | 5 m | 150 m |

(*) the system extension is the sum of all the single segments which compose it:
$\mathrm{C} 1+\mathrm{C} 2+\mathrm{D}+\mathrm{Bc} 1+\mathrm{Bc} 2+\mathrm{Bc} 3+\mathrm{Bc} 4+\mathrm{A} 1+\mathrm{A} 2+\ldots+\mathrm{An}$
4 The above mentioned indications must be considered also when the column interface is connected on the street side branch in systems with more than one column.

Devices derived from a door units interface with 4 door phone call stations max.

$E x=$ distance between the door units interface and the call station
$\mathrm{Dx}=$ distance between the door units interface and the power supply
For connection and distances of the riser, see the paragraph "Door phone risers connection"

| Cable | distance |  | estension |  |
| :--- | :---: | :---: | :---: | :---: |
|  | Ex | Dx | call station | column |
| 2Voice cable | 400 m | 5 m | 1600 m | 800 m |
| $\varnothing$ <br> pair without sheath | 200 m | 5 m | 800 m | 600 m |
| CAT5 UTP (one twisted <br> pair) | 100 m | 5 m | 400 m | 800 m |

The call stations extension is the sum of segments $\mathrm{E} 1+\mathrm{E} 2+\mathrm{E} 3+\mathrm{E} 4+\mathrm{D} 1$ and the column extension is the sum of segments $\mathrm{Bc} 1+\mathrm{Bc} 2+\mathrm{Bc} 3+\mathrm{Bc} 4+\mathrm{A} 1+\mathrm{A} 2+\ldots+\mathrm{An}+\mathrm{D} 2$.

## VIDEO DOOR PHONE RISERS CONNECTION

This chapter describes the different connection modes of a riser provided with at least one video door phone, regardless if it is derived from a system power supply, a column interface or a door units interface.
LISpecial decoders and door phone connections are similar, but special decoders must be installed at the end of a branch. On the decoder In/out connection can not be performed.

Connection of a video door phone riser with distributors

$A=$ distance between the 4-user distributor and the apartment station
$\mathrm{Bv}=$ distance between the device from which the riser is derived and the most distant 4-user distributor

| Cable | No. of users | video | distance |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | A | Bv | A+Bv |
| 2Voice cable | 128 | Colori | 50m | 200m | 200m |
|  |  | B/N | 50m | 200m | 200m |
| $\varnothing \quad 0,6 \mathrm{~mm}$ telephone pair without sheath | 64 | Colori | 50m | 150m | 150m |
|  |  | B/N | 50m | 125m | 125m |
| CAT5 UTP (one twisted pair) | 64 | Colori | 50m | 125m | 125m |
|  |  | B/N | 50m | 75m | 75m |
| $\text { HVV05-F } \quad 1,5 \quad \mathrm{~mm}^{2}$ rubber covered | 128 | Colori | 50m | 125m | 125m |
|  |  | B/N | 50m | 125m | 125m |
| 7057/235 Urmet cable (blue/red) | 64 | Colori | 50m | 125m | 125m |
|  |  | B/N | 50m | 125m | 125m |
| $1 \mathrm{~mm}^{2}$ section single cable | 32 | Colori | 50m | 50m | 75m |
|  |  | B/N | 50m | 50m | 75m |

4
For system extensions and connection of street side branch and call stations see the next paragraphs.

## Apartment stations derived by a distributor


$\mathrm{A}=$ distance between the 4-user distributor and the most distant apartment station

| Cable | No. of <br> users | distance |
| :--- | :---: | :---: |
|  |  |  |
| $\varnothing$ 0,6mm telephone pair without sheath |  |  |
| CAT5 UTP (one twisted pair) | Max 4 | 50 m |
| HVV05-F 1,5 mm² rubber covered |  |  |
| $7057 / 235$ Urmet cable (blue/red) |  |  |
| $1 \mathrm{~mm}^{2}$ section single cable |  |  |

In/out connection of a video door phone riser
32 video door phone apartme
stations max. for each riser

$\mathrm{Bv}=$ distance between the device from which the riser is derived and the most distant apartment station

| Cable | No. of <br> users | video | distance |
| :--- | :---: | :--- | :---: |
|  |  |  |  |
| 2Voice cable | 32 | Colori | 200 m |
|  |  | B/N | 200 m |
| Ø 0,6mm telephone pair without <br> sheath | 32 | Colori | 190 m |
|  |  | B/N | 190 m |
| CAT5 UTP (one twisted pair) | 32 | Colori | 190 m |
|  |  | B/N | 115 m |
| HVV05-F 1,5 mm² rubber covered | 32 | Colori | 150 m |
|  |  | B/N | 150 m |
| $7057 / 235$ Urmet cable (blue/red) | 32 | Colori | 100 m |
|  |  | B/N | 100 m |
| $1 \mathrm{~mm}^{2}$ section single cable | 32 | Colori | 100 m |
|  |  | B/N | 100 m |

4 For system extensions and connection of street side branch and call stations see the next paragraphs.

## ONE-COLUMN VIDEO DOOR PHONE SYSTEMS CONNECTION

This chapter describes the different connection modes of video door phone call stations in systems with only one riser column of apartment stations.

One-column with one video door phone call station

$C=$ distance between the power supply and the call station
5or connection and distances of the riser, see the paragraph "Video door phone risers connection"

| Cable | video | distance | estension (*) |
| :---: | :---: | :---: | :---: |
|  |  | C |  |
| 2Voice cable | Colori | 200m | 800m |
|  | B/N | 200m | 800m |
| $\varnothing 0,6 \mathrm{~mm}$ telephone pair without sheath | Colori | 100m | 600m |
|  | B/N | 100m | 600m |
| CAT5 UTP (one twisted pair) | Colori | 100m | 800m |
|  | B/N | 100 m | 800m |
| HVV05-F $1,5 \mathrm{~mm}^{2}$ rubber covered | Colori | 50 m | 300m |
|  | B/N | 50 m | 300m |
| 7057/235 Urmet cable (blue) red) | Colori | 50 m | 300m |
|  | B/N | 50 m | 300m |
| $1 \mathrm{~mm}^{2}$ section single cable | Colori | 50 m | 150 m |
|  | B/N | 50m | 150 m |

(*) the system extension is the sum of all the single segments which compose it:
$\mathrm{C}+\mathrm{Bv}+\mathrm{A} 1+\mathrm{A} 2+\ldots+\mathrm{An}$

Devices derived from a column interface with one or two video door phone call stations


Cx = distance between the column interface and the call station
$D=$ distance between the column interface and the power supply
5. For connection and distances of the riser, see the paragraph "Video door phone risers connection"

| Cavo | distance |  | estension <br> (*) |
| :--- | :---: | :---: | :---: |
|  | Cx | D |  |
| 2Voice cable | 200 m | 5 m | 800 m |
| $\varnothing$ <br> sheath | 100 mm | 5 m | 600 m |
| CAT5 UTP (one twisted pair) | 100 m | 5 m | 800 m |
| HVV05-F 1,5 mm² rubber covered | 50 m | 5 m | 300 m |
| $7057 / 235$ Urmet cable (blue/red) | 50 m | 5 m | 300 m |
| $1 \mathrm{~mm}^{2}$ section single cable | 50 m | 5 m | 150 m |

(*) the system extension is the sum of all the single segments which compose it:
$\mathrm{C} 1+\mathrm{C} 2+\mathrm{D}+\mathrm{Bv} 1+\mathrm{Bv} 2+\mathrm{Bv} 3+\mathrm{Bv} 4+\mathrm{A} 1+\mathrm{A} 2+\ldots+\mathrm{An}$
4
The above mentioned indications must be considered also when the column interface is connected on the street side branch in systems with more than one column.

Devices derived from a door units interface with 4 video door phone call stations max.


Video door phone call station
Ex = distance between the door units interface and the call station
$\mathrm{Dx}=$ distance between the door units interface and the power supply
For connection and distances of the riser, see the paragraph "Video door phone risers connection"

| Cable | distance |  | estension |  |
| :--- | :---: | :---: | :---: | :---: |
|  | Ex | Dx | call station | column |
| 2Voice cable | 200 m | 5 m | 800 m | 800 m |
| $\varnothing$ <br> pair without sheath | 200 m | 5 m | 800 m | 600 m |
| CAT5 UTP (one twisted <br> pair) | 100 m | 5 m | 400 m | 800 m |

The call stations extension is the sum of segments $\mathrm{E} 1+\mathrm{E} 2+\mathrm{E} 3+\mathrm{E} 4+\mathrm{D} 1$ and the column extension is the sum of segments Bv1+Bv2+Bv3+Bv4+A1+A2+... +An+D2.

## STREET SIDE BRANCHES CONNECTION IN SYSTEMS WITH MORE THAN ONE COLUMN

This chapter describes the different connection modes of street side branch between the door units interface and the various column interfaces.

Connection of 16 columns max., each one with 2 secondary call stations and one main call station

$G=$ distance between the main call station and the most distant column interface

| Cable | distance |
| :--- | :---: |
|  | G |
| 2Voice cable | 200 m |

For distances and extension of each column, see paragraph "Devices derived from a column interface with one or two video door phone call stations".

Street side branch connection split on the 4 outputs of door units interface


For distances and extension of each column, see paragraph "Devices derived from a column interface with one or two video door phone call stations".
UTIICT SYSTEM INSTALLATION

Street side branch connection split on the 2 outputs of door units interface

interface

| Cable | No. of column <br> interfaces for <br> each branch | distance | Street side branch <br> extension |
| :--- | :---: | :---: | :---: |
|  |  | G1+G2 |  |
| 2Voice cable | Max 16 | 400 m | 800 m |

For distances and extension of each column, see paragraph "Devices derived from a column interface with one or two video door phone call stations".

Street side branch connection split on only 1 output of the door units interface


| Cable | No. of column <br> interfaces for <br> each branch | distance |
| :--- | :---: | :---: |
|  |  | 400 m |

For distances and extension of each column, see paragraph "Devices derived from a column interface with one or two video door phone call stations".

Street side branch connection split on only 1 output of the door units interface using 84-user distributors Ref. 1083/55


For distances and extension of each column, see paragraph "Devices derived from a column interface with one or two video door phone call stations".


Street side branch connection split on only 1 output of the door units interface using 84-user distributors Ref. 1083/55


For distances and extension of each column, see paragraph "Devices derived from a column interface with one or two video door phone call stations".

## SYSTEM ACTIVATION

After wiring the devices, perform the following operations in sequence:

1. Set line terminations
2. Configure the devices
3. Power the system on and check power supply voltage
4. Check the system
5. Assign door units buttons to users
6. Perform basic functional check
7. After all the previous operations, perform optional programming procedures, if requested.

## LINE TERMINATIONS SETTING

2VOICE system elements must be connected each other via a true transmission network. To ensure correct operation, each segment of the network must match the cable impedance.
On apartment stations, distributors and column interfaces there is a jumper that allows to add the line termination ( $Z$ ).
The line termination must be activated in all the wired devices at the end of a line that has no other segments starting from the same terminal pins of the device (line end):


To identify the position of the line termination jumper on devices, see the sections concerning the single products.
4. Call stations and special decoder are provided with a not removable termination line, so they must always be connected to the end of a line

## DEVICES CONFIGURATION

This paragraph analyses only the parameters essential for system operation. For custom configurations (door lock release mode and time, busy time, etc.), see the section about each product.

## CALL STATIONS

ID: door unit identifier

- Each main call station must have a unique code (called ID, i.e. IDentifier);

- In case of secondary call station, the ID must be the same as the column ID configured on the column interface.


AUX: auxiliary settings

- Station type

The door unit can be configured as main or secondary. From the main door unit, all the system users can be called, from the secondary door unit only the users of that column can be called. The called user can identify the call source thanks to the call ring timing.

- Secondary call station number

In the same column 2 secondary call stations can be installed, but they must have different addresses (0 or 1 ).

The secondary call station number 0 must be connected to column interface INO input, the secondary call station number 1 must be connected to IN1 input.
 be connected and configured as follows:


## APARTMENT STATIONS (DOOR PHONES AND BRACKETS)

Each apartment station must be configured with a user code which can be set by dip-switch, with values from 0 to 127 and with an internal code which can be set from 0 to 3.
All apartment stations automatically acquire a column identifier from their column interface. If no column interfaces are present in the system, the identifier is the one set in factory, the same for all the devices.
If a new apartment station is installed in a column, wait at least two minutes until the identification code is updated.
If the new apartment station is already used in other systems, perform the procedure used to reset all the programmed data. This procedure is described in the paragraph about the apartment station.

CODE: user code
Set a number from 0 to 127, according to the following rules:

- In the same column, each apartment must have a different user code.
- Apartment stations in parallel in the same apartment must have the same user code.

INT: apartment station internal code.
The internal code is used to identify the single apartment stations of the same user. This allows to perform intercom calls to the single station inside the same apartment.
Set a number from 0 to 3, following the instructions below:

- If in the apartment there is only one apartment station, the internal code must be set to 0 .
- In apartments, up to 4 apartment stations can be connected in parallel with the same user code, but with different internal codes.
- If in the system there are door phone and video door phone apartment stations in parallel, the internal code 0 must be set on a video door phone.

In case of intercom calls to another apartment, calls coming from call stations or floor call, all the apartment stations of that user ring. After receiving a call, the internal code 0 rings immediately and the internal codes 1,2 and 3 ring in sequence.
If the call comes from a video door phone call station, the internal code 0 switches also the monitor on.
However, the other stations of that user can press a specific button to switch their monitor on and switch off the other ('video switching' function - see section 1, paragraph "calls receiving").

Programming examples:

- 2 users each with 1 apartment station, connection with distributor

- user with 2 apartment stations called at the same time, connection with distributor

- 1 user with 2 apartment stations called at the same time, $\ln /$ out connection

- 1 user with 2 apartment stations (one audio only) called at the same time, In/out connection



## COLUMN INTERFACES

Each column interface must be indentified by a unique code (called column ID), set with dip-switch with values from 0 to 31.
If present, door units connected to the column interface must have the same ID.

- DIP1

This switch allows to inform the system if the column interface is connected to any devices on LINE IN terminal pins: if no devices are connected to LINE IN (in case of a simple system, with only one or two call stations directly connected to IN1 and INO inputs of the column interface), it must be set to ON.


- DIP $2 \div 6$

Used to program the column identification code (ID).

## POWER-UP AND SUPPLY VOLTAGE CHECK

After performing carefully line terminations settings and devices configurations, before mounting monitors on brackets, the system can be powered and the following checks can be performed, with the system in standby mode:

## Power supply unit Ref. 1083/20

Check that on each pair of terminal pins LINE1 and LINE2 there is a continuous voltage between 44 Vcc and 48 Vcc .

## Call stations

Check that on terminal pins LINE there is a continuous voltage between 38 Vcc and 48 Vcc .

## Video distributors Ref. 1083/55

Check that on terminal pins LINE (IN/OUT) and LINE1-4 there is a continuous voltage between 38 Vcc and 48 Vcc .

## Apartment stations

Check that on terminal pins LINE there is a continuous voltage between 38 Vcc and 48 Vcc .

## Column interfaces

Check that on terminal pins POWER, LINE IN and LINE OUT, if connected, there is a continuous voltage between 38 Vcc and 48 Vcc .

## Interfaces for door units

Check that on terminal pins POWER IN and POWER LINE there is a continuous voltage between 38Vcc and 48Vcc.

## SYSTEM CHECK

To check that call stations have different identification codes, follow the instructions below:

- Access the advanced configuration according to the modes indicated for each call station in respective sections.
- Quit the advanced configuration.

In case of presence of more than one call station with the same identification code, the emission of repetitive beeps signals the error.

## HOW TO SPLIT THE SYSTEM

It may be useful to split the system into sections to isolate suspected branches when troubleshooting or seeking incorrectly wired areas.
Always disconnect the wiring starting side, not the ending one; avoid leaving connected cables without connected devices.
As already mentioned, the interconnection of devices forms an adapted transmission network. It is not therefore possible to disconnect parts of the system without considering the changes that this operation will cause. Observe the following rules:

- If a segment connected in in/out mode is disconnected, activate the line termination on the last device of the branch.


In the figure, the apartment stations 2 and 3 are separated from the rest of the system, so the apartment station 1 becomes the last one and must have the line termination active.

- If a segment that uses distributors is disconnected, the line termination must be activated on the last distributor.


In the example, the distributor 3 is separated from the rest of the system, so the distributor 2 becomes the last one and must have the line termination active.

- If a column interface street side segment is disconnected, put the interface line termination in ON position.


In the example shown in the figure, the interface with ID=2 is separated from the rest of the system, so the interface with ID=1 becomes the last one and must have the line termination active.

- If a column interface street side incoming line is disconnected, put the interface dip-switch 1 in ON position.

or door units interface


## ASSOCIATION OF DOOR UNITS BUTTONS TO USERS

Buttons can be connected to the door unit with expansion modules 1038/17.

## MAIN DOOR UNITS

If the door unit is configured as main, buttons are automatically associated to column 0 ; this makes installation of main call stations easier in one-column systems.


If the door unit is configured as main and in the system there are more than one column, buttons and column users must be associated, following the procedure indicated for each call station in respective sections.
If the call station is composed by a call module with directory, to associate codes to users enter names in directory with respective codes.

## SECONDARY DOOR UNITS

In door units configured as secondary, buttons are associated by default to the users from 0 to 63 of their column.


If door units are configured as secondary, but each station must call a different group of users, it is possible to follow the procedure indicated for each call station in respective sections.

## BASIC FUNCTIONAL CHECK

After checking that all devices are properly powered and line terminations correctly activated, check the system operation. This check consists in calling users from door units, verify the call ring tone in all the apartment stations of the called user, verify the image, in case of video door phone call, verify audio, pedestrian electric lock activation and driveway door lock release.

1. Press a call button in a main call station.

- The door unit emits a tone indicating that the call has been issued.

2. When the user receives the call, check the following points:

- The internal user code 0 rings and the display shows the image of the calling user. The user must answer within 60 seconds, by picking up the handset or pressing the audio button (in case of hands-free apartment stations).
- In case of several apartment stations in parallel, the display of internal stations 1, 2 and 3 does not show any image. Press the auto-on button on one of these internal stations to switch on the display of that video door phone ('video switching' function). This operation can be repeated on all the monitors of the called user within 60 seconds from the call or until an internal station answers. In this case, the image is shown only in the apartment station which has answered.
- When the user answers, the conversation with the caller starts for a max. time of 10 minutes.
- From the call beginning and until the conversation ends, the user can activate the pedestrian electric lock or the driveway door lock release by pressing the dedicated buttons.

3. Close the conversation by hanging up the handset or pressing again the audio button (on hands-free apartment stations). All the system goes back to standby mode.
4. Repeat the same operations for all system users.
5. If other call stations are present in the system, repeat all the operations starting from point 1 for the other call stations. Consider that monitors are not activated if the door unit is not video type.

## OPTIONAL PROGRAMMING

After system basic operation check has been performed, follow the advanced programming procedure below.

1. Auto-on function on surveillance cameras: in case of surveillance cameras connected to one or more call stations, this function must be programmed.
2. Intercom function between apartment stations: a user code or an internal code must be associated to a button.
3. Door phone call ring tone: 5 different call ring tones can be selected.
4. Floor call ring tone: 5 different call ring tones can be selected.

These operations are necessary only if these additional functions are requested.
For programming modes of these functions, see chapters about
the single devices.
-

## Download from www.urmetdomus.com Technical Manuals area.

SINTHESI PUSH BUTTON PANEL ..... 2
CAMERA MODULE AND DOOR UNIT WITH 2 BUTTONS Ref.1083/72 ..... 2
Features. ..... 2
Structure ..... 2
Terminals pins description ..... 3
Technical characteristics ..... 3
Default programming ..... 3
Operation. ..... 3
Camera lens orientation adjusting .....  4
Audio adjusting ..... 4
Name holders lighting ..... 4
DOOR UNIT MODULE WITH 2 BUTTONS Ref.1083/7 .....  .5
Features. ..... 5
Structure ..... 5
Terminals pins description ..... 5
Technical characteristics ..... 6
Default programming ..... 6
Operation ..... 6
Audio adjusting ..... 6
Name holders lighting .....  6
1-button front unit ..... 7
16-USER EXPANSION MODULE Ref.1038/17 ..... 8
Connection example. .....  8
Terminals pins description ..... 8
Technical characteristics ..... 8
PRODUCT LISTS ..... 8
INSTALLATION. ..... 9
OVERALL DIMENSIONS ..... 12
MODULARITY EXAMPLES ..... 13
CONFIGURATION ..... 23
ASSOCIATION OF DOOR UNITS BUTTONS TO USERS ..... 24
Main door units ..... 24
Secondary door units ..... ,
OPTIONAL PROGRAMMING ..... 26
Auto-on function on surveillance cameras ..... 26
Button configuration for special function ..... 26
PROGRAMMING DATA DELETING ..... 26
SECTION CONTENTS

## SINTHESI PUSH BUTTON PANEL



The system consists of anodized aluminium profile modular elements and is composed by modules which can be fitted in specific module holder frames.
Using suitable spacers, flush mounting boxes can be combined to realize any type of push button panels, reducing the number of components and cards managed in stocks. This is to wholesaler's and installer's advantage.
Module installation is easy, thanks to pre-wired connections on modules and to rising clamp removable terminal blocks.
All Sinthesi products, their characteristics and installation modes are described in "Products Technical Manual - Door Phone and Video Door Phone systems" in the section "Sinthesi Push Button Panel".

## CAMERA MODULE AND DOOR UNIT WITH 2 BUTTONS Ref. 1083/72

## FEATURES

- Installation on Sinthesi module holder frames with 2 modules.
- Two pre-wired call buttons.
- 4 expansion modules (connected in series) can be connected, up to 64 user buttons max. for each door unit.
- Connection of 16-user expansion module Ref. 1038/17 with connector.
- Up to 4 main call stations and up to two secondary call stations can be connected for each column.
- Fixed focus colour camera with embedded lens and shutter.
- Lens orientation can be adjusted.
- Embedded illuminator, that can be excluded under sufficient lighting conditions.
- Codes sequences can be assigned to call buttons with dip-switch.
- All the programming procedure can be performed with dip-switch.
- Off-hook waiting time: 60 seconds (system busy).
- The guaranteed communication time can be programmed with rotary-switch up to 70 seconds (system busy).
- Max. conversation time starting when the handset is picked up: 10 minutes.
- Tone for confirming call sending and conversation end.
- Video-audio signals of system busy.
- Pedestrian electric lock command actuator. Programmable timing with rotary-switch from 1 to 90 seconds.
- Driveway electric lock command actuator with clean contact.
- Electric lock management: Free or Secret.
- Circuitry for electric lock activation with entrance hall button.
- Input for open door sensor.
- Trimmer for adjusting loudspeaker and microphone audio level.
- Management of two external coax video inputs for surveillance cameras, if present.
- Relay box driving for cyclic control of several video surveillance cameras.
- Output for power supply of name holders lighting (up to 32 buttons with the power supply unit Ref. 1083/20).
- Audio repeater device for hard of hearing people.


## STRUCTURE



REAR VIEW


1. Camera
2. Signalling yellow led
3. Microphone
4. Pre-wired buttons
5. Name holders
6. Loudspeaker
7. Rotary-switch for pedestrian door lock release activation time
8. Auxiliary settings dip-switch
9. Identification code dip-switch
10. Busy time rotary-switch
11. Connector for expansion module
12. Loudspeaker volume adjustment
13. Microphone volume adjustment
14. Terminal blocks

## TERMINAL PINS DESCRIPTION

## LINE

LINE Incoming Bus line
SE+ Positive for pedestrian electric lock activation
SE- Negative for pedestrian electric lock activation
V3A Surveillance camera 1 signal
V5A Reference for surveillance camera 1 signal
V3B Surveillance camera 2 signal / video switch
V5B Reference for surveillance camera 2 / video switch
ILA $\}$ Hard of hearing device output
SE2 $\}$ Driveway electric lock activation
T+ Command for video switch
T- Reference for video switch
CT Reference for PA and SP
PA Entrance hall button
SP Open door sensor (*)
ILL $\}$ Power supply for name holders lighting
$\left.\begin{array}{l}- \\ +\end{array}\right\}$ Do not use
(*) the terminal pin SP is connected by default to the terminal pin CT; to connect the normally close door sensor (with closed door), remove the jumper.

## TECHNICAL CHARACTERISTICS

Power supply voltage (LINE):
Standby current consumption
Max. current consumption:
(video call and name holders on)
Name holders lighting ILL output:
Lock output SE+ and SE-:
SE2 switched load:
Operating temperature range:
Compliant with:
$36 \div 48 \mathrm{Vcc}$ 45mA max 250mA max
$11 \div 13,8 \mathrm{Vcc}$ max 200 mA $22 \div 24 \mathrm{Vcc}$ max 200 mAdc 300mA 125V Max $-10^{\circ} \mathrm{C} \div+50^{\circ} \mathrm{C}$ EN 61000-6-3, EN 61000-6-1

## DEFAULT PROGRAMMING

All cameras are configured in factory as follows:
Call station type:
Secondary number:
Door lock release:
Interruption:
Camera illuminators:
Busy time rotary:
Door lock release rotary:
Door unit number:
Power supply:

## OPERATION

## CALLS

Up to 64 users max. can be called by pressing the respective buttons of the push button panel associated to the camera Ref. 1083/72.
After pressing the call button, the two following cases can occur:

- The line is free: the door unit emits a confirmation tone and the call is sent to the selected user.
- The line is busy: the door unit emits an alert tone and the yellow led on the front blinks (when the busy time is elapsed, the call must be sent again)


## 0

If in the system there is a concierge switchboard in "Day" mode, all the calls performed from the main call stations are intercepted and managed by the switchboard.

## PEDESTRIAN ELECTRIC LOCK ACTIVATION

Door units are provided with two terminal pins for pedestrian electric lock activation (SE-, SE+). The electric lock is activated in the following cases:

- Each time the entrance hall button is pressed (terminal pins PA, CT).
- After receiving a door lock release command from an apartment station, according to the configuration of the dip-switch used to configure the operating mode "free" or "secret" (see section "2VOICE system", paragraph "Call stations features").
- When the call is sent to an apartment station which is provided with "automatic door lock release" feature and this function is active.

If electric locks to be activated need special timing, the rotary switch "DOOR TIME" must be adjusted.
L. During electric lock activation, additional name holders, if powered by door unit terminal pins ILL, switch off.

## DRIVEWAY DOOR LOCK RELEASE MANAGEMENT

Door units are provided with two terminal pins (SE2) connected to the contacts of a normally open relay, that can be used to command a gate opening control panel. The relay is activated for 1 sec . after receiving a driveway door lock release command from an apartment station, according to the configured operation mode, "free" or "secret", as for the pedestrian electric lock.

[^0]
## CAMERA LENS ORIENTATION ADJUSTING

After installation, camera orientation can be adjusted according to the position of the camera and the captured subject. This operation can be performed manually, after removing the frame and the extractable front unit. Move the articulated stand on the front side. It is not necessary to fold down the frame or use special tools.


## VIEWING ANGLES

Camera moving angles regarding the centered position are the following:
VERTICAL $+10 \div-15^{\circ} \quad$ HORIZONTAL $+10 \div-10^{\circ}$


Measures in cm

## AUDIO ADJUSTMENT

Audio levels are trimmed in factory, so they don't need to be changed in most installations.
If it is necessary to change them, use a screwdriver on the suitable adjusting points.


## NAME HOLDERS LIGHTING

If the call station has more than 32 name holders, an additional transformer must be used for button modules lighting.
In this case, the terminal pins "ILL" of the call station must not be connected to the button modules.


The transformer Ref. 9000/230 can provide 11,2 W power, that is up to 64 name holders max.
The number of name holders could be reduced according to distance and section of the used cable.

## DOOR UNIT MODULE WITH 2 BUTTONS Ref.1083/7

## FEATURES

- Installation on 2-module Sinthesi module holder frames.
- Two pre-wired call buttons.
- 4 expansion modules can be installed (connected in series), up to 64 user buttons max. for each door unit.
- Connection of 16-user expansion module Ref. 1038/17 with connector.
- Up to 4 main call stations and up to 2 secondary call stations can be connected for each column.
- Code sequences can be assigned to call buttons with the dipswitch.
- All the programming procedure can be performed with dip-switch.
- Off-hook waiting time: 60 seconds (system busy).
- Guaranteed communication time can be programmed with rotaryswitch up to 70 seconds (system busy).
- Max. conversation time starting when the handset is picked up: 10 minutes.
- Tone for confirming call sending and conversation end.
- Video-audio signals of system busy.
- Pedestrian electric lock command actuator. Programmable timing with rotary-switch from 1 to 90 seconds.
- Driveway electric lock command actuator with clean contact.
- Electric lock management: Free or Secret.
- Circuitry for electric lock activation with entrance hall button.
- Input for open door sensor.
- Trimmer for adjusting loudspeaker and microphone audio level.
- Management of two external coax video inputs for surveillance cameras, if present.
- Relay box driving for cyclic control of several video surveillance cameras.
- Output for power supply of name holders lighting (up to 32 buttons with the power supply unit Ref. 1083/20).
- Audio repeater device for hard of hearing people.


## STRUCTURE

## FRONT VIEW



REAR VIEW


1. Signalling yellow led
2. Microphone
3. Pre-wired buttons
4. Name holders
5. Loudspeaker
6. Rotary-switch for pedestrian door lock release activation time
7. Auxiliary settings dip-switch
8. Identification code dip-switch
9. Busy time rotary-switch
10. Connector for expansion module
11. Loudspeaker volume adjustment
12. Microphone volume adjustment
13. Terminal blocks

## TERMINAL PINS DESCRIPTION

LINE
LINE
SE+ Positive for pedestrian electric lock activation
SE- Negative for pedestrian electric lock activation
V3A Surveillance camera 1 signal
V5A Reference for surveillance camera 1 signal
V3B Surveillance camera 2 signal / video switch
V5B Reference for surveillance camera 2 / video switch
ILA $\}$ Hard of hearing device output
ILA
$\left.\begin{array}{l}\text { SE2 } \\ \text { SE2 }\end{array}\right\}$ Driveway electric lock activation
T+ Command for video switch
T- Reference for video switch
CT Reference for PA and SP
PA Entrance hall button
SP Open door sensor (*)
ILL $\}$ Power supply for name holders lighting
$\left.\begin{array}{l}- \\ +\end{array}\right\}$ Do not use
(*) the terminal pin SP is connected by default to the terminal pin CT; to connect the normally closed door sensor (with closed door), remove the jumper.

If a camera is connected to terminal pins V3A and V5A, the same features as those of a camera module with a door unit will be available. These features will not be available if no cameras are connected to terminal pins V3B and V5B.

## TECHNICAL CHARACTERISTICS

## Power supply voltage (LINE):

Standby current consumption:
Max. current consumption:
(video call and name holders on)
Name holders lighting ILL output:
Lock output SE+ and SE-:
SE2 switched load:
Operating temperature range:
Compliant with:
$36 \div 48 \mathrm{Vcc}$ 45mA max 220mA max
$11 \div 13,8 \mathrm{Vcc}$ max 200 mA $22 \div 24 \mathrm{Vcc}$ max 200 mAdc 300mA 125V Max
$-10^{\circ} \mathrm{C} \div+50^{\circ} \mathrm{C}$
EN 61000-6-3, EN 61000-6-1

## DEFAULT PROGRAMMING

All door unit modules are configured in factory as follows:
Call station type:
Secondary number:
Door lock release:
Interruption:
Busy time rotary:
Door lock release rotary:
Door unit number:
Power supply:


## OPERATION

## CALLS

Up to 64 users max. can be called by pressing the respective buttons of the push button panel associated to the camera Ref. 1083/72.
After pressing the call button, the two following cases can occur:

- The line is free: the door unit emits a confirmation tone and the call is sent to the selected user.
- The line is busy: the door unit emits an alert tone and the yellow led on the front blinks (when the busy time is elapsed, the call must be sent again).
L
If in the system there is a concierge switchboard in "Day" mode, all the calls performed from the main call stations are intercepted and managed by the switchboard.


## PEDESTRIAN ELECTRIC LOCK ACTIVATION

Door units are provided with two terminal pins for pedestrian electric lock activation (SE-, SE+). The electric lock is activated in the following cases:

- Each time the entrance hall button is pressed (terminal pins PA, CT).
- After receiving a door lock release command from an apartment station, according to the configuration of the dip-switch used to configure the operating mode "free" or "secret" (see section "2VOICE system", paragraph "Call stations features").
- When the call is sent to an apartment station which is provided with "automatic door lock release" feature and this function is active.

If electric locks to be activated need special timing, the rotary switch "DOOR TIME" must be adjusted.
During electric lock activation, additional name holders, if powered by door unit terminal pins ILL, switch off.

## DRIVEWAY DOOR LOCK RELEASE MANAGEMENT

Door units are provided with two terminal pins (SE2) connected to the contacts of a normally open relay, that can be used to command a gate opening control panel. The relay is activated for 1 sec . after receiving a driveway door lock release command from an apartment station, according to the configured operation mode, "free" or "secret", as for
the pedestrian electric lock.
This relay is NOT suitable to manage directly power loads, but can only be used as command relay.

## AUDIO ADJUSTMENT

Audio levels are trimmed in factory, so they don't need to be changed in most installations.
If it is necessary to change them, use a screwdriver on the suitable adjusting points.


## NAME HOLDERS LIGHTING

If the call station has more than 32 name holders, an additional transformer must be used for button modules lighting.
In this case, the terminal pins "ILL" of the call station must not be connected to the button modules.


The transformer Ref. 9000/230 can provide 11,2 W power, that is up to 64 name holders max.

[^1]
## 1－BUTTON FRONT UNIT

For call station with 1 button，the front unit Ref．1745／107 must be bought and installed as follows：
5 Installation modes are the same as for modules with camera and door unit modules．


5
In this case，if the button is pressed，the apartment station with user code CODE＝1 will be called．
If the module is provided with firmware version 3.1 or higher， perform the following programming procedure to call the apartment station with code 0.

## ASSIGNING CODE 0 TO THE BUTTON

1．Enter in programming mode by setting the rotary switch DOOR TIME to position 8 and the rotary switch CONV TIME to position 9．The call station will emit 2 beeps each second to indicate the programming state．


2．Press the call station button．The module will emit a long beep to indicate that programming has been successful．


3．Restore the rotary switches original position to exit from the programming mode．

## FACTORY CODES RESTORE

To restore the user code assigned to the button，follow the procedure below：

1．Enter in programming mode by setting the rotary switch DOOR TIME to position 8 and the rotary switch CONV TIME to position 9．The call station will emit 2 beeps each second to indicate the programming state．


2．Press the button in the upper side of the call station．The module will emit a long beep to indicate that programming has been successful．


3．Set the rotary switches to the correct position to exit from the programming mode．

## 16-USER EXPANSION MODULE Ref. 1038/17

To the
door unit


The expansion module allows to add 16 user buttons to the door unit.
Place the device in the push button panel as shown in the following figures.
Connect the user buttons and connect the device to the door unit or to other expansion modules, if present, with the suitable cable, respecting connection direction and passages in flush mounting boxes.


Screw the device on the flush mounting box bottom, near buttons modules or blind modules or directory.

## CONNECTION EXAMPLE



## TERMINAL PINS DESCRIPTION

C Reference ground
P1 $\div$ P16 User buttons

## TECHNICAL CHARACTERISTICS

Current consumption:
Current in user button:
Operating temperature range:
Humidity:

1mA Max
$+0^{\circ} \mathrm{C} \div+50^{\circ} \mathrm{C}$ $90 \%$ UR a $30^{\circ} \mathrm{C}$

## PRODUCT LISTS

All Sinthesi products, their characteristics and installation modes are described in "Products Technical Manual - Door Phone and Video Door Phone system" in the section "Sinthesi Push Button Panel"

BUTTONS MODULES AND DIRECTORY

| With 1 button | Ref. 1145/11 |
| :--- | :--- |
| With 2 buttons | Ref. $1145 / 12$ |
| With 3 buttons | Ref. 1145/13 |
| With 4 buttons | Ref. $1145 / 14$ |
| With 4 Double buttons | Ref. $1145 / 18$ |
| Directory module | Ref. $1145 / 50$ |
| Blind module | Ref. 1145/59 |

## FLUSH MOUNTING BOXES

| For 2 modules | Ref. 1145/52 |
| :--- | :--- |
| For 3 modules | Ref. 1145/53 |
| For 4 modules | Ref. 1145/54 |
|  |  |
| FRAMES AND MODULE HOLDERS |  |


| For 2 modules | Ref. 1145/62 |
| :--- | :--- |
| For 3 modules | Ref. 1145/63 |
| For 4 modules | Ref. 1145/64 |

EMBEDDING FRAMES

| For 2 modules | Ref. 1145/712 |
| :--- | :--- |
| For 3 modules | Ref. 1145/713 |
| For 4 modules | Ref. 1145/714 |
| For 4 modules (2 module holders with 2 modules) | Ref. 1145/724 |
| For 6 modules (2 module holders with 3 modules) | Ref. 1145/726 |
| For 8 modules (2 module holders with 4 modules) | Ref. 1145/728 |
| For 9 modules (3 module holders with 3 modules) | Ref. 1145/739 |
| For 12 modules (3 module holders with 4 modules) | Ref. 1145/732 |

## RAIN HOODS

For 2 modules
Ref. 1145/612
For 3 modules
Ref. 1145/613
For 4 modules
Ref. 1145/614
Ref. 1145/624
Ref. 1145/626
Ref. 1145/628
Ref. 1145/639
Ref. 1145/632

HOODED HOUSINGS
For 2 modules
Ref. 1145/312
For 3 modules
For 4 modules
Ref. 1145/313
For 4 modules ( 2 module holders with 2 modules)
For 6 modules ( 2 module holders with 3 modules)
For 8 modules ( 2 module holders with 4 modules)
For 9 modules ( 3 module holders with 3 modules)
For 12 modules (3 module holders with 4 modules)
Ref. 1145/314
Ref. 1145/324
Ref. 1145/326
Ref. 1145/328
Ref. 1145/339
Ref. 1145/332
hooded housings for semi-flush mounting in gate PILLAR

| For 2 modules | Ref. 1145/342 |
| :--- | :--- |
| For 3 modules | Ref. 1145/343 |

## POSTALBOXES

For 2 vertical modules
Ref. 1145/42

## INSTALLATION

It is suggested to install the modules at the height shown below, according to the system to be realized.


However, for complex systems with several modules, for a correct installation consider the height shown in the figure to fix the camera. If the system is a door phone, height refers to the door unit.
Before installing the flush mounting box (single or coupled with other ones), prepare the hole (at the bottom or at the sides) for the passage of connection wires.


Flush mounting boxes can be assembled with suitable spacers, also used as wire hole.
If no accessories are included in flush mounting version, an unlimited number of flush mounting boxes can be combined. In case of systems also composed by embedding frames or rain hoods, the max. number of boxes to be combined is 3 ; the boxes are joined on the longest side.
All spacers are empty, to allow the passage of wires from a box to another one.


Arrange the flush mounting boxes and follow the instructions below:

- Install the flush mounting box: it must not jut out of the wall.

- Mount the module holder.

- Mount the modules on the module holder.


PUSH BUTTON PANEL

- Fold down the module holder and connect wires.


## SINTHESI PUSH BUTTON PANEL



- Set the dip-switches according to instructions in the section "System installation and activation".

- Adjust the correct perpendicularity of the push button panel.
- Close the module holder by fastening screws A.

- Adjust camera orientation.

- Fit the name holders.

- Place the frame on the module holder.
- Fasten screws B on screws A.




Values $\mathrm{H} 1=204,294,384$ concerning flush mounting box height and values $\mathrm{H} 2=209,299,389$ concerning the total height, are referred to versions composed by 2, 3, 4 modules.

WALL MOUNTING VERSION


LValues $\mathrm{H}_{3}$ concerning the total height can change according to the number of modules that can be included in the housing.

| Video door phone |  |  | NUMBER OF BUTTONS |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | 1 | 2 | 3 | 4 | 5 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 131 | 14 |  | 16 | 17 | 18 | 19 | 20 | 21 | 22 | 23 | 24 | 25 | 26 | 27 | 28 | 29 | 30 | 31 | 32 |
| Common products | Button modules and directory | 1145/11 |  |  | 1 |  |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |
|  |  | 1145/12 |  |  |  | 1 |  |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |
|  |  | 1145/13 |  |  |  |  | 1 | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  |
|  |  | 1145/14 |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 2 | 2 | 2 | 2 | 3 | 3 | 3 | 3 | 4 | 4 | 4 | 4 | 5 | 5 | 5 | 5 | 6 | 6 | 6 | 6 | 7 | 7 | 7 |
|  |  | 1145/59 |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  | 2 | 2 |
|  |  | 1145/50 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Camera modules with door unit | 1083/72 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
|  | Expansion module | 1038/17 |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |
|  | 1-button front unit | 1745/107 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Flush mounting (\#) | Flush mounting box | 1145/52 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/53 |  |  | 1 | 1 | 1 | 1 | 1 |  |  |  |  | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |  |  |  |  |  |  |  |  | 3 | 3 | 3 | 3 |  |  |
|  |  | 1145/54 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |  |  |  |  | 3 | 3 |
|  | Module holders and frames | 1145/62 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/63 |  |  | 1 | 1 | 1 | 1 | 1 |  |  |  |  | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |  |  |  |  |  |  |  |  | 3 | 3 | 3 | 3 |  |  |
|  |  | 1145/64 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |  |  |  |  | 3 | 3 |
|  | Embedding frame ( ${ }^{\circ}$ ) | 1145/712 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/713 |  |  | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/714 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/726 |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/728 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |
|  |  | 1145/739 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |
|  |  | 1145/732 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 |
|  | Rain hood ( ${ }^{\circ}$ ) | 1145/612 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/613 |  |  | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/614 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/626 |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/628 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |
|  |  | 1145/639 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |
|  |  | 1145/632 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 |
| Wall mounting (\#) | Hooded housing (§) | 1145/312 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/313 |  |  | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/314 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/326 |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/328 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |
|  |  | 1145/339 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |
|  |  | 1145/332 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 |
|  | Postalbox (§) | 1145/42 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Semi-flush mounting pillar (\#) | Housing | 1145/342 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/343 |  |  | 1 | 1 |  |  | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Name holders lighting transformer |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  | 1 | 2 | 3 | 4 |  | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 131 | 14 | 15 | 16 | 17 | 18 | 19 | 20 | 21 | 22 | 23 | 24 | 25 | 26 | 27 | 28 | 29 | 30 | 31 | 32 |
|  |  |  | NUMBER OF BUTTONS |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

[^2]
## Video door phone

| 33 | 34 | 35 | 36 | 37 | 38 | 39 | 40 | 41 | 42 | 43 | 44 | 45 | 46 | 47 | 48 | 49 | 50 | 51 | 52 | 53 | 54 | 55 | 56 | 57 | 58 | 59 | 60 | 61 | 62 | 63 | 64 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |


| Common products | Button modules and directory | 1145/11 |  |  |  | 1 |  |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 1145/12 |  |  |  |  | 1 |  |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |
|  |  | 1145/13 | 1 |  |  |  |  | 1 |  |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  |
|  |  | 1145/14 | 7 | 8 |  | 8 | 8 | 8 | 9 |  | 9 | 9 | 9 | 10 | 10 | 10 | 10 | 11 | 11 | 11 | 11 | 12 | 12 | 12 | 12 | 13 | 13 | 13 | 13 | 14 | 14 | 14 | 14 | 15 | 15 | 15 |
|  |  | 1145/59 | 1 | 1 |  | 1 | 1 | 1 | 1 |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |
|  |  | 1145/50 | 1 | 1 |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Camera modules with door unit | 1083/72 | 1 | 1 |  | 1 | 1 | 1 | 1 |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
|  | Expansion module | 1038/17 | 2 | 2 |  | 3 | 3 | 3 | 3 |  | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 |
|  | 1-button front unit | 1745/107 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Flush mounting (\#) | Flush mounting box | 1145/52 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/53 |  |  |  |  |  |  |  |  |  |  |  |  | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 |  |  |  |  | 6 | 6 | 6 | 6 | 6 | 6 |
|  |  | 1145/54 | 3 | 3 |  | 3 | 3 | 3 | 3 |  | 3 | 3 | 3 | 3 |  |  |  |  |  |  |  |  |  |  |  |  | 4 | 4 | 4 | 4 |  |  |  |  |  |  |
|  | Module holders and frames | 1145/62 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/63 |  |  |  |  |  |  |  |  |  |  |  |  | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 |  |  |  |  | 6 | 6 | 6 | 6 | 6 | 6 |
|  |  | 1145/64 | 3 | 3 |  | 3 | 3 | 3 | 3 |  | 3 | 3 | 3 | 3 |  |  |  |  |  |  |  |  |  |  |  |  | 4 | 4 | 4 | 4 |  |  |  |  |  |  |
|  | Embedding frame ( ${ }^{\circ}$ ) | 1145/712 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/713 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/714 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/726 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/728 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/739 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/732 | 1 | 1 |  | 1 | 1 | 1 | 1 |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Rain hood ( ${ }^{\circ}$ ) | 1145/612 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/613 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/614 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/626 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/628 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/639 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/632 | 1 | 1 |  | 1 | 1 | 1 | 1 |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Wall mounting (\#) | Hooded housing (§) | 1145/312 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/313 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/314 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/326 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/328 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/339 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/332 | 1 | 1 |  | 1 | 1 | 1 | 1 |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Postalbox (§) | 1145/42 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Semi-flush <br> mounting pillar <br> (\#) <br> ( | Housing | 1145/342 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/343 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Name holders lighting transformer |  |  | $\checkmark$ | $\checkmark$ |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |  | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ | $\checkmark$ |
|  |  |  | 33 | 34 |  | 5 | 36 | 37 | 38 |  | 39 | 40 | 41 | 42 | 43 | 44 | 45 | 46 | 47 | 48 | 49 | 50 | 51 | 52 | 53 | 54 | 55 | 56 | 57 | 58 | 59 | 60 | 61 | 62 | 63 | 64 |
|  |  |  | NUMBER OF BUTTONS |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

(\#); (§) alternative
( ${ }^{\circ}$ ) optional, alternative




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## Door phone

| Door phone |  |  | NUMBER OF BUTTONS |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | 1 | 2 | 3 | 4 |  | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 | 17 | 18 |  | 20 | 21 | 22 | 23 | 24 | 25 | 26 | 27 | 28 | 29 | 30 | 31 | 32 |
| Common products | Button modules and directory | 1145/11 |  |  | 1 |  |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |
|  |  | 1145/12 |  |  |  | 1 |  |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |
|  |  | 1145/13 |  |  |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  | 1 |  |  |  |
|  |  | 1145/14 |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 2 | 2 | 2 | 2 | 3 | 3 | 3 | 3 | 4 | 4 | 4 | 4 | 5 | 5 | 5 | 5 | 6 | 6 | 6 | 6 | 7 | 7 | 7 |
|  |  | 1145/59 |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  | 2 | 2 |
|  |  | 1145/50 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Modules with door unit | 1083/7 | 1 | 1 | 1 | 1 |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
|  | Expansion module | 1038/17 |  |  | 1 | 1 |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |
|  | 1-button front unit | 1745/107 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Flush mounting (\#) | Flush mounting box | 1145/52 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/53 |  |  | 1 | 1 |  | 1 | 1 |  |  |  |  | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |  |  |  |  |  |  |  |  | 3 | 3 | 3 | 3 |  |  |
|  |  | 1145/54 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |  |  |  |  | 3 | 3 |
|  | Module holders and frames | 1145/62 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/63 |  |  | 1 | 1 |  | 1 | 1 |  |  |  |  | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |  |  |  |  |  |  |  |  | 3 | 3 | 3 | 3 |  |  |
|  |  | 1145/64 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |  |  |  |  | 3 | 3 |
|  | Embedding frame ( ${ }^{\circ}$ ) | 1145/712 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/713 |  |  | 1 | 1 |  | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/714 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/726 |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/728 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |
|  |  | 1145/739 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |
|  |  | 1145/732 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 |
|  | Rain hood ( ${ }^{\circ}$ ) | 1145/612 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/613 |  |  | 1 | 1 |  | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/614 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/626 |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/628 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |
|  |  | 1145/639 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |
|  |  | 1145/632 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 |
| Wall mounting (\#) | Hooded housing (§) | 1145/312 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/313 |  |  | 1 | 1 |  | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/314 |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/326 |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/328 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |  |  |  |  |  |  |
|  |  | 1145/339 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 | 1 | 1 |  |  |
|  |  | 1145/332 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1 |
|  | Postalbox (§) | 1145/42 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Semi-flush <br> mounting pillar <br> (\#) <br> ( | Housing | 1145/342 | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | 1145/343 |  |  | 1 | 1 |  | 1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Name holders lighting transformer |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  | 1 | 2 | 3 | 4 |  | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 | 17 | 18 | 19 | 20 | 21 | 22 | 23 | 24 | 25 | 26 | 27 | 28 | 29 | 30 | 31 | 32 |

(\#); (§) alternative
${ }^{( }$) optional, alternative
PUSH BUTTON PANEL
0
0
0
6

12

14

17

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## CONFIGURATION

ID: door unit identifier

- Each main call station must have a unique code (call ID, i.e. Identifier) that can be set with dip-switch with values $0 \div 3$.
- In case of secondary call station the ID must be the same as the column ID configured on the column interface.


AUX: auxiliary settings


DIP1 - Station type: the door unit can be configured either as a main or a secondary device. All the users in the system may be called from the main door unit. A secondary door unit may only call the users of
the column to which it belongs. Users can identify the source of the call by the ring tone.

DIP2 - Secondary station address: Two secondary calling stations may be present in a column and must have a different address ( 0 or 1).

DIP3 - Door opener: The electric lock can be managed in "privacy" or
"free" mode. The door unit works as follows in the two cases:

- "Privacy": the electric lock may only be activated by pressing the door opening button on the calling station when an audio conversation has been established or when after having received a call or auto-on function either a video connection has been established.
- 'Free': when pressing the door lock release button of an apartment station, the door unit electric lock can be activated only if the door unit is configured as main or the user belongs to the column of the same secondary door unit. This column is defined by the ID setting of the secondary door unit. This function is typically used for secondary stations.

DIP4 - Interruption: where is in progress an auto-on or an intercom conversation or the video door phone answering machine browsing, the respective column or the whole system is in busy mode, which, according to the configuration of this switch, can be interrupted or not by a call from the door unit.

DIP5 - Camera lights: the camera lights may be turned off if illumination in the surrounding environment is sufficient at night.
5 On the door unit module Ref. 1083/7 the position of this dip is irrelevant.

DOOR OPENING TIME The position of the rotary switch (DOOR TIME) determines the activation time of the door lock.


Pos. $0=1 \mathrm{sec} . \quad$ Pos. $1=10 \mathrm{sec} . \quad$ Pos. $2=20 \mathrm{sec}$.
Pos. $3=30 \mathrm{sec} . \quad$ Pos. $4=40 \mathrm{sec} . \quad$ Pos. $5=50 \mathrm{sec}$.
Pos. $6=60 \mathrm{sec}$. Pos. $7=70 \mathrm{sec}$. Pos. $8=80 \mathrm{sec}$.
Pos. $9=90 \mathrm{sec} /$ advanced programming

GUARANTEED CONVERSATION TIME The position of the rotary switch (CONV TIME) determines a busy time i.e. the guaranted conversation time.


Pos. $0=1 \mathrm{sec}$. Pos. $1=10 \mathrm{sec}$. Pos. $2=20 \mathrm{sec}$.
Pos. $3=30 \mathrm{sec}$. Pos. $4=40 \mathrm{sec}$. Pos. $5=50 \mathrm{sec}$.
Pos. $6=60$ sec. Pos. 7 e $8=70$ sec.
Pos. $9=$ advanced programming
Ly Gain access to the advanced configuration by rotating both rotary switches to position 9.

## ASSOCIATION OF DOOR UNITS BUTTONS TO USERS

Up to 62 buttons (besides the two buttons on the door unit station) can be connected to the door unit, using 4 add-on buttons units 1038/17 max.

## MAIN DOOR UNITS

If the door unit is configured as main, buttons are automatically associated to column 0 ; this makes installation of main call stations easier in one-column systems.


If the door unit is configured as main and in the system there are several columns, an association between buttons and users of the different columns is needed. Follow the instructions below:
1 - Gain access to advanced configuration by rotating both the dipswitches in position 9 (the yellow led turns on).

| $\begin{aligned} & \text { DOOR } \\ & \text { TIME } \end{aligned}$ |
| :---: |
|  |
|  |
| $\begin{aligned} & \text { CONV } \\ & \text { TIME } \end{aligned}$ |

2 - Set the call station ID dip-switch to the code of the column to which the buttons must be associated.
3 - Press the button associated to the user 0 of the selected column. All next buttons are automatically associated to the users of that column, in sequence.
4 - Repeat steps 2 and 3 for all the columns.
5 - Put again the ID dip-switches in their original position.
6 - Quit the advanced configuration, by putting again the two rotary
switches in the positions used to set door lock release time and guaranteed communication time. The yellow led switches off.
7 - Repeat these operations for all main call stations.

## Example:

System with 3 columns, the first one with 4 users, the second with 6 users, the third with 8 users.


- Gain access to advanced configuration.
- Set the call station ID dip-switch to 0 .
- Press the door unit upper button (the first button).
- Set the call station ID dip-switch to 1.
- Press the button 3 of the first buttons module (the fifth button), which is associated to the user 0 of the column 1.
- Set the call station ID dip-switch to 2 .
- Press the first button of the third buttons module (the eleventh button) which is associated to the user 0 of the column 2.
- Put again the ID dip-switches in their original position.
- Quit the advanced configuration.

The final configuration is the following:


## SECONDARY DOOR UNITS

In door units configured as secondary, buttons are associated by default to the users from 0 to 63 of their column.


If the door units are configured as secondary, but each one must call a different group of users, follow the instructions below:

- Gain access to advanced configuration by rotating both the dipswitches in position 9 (the yellow led turns on).

- Set the call station ID dip-switch to the code of the apartment station which will be associated to the first button (offset).
The offset code must only be included between 0 and 31.
- Change AUX dip switch n. 5 position (the call station emits a confirmation tone);
- Put again the AUX dip switch n. 5 in its original position (the call station emits a confirmation tone);

- Put again the ID dip-switches in their original position.
- Quit the advanced configuration, by putting again the two rotary switches in the positions used to set door lock release time and guaranteed communication time: the yellow led switches off.

Example:
The secondary call station "A" calls only users from 0 to 10 , the call station "B" only users from 11 to 18.


- On the call station " $B$ ", gain access to advanced configuration;
- Set ID dip-switch to 11;
- Move AUX dip switch n. 5;
- Put again all dip-switches in their original position;
- Quit the advanced configuration.


## OPTIONAL PROGRAMMING

## AUTO-ON FUNCTION ON SURVEILLANCE CAMERAS

If in a call station there are surveillance cameras, this function must be programmed.

1. Gain access to the advanced configuration by rotating both rotary switches to position 9; the door unit emits a beep to indicate programming status and the yellow led turns on.

2. Press the entrance hall button (PA - CT) for many times as the number of installed surveillance cameras. Each time the button is pressed, the door unit emits a number of beeps equal to the number of programmed cameras ( 5 max.). By pressing again the buttons after the 5 beeps, the door unit emits a long beep, indicating that there are no cameras connected (default).

3. Put again the rotary switches in the correct position to quit the advanced configuration.
4. Repeat the programming procedure for all call stations with surveillance cameras.

According to the programmed number of cameras, the following configurations are available:

DOOR PHONE CALL STATION
no surveillance camera (default)



 4 surveillance cameras


5 surveillance cameras


## VIDEO DOOR PHONE CALL STATION




5 surveillance cameras



4
If the call comes from a video door phone call station, the push button panel camera will be activated. In case of call coming from a door phone call station with surveillance camera, the camera connected to terminal pins V3A and V5A will be activated.

## BUTTON CONFIGURATION FOR SPECIAL FUNCTION

It is possible to configure a button for a special function, for example to turn the stairs lights on.
To configure the button, perform as follows:

- Go to advanced configuration.

- Keep the selected button pressed for 3 sec., the door unit emits an acoustic signal to confirm that the acquisition has been successfully performed.


The function can be activated only if a suitably programmed special decoder is installed.

## PROGRAMMING DATA DELETING

1. Gain access to advanced programming by putting both the rotary switches in position 9.
2. Keep any call button pressed for at least 5 seconds (after the second beep), then release it.
3. Put again the rotary switches in their operating position.

In this way, buttons/users association, special function button association and surveillance cameras number are deleted.

## Download from www.urmetdomus.com Technical Manuals area.

## SECTION CONTENTS

SINTHESI CALL MODULE Ref.1083/13 ..... 2
Technical specifications ..... 2
STRUCTURE ..... 2
INSTALLATION ..... 2
Audio adjusting .....  3
Description of terminals ..... 3
Camera module connection .....  3
Product list ..... 4
PROGRAMMING ..... 4
Default configuraion ..... 4
PROGRAMMING WITH KEYBOARD ..... 4
Programming masting ..... 4
PROGRAMMING VIA BLUETOOTH ..... 7
OPERATION ..... 8
Calls to users ..... 8
Call to switchboard. ..... 9
Communication and door opening. ..... 9
Transmission of special codes .....  9
Entry of door-opener codes ..... 9
"Postman" function ..... 9
EXAMPLES OF MODULAR CONSTRUCTIONS ..... 10

## SINTHESI CALL MODULE Ref.1083/13



The Ref. 1083/13 calling module corresponds to 2 Sinthesi modules and is provided with LCD display, built-in door unit and back-lit buttons.
The Ref. 1083/13 call module offers the following functions:

- Possibility of calling all potential system users (128 users for 32 risers) by entering the physical code ( 2 digits for the riser number and 3 digits for the apartment number).
- Two 16-character row LCD with display of user repertory.
- Alphanumeric keypad
- 4200-name repertory; a 4-digit door-opener code can be assigned to each name.
- Possibility of associating 4-digit logical call codes to the names.
- 100 door-opener codes not associated with names.
- Name selection using arrow keys and search by initial letter.
- Management of main entrance electric lock with capacitance discharge and holding current and also with changeover relay output.
- Output contact for control of vehicle entrance electric lock.
- Door-opener pulse (unrestricted or protected by privacy feature).
- Postman function: direct opening of main entrance with -O key on days and at times programmed.
- Direct call to switchboard if two buttons are pressed at the same time.
- Management of main entrance Hall button.
- Management of main entrance door sensor.
- Management of video input for surveillance camera and T signal management for video switch.
- Speaker and microphone volume adjustment trimmer.
- Bluetooth programmable using portable devices equipped with dedicated software
- Output of device for deaf people (European law SOCU0611477A)


## TECHNICAL SPECIFICATIONS

Power voltage (LINE):
Stand-by consumption:
Max. consumption (Video call)
Lock output SE+ SE-:
Lock relay C/NC/NO:
Lock relay SE2:
Working temperature range:
Reference standards:
$36 \div 48 \mathrm{Vdc}$
Max 85 mA
220 mA
capacitance discharge $22-24 \mathrm{Vdc}$ holding current max 200 mAdc Max 24V 5A
Max 24V 300mA
$-10^{\circ} \mathrm{C}+50^{\circ} \mathrm{C}$
EN61000-6-3, EN61000-6-1

## STRUCTURE



1. Loudspeaker
2. Microphone
3. Volume adjustment of loudspeaker and call module microphone (they can also be accessed from the rear side of the module)
4. Infrared port for remote programming
5. Graphic backlit alphanumeric display
6. Yellow backlit buttons for name selection
7. Green backlit numeric keyboard buttons, with yellow backlit function buttons: 'Cancel', 'Key' and 'Call'

## INSTALLATION

1. Install the module at the height shown.


To obtain the best reading of the call module display, it is suggested not to keep it against the light and not to directly point it to strong light sources (for ex. sun, street lamps, lamps, flashes or reflections).
2. Fit the module holder frame in the flush-mounting box.

3. Fit the modules in the frame.

4. Tip the frame and connect wires.

5. Close the frame.
6. Fit the panel on the frame.


An anti-theft screw is provided to increase installation security.

## AUDIO ADJUSTING

The audio levels are trimmed in factory, so they don't need to be changed in most installations.
If they must be changed, use a screwdriver on the suitable adjustments (3), accessible from the module front side (by removing the upper front) and from the rear side.

DESCRIPTION OF TERMINALS

| $\left.\begin{array}{l} \text { LINE } \\ \text { LINE } \end{array}\right\}$ | Bus line in |
| :---: | :---: |
| SE+ | Positive activation main entrance electric lock with capacitance discharge |
| SE- | Negative activation main entrance electric lock with capacitance discharge |
| V3 | Control camera signal / video switch |
| V5 | Reference for control camera signal / video switch |
| ILA ILA $\}$ | Output of device for deaf people |
| SE2 SE2 $\}$ | Driveway electric lock activation (NO contact) |
| $\left.\begin{array}{l} \mathrm{C} \\ \mathrm{NC} \\ \mathrm{NO} \end{array}\right\}$ | Activation main entrance electric lock |
| T+ | Command for video switch |
| T- | Reference for video switch |
| CT | Reference for PA and SP |
| PA | Hall button |
| SP | Open door detector (*) |
| $\left.\begin{array}{l}- \\ +\end{array}\right\}$ | Do not use |
| $\left.\begin{array}{l} A \\ B \\ R E F \end{array}\right\}$ | RS485 serial port connection (for future developments) |

(*) the terminal pin SP is connected by default to the terminal pin CT; to connect the normally closed door sensor (with closed door), remove the jumper.

## CAMERA MODULE CONNECTION

In order to obtain a video door phone call station, a camera module can be installed with the digital call module. To connect the camera module Ref. 1745/40 (colour) or Ref. 1745/70 (black/white), use the connector on the rear side of the call module for the provided cable: RED - Power positive (+TC)
BLACK - Power negative (R1)
WHITE - Video signal coax (Shield V5 + Core V3)


## PRODUCT LIST

To install the call module, Sinthesi products and accessories can be used.
The following list contains the main codes which can be used.

## EMBEDDING BOX

| For 2 modules | Ref. 1145/52 |
| :--- | :--- |
| For 3 modules | Ref. 1145/53 |
| For 4 modules | Ref. 1145/54 |

FRAMES AND MODULE HOLDERS

| For 2 modules | Ref. 1145/62 <br> For 3 modules <br> For 4 modules |
| :--- | :--- |
|  | Ref. 1145/63 <br> Ref. 1145/64 |
| WALL COVER FRAME |  |
| For 2 modules | Ref. 1145/712 |
| For 3 modules | Ref. 1145/713 |
| Per 4 moduli | Ref. 1145/714 |
| Fof. 1145/724 4 modules (2 frames for 2 modules) |  |
|  |  |
| RAIN HOOD | Ref. 1145/612 |
| For 2 modules | Ref. 1145/613 |
| For 3 modules | Ref. 1145/614 |
| For 4 modules | Ref. 1145/624 |
| For 4 modules (2 frames for 2 modules) |  |
| CASE AND HOOD |  |

For 2 modules Ref. 1145/312

Ref. 1145/312
For 3 modules
Ref. 1145/313
For 4 modules
Ref. 1145/314
For 4 modules (2 frames for 2 modules)
Ref. 1145/324

CASE AND HOOD FOR SEMI-FLUSHED GATE INSTALLATION

| For 2 modules | Ref. 1145/342 <br> For 3 modules |
| :--- | :--- |
| POSTALBOX |  |
| For 2 modules | Ref. 1145/343 |

## BLANK MODULE AND REPERTORY

Repertory module
Ref. 1145/50
Blank module
Ref. 1145/59
All Sinthesi products, characteristics and installation procedures are shown in "Technical product manual - door phone and video door phone systems" in the "Sinthesi panels" section.

## PROGRAMMING

The call module with directory can be programmed as follows:

- Locally, with the keypad, without opening the module frame.
- With a BlueTooth device (PDA, Telephone, etc.) equipped with Windows Mobile 6.1 and a suitable software which can be downloaded from the reserved area of the website www. urmetdomus.com.
- With a PC provided with BlueTooth interface, equipped with a suitable software which can be downloaded from the reserved area of the website www.urmetdomus.com.


## DEFAULT CONFIGURATION

| Language: | Italian |
| :--- | ---: |
| Module type: | main |
| Module ID: | 0 |
| Code type: | physical code |
| Device type: | video |
| Busy time: | 30 s |
| Interruption: | not enabled |
| Main entrance lock time: | 1 s |
| Type of main entrance door-opener: | private |
| Vehicle entrance door-opener time: | 1 s |
| Type of vehicle entrance door opener: | private |
| Password: | 1000 |
| Number of surveillance cameras: | 0 |
| Key click: | yes |
| Postman function: | no |
| To restore the default values, power the device holding down |  |
| the X, 8 and 6 keys. |  |

## PROGRAMMING WITH KEYBOARD

## PROGRAMMING MASTING

To access the configuration and programming menu must:

- enter the 99999;
- the display shows:

- Enter the password (default 1000) and press " $\stackrel{\text { " }}{ }$ " to access the following programming menu:


Use the arrow keys to scroll the programming menu. Press ")"to access the selected second level menu; press $\mathbf{X}$ to quit programming.

## LANGUAGE

In the "language" menu, select the operating language with the buttons $\uparrow \downarrow$ and confirm with "

## CONFIGURATION

The configuration menu is as follows:


Press " $\mathbf{X}$ for $3 \mathrm{~s}^{\circ}$, returns to the start of the menu; to quit, press $\mathbf{X}$ again. If the value entered is not correct, the display shows:

## CODE Not <br> ALLOWED

The parameters which are configured in this menu are the following:

## Module type

The calling module may be a main or secondary device. All systems users can be called from the main device; only users of the related riser column can be called from the secondary device. The user who receives the call is able to distinguish the origin of the call according to ring duration.
There may be 2 secondary call stations with different numbers in the same riser column (secondary 0 or 1).

## Module ID: door unit number

Set a number from 00 to 03 for a main module or from 00 to 31 for a secondary module.

- Two main stations cannot have the same ID. Two secondary stations may have the same ID but must have a different number see next parameter).
- The ID of the secondary door unit must be the same as the riser column ID set in the Ref. 1083/50 riser column interface.


## Secondary

In the case of a secondary module and if there is only one secondary in the riser column, set 0 ; if there are 2 , set 0 and 1 in the two secondaries.

\&
The secondary call station with ID=0 must be connected to the column interface Ref. 1083/50 INO input, the secondary call station with ID=1 must be connected to IN1 input.

## Code type

Type of user call code.

- Physical code: users are called with a 5 -digit code as follows: ccnnn, where cc indicates the riser column (from 00 a 31) and nnn indicates the number of the apartment (from 000 a 127)
- Logical code: users are called with a a number of 1 to 4 digits from 1 to 9999. To use the logical codes, the names must be programmed, assigning the logical call code to the physical code of the apartment.


## Device type

Indicates whether the module is equipped with local camera unit.

- Video: a local camera is connected to the "VIDEO MODULE" connector; the call station is a video door phone. Up to 4 surveillance cameras, which can be displayed by users using the auto power-on key, can be connected to the V3/V5 input.
- Audio: no local camera unit is connected to the "VIDEO MODULE" connector; the call station is a door phone. Up to 4 surveillance cameras, which can be displayed by users using the auto power-on key, can be connected to the V3/V5 input. In the case of a single surveillance camera, the call station becomes a video door phone and uses this camera in the call phase.


## Busy time

This is the guaranteed communication time. The values (in seconds), which can be selected with the arrow keys, are 01, 10, 20, ....70.

## Stopable

During auto power-on or an intercommunicating call or consultation of the video door phone answering service, the riser column concerned or the entire system is in Busy status which, according to how this parameter is programmed, may or may not be interrupted by a call from the door unit.

## Door lock T1

Maintenance time of the main entrance electric lock (terminals $\mathrm{SE}_{+} /$ SE-) and of activation of terminals C/NC/NO. Enter a number (in seconds) from 1 to 90 .

## Door opener 1

Electric lock control may be "protected by privacy feature" or "unrestricted". The door unit behaves as follows in the two cases:

- 'Secret': pressing the door-opener button of an apartment station, the electric lock of the call station is released only if a call has
been received or a voice conversation is in progress with this or if, following auto power-on, it is in video connection with this.
- 'Free': pressing the door-opener button of an apartment station, the electric lock of the door unit is released only if this has been configured as main, or the user belongs to the riser column of the same secondary door unit. This riser column is defined by the ID of the secondary door unit. This function is normally used on secondary stations.


## Door lock T2

Activation time of the vehicle entrance electric lock (SE2 terminals). Enter a number (in seconds) from 1 to 90.

## Door opener 2

The electric lock may be controlled in "private" or "unrestricted" mode. The door unit behaves as follows in the two cases:

- 'Secret': pressing the door-opener button of an apartment station, the electric lock of the call station is released only if a call has been received or a voice conversation is in progress with this or if, following auto power-on, it is in video connection with this.
- 'Free': pressing the door-opener button of an apartment station, the electric lock of the door unit is released only if the door unit is configured as main, or the user belongs to the riser column of the same secondary door unit. This riser column is defined by the ID of the secondary door unit. This function is normally used on secondary stations.


## Password

Password for accessing configuration and programming of call module data.
Set a value from 1000 to 9999 (default 1000).

## Control cameras

Number of surveillance cameras connected to terminals V3/V5 (if more than one, via the 1083/69 video switch).

## LCD contrast

Press the UP key to increase contrast and the DOWN key to reduce this.

## Button sound

The button sound function can be disabled.

## Day

With the arrow keys, select the day of the week to be programmed in the internal calendar.

## Time

Enter the time to be programmed on the internal clock

## Postman function

If the function is enabled, the main entrance can be opened simply by pressing the key on the days and at the time set in the following screen pages.


The function can be enabled for each day of the week, also defining the related time band.

On exiting configuration, a check is made on whether the system already comprises a device of the same type with the same ID and, if secondary, with the same number (0 or 1). If so, the following message is displayed:


In this case, return to configuration and correct the error.

## NAME PROGRAMMING

The name programming menu is as follows:


The name programming menu can be scrolled using the arrow keys; press $\mathbf{X}$ to quit programming or " 1 ") to access the menu item.

## Enter



Up to 32 characters can be entered using the keypad as for a telephone; to insert a space ( $\bigsqcup$ —— ), press the 1 key once only; press the 0 key once to move to the second line ( $\downarrow$ ). Press the arrow keys to scroll all available characters for the language used.
Press (") to move to insertion of the physical code.
Press $\mathbf{X}$ to cancel the last character. Pressing $\mathbf{X}$ without inserting characters returns to the name programming menu.
If the name entered already exists, an error message is displayed and the data must be re-entered.

Enter the physical call code of the apartment in the format XYABC, where XY is the riser column $(00-31)$ and ABC is the address of the apartment ( $0-127$ ). In systems without Ref. 1083/50 riser column interface, the riser column code is 00 .
Press " 2 " to move to the next step (logical code or door-opener code).
Press $\mathbf{X}$ to cancel the code. Pressing $\mathbf{X}$ without inserting characters returns to the previous step.
If the code entered is not valid, an error message is displayed and the data must be re-entered.
Enter the logical call code of the apartment which must be a a number of 1 to 4 digits from 1 to 9999.
Press "
If the device is set with code type = physical codes, this screen
page is not displayed.
Press $\mathbf{X}$ to cancel the code. Pressing $X$ without inserting characters returns to the previous step.
If the code entered is not valid, an error message is displayed and the data must be re-entered.
The logical code must be univocal in the repertory programmed.

If a door-opener code to be assigned to the user inserted, enter the door-opener code which must be a 4-digit number from 0001 to 4999. This code will open the main entrance; to open the vehicle entrance, enter a door-opener code from 5000 to 9999. After insertion, press 4
If" a door-opener code is not to be assigned to the user inserted, press " (̂)" without code.
Press $\mathbf{X}$ to cancel the code. Pressing $\mathbf{X}$ without inserting characters returns to the previous step.
If the code entered is not valid or already exists, an error message is displayed and the data must be re-entered.

After this step, the name is inserted in the repertory and a new name can be inserted.

## Modify

From this menu, the repertory can be scrolled using the arrow keys; press " $)$ " to modify the data following the same screen pages as for insertion.

## Delete

From this menu, the repertory can be scrolled using the arrow keys; pressing " ( $/$ ", confirmation of deletion is requested.

## Delete all

From this menu, the entire names repertory can be deleted; pressing
"("), confirmation of deletion is requested.

## DOOR-OPENER

This menu is used to manage door-opener codes not associated with names in the repertory. The menu as follows


The door-opener codes programming menu can be scrolled using the arrow keys; press $\mathbf{X}$ to quit programming or " $\hat{\sim}$ " to access the menu item.

## Enter

Enter the door-opener code which must be a 4-digit number from 0001 to 9999. A code between 1 and 4999 will open the main entrance; a code between 5000 and 9999 will open the vehicle entrance. After insertion, press (").
Press $\mathbf{X}$ to cancel the code. Pressing $\mathbf{X}$ without inserting characters returns to the previous step.
If the code entered is not valid or already exists, an error message is displayed and the data must be re-entered.

## Modify

From this menu, the list of the door-opener codes can be scrolled with the arrow keys; press "

## Delete

From this menu, the list of the door-opener codes can be scrolled with the arrow keys; pressing , confirmation of deletion is requested.

## Delete all

From this menu, all the door-opener codes can be deleted; pressing , confirmation of deletion is requested

## PROGRAMMING VIA BLUETOOTH

The call module is equipped with a Bluetooth receiver-transmitter to facilitate programming of configuration, names and door-opener codes.

## PROGRAMMING WITH PDA OR TELEPHONES

Access the programming mode by entering the code 99999 followed by the password (default 1000), activate the 2Voice_Mobile software (which can be downloaded from the site www.urmetdomus.com) previously installed on the PDA or on the telephone and, from the telephone, make the connection between the software of the telephone and the call module.
The display shows:

| BLUETOOTH |
| :---: |
| CONNECTED |

Set as indicated in the user manual of the 2Voice_PC software. To exit Bluetooth programming, press $\mathbf{X}$ for 2 seconds.

## PROGRAMMING WITH PC

Access the programming mode by entering the code 99999 followed by the password (default 1000), activate the 2Voice_PC software (which can be downloaded from the site www.urmetdomus.com) previously installed on the PC and make the connection between the software and the call module.
The display shows:

| BLUETOOTH |
| :---: |
| CONNESSO |

Set as indicated in the user manual of the 2Voice_PC software. To exit Bluetooth programming, press $\mathbf{X}$ for 2 seconds.

## OPERATION

## CALLS TO USERS

In stand-by mode, the call module displays:


If no names have been inserted in the repertory, the display shows

| TYPE CODE |
| :---: |
| PRESS |

## CALL BY ENTERING PHYSICAL CODE

If the call module is configured with physical codes, enter the 5-digit code as follows:


In systems without Ref.1083/50 riser column interface, the riser column code is 00 .

Use $\mathbf{X}$ to delete the character if you make a mistake; with " system is free and the code is valid, the call is made and for the entire pick-up wait time (max. 60s) the display shows:

## CALLING

If the code is not valid, the display shows:

and the display returns to stand-by status;
If the code is valid but the system is busy, the display shows:


When the system is free again, the call can be repeated
4
A physical code that starts with zeroes can be entered, omitting the zeroes (e.g. physical code 1001 will call riser column 01 user 001).

## CALL BY ENTERING LOGICAL CODE

If the call module is configured with logical codes, enter a code of maximum 4 digits.
The digits entered are shown on the display:


Use $\mathbf{X}$ to delete the character if you make a mistake; with " system is free and the code is valid, the call is made and for fhe entire pick-up wait time (max. 60s) the display shows:


If the code is not valid, the display shows:

## WRONG CODE

and the display returns to stand-by status;
If the code is valid but the system is busy, the display shows:

| LINE BUSY |
| :---: |
| WAIT |

When the system is free again, the call can be repeated.

## CALL BY SELECTING NAME FROM REPERTORY

Press the arrow keys to scroll the list of names in alphabetical order. The names are shown on the display:

```
ROSSI
    MARIO
```

Pressing $\mathbf{X}$, stand-by status is restored; with " the call is made and for the entire pick-up wait time (max. 60s) the display shows:

CALLING

If the system is busy, the display shows:


When the system is free again, the call can be repeated.
If the repertory contains a high number of names, to make a faster search, proceed as follows.

- Press an arrow key once to display the repertory. The first name is displayed;
- Use the keypad to select the initial letter of the name to be found; the first name that starts with the letter indicated is displayed;
- Use the arrow keys to search for the name required.

For example, to find the name "ROSSI", from the previous display, press the 7 key three times to position the repertory on the first name starting with "R"; if there are no names starting with "R", the first name in alphabetical order is displayed. Use the arrow keys to navigate the repertory starting from the name displayed.

Association between buttons and numbers/letters is shown in the following table:

| button | 1 | 2 | 3 | 4 | 5 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | space | 1 |  |  |  |
| 2 | A | B | C | 2 |  |
| 3 | D | E | F | 3 |  |
| 4 | G | H | I | 4 |  |
| 5 | J | K | L | 5 |  |
| 6 | M | N | O | 6 |  |
| 7 | P | Q | R | S | 7 |
| 8 | T | U | V | 8 |  |
| 9 | W | X | Y | Z | 9 |
| 0 | 0 |  |  |  |  |

## CALL TO SWITCHBOARD

If the system includes a concierge switchboard set to "day" functioning, this will intercept and manage all the calls made from the main call modules. The switchboard in "day" status can also be called
directly with the key " $\sim$ " without any selection, or pressing several buttons at the same time.
If the system is free, the call is made and for the entire pick-up wait time (max. 60s) the display shows


If the code is valid but the system is busy, the display shows:


When the system is free again, the call can be repeated.

## COMMUNICATION AND DOOR OPENING

If a call is made, when the user lifts the hand-set, the module establishes a conversation and for the entire communication time (max. 10 minutes) the display shows:

```
SPEAK
```

PLEASE

If the user presses the button to open the main or vehicle entrance, the module activates the corresponding output with temporary display of:


When the user called hangs up, the communication is closed and the module returns to stand-by status.
If the call is intercepted by the switchboard and this puts the call module on hold in order to call an apartment station, the display shows:

```
WAIT
PLEASE
```

When communication between the module and the switchboard or directly with the apartment station called by the switchboard is restored, the display shows:


## TRANSMISSION OF SPECIAL CODES

If the system comprises special decoders, the call module can send commands to activate load driving outputs (lights, gates, etc.) When the call module is on stand-by, pressing the 0 key, the display shows


Continuing to press the 0 key for 2 s , the call module switches to special code mode and the display shows:


Enter the 3-digit code (from 1 to 255) programmed in the special decoder to be activated. The display shows this code with *:


Press $\mathbf{X}$ to delete the data entered; on completion of data entry, press to sent the code. The display returns to stand-by status.

## ENTRY OF DOOR-OPENER CODES

If door-opener codes (unrestricted or associated with names in the repertory) have been programmed on the call module, the door (pedestrian or vehicle) can be opened entering this code. The main entrance lock is activated for codes from 0001 to 4999; the vehicle entrance lock is activated for codes from 5000 to 5999.
When the call module is on stand-by, pressing the key
 , the display shows

```
DOOR LOCK
```

Enter the 4-digit door-opener code programmed. The display shows this code with *:


Press $\mathbf{X}$ to delete the data if you make a mistake; after entry, press The display returns to stand-by status.
If the code is amongst those programmed, the lock is activated and the display shows:


If the code is not amongst those programmed, the lock is not activated and the display shows:


## "POSTMAN" FUNCTION

If time bands have been programmed on the call module and the function is active, the main entrance can be opened on the days and at the times established simply by pressing the $\longrightarrow$ key.
After pressing this key, any door-opener code can be entered to open the vehicle entrance.

-

## PUSH BUTTON PANEL

Download from www.urmetdomus.com Technical Manuals area.

## SECTION CONTENTS

MIKRA PUSH BUTTON PANEL ..... 2
Features ..... 2
Structure ..... 2
Terminal pins description ..... 2
Technical characteristics. .....  2
Default programming. .....  3
Operation. ..... 3
Audio adjustment .....  3
INSTALLATION .....  4
Wall mounting ..... 4
Flush mounting .....  5
CONFIGURATION ..... 7
ASSOCIATION OF DOOR UNITS BUTTONS TO USERS ..... 8
PROGRAMMING DATA DELETING .....  8

## MIKRA PUSH BUTTON PANEL



Mikra push button panels are made of zama with high resistance against impact and damage.
Push button panels are provided with 2 call buttons and can be used in single- or two-family systems (second button excluded with jumper) or as secondary call station.
All push button panels can be wall mounted with screws and screw anchors, or flush mounted for special requirements, using the suitable box; in this case it sticks out few millimetres from the wall.
The push button panel reduced width allows its installation also on gate pillar. To make installation easier, each module is provided with call buttons, name holders, door unit and camera.
Push button panels are available in two different models:
With colour camera
Ref. 1783/1
with black/white camera
Ref. 1783/2

## FEATURES

- Surface finishing: metal colouring by chemical deposition with horizontal brush effect (no painting)
- High waterproof level and ingress protection against solid objects (IP44).
- Not removable door unit.
- System wires connected on a fixed raising clamp terminal block on the push button panel base.
- Double balancing call button also used as glass for name holder.
- White backlit name holder.
- Black/white or colour semi pinhole camera
- Infrared (b/w) and white (colour) leds illuminator. It can be excluded with dip-switch.
- All the programming procedure can be performed with dip-switch.
- Off-hook waiting time: 60 seconds (system busy).
- The guaranteed communication time can be programmed with rotary-switch up to 70 seconds (system busy).
- Max conversation time starting when the handset is picked up: 10 minutes.
- Tone for confirming call sending and conversation end.
- Audio signals of system busy.
- Pedestrian electric lock command actuator. Programmable timing with rotary-switch from 1 to 9 seconds.
- Driveway electric lock command actuator with clean contact.
- Electric lock management: Free or Secret.
- Circuitry for electric lock activation with entrance hall button.
- Input for open door sensor.
- Trimmer for adjusting loudspeaker and microphone audio level.


## STRUCTURE



1. Front made of zama
2. balancing name holder
3. Busy time rotary-switch
4. pedestrian door lock release activation time dip-switch
5. Identification code dip-switch
6. Auxiliary settings dip-switch
7. Loudspeaker volume adjustment
8. Microphone volume adjustment
9. user 1 call button
10. Microphone
11. user 2 call button
12. Terminal blocks
13. Loudspeaker
14. Camera

## TERMINAL PINS DESCRIPTION

| LINE <br> LINE | Incoming Bus line |
| :---: | :---: |
| SE+ | Positive for pedestrian electric lock activation |
| SE- | Negative for pedestrian electric lock activation |
| SE2 | Driveway electric lock activation |
| SE2 | (normally open contact) |
| $\begin{aligned} & \text { PA } \\ & \text { PA } \end{aligned}$ | Entrance hall button |
| SP SP | Open door sensor (*) |

(*) the terminal pin SP is connected by default to the terminal pin CT; to connect the normally close door sensor (with closed door), remove the jumper.

## TECHNICAL CHARACTERISTICS

Power supply voltage (LINE):
$36 \div 48 \mathrm{Vdc}$
Standby current consumption:
45mA max
Max. current consumption (video call): $\quad 250 \mathrm{~mA}$ max
Lock output SE+ and SE-: Capacitive discharge $22 \div 24 \mathrm{Vdc}$ Holding current max 200mAdc
SE2 switched load:
temperature range:
EN 61000-6-3, EN 61000-6-1
Compliant with:
3, EN 61000-6-1
Dimensions (LxHxW)


## DEFAULT PROGRAMMING

All push-buttons are configured in factory as follows:
Call station type:
Secondary number:
Door lock release:
Interruption:
Camera illuminators:
Number of users:
Busy time rotary:
Door lock release rotary:
Door unit number:
main ..... 0
free
Not enabled
on
single-family 30 sec. (pos 3 ) 1 sec.

## OPERATION

## CALLS

Il cartellino portanome ha la funzione di pulsante di chiamata; la chiamata avverrà nei seguenti modi:


After pressing the call button, the two following cases can occur:

- The line is free: the door unit emits a confirmation tone and the cal is sent to the selected user. At the end of conversation the door unit emits a "communication end" tone.
- The line is busy: the door unit emits an alert tone (when the busy time is elapsed, the call must be sent again).


## PEDESTRIAN ELECTRIC LOCK ACTIVATION

Door units are provided with two terminal pins for pedestrian electric lock activation (SE-, SE+). The electric lock is activated in the following cases:

- Each time the entrance hall button is pressed (terminal pins PA).
- After receiving a door lock release command from an apartment station, according to the configuration of the dip-switch used to configure the operating mode "free" or "secret" (see section "2VOICE system", paragraph "Call stations features").
- When the call is sent to an apartment station which is provided with "automatic door lock release" feature and this function is active.

If electric locks to be activated need special timing, the dip-switch "DOOR TIME" must be adjusted.

## DRIVEWAY DOOR LOCK RELEASE MANAGEMENT

Door units are provided with two terminal pins (SE2) connected to the contacts of a normally open relay, that can be used to command a gate opening control panel. The relay is activated for 1 sec . after receiving a driveway door lock release command from an apartment station, according to the configured operation mode, "free" or "secret", as for the pedestrian electric lock.
5 This relay is NOT suitable to manage directly power loads, but can only be used as command relay.

## AUDIO ADJUSTMENT

Audio levels are trimmed in factory, so they don't need to be changed in most installations.
If it is necessary to change them, use a screwdriver on the suitable adjusting points.


MIKRA PUSH BUTTON PANEL

- Remove the front panel of the push button panel.

- Install the push button panel at the height shown.
- Connect the wires and set the dip-switches.

PUSH BUTTON PANEL

## INSTALLATION

_ـ

| Urmet $\quad$ MIKRA PUSH BUTTON PANEL |  |
| :---: | :---: |
| INSTALLATION | 0 |
| 0 |  |
| 0 |  |

## FLUSH MOUNTING

- Remove the front panel of the push button panel.

- Install the flush mounting box Ref. 1122/60 (it must be purchased separately) at the indicated height.

- Fix the push button panel base to the frame provided with the flush mounting box.

- Put the frame with the base in the flush mounting box, and make cables come out of the hole.


The connection cables must protrude from the embedding box for at least 20 cm .

- Connect the wires and set the dip-switches.

- Remove the frame from the base by pressing the locks


[^3]MIKRA PUSH BUTTON PANEL

- Close the push button panel with the metal cover.


## MIKRA PUSH BUTTON PANEL



- Fix the push button panel to the frame.

PUSH BUTTON PANEL


## CONFIGURATION

ID: door unit identifier

- Each main call station must have a unique code (call ID, i.e. Identifier) that can be set with dip-switch with values $0 \div 3$.
- In case of secondary call station the ID must be the same as the column ID configured on the column interface.


AUX: auxiliary settings


Dip 1-Station type
The door unit can be configured either as a main or a secondary device. All the users in the system may be called from the main door unit. A secondary door unit may only call the users of the column to which it belongs. Users can identify the source of the call by the ring tone.

Dip 2 - Secondary station address
Two secondary calling stations may be present in a column and must have a different address (0 or 1).

Dip 3 - Door opener
The electric lock can be managed in "privacy" or "free" mode. The
door unit works as follows in the two cases:

- "Privacy": the electric lock may only be activated by pressing the door opening button on the calling station when an audio conversation has been established or when after having received a call or auto-on function either a video connection has been established.
- 'Free': when pressing the door lock release button of an apartment station, the door unit electric lock can be activated only if the door unit is configured as main or the user belongs to the column of the same secondary door unit. This column is defined by the ID setting of the secondary door unit. This function is typically used for secondary stations..

Dip 4 - Interruption
When is in progress an auto-on or an intercom conversation the respective column or the whole system is in busy mode, which, according to the configuration of this switch, can be interrupted or not by a call from the door unit.

Dip 5-Camera lights
The camera lights may be turned off if illumination in the surrounding environment is sufficient at night.

Dip 6 - Number of users
Setting this dip-switch to ON, the balancing call button will call two different users (user 0 if the button is pressed to the left and user 1 if pressed to the right). If it is set to OFF, only one user will be called, regardless of the call button is pressed to the left or right.

DOOR OPENING TIME The position of these dipswitches (DOOR TIME) determines the activation time of the main entrance electric lock.

|  | 回 | $\begin{aligned} & \square \text { 可 } \\ & 0 \end{aligned}$ |  |
| :---: | :---: | :---: | :---: |
| $\begin{aligned} & \text { Pos. } 0 \\ & (1 \mathrm{sec}) \end{aligned}$ | $\begin{aligned} & \text { Pos. } 1 \\ & (3 \mathrm{sec}) \end{aligned}$ | $\begin{aligned} & \text { Pos. } 2 \\ & (6 \mathrm{sec}) \end{aligned}$ | Pos. 3 <br> (9 sec) |

GUARANTEED CONVERSATION TIME The position of the rotary switch (CONV TIME) determines the busy time i.e. a guaranteed conversation time.


Pos. $0=1 \mathrm{sec} . \quad$ Pos. $1=10 \mathrm{sec} . \quad$ Pos. $2=20 \mathrm{sec}$.
Pos. $3=30$ sec. Pos. $4=40 \mathrm{sec}$. Pos. $5=50 \mathrm{sec}$.
Pos. $6=60$ sec. Pos. 7 and $8=70 \mathrm{sec}$.
Pos. 9 = high level programming
LGain access to the advanced configuration by rotating the "CONV TIME" rotary switch in position 9.

## ASSOCIATION OF DOOR UNITS BUTTONS TO USERS

In two-family systems with double call station, one station can be associated with user 0 and the other with user 1:

- Configure the two call stations as "single-family" (AUX dip $6=$ OFF).
- Configure the call station associated with user 0 as main (AUX dip $1=O F F)$ and ID = 0 .
- Configure the call station associated with user 1 as secondary (AUX $\operatorname{dip} 1=\mathrm{ON})$ with address $1(\mathrm{AUX} \operatorname{dip} 2=\mathrm{ON})$ and $\mathrm{ID}=0$.
- Position the rotary switch (CONV TIME) of the call station associated with user 1 to position " 9 ". The station emits a confirmation tone.
- On the call station associated with user 1, set the number of the door speaker unit ID = 1 .
- Change the position of AUX dip switch no. 5 (the call module emits a confirmation tone).
- Set again the AUX dip switch no. 5 in its previous position (the call module emits a confirmation tone).
- Set again the ID dip switches in their previous position (ID = 0).
- Exit from advanced configuration, returning the rotary switch to the position for setting guaranteed conversation time.


The main call station "A" calls only user 0 with both keys while the secondary call station " $B$ " calls only user 1 with both keys.

- On the call module "B" access to advanced configuration;
- Set the ID dip switch to 1 ;
- Move the AUX dip switch no. 5;
- Set again all the dip switches in their previous position;
- Exit from the advanced configuration.


## PROGRAMMING DATA DELETING

To delete all the data programmed in the advanced configuration, follow the instructions below:

- Go to advanced configuration (CONV TIME = 9).
- Holding down any key for at least 5 sec., the door speaker unit emits a warning tone to confirm cancellation.


## Exigo

## PUSH BUTTON PANEL

## Download from www.urmetdomus.com Technical Manuals area.

EXIGO PUSH BUTTON PANEL ..... 2
ELECTRICAL AND MECHANICAL SPECIFICATIONS ..... 2
HOW TO FORM THE PANEL CODE ..... 2
Example of engraved front panel .....  2
Example of name tag customisation ..... 2
LOUDSPEAKING UNIT Ref.1083/8 ..... 3
Performance ..... 3
Structure ..... 3
Terminal pins description ..... 3
Technical characteristics ..... 3
Default programming ..... 3
Operation ..... 4
Audio adjustment ..... 4
16-USER EXPANSION MODULE Ref.1038/17 ..... 4
Connection example. ..... 4
Terminal pins description ..... 4
Technical specifications ..... 4
TV CAMERA UNIT Ref. 1810/40 ..... 5
Technical specifications ..... 5
Camera unit assembly ..... 5
Camera lens direction adjustment. ..... 6
PANELS FOR SINTHESI FLUSH-MOUNTING BOXES ..... 7
Flush-mounting boxes ..... 7
Door unit installation procedure ..... 8
Name tag back-lighting LED fastening procedure ..... 8
Front panel fastening procedure ..... 8
PANELS FOR DEDICATED FLUSH-MOUNTING BOXES ..... 9
Flush-mounting boxes ..... 9
Flush-mounting boxe installation procedure ..... 10
Door unit installation procedure ..... 10
Name tag back-lighting LED fastening procedure. ..... 10
Front panel fastening procedure ..... 10
SECTION CONTENTS
ACCESSORIES ..... 11
Name tag ..... 11
EXAMPLE OF MODULAR CONSTRUCTION ..... 12
CONFIGURATION ..... 16
ASSOCIATION OF DOOR UNITS BUTTONS TO USERS ..... 17
Main door units ..... 17
Secondary door units ..... 17
OPTIONAL PROGRAMMING ..... 18
Control cameras ..... 18
Button configuration for special function ..... 18
PROGRAMMING DATA DELETING ..... 18

## EXIGO PUSH BUTTON PANEL

Exigo is the elegant and customisable brass-plated Urmet panel. A special space for an engraved plate is provided on the panel. The space may be used to fit plate showing the name of the building, the address, the street number and other information, on one or two lines. Two types of fonts may be chosen.
The basic panel is supplied with a brass panel to be engraved. Other two options are available upon request: an engraved brass plate or an anthracite grey PVC plate. You may choose what information to be written on the name tags (name, floor/apartment number, etc.) and the number of lines (1 or 2).
The name tags are backlit by a set of high-efficiency white LEDs. This feature may also be customised by purchasing a blue or green coloured film.
Polished brass-plate and matte brass-plate panels are available. The system is suitable for use in both door phone and video door phone systems (colour or black and white).
All parts of the front panel are treated by means of a ion plating protection process (PVD) to make them corrosion and rustproof. The panels are particularly resistant to weather elements.
The Exigo panels may be installed in Sinthesi flush-mounting boxes or in specific boxes.

All versions are complete with:

- LED name tag lighting unit.
- Brass-plate name tags to be engraved.
- Tamperproof screws and screwdriver.
- Drilling template for fastening the door unit (versions 1143 and 1743).


## ELECTRICAL <br> AND <br> MECHANICAL SPECIFICATIONS

Front projection from wall: 17 mm Total button stroke: $>4 \mathrm{~mm}$
Idle button stroke: $>2.4 \mathrm{~mm}$
Isolation voltage between contacts: 500Vac
Max. button cut-off current: 2Aac
Name tag lighting:
Name tag lighting intake: white LED diodes 20 mA 12Vac for each name tag (*) Plexiglas
Temporary name tags:
Max. wire cross-section area for button and light terminals: 1.5mm² Corrosion: as per DIN 5342/64 standard
Test duration: 16 hours
Test temperature range:
$35^{\circ} \mathrm{C}$
IMPORTANT: Clean with a dry, soft cloth. Do not use brass polish.
(*) For name holder lighting, a transformer Ref. 9000/230 or another power supply with a suitable power is needed.

## HOW TO FORM THE PANEL CODE

Please provide a code formed as follows for ordering a customised part:




Plate type: 0 - brass, not engraved 1 - grass, engraved 2 - anthracite grey PVC

Engraved font:
0 - none
1-SL43
12-aero
Number of engraved lies:
0 - none
1 - one line
2-two lines
Front panel finish:
S - matte
L - polished

- Number of buttons

Front panel type:
1743 - video door phone in Sinthesi box
1143 - door phone in Sinthesi box
1721 - video door phone in dedicated box
1121 - door phone in dedicated box

EXAMPLE OF ENGRAVED FRONT PANEL


EXAMPLE OF NAME TAG CUSTOMISATION
PVC PLATE - SL43 FONT
Urmet
Gorino

BRASS PLATE - STENCIL FONT
LEMMES

## LOUDSPEAKING UNIT Ref．1083／8



## PERFORMANCE

－ 4 expansion modules（connected in series）can be potentially connected，up to 64 user buttons max．for each door unit．
－Connector for 16 user expansion module Ref．1038／17．
－Up to 4 main call station and up to two secondary call stations can be connected for each column．
－Possibility to connect a camera to the door unit with a pre－cabled connector．
－Codes sequences can be assigned to call buttons with dip－switch
－All the programming procedure can be performed with dip－switch．
－Off－hook waiting time： 60 seconds（system busy）．
－The guaranteed communication time can be programmed with rotary－switch up to 70 seconds（system busy）．
－Max conversation time starting when the handset is picked up； 10 minutes
－Tone for confirming call sending and conversation end．
－Video－Audio signals of system busy
－Pedestrian electric lock command actuator．Programmable timing with rotary－switch from 1 to 30 seconds．
－Electric lock management：Free or Secret．
－Circuitry for electric lock activation with entrance hall button．
－Input for open door sensor．
－Trimmer for adjusting loudspeaker and microphone audio level．
－Management of an external video coax input for control cameras， if needed．
－Relay box driving for cyclic control of several video surveillance cameras

## STRUCTURE



1）Speaker volume trimmer．
2）Connection terminal board
3）Microphone volume trimmer．
4）Connector for local camera connection
5）Programming dip－switch．
6）Door lock release time and busy time rotary switch．
7）Connector for 16 user expansion modules Ref．1038／17．

## TERMINAL PINS DESCRIPTION

\(\left.$$
\begin{array}{ll}\text { SE＋} & \text { Positive for pedestrian crossing electric lock } \\
\text { SE－} & \text { Negative for pedestrian crossing electric lock } \\
\text { CT } & \text { Reference for PA and SP } \\
\text { PA } & \text { Hall button } \\
\text { SP } & \begin{array}{l}\text { Open door detector（＊）} \\
\text { T－}\end{array} \\
\begin{array}{l}\text { Reference for video switch } \\
\text { T＋} \\
\text { LINE }\end{array} & \begin{array}{ll}\text { Command for video switch }\end{array}
$$ <br>

LINE\end{array}\right\}\)| Bus line in |  |
| :--- | :--- |
| V3 | Control camera signal |
| V5 | Reference for control camera signal |

（＊）the terminal pin SP is connected by default to the terminal pin CT；to connect the normally close door sensor（with closed door）， remove the jumper

## TECHNICAL CHARACTERISTICS

Power supply voltage（LINE）：
$36 \div 48 \mathrm{Vdc}$
Standby current consumption：
45mA max
Max．current consumption（video call）：
250mA max
Lock output SE＋and SE－：
Capacitive discharge $22 \div$ 24Vdc Holding current 200mAdc max $-10^{\circ} \mathrm{C} \div+50^{\circ} \mathrm{C}$
Operating temperature range：
EN 61000－6－3，EN 61000－6－1

## DEFAULT PROGRAMMING

All louspeaking unit are configured in factory as follows：
Call station type：
Secondary number：
Door lock release：
Not enabled
Interruption：
Not enabled
0 sec．（pos 3 ）
Busy time rotary：
1sec．（pos．1）
Door lock release rotary：
Door unit number：


DOOR TIME

## OPERATION

## CALLS

Up to 64 users max. can be called by pressing the respective buttons of the push button panel associated.
After pressing the call button, the two following cases can occur:

- The line is free: the door unit emits a confirmation tone and the call is sent to the selected user.
- The line is busy: the door unit emits an alert tone (when the busy time is elapsed, the call must be sent again).

4. If in the system there is a concierge switchboard in "Day" mode, all the calls performed from the main call stations are intercepted and managed by the switchboard.

## PEDESTRIAN ELECTRIC LOCK ACTIVATION

Door units are provided with two terminal pins for pedestrian electric lock activation (SE-, SE+). The electric lock is activated in the following cases:

- Each time the entrance hall button is pressed (terminal pins PA, CT).
- After receiving a door lock release command from an apartment station, according to the configuration of the dip-switch used to configure the operating mode "free" or "secret" (see section "2VOICE system", paragraph "Call stations features").
- When the call is sent to an apartment station which is provided with "automatic door lock release" feature and this function is active.
If electric locks to be activated need special timing, the rotary switch "DOOR TIME" must be adjusted.


## AUDIO ADJUSTMENT

Audio levels are trimmed in factory, so they don't need to be changed in most installations.
If it is necessary to change them, use a screwdriver on the suitable adjusting points.


## 16-USER EXPANSION MODULE Ref.1038/17



The expansion module allows to add 16 user buttons to the door unit.
Position the device in the panels as shown in the figures below under the LED circuits for lighting the name tags.


Connect the user buttons and connect the device to the door unit or to other expansion modules, if present, with the suitable cable, respecting connection direction


## CONNECTION EXAMPLE



TERMINAL PINS DESCRIPTION
C Reference ground for buttons $1 \div 8$
P1〒P8 User buttons
C Reference ground for buttons $9 \div 16$
P9 $\div$ P16 User buttons

## TECHNICAL CHARACTERISTICS

| Current consumption: | 1 mA Max |
| :--- | ---: |
| Current in user button: | $\sim 1 \mathrm{~mA}$ |
| Operating temperature range: | $+0^{\circ} \mathrm{C} \div+50^{\circ} \mathrm{C}$ |
| Humidity: | $90 \%$ UR a $30^{\circ} \mathrm{C}$ |

Current in user button:
Operating temperature range: $90 \%$ UR a $30^{\circ} \mathrm{C}$
UFmet EXIGO PUSH BUTTON PANEL

## TV CAMERA UNIT Ref. 1810/40



Easy to insert and extract from the front of the panel, the camera unit are provided with:

- Fixed focus camera with built-in optics and shutter.
- Possibility of adjusting camera lens vertically and horizontally.
- Set of LEDs for illuminating the subject.
- Extractable connection terminal board.


## TECHNICAL SPECIFICATIONS

Power voltage:
Maximum uptake:
Image sensor:
Lens:
Shutter:
Focus:
Minimum light for acceptable pictures:
Coax video output:
Frequency:
Operating temperature range:

## CAMERA UNIT ASSEMBLY

Proceed as follows for fixing the camera unit to the front panel:

1. Extract the connector from the camera body.

2. Loosen the camera fastening screw.

3. Remove the LED circuit from the plastic front panel.

4. Remove the camera from the plastic front panel.

5. Fasten the LED circuit to the Exigo front panel.

6. Fit the camera on the Exigo front panel.

7. Fasten the camera fastening screw.
8. Connector the connector to the camera body.

9. Connect the camera to the door unit.


## CAMERA LENS DIRECTION ADJUSTMENT

With this TV camera unit, it is possible to adjust the direction of the TV camera lens inside it using the specific adjustment screws $A$ and $B$ in order to overcome any installation flaws.
The adjustment along the vertical axis in relation to the position set is $10^{\circ}$ up and $20^{\circ}$ down.
Adjustment along the horizontal axis in relation the position set is $10^{\circ}$ in both directions (left-right).


## Orientation along the vertical axis

Turning screw A:

- In a clockwise direction (to the right) moves the pick-up field towards the top of the screen.
- In a counterclockwise direction (to the left) moves the pick-up field towards the bottom of the screen.


## Orientation along the horizontal axis

Turning screw B :

- In a clockwise direction (to the right) moves the pick-up field towards the left the screen.
- In a counterclockwise direction (to the left) moves the pick-up field towards the right of the screen.

IMAGING ANGLES


Measurements in centimetres

## PANELS FOR SINTHESI FLUSH-MOUNTING BOXES

This range of panels is suitable for installation in systems from 1 to 10 users. Sinthesi flush-mounting boxes adapted by means of a spacer are used.
The front panels are arranged for door unit installation. The following models are available:

Door phone panels
with 1 calling button
with 2 calling buttons with 3 calling buttons with 4 calling buttons with 5 calling buttons with 6 calling buttons with 7 calling buttons with 8 calling buttons with 9 calling buttons

Ref. 1143/101
Ref. 1143/102
Ref. 1143/103
Ref. 1143/104
Ref. 1143/105
Ref. 1143/106
Ref. 1143/107
Ref. 1143/108
Ref. 1143/109
Ref. 1143/110
Video door phone panels
with 1 calling button
Ref. 1743/101
Ref. 1743/102
Ref. 1743/103
Ref. 1743/104
Ref. 1743/105
Ref. 1743/106
Ref. 1743/107
Ref. 1743/108
Ref. 1743/109
Ref. 1743/110
Fill in the order form and specify the required customisations by using the complete code formed as explained in the "How to form the panel code" paragraph.

## FLUSH-MOUNTING BOXES

A different box than shown in the following table must be used according to the panel model to be installed:

| Front panel code | Flush-mounting box code |
| :---: | :---: |
| Ref. 1143/101 | Ref. 1145/52 |
| Ref. 1143/102 |  |
| Ref. 1143/103 | Ref. 1145/53 |
| Ref. 1143/104 |  |
| Ref. 1143/105 |  |
| Ref. 1143/106 |  |
| Ref. 1143/107 | $2 \times$ Ref. 1145/52 |
| Ref. 1143/108 |  |
| Ref. 1143/109 | $2 \times$ Ref. 1145/53 |
| Ref. 1143/110 |  |
| Ref. 1743/101 | Ref. 1145/53 |
| Ref. 1743/102 |  |
| Ref. 1743/103 | Ref. 1145/54 |
| Ref. 1743/104 |  |
| Ref. 1743/105 |  |
| Ref. 1743/106 |  |
| Ref. 1743/107 | $2 \times$ Ref. 1145/53 |
| Ref. 1743/108 |  |
| Ref. 1743/109 |  |
| Ref. 1743/110 |  |

System wires lead into the boxes through the openings on the sides and bottom of the box.
All openings are shut by removable closures.


FLUSH-MOUNTING BOXES JOINING PROCEDURE
Two fairlead spacers for joining the boxes are provided with flushmounting boxes Ref. 1145/52-/53-/54 modules.
All the spacers are hollow to allow the passage of wires from one box to the other.


## FLUSH-MOUNTING BOX INSTALLATION PROCEDURE

The spacer Ref. 1143/60 must be fixed to each of the flush-mounting boxes.
A standard sized spacer is provided. For flush-mounting boxes Ref. $1145 / 52$ or Ref. 1145/53, break the spacer along the pre-cutting for correct assembly.


EXIGO PUSH BUTTON PANEL
PANELS FOR SINTHESI FLUSH-MOUNTING BOXES

Screws A ( $3.5 \times 16 \mathrm{~mm}$ ) are provided with the spacer.
The box and spacer must be installed flush with the wall without protruding at a height of approximately $1.55 \div 1.60 \mathrm{~m}$ from the floor.
The flush-mounting depth of all boxes is equal to 60 mm ( 45 mm for the $b o x+15 \mathrm{~mm}$ for the spacer).


## DOOR UNIT INSTALLATION PROCEDURE

Do not fit the seal on the microphone provided with the door unit.


5 Screws C are included with the front panel and not with the door unit.

## NAME TAG BACK-LIGHTING LED FASTENING PROCEDURE

Use the template provided with the front panel to fasten the name tag lighting LEDs. Cut all the flush-mounting box columns shown by , and then drill at the points indicated by .

Fix the spacers to the flush-mounting box and fix the LED circuit to the spacers.
SINGLE LED CIRCUIT


MULTIPLE LED CIRCUIT


## FRONT PANEL FASTENING PROCEDURE

Close the panel front using the tamperproof screws provided at the end of the operations:


## PANELS FOR DEDICATED FLUSH-MOUNTING BOXES

This panel range is designed for use in systems from 3 to 20 users. Dedicated flush-mounting boxes are used.
The front panels are arranged for door unit installation. The following models are available:

## Door phone panels with 1 row of buttons

with 3 calling buttons with 4 calling buttons with 5 calling buttons with 6 calling buttons

Door phone panels with 2 rows of buttons
with 4 calling buttons with 6 calling buttons with 8 calling buttons with 10 calling buttons with 12 calling buttons with 14 calling buttons with 16 calling buttons with 18 calling buttons with 20 calling buttons

Video door phone panels with 1 row of buttons
with 3 calling buttons
with 4 calling buttons with 5 calling buttons with 6 calling buttons

Video door phone panels with 2 rows of buttons with 4 calling buttons with 6 calling buttons with 8 calling buttons with 10 calling buttons with 12 calling buttons with 14 calling buttons with 16 calling buttons with 18 calling buttons with 20 calling buttons

Ref. 1121/103
Ref. 1121/104
Ref. 1121/105
Ref. 1121/106

Ref. 1121/204
Ref. 1121/206
Ref. 1121/208
Ref. 1121/210
Ref. 1121/212
Ref. 1121/214
Ref. 1121/216
Ref. 1121/218
Ref. 1121/220

Ref. 1721/103
Ref. 1721/104
Ref. 1721/105
Ref. 1721/106

Ref. 1721/204
Ref. 1721/206
Ref. 1721/208
Ref. 1721/210
Ref. 1721/212
Ref. 1721/214
Ref. 1721/216
Ref. 1721/218
Ref. 1721/220

Fill in the order form and specify the required customisations by using the complete code formed as explained in the "How to form the panel code" paragraph.

## FLUSH-MOUNTING BOXES

A different box than shown in the following table must be used according to the panel model to be installed:

| Front panel code | Front panel code | Dimensions of <br> flush-mounting box |
| :---: | :---: | :---: |
| Ref. 1121/103 | Ref. 1121/53 | $110 \times 256 \mathrm{~mm}$ |
| Ref. 1121/104 | Ref. 1121/54 | $110 \times 284 \mathrm{~mm}$ |
| Ref. 1121/105 | Ref. 1121/55 | $110 \times 312 \mathrm{~mm}$ |
| Ref. 1121/106 | Ref. 1121/56 | $110 \times 340 \mathrm{~mm}$ |
| Ref. 1121/204 <br> Ref. 1121/206 | Ref. 1121/60 | $186 \times 228 \mathrm{~mm}$ |
| Ref. 1121/208 <br> Ref. 1121/210 | Ref. 1121/62 | $186 \times 284 \mathrm{~mm}$ |
| Ref. 1121/212 | Ref. 1121/64 | $186 \times 312 \mathrm{~mm}$ |
| Ref. 1121/214 | Ref. 1121/65 | $186 \times 340 \mathrm{~mm}$ |
| Ref. 1121/216 | Ref. 1121/66 | $186 \times 368 \mathrm{~mm}$ |
| Ref. 1121/218 | Ref. 1121/67 | $186 \times 396 \mathrm{~mm}$ |
| Ref. 1121/220 | Ref. 1121/68 | $186 \times 424 \mathrm{~mm}$ |
| Ref. 1721/103 | Ref. 1721/53 | $110 \times 340 \mathrm{~mm}$ |
| Ref. 1721/104 | Ref. 1721/54 | $110 \times 368 \mathrm{~mm}$ |
| Ref. 1721/105 | Ref. 1721/55 | $110 \times 396 \mathrm{~mm}$ |
| Ref. 1721/106 | Ref. 1721/56 | $110 \times 424 \mathrm{~mm}$ |
| Ref. 1721/204 | Ref. 1721/60 | $186 \times 312 \mathrm{~mm}$ |
| Ref. 1721/206 | Ref. 1721/61 | $186 \times 312 \mathrm{~mm}$ |
| Ref. 1721/208 | Ref. 1721/62 | $186 \times 340 \mathrm{~mm}$ |
| Ref. 1721/210 | Ref. 1721/63 | $186 \times 368 \mathrm{~mm}$ |
| Ref. 1721/212 | Ref. 1721/64 | $186 \times 396 \mathrm{~mm}$ |
| Ref. 1721/214 | Ref. 1721/65 | $186 \times 424 \mathrm{~mm}$ |
| Ref. 1721/216 | Ref. 1721/66 | $186 \times 452 \mathrm{~mm}$ |
| Ref. 1721/218 | Ref. 1721/67 | $186 \times 480 \mathrm{~mm}$ |
| Ref. 1721/220 | Ref. 1721/68 | $186 \times 508 \mathrm{~mm}$ |

The flushing depth for all boxes is 55 mm .
System wires lead into the boxes through the openings on the bottom of the box.
All openings are shut by removable closures.


## FLUSH-MOUNTING BOX INSTALLATION

 PROCEDUREApply adhesive labels to protect the front panel fastening holes during the embedding operation.
The box must be installed flush with the wall without protruding at a height of approximately $1.55 \div 1.60 \mathrm{~m}$ from the floor.


The wall surface must be flat.
Maximum permitted tolerance $=1.5 \mathrm{~mm}$.

## DOOR UNIT INSTALLATION PROCEDURE

1 ROW OF BUTTONS


2 ROWS OF BUTTONS

PUSH BUTTON PANEL
$\checkmark$

NAME TAG BACK-LIGHTING LED CIRCUIT FASTENING PROCEDURE
Proceed as follows to fasten the name tag lighting LEDs: Fix the spacers to the flush-mounting box and fix the LED circuit to the spacers


FRONT PANEL FASTENING PROCEDURE
Close the panel front using the tamperproof screws provided at the end of the operations:


## ACCESSORIES

## NAME TAG

Exigo panels are provided with a brass name tag (not engraved) which may be replaced by an engraved brass name tag or an anthracite grey PVC name tag.
Coloured film (each box contains 5 pieces in two colours) may be used to customise the colour of the backlighting:

- Blue Ref. 1143/51
- Green Ref. 1143/52

Proceed as shown in the following drawings for fitting the coloured film and the name tags.


Possible coloured film (not included)

|  |  | BUTTONS NUMBER |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
|  | 1143/101 | 1 |  |  |  |  |  |  |  |  |  |
|  | 1143/102 |  | 1 |  |  |  |  |  |  |  |  |
|  | 1143/103 |  |  | 1 |  |  |  |  |  |  |  |
|  | 1143/104 |  |  |  | 1 |  |  |  |  |  |  |
| FRONT | 1143/105 |  |  |  |  | 1 |  |  |  |  |  |
| FRONT | 1143/106 |  |  |  |  |  | 1 |  |  |  |  |
|  | 1143/107 |  |  |  |  |  |  | 1 |  |  |  |
|  | 1143/108 |  |  |  |  |  |  |  | 1 |  |  |
|  | 1143/109 |  |  |  |  |  |  |  |  | 1 |  |
|  | 1143/110 |  |  |  |  |  |  |  |  |  | 1 |
| DOOR UNIT | 1083/8 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| EXPANSION MODULE | 1038/17 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| FLUSH MOUNTING | 1145/52 | 1 | 1 |  |  |  |  | 2 | 2 |  |  |
| BOX | 1145/53 |  |  | 1 | 1 | 1 | 1 |  |  | 2 | 2 |
| SPACER | 1143/60 | 1 | 1 | 1 | 1 | 1 | 1 | 2 | 2 | 2 | 2 |
|  |  | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
|  |  |  |  | BUT | TO | NS | N | UM | E |  |  |


$\qquad$
urmet $\qquad$ －

|  |  | BUTTONS NUMBER |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
| FRONT | 1743／101 | 1 |  |  |  |  |  |  |  |  |  |
|  | 1743／102 |  | 1 |  |  |  |  |  |  |  |  |
|  | 1743／103 |  |  | 1 |  |  |  |  |  |  |  |
|  | 1743／104 |  |  |  | 1 |  |  |  |  |  |  |
|  | 1743／105 |  |  |  |  | 1 |  |  |  |  |  |
|  | 1743／106 |  |  |  |  |  | 1 |  |  |  |  |
|  | 1743／107 |  |  |  |  |  |  | 1 |  |  |  |
|  | 1743／108 |  |  |  |  |  |  |  | 1 |  |  |
|  | 1743／109 |  |  |  |  |  |  |  |  | 1 |  |
|  | 1743／110 |  |  |  |  |  |  |  |  |  | 1 |
| DOOR UNIT | 1083／8 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| EXPANSION MODULE | 1038／17 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| TV CAMERA UNIT | 1810／40 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| FLUSH MOUNTING | 1145／53 | 1 | 1 |  |  |  |  | 2 | 2 | 2 | 2 |
| BOX | 1145／54 |  |  | 1 | 1 | 1 | 1 |  |  |  |  |
| SPACER | 1143／60 | 1 | 1 | 1 | 1 | 1 | 1 | 2 | 2 | 2 | 2 |
|  |  | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
|  |  | BUTTONS NUMBER |  |  |  |  |  |  |  |  |  |



## EXIGO PUSH BUTTON PANEL

|  |  | BUTTONS NUMBER |  |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 1 row |  |  |  | 2 rows |  |  |  |  |  |  |  |  |  |
|  |  | 3 | 4 | 5 | 6 | 4 | 6 | 6 | 8 | 10 | 12 | 14 | 16 | 18 | 20 |
| FRONT | 1121/103 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | 1121/104 |  | 1 |  |  |  |  |  |  |  |  |  |  |  |  |
|  | 1121/105 |  |  | 1 |  |  |  |  |  |  |  |  |  |  |  |
|  | 1121/106 |  |  |  | 1 |  |  |  |  |  |  |  |  |  |  |
|  | 1121/204 |  |  |  |  | 1 |  |  |  |  |  |  |  |  |  |
|  | 1121/206 |  |  |  |  |  | 1 | 1 |  |  |  |  |  |  |  |
|  | 1121/208 |  |  |  |  |  |  |  | 1 |  |  |  |  |  |  |
|  | 1121/210 |  |  |  |  |  |  |  |  | 1 |  |  |  |  |  |
|  | 1121/212 |  |  |  |  |  |  |  |  |  | 1 |  |  |  |  |
|  | 1121/214 |  |  |  |  |  |  |  |  |  |  | 1 |  |  |  |
|  | 1121/216 |  |  |  |  |  |  |  |  |  |  |  | 1 |  |  |
|  | 1121/218 |  |  |  |  |  |  |  |  |  |  |  |  | 1 |  |
|  | 1121/220 |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 |
| DOOR UNIT | 1083/8 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| $\begin{aligned} & \hline \text { EXPANSION } \\ & \text { MODULE } \end{aligned}$ | 1038/17 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 2 | 2 |
| FLUSH MOUNTING BOX | 1121/53 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | 1121/54 |  | 1 |  |  |  |  |  |  |  |  |  |  |  |  |
|  | 1121/55 |  |  | 1 |  |  |  |  |  |  |  |  |  |  |  |
|  | 1121/56 |  |  |  | 1 |  |  |  |  |  |  |  |  |  |  |
|  | 1121/60 |  |  |  |  | 1 | 1 | 1 |  |  |  |  |  |  |  |
|  | 1121/62 |  |  |  |  |  |  |  | 1 | 1 |  |  |  |  |  |
|  | 1121/64 |  |  |  |  |  |  |  |  |  | 1 |  |  |  |  |
|  | 1121/65 |  |  |  |  |  |  |  |  |  |  | 1 |  |  |  |
|  | 1121/66 |  |  |  |  |  |  |  |  |  |  |  | 1 |  |  |
|  | 1121/67 |  |  |  |  |  |  |  |  |  |  |  |  | 1 |  |
|  | 1121/68 |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 |
|  |  | 3 | 4 | 5 | 6 | 4 | 6 | 6 | 8 | 10 | 12 | 14 | 16 | 18 | 20 |
|  |  |  |  | row |  |  |  |  |  |  | row |  |  |  |  |
|  |  | BUTTONS NUMBER |  |  |  |  |  |  |  |  |  |  |  |  |  |



> PUSH BUTTON PANEL


VIDEO DOOR PHONE SYSTEM IN DEDICATED BOXES



3


4




## CONFIGURATION

ID: door unit identifier

- Each main call station must have a unique code (call ID, i.e. Identifier) that can be set with dip-switch with values $0 \div 3$.
- In case of secondary call station the ID must be the same as the column ID configured on the column interface




ID 1


ID 13


ID 19


ID 12


ID 18


ID 34


ID 9


ID 10


ID 16


ID 22



Dip 1 - Station type
The door unit can be configured either as a main or a secondary device. All the users in the system may be called from the main door unit. A secondary door unit may only call the users of the column to which it belongs. Users can identify the source of the call by the ring tone.

Dip 2 - Secondary station address
Two secondary calling stations may be present in a column and must have a different address (0 or 1).

Dip 3 - Door opener
The electric lock can be managed in "privacy" or "free" mode. The door unit works as follows in the two cases:

- "Privacy": the electric lock may only be activated by pressing the door opening button on the calling station when an audio conversation has been established or when after having received a call or auto-on function either a video connection has been established.
- 'Free': when pressing the door lock release button of an apartment station, the door unit electric lock can be activated only if the door unit is configured as main or the user belongs to the column of the same secondary door unit. This column is defined by the ID setting of the secondary door unit. This function is typically used for secondary stations.

Dip 4 - Interruption
When is in progress an auto-on or an intercom conversation the respective column or the whole system is in busy mode, which, according to the configuration of this switch, can be interrupted or not by a call from the door unit.

DIP5 - Not used
The position of this dip-switch is irrelevant.

## DOOR OPENING TIME

The position of the rotary switch (DOOR TIME) determines the activation time of the door lock.


Pos. $0=1 \mathrm{sec} . \quad$ Pos. $1=10 \mathrm{sec} . \quad$ Pos. $2=20 \mathrm{sec}$.
Pos. $3=30$ sec. Pos. $4=30 \mathrm{sec}$. Pos. $5=30 \mathrm{sec}$.
Pos. $6=30$ sec. Pos. $7=30 \mathrm{sec} . \quad$ Pos. $8=30 \mathrm{sec}$.
Pos. $9=30$ sec. / advanced programming

## GUARANTEED CONVERSATION TIME

The position of the rotary switch (CONV TIME) determines the busy time i.e. a guaranteed conversation time.


Pos. $0=1 \mathrm{sec} . \quad$ Pos. $1=10 \mathrm{sec} . \quad$ Pos. $2=20 \mathrm{sec}$.
Pos. $3=30 \mathrm{sec} . \quad$ Pos. $4=40 \mathrm{sec}$. Pos. $5=50 \mathrm{sec}$.
Pos. $6=60 \mathrm{sec} . \quad$ Pos. 7 e $8=70 \mathrm{sec}$.
Pos. $9=$ advanced programming
Gain access to the advanced configuration by rotating both rotary switches in position 9 .

## ASSOCIATION OF DOOR UNITS BUTTONS TO USERS

Up to 62 buttons (besides the two buttons on the door unit station) can be connected to the door unit, using 4 add-on buttons units 1038/17 max.

## MAIN DOOR UNITS

If the door unit is configured as main, buttons are automatically associated to column 0 ; this makes installation of main call stations easier in one-column systems.


If the door unit is configured as main and in the system there are several columns, an association between buttons and users of the different columns is needed. Follow the instructions below:
1 - Gain access to advanced configuration by rotating both the dipswitches in position 9.


2 - Set the call station ID dip-switch to the code of the column to which the buttons must be associated.
3 - Press the button associated to the user 0 of the selected column. All next buttons are automatically associated to the users of that column, in sequence.
4 - Repeat steps 2 and 3 for all the columns.
5 - Put again the ID dip-switches in their original position.
6 - Quit the advanced configuration, by putting again the two rotary switches in the positions used to set door lock release time and guaranteed communication time. The yellow led switches off.
7 - Repeat these operations for all main call stations.

## Example:

System with 3 columns, the first one with 4 users, the second with 6 users, the third with 8 users.


- Gain access to advanced configuration.
- Set the call station ID dip-switch to 0 .
- Press the first button of the call station (user 0 column 0 ).
- Set the call station ID dip-switch to 1.
- Press the fifth button of the call station (user 0 column 1).
- Set the call station ID dip-switch to 2.
- Press the eleventh button of the call station (user 0 column 2).
- Put again the ID dip-switches in their original position
- Quit the advanced configuration.

The final configuration will be:


## SECONDARY DOOR UNITS

In door units configured as secondary, buttons are associated by default to the users from 0 to 63 of their column.

If the door units are configured as secondary, but each one must call a different group of users, follow the instructions below:

- Gain access to advanced configuration by rotating both the dipswitches in position 9.

- Set the call station ID dip-switch to the code of the apartment station which will be associated to the first button (offset).
5The offset code must only be included between 0 and 31.
- Change AUX dip switch no. 5 position (the call station emits a confirmation tone);
- Put again the AUX dip switch no. 5 in its original position (the call station emits a confirmation tone);

())) Beep
- Put again the ID dip-switches in their original position.
- Quit the advanced configuration, by putting again the two rotary switches in the positions used to set door lock release time and guaranteed communication time.

Example:
The secondary call station "A" calls only users from 0 to 10 , the call station "B" only users from 11 to 18.

- On the call station "B", gain access to advanced configuration;
- Set ID dip-switch to 11;
- Move AUX dip switch no. 5;
- Put again all dip-switches in their original position;
- Quit the advanced configuration.


## OPTIONAL PROGRAMMING

## CONTROL CAMERAS

If in a call module are present the control cameras, the function must be programmed.

1. Go to the advanced confi guration, by setting both the rotary switches to position 9; the door unit emits a beep to indicate the programming state.

2. Press the hall button (PA - CT) for the same times number as the present control cameras number. Each time the button is pressed, the door unit emits the same beep number as the programmed cameras number ( 4 max ); by pressing again the button after 4 beeps, a long beep is emitted, to indicate that 0 cameras are connected (default).
3. Put again the rotary switches on the correct position to exit from the advanced configuration.

If a local camera is connected to the connector "VIDEO MODULE", the call station is a video door phone station. If no local camera is connected to the connector "VIDEO MODULE", the call station is a door phone station. Up to 4 control cameras can be connected to the input V3/V5; the images coming from these cameras can be displayed by users by pressing the autoon button. If there is only one control camera, the call station becomes a video door phone station using this camera during the call.

## BUTTON CONFIGURATION FOR SPECIAL FUNCTION

It is possible to configure a button for a special function, for example to turn the stairs lights on.
To configure the button, perform as follows:

- Go to advanced configuration.

- Keep the selected button pressed for 3 sec., the door unit emits an acoustic signal to confirm that the acquisition has been successfully performed.
4 The function can be activated only if a suitable programmed special decoder is installed.


## PROGRAMMING DATA DELETING

To delete all the data programmed in the advanced configuration, follow the instructions below:

- Go to advanced configuration.

- Keep any button pressed for 5 sec . at least.

The door units emits an acoustic tone to confirm the deleting.

## VIDEO DOOR PHONE APARTMENT STATIONS

## Download from www.urmetdomus.com Technical Manuals area.

## SECTION CONTENTS

BLACK/WHITE SIGNO VIDEO DOOR PHONE Ref. 1740/1 ..... 2
CHARACTERISTICS ..... 2
Buttons function ..... 2
TECHNICAL CHARACTERISTICS .....  2
COLOUR SIGNO VIDEO DOOR PHONE ..... 3
CHARACTERISTICS ..... 3
Buttons function .....  3
TECHNICAL CHARACTERISTICS ..... 3
SIGNO BRACKET Ref.1740/83 .....  4
Terminal pins description ..... 4
Technical characteristics. .....  4
INSTALLATION. .....  4
CONFIGURATION OF APARTMENT STATIONS BRACKETS ..... 4
Line termination setting .....  6
FEATURES .....  6
OPTIONAL PROGRAMMING ..... 7
Intercom function ..... 7
CALL RING TONE PROGRAMMING ..... 8
Door phone call ring tone .....  8
Floor call ring tone ..... 8
PROGRAMMING DATA DELETING ..... 9
ACCESSORIES FOR SIGNO VIDEO DOOR PHONE .....  9
Add-on buttons unit Ref. 1083/96 .....  9
FOLIO FLUSH-MOUNTED COLOUR HANDSFREE VIDEO DOOR PHONE ..... 11
CHARACTERISTICS ..... 11
TECHNICAL FEATURES ..... 12
TERMINALS PINS DESCRIPTION ..... 12
INSTALLATION ..... 12
On brick walls ..... 12
On plasterboard walls ..... 12
CONFIGURATION OF APARTMENT STATIONS BRACKETS ..... 13
Line termination setting ..... 14
FEATURES ..... 14
Call reception and 'video transfer' function ..... 14
Answering the call ..... 15
Door lock release during a call and open door indication ..... 15
Ringer loudspeaker mute ..... 15
Additional ringer ..... 15
Audio/video settings during call ..... 15
Floor call ..... 15
Auto-on. ..... 15
Calling the switchboard ..... 15
Intercom call ..... 15
Functioning with hearing aid ..... 15
MENU ..... 16
Call menu. ..... 16
Automatic door lock release. ..... 16
Absence indication (For future development). ..... 16
Video door phone answering machine ..... 16
Settings. ..... 16
AIKO COLOUR HANDS-FREE VIDEO DOOR PHONE ..... 18
CHARACTERISTICS ..... 18
TECHNICAL CHARACTERISTICS ..... 19
TERMINAL PINS DESCRIPTION ..... 19
INSTALLATION ..... 19
Wall mounting installation ..... 19
Flush mounting installation. ..... 19
CONFIGURATION OF APARTMENT STATIONS BRACKETS ..... 20
Line termination setting ..... 21
FEATURES ..... 21
Call reception and 'video transfer' function ..... 21
Answering the cal ..... 21
Door lock release during a call and open door indication ..... 21
Ringer loudspeaker mute ..... 21
Additional ringer ..... 21
Audio/video settings during call ..... 21
Floor call ..... 22
Auto-on ..... 22
Calling the switchboard ..... 22
Intercom call ..... 22
Functioning with hearing aid ..... 22
MENU ..... 23
Call menu. ..... 23
Automatic door lock release. ..... 23
Absence indication (For future development) ..... 23
Video door phone answering machine ..... 23
Settings. ..... 23
ACCESSORIES FOR AIKO VIDEO DOOR PHONE ..... 4

BLACK/WHITE SIGNO VIDEO DOOR PHONE Ref. 1740/1


Designed by architect Citterio, Signo video door phone has a perfectly flat surface harmonized with the absence of corners.
On the front panel there are the button for door opening, backlit by leds, and 3 buttons for additional services as intercom calls, auto-on function, video switching, etc.
Signo video door phone has an electronic management of the call ring tone with a loudspeaker dedicated to this function, placed under the handset. Also the switch used to adjust the call volume with "Mute" function is hid by the handset.
The apartment station is provided with a special handset, that allows to hard of hearing people, equipped with a suitable earphone, to listen who is speaking from the push button panel: the loudspeaker system can drive acoustic devices for hearing-impaired with function "T".
For installation, no masonry works are needed and all connections can be made on the bracket, to which it is fixed.

## CHARACTERISTICS

The main characteristics of the video door phone are the following:

- 4" black/white flat video module
- Call volume adjustment and mute function. When "Mute" function is active, the light on the front panel is red.


Lel With volume adjustment in "Mute" position, the video door phone does not emit the call ring tone, but the video module turns on.

- Door lock release button backlit by leds when the video module is turned on.
- Service buttons ( $\cdot \bullet$, ) for additional functions: intercom calls, video door phone auto-on, video switching, etc.
- Image brightness and contrast adjustment.


1. door lock release button
2. auxiliary buttons
3. contrast adjustment command
4. brightness adjustment command
5. call volume command and adjustment

## BUTTONS FUNCTION

| Button | en | $\bullet$ | $\bullet$ |  |
| :---: | :---: | :---: | :---: | :---: |
| Idle and <br> on-hook | Pedestrian <br> door lock <br> release | Driveway door <br> lock release | Auto-on | Scroll <br> video-memory |
| Off-hook <br> waiting <br> time | Pedestrian <br> door lock <br> release | Driveway door <br> lock release | Video <br> switching | Special <br> function |
| Speaking | Pedestrian <br> door lock <br> release | Driveway door <br> lock release | -- | Special <br> function |
| Idle and <br> off-hook | Pedestrian <br> door lock <br> release | Intercom call <br> (default: not <br> programmed) | Intercom call <br> (default: switch <br> board call) | Intercom call <br> (default: not <br> programmed) |

## TECHNICAL CHARACTERISTICS

Power supply voltage:
$16 \div 18,5 \mathrm{Vdc}$
Current consumption: Operating: max 0,35A
Idle:
Operating power consumption:
CCIR Vers.: Vertical frequency:
Video signal:

## Kinescope:

Horizontal frequency:
max 6,5W
$50 \mathrm{~Hz} \pm 2 \mathrm{~Hz}$
$15625 \pm 300 \mathrm{~Hz}$
1Vpp $75 \Omega$ nominal 1Vpp -6 dB minimum 4,5" flat, neck 13mm
$81 \times 59 \mathrm{~mm}$
vert. 5\% max.
horiz. 5\% max.
barrel 10\% max
Luminance:
X-rays:
Switch-on delay:
Transmitting microphone :
Receiving microphone:
Operating temperature range:
Max. humidity:
free
4sec. Max
electret microphone
$45 \Omega$ loudspeaker $-5^{\circ} \div+50^{\circ} \mathrm{C}$

90\% UR

## COLOUR SIGNO VIDEO DOOR PHONE



Signo colour video door phone allows to obtain the same performances as the device ref. 1740/1, except for displaying mode.
Also this model has been designed by architect Citterio and has a perfectly flat surface harmonized with the absence of corners.
On the front panel there are the button for door opening, backlit by leds, and 3 buttons for additional services as intercom calls, auto-on function, video switching, etc.
Signo video door phone has an electronic management of the call ring tone with a loudspeaker dedicated to this function, placed under the handset. Also the switch used to adjust the call volume with "Mute" function is hid by the handset.
The apartment station is provided with a special handset, that allows to hard of hearing people, equipped with a suitable earphone, to listen who is speaking from the push button panel: the loudspeaker system can drive acoustic devices for hearing-impaired with function " T ".
For installation, no masonry works are needed and all connections can be made on the bracket, to which it is fixed.
For a better adaptability to various architectonic environments, the video door phone is available in the following colours:

- white

Ref. 1740/40

- anthracite

Ref. 1740/41

- platinum

Ref. 1740/42

## CHARACTERISTICS

The main video door phone characteristics are the following:

- 4" colour flat video module
- Call volume adjustment and mute function. When "Mute" function is active, the light on the front panel is red.


MAX.


MIN.


MUTE

With volume adjustment in "Mute" position, the video door phone does not emit the call ring tone, but the video module turns on.

- Door lock release button backlit by leds when the video module is turned on.
- Service buttons (,$\bullet^{\bullet}$ ) for additional functions: intercom calls, video door phone auto-on, video switching, etc.
- Image brightness and contrast adjustment.


1. door lock release button
2. auxiliary buttons
3. colour adjustment command
4. brightness adjustment command
5. call volume command and adjustment

## BUTTONS FUNCTION

| Button | Aler | $\bullet$ | $\bullet$ |  |
| :---: | :---: | :---: | :---: | :---: |
| Idle and <br> on-hook | Pedestrian <br> door lock <br> release | Driveway door <br> lock release | Auto-on | Scroll <br> video-memory |
| Off-hook <br> waiting <br> time | Pedestrian <br> door lock <br> release | Driveway door <br> lock release | Video <br> switching | Special <br> function |
| Speaking | Pedestrian <br> door lock <br> release | Driveway door <br> lock release | -- | Special <br> function |
| Idle and <br> off-hook | Pedestrian <br> door lock <br> release | Intercom call <br> (default: not <br> programmed) | Intercom call <br> (default: switch <br> board call) | Intercom call <br> (default: not <br> programmed) |

## TECHNICAL CHARACTERISTICS

Power supply voltage:
$16 \div 18,5 \mathrm{Vdc}$ max 0,35A
Operating
OA
Idle:
max 6,5W
$50 \mathrm{~Hz} \pm 2 \mathrm{~Hz}$
$15625 \pm 300 \mathrm{~Hz}$
1 Vpp $75 \Omega$ nominal 1Vpp -6 dB minimum

4" backlit
380H x 250V pixel
PAL
4sec. Max
electret microphone
$45 \Omega$ loudspeaker $-5^{\circ} \div+50^{\circ} \mathrm{C}$

90\% UR

## SIGNO BRACKET Ref. 1740/83

Signo video door phones are provided without fixing bracket, that must be bought separately.
The bracket ref. 1740/83 used with black/white or colour Signo video door phones allows to obtain the following performances:

- Not polarized video input
- In/out video connection
- Video connection with distributor ref. 1083/54 or ref.1083/55
- Input for floor call button
- Output for an additional ringer, to repeat the ring tone of a call received from the video door phone
- Dip-switch user and internal code programming with dip-switch.
- Line termination with jumper in case of connection as last device of a branch.


## TERMINAL PINS DESCRIPTION

| Line IN | Incoming Bus line |
| :---: | :---: |
| Line IN | Incoming Bus line |
| $\left.\begin{array}{l} \text { Line OUT } \\ \text { Line OUT } \end{array}\right\}$ | Outgoing Bus line |
| $\left.\begin{array}{l}\text { CP } \\ \mathrm{CP}\end{array}\right\}$ | Floor call |
| S+ | Supplementary ringer |

## TECHNICAL CHARACTERISTICS

Power supply voltage:
Current consumption in standby:
Max. current consumption:
Operating temperature range:
Reference standards:
$36 \div 48 \mathrm{Vdc}$ 3,0 mA max 500 mA max (with video door phone) $-5^{\circ} \mathrm{C} \div+45^{\circ} \mathrm{C}$ EN 61000-6-3 EN 61000-6-1

## INSTALLATION

To install Signo video door phone and its bracket perform the following operations:

1. Arrange the cable conduits in order to match the holes present on the bracket for the passage of the cables.
2. Fix the bracket to the wall with the provided screws and screw anchors.

3. Remove the carton protection sheet from the bracket.
4. Connect the wires to the suitable terminal pins.
5. Configure the dip-switches.
6. Remove the stop hook $\alpha$ by pulling it down.
7. Hang the video door phone as shown in the figure.
8. Lock the video door phone by pushing the stop hook $\alpha$ up.


4 The switch on the video door phones can be in position "A" or " $B$ ".

## CONFIGURATION OF APARTMENT STATIONS BRACKETS



Valori default: All the brackets have the following factory default setting:
USER= 127
INTERNAL = 0
Therefore, for the proper operation of the system, always pay attention to dip switches, in order to configure them with correct value.

CODE: user code
Set a number from 0 to 127, according to the following rules:

- In the same column, each apartment must have a different user code.
- Apartment stations in parallel in the same apartment must have the same user code.
- The user code of the same column must be consecutive.

5
To set the desired code, use the dip-switches CODE from 2 to 8 (2= more significant bit - 8= less significant bit); the dip-switch 1 must always be set to OFF.



INT: apartment station internal code.
Set a number from 0 to 3, following the instructions below:

- If in the apartment there is only one apartment station, the internal code must be set to 0 .
- In apartments, up to 4 apartment stations can be connected in parallel with the same user code, but with different internal codes.


The internal code is used to identify the single apartment stations of the same user. This allows to perform intercom calls to the single station inside the same apartment.
In case of intercom calls to another apartment, calls coming from call stations or floor call, all the apartment stations of that user ring.
Consider also the following information:

- After receiving a call, the internal code 0 rings immediately and the internal codes 1,2 and 3 ring in sequence.
- If the call comes from a video door phone call station, the internal code 0 switches also the monitor on.
However, the other stations of that user can press button to switch their monitor on and switch off the other ('video switching' function).


## LINE TERMINATIONS SETTING



On apartment stations there is a jumper that allows to add the line termination.
The line termination must be activated in all the wired devices at the end of a line that has no other segments starting from the LINE OUT terminal pins of the device.

## FEATURES

## CALL RECEIVING AND VIDEO TRANSFER FUNCTION

When a call is received, the user apartment station rings with the programmed tone, according to the source:

- From main door unit
- From secondary door unit
- From Intercom
- From floor call
- From switchboard

When receiving a video door phone or door phone call, the door unit electric lock can always be activated, also without starting a conversation.
If in the apartment there are more apartment stations in parallel, the stations ring in sequence. If the call comes from a video door phone call station, the internal code with $\mathrm{INT}=0$ of the user also switches the video door phone on.
In this case, during off-hook waiting time (60s starting from the call), the other internal codes can switch their video door phone on by pressing the auto-on button © ('video transfer' function), until a video door phone of the called user answers.
If the image is already displayed, press the button : to display cyclically the images coming from the surveillance cameras of the calling station only.
After picking up the handset or audio activation in case of hands-free stations, the image coming from the main camera will be displayed only on the apartment station which has answered.
So the image is always displayed on a single apartment station.

## AUTO-ON

If the apartment station is in standby mode, press the button on the video door phone to perform an auto-on function.
Press the button again to cyclically display the picture from the surveillance cameras installed in the main door units in the system and the secondary door units of the column to which the device belongs. By picking the handset up the user starts a conversation with the selected call station. With audio conversation active, the user can open the door at any time.

## INTERCOM CALLS

After programming an apartment station button for intercom function, activate audio by picking the handset up. Then press the intercom call button.
The following cases can occur, according to column state:

- Column free: the calling apartment station emits a confirmation tone ( 2 beep) and the called apartment station rings. When the user picks the handset up, the conversation can start.
- Column busy: the apartment station emits an alert tone (4 fast beeps). Hang up and try again later.


## FLOOR CALL

Apartment station is provided with two terminal pins (CP) used to connect the floor call button. If the button is pressed, the apartment station emits a 3s ring, according to the selected call ring tone. If the user has several apartment stations in parallel, connect this button only to one apartment station. However, apartment stations will ring in sequence.

## ADDITIONAL RINGER

Apartment stations are provided with two terminal pins (S+, S-) used to connect an additional ringer or a relay. This ringer is activated at the same time as any call ring tone.

## OPTIONAL PROGRAMMING

The following programming operations are needed after testing the basic operation of the system, only if are required.

## INTERCOM FUNCTION

In 2VOICE system, an apartment station button $\bullet \bullet \bullet$ or buttons $1 \div 6$ on add-on buttons unit Ref. 1083/96) can be programmed to call another user of the same column or to call another internal code of the same apartment station. In the first case, all the internal codes of the called user will ring; in the second case, only the internal code specified in programming will ring.

## INTERCOM FUNCTION BETWEEN DIFFERENT USERS

- Go to the apartment station to be programmed as caller (apartment station A).
- Keeping the door lock release button pressed, pick the handset up. The apartment station A emits a beep to signal the access to programming mode.

- Press the button to be programmed; the apartment station emits a confirmation tone.

- Go to the user to be called by that button (user B) and press the door lock release button. The apartment stations emit a beep to indicate that they have been programmed. Alternatively, go to a call station and press the call button of user $B$; the apartment station in programming mode (A) emits a beep to signal that it has been programmed. At the same time, user $B$ apartment stations ring. Ignore this call.

B


- Hang up the handset of the apartment station A, that emits a beep to indicate the exit from the programming mode.
- Check the programmed function: pick up the handset $A$ and press the programmed button. All user B stations ring; when answering, the communication is activated.
- If you want to program also the inverse call, it is necessary to program the apartment station B for the call to the apartment station A.

4. If buttons are programmed for this function, the other functions are not lost, because the intercom call is performed keeping the handset picked up.

## INTERCOM FUNCTION IN THE SAME APARTMENT

- Go to the apartment station to be programmed as caller (apartment station C1).
- Keeping the door lock release button pressed, pick the handset up. The apartment station C1 emits a beep to signal the access to button programming mode.

- Press the button to be programmed; the apartment station C1 emits a confirmation tone.

- Go to the apartment station to be called by that button (apartment station C2) and press the door lock release button. The apartment stations C1 and C2 emit a beep to indicate that they have been programmed.

- Hang up the handset of the apartment station C1, that emits a beep to indicate the exit from the programming mode.
- Check the programmed function: pick up the handset C1 and press the programmed button. The apartment station C2 ring; when answering, the communication is activated.
- If you want to program also the inverse call, it is necessary to program the apartment station C2 for the call to the apartment station C1.

5
If buttons are programmed for this function, the other features are not lost, because the intercom call is performed keeping the handset picked up.

## CALL RING TONE PROGRAMMING

In 2VOICE system each user can select the video door phone call ring tone and the floor call ring tone among the 5 available ones.

## DOOR PHONE CALL RING TONE

- By keeping the door lock release button pressed, press and release the button
- The apartment station emits a call ring tone.
- By keeping the door lock release button pressed, press again the button to change the call ring tone.
- When the call ring tone has been selected, release the door lock release button.
- The call ring tone is programmed.


The selected call ring tone is the same for all door phone calls. However, the call ring tone source can be identified thanks to the call ring tone timing.

| Call source | Time | Ring total duration |
| :--- | :--- | :---: |
| Main call station | 3 s ON | 3 s |
| Secondary call <br> station | $0,4 \mathrm{~s}$ ON 0,2 s OFF <br> for 5 times | $2,8 \mathrm{~s}$ |
| Intercom | $0,5 \mathrm{~s}$ ON 0,5 s OFF <br> for 3 times | $2,5 \mathrm{~s}$ |
| Switchboard | $0,1 \mathrm{~s}$ ON 0,05 s OFF <br> for 3 times pause <br> 0,2 s repeated for 5 <br> times | $2,8 \mathrm{~s}$ |

## FLOOR CALL RING TONE

- By keeping the door lock release button pressed, press and release the button
- The door unit emits a ring with a ring tone.
- By keeping the door lock release button pressed, press again the button to change the call ring tone.
- When the call ring tone has been selected, release the door lock release button.
- The call ring tone is programmed.



## PROGRAMMING DATA DELETING

To delete all optional programming data (intercom call codes), perform the following operations:

- By keeping the door lock release button pressed, pick the handset up.
- Press at the same time the buttons and and keep them pressed for 3 seconds until a tone confirming the deletion is emitted.
- Release the buttons and and hang the handset up.

The deleting procedure does not change the previously selected call ring tones.

Warning: when programmed data are deleted, also the column code will be deleted; it will be automatically acquired after about 5 minutes.

## ACCESSORIES FOR SIGNO VIDEO DOOR PHONE

## ADD-ON BUTTONS UNIT Ref. 1083/96

For intercom systems, where more than three call buttons are needed, and/or systems, where the automatic pedestrian door opening is needed after a call, an additional add-on buttons unit ref. 1083/96 must be bought and combined with the basic video door phone.


0Automatic door lock release function and open door signalling function are active only if the add-on buttons unit is combined with the video door phone with internal code $=0$.

AUTOMATIC DOOR LOCK RELEASE FUNCTION
This function can be enabled/disabled with the switch $\square$ $\square$ of the addon buttons unit ref. 1083/96
When the function is active, the green led turns on and, when a call coming from a door unit is received, the door lock release command is sent.
5 With door lock release in "free" mode, after a call all the locks will be activated.

## 'MASTER' DOOR UNIT OPEN DOOR SIGNALLING

If a normally closed door sensor (with closed door) is connected to call stations between the terminal pins SP and CT, apartment stations can show the physical state of that door.
It is possible to display the state of the door of the call station, from which the call has been sent and to which a door lock release command has been sent.
If the door of the main call station is open, the led is turned on steady, if the door of the secondary call station is open, the led blinks.

## INTERCOM CALLS

To perform intercom calls to other users of the same column, the 6 buttons of the add-on buttons unit can be programmed for 6 calls. Programming and operations are the same as the video door phone basic buttons used for intercom functions.

BUTTONS FUNCTION

| State | Buttons | $1 \div 6$ |
| :--- | :---: | :---: |
| Idle and on-hook | $\square$ |  |
| Off-hook waiting time | Special <br> function | Automatic <br> door lock <br> release |
| Speaking | Intercom call |  |
| Idle and off-hook | (default: not programmed) |  |

## ADD-ON BUTTONS UNIT INSTALLATION

1. Fix the add-on buttons unit to the bracket using the provided plates.

2. Remove the carton protection sheet from the bracket.
3. Connect the provided flat cable on the video door phone bracket.

4. Arrange the cable conduits in order to match the holes present on the bracket for the passage of the cables.
5. Fix the bracket to the wall with the provided screws and screw anchors.

6. Connect the wires to the suitable terminal pins.
7. Configure the dip-switches.
8. Remove the stop hook $\alpha$ by pulling it down.
9. Hang the video door phone as shown in the figure.
10. Lock the video door phone by pushing the stop hook $\alpha$ up.


To gain access to the name holder tag, remove the transparent cover.


## FOLIO

FLUSH－MOUNTED
COLOUR HANDSFREE VIDEO DOOR PHONE


The Folio video door phone is a flush－mounted colour device with hands－free audio function．
It protrudes only a few millimetres from the wall and its style suggestive of the Simon Urmet Nea wiring accessory design．It has a shiny＂iPod effect＂front panel．
All settings are simply and intuitively made on an OSD（On Screen Display）menu with graphic icons and integrated textual descriptions using a handy four－position joypad．
Folio may be customised by the user by changing，for instance，the display colours and themes and programming a different ring tone for different call types．
On the front panel，besides navigation joypad，also buttons dedicated to system main functions are available．
The internal name directory，programmable by the user，may be used to establish intercom calls to 32 users．
The Folio come in two versions of different colour：
－Black front
Ref．1706／5
－White front
Ref．1706／6

## CHARACTERISTICS

The main features of the video door phone are：
－Flat 3．5＂LCD backlit colour module．
－Wide viewing angle in all directions also without mechanical tilting．
－Call speaker separate from audio speaker．
－ 4 backlit icons for activating various functions arranged by the two sides of the display．
－Backlit buttons with RGB variable colour LED programmable by the user．
－Automatic door opening function activatable from menu：a door opening command is sent when a call is received from a door unit． A LED indicates when the function is on．
－Adjustable audio volume and call volume with muting function．
－Adjustable brightness and contrast from menu．
LY Use mild detergents for delicate surfaces and a soft cloth to clean the front panel of the video door phone．Do not use abrasive materials．


1－Display
2－Microphone
3 －Mute indicator led（green led）
4 －Automatic door opener on indicator led（green led）
5 －Indication of present messages（green led）
6 －Indication of open door or absence active（red led）
7 －Button used to activate／deactivate audio－contextual button X
8 －Door opener button－contextual button OK
9 －Function buttons

|  | Video door phone mode | Menu mode |
| :---: | :---: | :---: |
| c／3 | Ringer Mute | $\uparrow$ |
|  | Gate opening | $\rightarrow$ |
| 戓雨第 | Call to switchboard | $\downarrow$ |
| （0） | Auto－on | $\leftarrow$ |

10 －Menu button
11－Configuration dip－switch：
－ 2 to define the number of video door phone inside the apartment
－ 8 to define the number of the apartment in the column
12－Terminal pins for connection to the system
13－Line termination
Folio Touch video door phone is provided with an embedded device for hard of hearing．


- Insert the box in the hole.

- Fasten the screws of the kit to secure the box.

- Then fix the video door phone to the flush-mounting box by means of the four screws provided and snap the front panel onto the support.

- Remove the protective film at the end of the operation.


## CONFIGURATION OF APARTMENT STATIONS BRACKETS



Default values: all video door phones default configuration is the following:
USER = 127
INTERNAL CODE $=0$
Therefore, for the proper operation of the system, always pay attention to dip switches, in order to configure them with the correct value.

CODE: user code.
Set a number from 0 to 127, according to the following rules:

- In the column there must not be any apartments with the same user code.
- If there are apartment stations in parallel in the same apartment, these must have the same user code.
- The user codes of the same column must be consecutive.

3
To set the desired code, use the dip switches from 2 to 8 (2= most significant bit - 8= less significant bit); the dip-switch 1 must be set to OFF.


USER 32



USER 21


USER 29



USER 14


USER 22


12345
USER 30




## ON <br>  <br> USER 72 ON <br> $1234_{0}$ <br> USER 76

##  <br> 12345678 <br> USER 80 <br> ON <br> USER 84 <br>  <br> USER 88

\section*{ <br> USER 92 <br>  <br> USER 96 <br>  <br> USER 100 <br>  <br> | 12 | 3 | 4 | 5 | 6 | 7 | 8 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | <br> USER 104}



USER 108


USER 112
 USER 116



INT: apartment internal code.
Set a number from 0 to 3 , according to the following rules:

- If in the apartment there is only one station, the internal code must be set to 0 .
- In apartments, up to 4 apartment stations in parallel with the same user code and different internal codes can be connected.


The internal code identifies each station of the same user. This means that intercom calls can be addressed to the single internal code in the same apartment.
In case of intercom calls to different apartments, in case of calls coming from door units and in case of floor call, all the user apartment stations always ring. Consider also the following information:

- after receiving a call, the internal code 0 rings immediately; the internal codes 1, 2 and 3 ring in sequence.
- If the call comes from a video call station, the internal code 0 turns the monitor on.

However, the other apartment stations of the same user can press the button © 0 to turn their video door phone, turning off the other ('video transfer' function).

## LINE TERMINATION SETTING



On the video door phone there is a jumper which allows to insert the line termination. The termination must be activated in all the devices installed at the end of a line that does not start again with another segment from the terminal pins LINE OUT.

## FEATURES

## CALL RECEPTION AND 'VIDEO TRANSFER' FUNCTION

When a call is received, the user apartment station rings with the programmed tone, according to the source:

- From main door unit
- From secondary door unit
- From Intercom
- From floor call
- From switchboard

When the door phone or video door phone call is received, it is always possible to activate the door unit electric lock also without activating the communication.
If in the apartment there are several apartment stations in parallel, the stations ring in sequence. The user internal code 0 also performs the video door phone power-on, if the call comes from a video door phone call station. In this case, during the off-hook waiting time (60s from the call), the other internal codes can turn their video door phone on by pressing the auto-on button (0) ('video transfer' function), until one of the video door phones of the called user answers.
If the image is already displayed, press the button (0) to cyclically display images coming from other control cameras of the caller station only.

After the audio activation，the image coming from the main camera will be displayed only on the screen of the answering apartment station． Therefore the camera image will be displayed on one apartment station at a time．

## ANSWERING THE CALL

By pressing the button（ $(\underset{2}{ }$ ，the user establishes a communication with the caller（the button pressed starts blinking）．By pressing again the button，the communication is closed and the display turns off．

## DOOR LOCK RELEASE DURING A CALL AND OPEN DOOR INDICATION

After a call is received from a door unit or during the communication with a door unit，the pedestrian or driveway gate can be opened by pressing the buttons $C$ п and $? ⿻ 川 ⿲ 丶 丶 丶 H \mid H$ respectively

If the call modules are provided with open door sensor（and the absence service is not active），the led［］can indicate if the door is really open or not：the led lights up steady if the open door is the main one，and blinks if the open door is the secondary one．

## RINGER LOUDSPEAKER MUTE

This function allows to disabled the call ringer．To activate this function， press the button $\mathbb{K}$ ．When the function is activated，the led MUTE $\mathcal{L}$ turns on and when a call is received，the device will not ring．

## ADDITIONAL RINGER

The video door phone is provided with two terminal pins（S＋，S－） for the connection of an additional ringer or a relay．This ringer is activated with any call ring．

## AUDIO／VIDEO SETTINGS DURING CALL

When a call is received or during communication，some audio／video adjustments can be performed：by pressing the button MENU，the following screen appears


This menu will be displayed over the image coming from the door unit
－Select $\mathrm{O} \pm$（Loudspeaker volume），（Brightness），（Contrast）， （\％）（Colour）using directional buttons Up／Down（ $</$／$/ 5$
－Select the desired value using directional buttons Right／Left（ \ll ） ／？${ }^{(1)}(H)$
－Press $(\mathrm{OK})$ to confirm；press $(\mathrm{X})$ to cancel or press MENU to quit the setting menu．

## FLOOR CALL

The video door phone is equipped with a pair of terminal pins（CP）for the connection of a floor call button．When a floor call is received，the video door phone emits a ring，according to the ring tone selected by the user；the display does not turn on．If the user has several apartment stations in parallel，connect this button to only one apartment station． The internal codes will ring in sequence．

## AUTO－ON

The auto－on function allows to see on the display the image captured by system call modules．When the system is in standby mode，press the button（0）and wait until the image is displayed on the video door phone（the first displayed image is the one coming from the main call module number 0）；press again the button（0）to go to the next call modules．The first images displayed are those coming from the main call modules，then secondary of the belonging column．
 communication is established with the selected call station；by

The auto－on function can not be performed if the column is already in conversation．If the auto－on function is activated when the column is already in conversation，the video door phone will emit an alert tone．

## CALLING THE SWITCHBOARD

This function allows to establish a communication with the concierge switchboard：press the button $\frac{5}{5}$ to send the call to the switchboard． If there is no answer within 10 s，the video door phone will turn off and the call will be stored in the switchboard．

4 The call to the switchboard is only AUDIO．

## INTERCOM CALL

## Intercom call using the directory

The device allows to perform up to 32 intercom calls．
There are two types of intercom calls：intercom call inside the same apartment and intercom call outside the apartment（the called device must be in the same column）．To perform a call from the directory：
－Press the button MENU to access the menu
－Select the icon $\square$ and press OK．
－Select the user to be called with directional buttons and press OK．
－When the call is sent，the monitor turns off．
If the system is busy，the user can not access the menu．

## Intercom call using quick selection keys

The first 4 users of the video door phone directory can be called using quick selection keys；the first 4 users are associated to directional buttons as follows：
User 1 － $2 / 5$
User 2 －？
User 3 －
User 4 －（0）
To perform an intercom call using quick selection keys，press the audio button（ $\lll<$ followed by a directional button．Press again the audio button to close the conversation．

If the system is busy，the video door phone emits an alert tone．
5 The intercom call is only AUDIO．

## FUNCTIONING WITH HEARING AID

The video door phone is fitted with a device that allows hearing－ impaired persons wearing a hearing aid to hear the person speaking from the call station or from another video door phone in the case of intercom calls．The device is able to interface hearing aids with＂ T ＂ function at a distance of around 20 cm ．


## MENU

To access the video door phone main menu，press the button MENU． The display shows：


The device can return to standby mode at any moment by keeping the button $X$ pressed for at least 3 seconds．
If the column is already in conversation，the device will not turn on and emit an alert tone．

## CALL MENU

With this menu the user can call a name previously saved in the directory．
－Press the button MENU to access the menu．
－Select the icon $\frac{\square}{\circ \equiv}$
－Select the user to be called with directional buttons and press OK．
－When the call is sent，the monitor turns off．


## AUTOMATIC DOOR LOCK RELEASE

The automatic door lock release function allows to directly open the door after receiving a call．To activate this function：
－Press the button MENU to access the menu．
－Select the icon $\stackrel{C}{\text { AUTO }}$ and press OK．When the function is active，the LED ${ }_{\text {AUTO }}^{\text {Ci m }}$ turns on．

## ABSENCE INDICATION（For future development）

The absence indication service allows to inform the system about the absence of people inside the apartment．To activate this function from the video door phone with INT＝0：
Press the button MENU to access the menu．
－Select the icon 贞 and press OK．When the function is active，the led［】］blinks slowly．

## VIDEO DOOR PHONE ANSWERING MACHINE

If there are recorded video messages，the led $\square$ blinks slowly．To receive messages：
－Press the button MENU to access the menu．
－Select the icon $\underset{R E C}{\overleftrightarrow{0}}$ and press OK．
This function is available only if the system is provided with the column video door phone answering machine．

## SETTINGS

To access settings menu，press the button MENU and select the icon察等。


If the system is busy，the user can not access the menu．

## VIDEO DOOR PHONE DIRECTORY

Up to 32 calls can be included in the video door phone directory（calls to users and special calls）．

## Adding a record to the directory

To add a name to the directory：
－Press the button MENU to access the menu．
－Select the icon 总毕 and press OK．
－Select the icon $)_{-1}$ ，press OK and select the icon $\square \square+$
－Select the record to be edited among the 32 available ones and press OK．
－Select the record，then select the function type to be configured and press OK；the possible functions are：
－Internal call ：call inside the same apartment
－External call 圆亩：call outside the apartment，but inside the same video door phone column．

FOLIO FLUSH－MOUNTED COLOUR HANDSFREE VIDEO DOOR PHONE
MENU
－Special request o o：Request to special decoder
－Enter the name to be assigned to the call，using directional buttons
 cursor， X to delete）and press OK to confirm．
－Enter the code，using directional buttons（ $\Sigma / 2$ and $0_{0}^{5}$ ）to select the character，（O）and ？ $\mathrm{H} \| \mathrm{H}$ to move the cursor， X to delete）and press OK to confirm．
－For internal calls，allowable codes are from 0 to 3
－For external calls，allowable codes are from 0 to 127
－For special functions，allowable codes are from 0 to 250

## Changing a record in the directory

To change a record in the directory：
－Press the button MENU to access the menu．
－Select the icon 䰟算 and press OK．
－Select the icon $\sim_{d}$ ，press OK and select the icon $\square \square$
－Select the record to be changed and press OK．
－After selecting the record，proceed as described in the previous paragraph＂Adding a record to the directory＂．

## Deleting a record of the directory

To delete a record in the directory：
－Press the button MENU to access the menu．
－Select the icon 点筷 ，and press OK．
－Select the icon 2 ，press OK and select the icon $\square{ }_{\circ}{ }^{\square} \mathrm{D}$－．
－Select the record to be deleted and press OK．

## CALL TONE SELECTION

In this menu the user can choose 5 different call tones for calls and floor calls．To select call tones：
－Press the button MENU to access the menu．
－Select the icon 尊毕 and press OK．
－Select the icon $\sqrt{\delta}$ ，press OK．
－Select the call ring tone to be configured：（call tone）（floor call tone）．
－Select the call ring tone to be used with directional buttons Right／ Left．
－Press OK to confirm．

## AUDIO ADJUSTMENTS

In this menu，the user can adjust ringer volume，audio volume and buttons beep．
－Press the button MENU to access the menu．

－Select the icon（（（॰ and press OK．
－Select the icon $\delta \delta$ to adjust the ringer volume with directional buttons Right／Left，select $\square \pm$ to adjust audio volume，and select BEEP to activate or not the button beep．
－After configuration，press OK to confirm．

## VIDEO ADJUSTMENTS

In this menu the user can adjust brightness，contrast，colour and themes（5 available themes）of the menu．
－Press the button MENU to access the menu．

－Select the icon $\square$ and press OK．
－Select the icon to adjust brightness with directional buttons Right／Left，select to adjust contrast，select to adjust colour and select $\boldsymbol{\pi}$ to adjust the desired theme．
－After configuration，press OK to confirm．

## BUTTON BACKLIGHT

In this menu the user can choose 16 different colours for video door phone button backlight；to choose the desired colour：
－Press the button MENU to access the menu．
－Select the icon 築简 and press OK．
－Select the icon（8）and press OK．
－Select the desired colour and press OK to confirm．

## RESET

In this menu the user can reset the device and restore all default configurations．
－Press the button MENU to access the menu．
－Select the icon 郞等
－Select the icon RESET and press OK．
－Select YES to confirm reset or select NO to go back．
5 The Reset operation does not delete the directory．
Warning：when programmed data are deleted，also the column code will be deleted；it will be automatically acquired after about 5 minutes．

## AIKO COLOUR HANDS-FREE VIDEO DOOR PHONE



Biko video door phone has a clean and minimalistic design.
Commands are managed by lightly touching front panel buttons, thanks to soft-touch technology, with user-friendly OSD intuitive icons which guide the user through the menus. The wide colour display ensures optimal viewing from all angles.
For intercom calls and special decoder activation, up to 32 call or activation codes can be stored in the directory.
Aiko is available in two different colours:

- Black

Ref.1716/1

- White

Ref.1716/2

## CHARACTERISTICS

The main features of the video door phone are:

- Flat 4.3" LCD backlit colour module.
- Wide viewing angle in all directions also without mechanical tilting.
- 4 back light icons.
- Automatic door opening function activatable from menu: a door opening command is sent when a call is received from a door unit.
- Door open indication.
- Adjustable call volume with muting function.
- Adjustable brightness and contrast from menu.

Use mild detergents for delicate surfaces and a soft cloth to clean the front panel of the video door phone. Do not use abrasive materials.


1- Display
2- Microphone
3 - Indication of "mute function" active (green led)
4 - Indication of automatic door lock release active (green led)
5 - Indication of present messages (green led)
6 - Indication of open door or absence active (red led)
7 - Door lock release button - Contextual button OK
8- Navigation buttons
9- Open main entrance button
10 -Mute ringer button (MUTE)
11- Switchboard call button
12 -Automatic activation button
13 -Menu button
14- Loudspeaker
15 - Button used to activate/deactivate audio - Contextual button X
16 - Terminal pins for connection to the system
17 - Line termination
18 - Configuration dip switch:

- 2 to define the number of the video door phone inside the apartment
- 8 to define the number of the apartment in the column

Aiko video door phone is provided with an embedded device for hard of hearing.

## TECHNICAL CHARACTERISTICS

Power voltage:
Working Uptake:
Stand-by:
CCIR Version Vertical frequency:
Video signal:
LCD:
Horizontal viewing angle:
Vertical viewing angle
Brightness:
Screen size:
Resolution:
Colour system:
Switch-on delay:
Transmitting capsule:
Receiving capsule:
Operating temperature range:
Max. humidity:

## TERMINAL PINS DESCRIPTION

LINE IN Connection to the system BUS
LINE OUT Connection to the next device for an in/out connection
S+ Call repeat
S- Call repeat
CP Floor call

## INSTALLATION

## WALL MOUNTING INSTALLATION

Fix the flush mounting box at the height shown in the following figure.
Fasten the bracket to the embedding box.


Perform connections and dip-switch settings.
At the end of programming, fasten the video door phone to the bracket.


## FLUSH MOUNTING INSTALLATION

- Fix the flush mounting box Ref.1716/60 at the height shown in the following figure.

- Fix the frame to the video door phone.

- Perform connections and dip-switch settings.
- Fix the frame with the video door phone to the flush mounting box.
- Complete the installation with the flush mounting frame.



## CONFIGURATION OF APARTMENT STATIONS BRACKETS



Default values: all video door phones default configuration is the following:
USER = 127
INTERNAL CODE $=0$
Therefore, for the proper operation of the system, always pay attention to dip switches, in order to configure them with the correct value.

CODE: user code.
Set a number from 0 to 127, according to the following rules:

- In the column there must not be any apartments with the same user code.
- If there are apartment stations in parallel in the same apartment, these must have the same user code.
- The user codes of the same column must be consecutive
$\square$
To set the desired code, use the dip switches from 2 to 8 ( $2=$ most significant bit - 8= less significant bit); the dip-switch 1 must be set to OFF.


| $O N$ |
| :--- |
| ON |
|  |



USER 8
 USER 12


USER 16


USER 20


ON


USER 32


USER 40
ON


USER 44


USER


ON


USER 30


USER 34


USER 11
 USER 15


USER 19


12345678
 USER 31


USER 35

## 4

 USER 37 12345678 USER 41
 USER 45


USER 124


INT：apartment internal code．
Set a number from 0 to 3 ，according to the following rules：
－If in the apartment there is only one station，the internal code must be set to 0 ．
－In apartments，up to 4 apartment stations in parallel with the same user code and different internal codes can be connected．

| ON | ON | ON | ON |
| :---: | :---: | :---: | :---: |
|  | ${ }^{\square}$ |  | －$\square^{\square}$ |
| 12 | 12 | 12 | 12 |
| INT＝0 | NT＝1 | NT＝2 | INT |

The internal code identifies each station of the same user．This means that intercom calls can be addressed to the single internal code in the same apartment．
In case of intercom calls to different apartments，in case of calls coming from door units and in case of floor call，all the user apartment stations always ring．Consider also the following information：
－after receiving a call，the internal code 0 rings immediately；the internal codes 1， 2 and 3 ring in sequence．
－If the call comes from a video call station，the internal code 0 turns the monitor on．
However，the other apartment stations of the same user can press the button ©（o）to turn their video door phone，turning off the other （＇video transfer＇function）．

## LINE TERMINATION SETTING



On the video door phone there is a jumper which allows to insert the line termination．The termination must be activated in all the devices installed at the end of a line that does not start again with another segment from the terminal pins LINE OUT．

## CLEANING

Clean the video door phone with a damp cloth，wiping gently the screen．

## FEATURES

## CALL RECEPTION AND＇VIDEO TRANSFER＇ FUNCTION

When a call is received，the user apartment station rings with the programmed tone，according to the source：
－From main door unit
－From secondary door unit
－From Intercom
－From floor call
－From switchboard
When the door phone or video door phone call is received，it is always possible to activate the door unit electric lock also without activating the communication
If in the apartment there are several apartment stations in parallel， the stations ring in sequence．The user internal code 0 also performs the video door phone power－on，if the call comes from a video door phone call station．In this case，during the off－hook waiting time（60s
from the call），the other internal codes can turn their video door phone on by pressing the auto－on button（0）（＇video transfer＇function）， until one of the video door phones of the called user answers．
If the image is already displayed，press the button（0）to cyclically display images coming from other control cameras of the caller station only．
After the audio activation，the image coming from the main camera will be displayed only on the screen of the answering apartment station． Therefore the camera image will be displayed on one apartment station at a time．

## ANSWERING THE CALL

By pressing the button（ç，the user establishes a communication with the caller（the button pressed starts blinking）．By pressing again the button，the communication is closed and the display turns off．

## DOOR LOCK RELEASE DURING A CALL AND OPEN DOOR INDICATION

After a call is received from a door unit or during the communication with a door unit，the pedestrian or driveway gate can be opened by pressing the buttons $C-\pi$ and $? ⿻ 川 ⿲ 丶 丶 丶 H$ respectively．

If the call modules are provided with open door sensor（and the absence service is not active），the led can indicate if the door is really open or not：the led lights up steady if the open door is the main one，and blinks if the open door is the secondary one．

## RINGER LOUDSPEAKER MUTE

This function allows to disabled the call ringer．To activate this function， press the button $\mathscr{K} / 2$ ．When the function is activated，the led MUTE $\mathcal{S}$ turns on and when a call is received，the device will not ring．

## ADDITIONAL RINGER

The video door phone is provided with two terminal pins（S＋，S－）for the connection of an additional ringer or a relay．This ringer is activated with any call ring．

## AUDIO／VIDEO SETTINGS DURING CALL

When a call is received or during communication，some audio／video adjustments can be performed：by pressing the button MENU，the following screen appears


This menu will be displayed over the image coming from the door unit
－Select $1 \pm$（Loudspeaker volume），（Brightness），（Contrast）， （Colour）using directional buttons Up／Down．
－Select the desired value using directional buttons Right／Left
－Press（OK）to confirm；press $(X)$ to cancel or press MENU to quit the setting menu．

## FLOOR CALL

The video door phone is equipped with a pair of terminal pins (CP) for the connection of a floor call button. When a floor call is received, the video door phone emits a ring, according to the ring tone selected by the user; the display does not turn on. If the user has several apartment stations in parallel, connect this button to only one apartment station. The internal codes will ring in sequence.

## AUTO-ON

The auto-on function allows to see on the display the image captured by system call modules. When the system is in standby mode, press the button (0) and wait until the image is displayed on the video door phone (the first displayed image is the one coming from the main call module number 0); press again the button (0) to go to the next call modules. The first images displayed are those coming from the main call modules, then secondary of the belonging column.
By activating the audio with the button ( (ç, an audio and video communication is established with the selected call station; by pressing again the button (ç, the auto-on function is ended.
The auto-on function can not be performed if the column is already in conversation. If the auto-on function is activated when the column is already in conversation, the video door phone will emit an alert tone.

## CALLING THE SWITCHBOARD

This function allows to establish a communication with the concierge switchboard: press the button If there is no answer within 10s, the video door phone button ( $(f)$ will turn off and the call will be stored in the switchboard.
4 The call to the switchboard is only AUDIO.

## INTERCOM CALL

## Intercom call using the directory

The device allows to perform up to 32 intercom calls.
There are two types of intercom calls: intercom call inside the same apartment and intercom call outside the apartment (the called device must be in the same column). To perform a call from the directory:

- Press the button MENU to access the menu
- Select the icon $\square{ }^{\square} \mathrm{D}$ and press OK.
- Select the user to be called with directional buttons and press OK.
- When the call is sent, the monitor turns off.

If the system is busy, the user can not access the menu.

## Intercom call using quick selection keys

The first 8 users of the video door phone directory can be called using quick selection keys; the first 8 users are associated to the buttons as follows:
User 1 - $\boldsymbol{\Delta}$
User $2-\downarrow$
User $3-\nabla$
User $4-4$
User 5 - (0)
User 6 -
User 7 - K/S
User 8 - ? 케H
To make an intercom call using the fast dial keys, press the push-to-talk button (cç followed by one of the keys indicated above. Press again the push-to-talk button to close the conversation.
If the system is busy, the video door phone emits an alert tone.
5 The intercom call is only AUDIO.

## FUNCTIONING WITH HEARING AID

The video door phone is fitted with a device that allows hearingimpaired persons wearing a hearing aid to hear the person speaking from the call station or from another video door phone in the case of intercom calls. The device is able to interface hearing aids with " T " function at a distance of around 20 cm .


AIKO COLOUR HANDS－FREE VIDEO DOOR PHONE

## MENU

To access the video door phone main menu，press the button MENU． The display shows：


The device can return to standby mode at any moment by keeping the button $X$ pressed for at least 3 seconds．
If the column is already in conversation，the device will not turn on and emit an alert tone．

## CALL MENU

With this menu the user can call a name previously saved in the directory．
－Press the button MENU to access the menu．
－Select the icon $\square$ 이 ${ }^{\text {d }}$ and press OK．
－Select the user to be called with directional buttons and press OK．
－When the call is sent，the monitor turns off．


## AUTOMATIC DOOR LOCK RELEASE

The automatic door lock release function allows to directly open the door after receiving a call．To activate this function：
－Press the button MENU to access the menu．
－Select the icon $\begin{gathered}C \cup T 0 \\ \text { AUTO }\end{gathered}$ and press OK．When the function is active，the LED $\begin{gathered}\text { AUTO } \\ \text { turns on．}\end{gathered}$

## ABSENCE INDICATION（For future development）

The absence indication service allows to inform the system about the absence of people inside the apartment．To activate this function from the video door phone with INT＝ 0 ：
－Press the button MENU to access the menu．
－Select the icon and press OK．When the function is active，the led［】］blinks slowly．

## VIDEO DOOR PHONE ANSWERING MACHINE

If there are recorded video messages，the led $\$$ blinks slowly．To receive messages：
－Press the button MENU to access the menu．
－Select the icon $\stackrel{(0)}{\text { REC }}$ and press OK．
4 This function is available only if the system is provided with the column video door phone answering machine．

## SETTINGS

To access settings menu，press the button MENU and select the icon籁


If the system is busy，the user can not access the menu．

## VIDEO DOOR PHONE DIRECTORY

Up to 32 calls can be included in the video door phone directory（calls to users and special calls）．

## Adding a record to the directory

To add a name to the directory：
－Press the button MENU to access the menu．
－Select the icon 学筑 and press OK．
－Select the icon 2 ，press OK and select the icon $\square \square_{0} \sqrt{\circ}$ ．
－Select the record to be edited among the 32 available ones and press OK．
－Select the record，then select the function type to be configured and press OK；the possible functions are：
－Internal call call inside the same apartment
－External call 圆䓢：call outside the apartment，but inside the same video door phone column．
－Special request o o：Request to special decoder
－Enter the name to be assigned to the call，using directional buttons （Up and Down to select the character，Right and Left to move the cursor， X to delete）and press OK to confirm．
－Enter the code，using directional buttons（Up and Down to select the character，Right and Left to move the cursor， X to delete）and press OK to confirm．
－For internal calls，allowable codes are from 0 to 3
－For external calls，allowable codes are from 0 to 127
－For special functions，allowable codes are from 0 to 250

## Changing a record in the directory

To change a record in the directory：
－Press the button MENU to access the menu．
－Select the icon 學艮 and press OK．

－Select the record to be changed and press OK．
－After selecting the record，proceed as described in the previous paragraph＂Adding a record to the directory＂．

## Deleting a record of the directory

To delete a record in the directory：
－Press the button MENU to access the menu．
－Select the icon 总迸，and press OK．

－Select the record to be deleted and press OK．

## CALL TONE SELECTION

In this menu the user can choose 5 different call tones for calls and floor calls．To select call tones：
－Press the button MENU to access the menu．
－Select the icon 㫱过 and press OK．
－Select the icon $\bar{\delta}$ ，press OK．
－Select the call ring tone to be configured：$\stackrel{\leftrightarrow}{\varsigma}$（call tone）（floor call tone）．
－Select the call ring tone to be used with directional buttons Right／ Left．
－Press OK to confirm．

## AUDIO ADJUSTMENTS

In this menu，the user can adjust ringer volume，audio volume and buttons beep．
－Press the button MENU to access the menu．
－Select the icon 尊过 and press OK．
－Select the icon（（ $\bullet$ and press OK．
－Select the icon $\mathrm{\delta}_{\mathrm{d}}$ to adjust the ringer volume with directional buttons Right／Left，select $\square_{ \pm}^{+}$to adjust audio volume，and select BEEP to activate or not the button beep．
－After configuration，press OK to confirm．

## VIDEO ADJUSTMENTS

In this menu the user can adjust brightness，contrast，colour and themes（ 5 available themes）of the menu．
－Press the button MENU to access the menu．
－Select the icon 學箴 and press OK．
－Select the icon $\square$ and press OK．
－Select the icon to adjust brightness with directional buttons Right／Left，select to adjust contrast，select to adjust colour and select $\boldsymbol{T}$ to adjust the desired theme．
－After configuration，press OK to confirm．

## RESET

In this menu the user can reset the device and restore all default configurations．
－Press the button MENU to access the menu．
－Select the icon 害迹 and press OK．
－Select the icon RESET and press OK．
－Select YES to confirm reset or select NO to go back．

## 4 The Reset operation does not delete the directory．

Warning：when programmed data are deleted，also the column code will be deleted；it will be automatically acquired after about 5 minutes

## ACCESSORIES FOR AIKO VIDEO DOOR PHONE

Aiko video door phone can be customized by replacing the front glass with colour glasses included in Kit Ref．1716／51．


## DOOR PHONE APARTMENT STATIONS

Download from www.urmetdomus.com Technical Manuals area.

## SECTION CONTENTS

SIGNO DOOR PHONE Ref.1183/2 ..... 2
Buttons function ..... 2 ..... 2
TECHNICAL CHARACTERISTICS ..... 2
INSTALLATION ..... 2
Terminal pins description ..... 2
CONFIGURATION ..... 2
Line terminal settings ..... 4
PERFORMANCE .....  4
Call reception .....  4
Intercom call forwarding ..... 4
Floor call function ..... 4
Supplementary ringer . .....  .4
Door open LED ..... 4
Intercom function ..... 5
CALL TONE PROGRAMMING ..... 6
Door phone call ring tone .....  .6
Floor call ring tone. ..... 6
PROGRAMMING DATA DELETING ..... 6
ATLANTICO DOOR PHONE Ref.1183/1 ..... 7
Buttons function ..... 7
TECHNICAL CHARACTERISTICS ..... 7
INSTALLATION ..... 7
Terminal pins description .....  7
CONFIGURATION ..... 8
Line terminal settings ..... 9
PERFORMANCE .....  9
Call reception ..... 9
Intercom call forwarding ..... 9
OPTIONAL PROGRAMMING ..... 9
Intercom function ..... 9
CALL TONE PROGRAMMING ..... 10
Door phone call ring tone. ..... 10
PROGRAMMING DATA DELETING ..... 10
SIGNO HOUSE PHONE WITH 10 ADDITIONAL BUTTONS Ref. 1183/3 ..... 11
Buttons function ..... 11
TECHNICAL SPECIFICATIONS .....  .11
INSTALLATION ..... 11
Description of terminals. ..... 11
CONFIGURATION ..... 11
Line terminal settings ..... 13
PERFORMANCE ..... 13
Call reception ..... 13
Intercom call forwarding ..... 13
Floor call function ..... 13
Additional ringer management ..... 13
Automatic door lock release ..... 14
Door open LED / Automatic door lock release. ..... 14
OPTIONAL PROGRAMMING ..... 14
Indoor station intercom function ..... 14
CALL TONE PROGRAMMING ..... 15
Door phone call ring tone ..... 15
Floor call ring tone ..... 15
PROGRAMMING DATA DELETING ..... 15

SIGNO DOOR PHONE Ref.1183/2


Signo door phone recalls the style of Signo video door phone. Designed by architect Citterio, Signo door phone has a perfectly flat surface harmonized with the absence of corners.
On the front panel there are the button for door opening, backlit by leds, and 3 buttons for additional services as intercom calls, opening of the second electric lock, etc.
Signo door phone has an electronic management of the call ring tone with a loudspeaker dedicated to this function, placed under the handset. Also the switch used to adjust the call volume with "Mute" function is hid by the handset.
When the switch is in "Mute" position, a little red flag comes out of the door phone body to indicate the absence of the call ring tone.


## BUTTONS FUNCTION

| Sutton | Sar | $\bullet$ | $\bullet$ | $\bullet \bullet$ |
| :--- | :---: | :---: | :---: | :---: |
| Idle and on <br> hook | Pedestrian <br> door lock <br> release | Driveway door <br> lock release | Special <br> function | Special <br> function |
| Off-hook <br> waiting time <br> (call received) | Pedestrian <br> door lock <br> release | Driveway door <br> lock release | Special <br> function | Special <br> function |
| Speaking | Pedestrian <br> door lock <br> release | Driveway door <br> lock release | Special <br> function | Special <br> function |
| Idle and <br> off hook | Pedestrian <br> door lock <br> release | Intercom call <br> (default: not <br> programmed) | Intercom call <br> (default: <br> switchboard <br> call) | Intercom call <br> (default: not <br> programmed) |

## TECHNICAL CHARACTERISTICS

## Power supply voltage:

Current consumption in standby:
Max. current consumption:
Operating temperature range:
Reference standards:
Max. humidity:
$36 \div 48 \mathrm{Vdc}$
3,0mA max
70mA max
$-5^{\circ} \mathrm{C} \div+45^{\circ} \mathrm{C}$
EN 61000-6-3
EN 61000-6-1 90\% UR


SIGNO DOOR PHONE


INT: apartment station code.
Set a number from 0 to 3 according to the following rules:

- The indoor station code must be 0 if there is only one station in the apartment.
- Up to 4 apartment stations can be connected in parallel using the same user code and different indoor station codes.

|  |  |  |  |
| :---: | :---: | :---: | :---: |
| INT $=0$ | $\mathrm{INT}=1$ | INT = 2 | INT |

The indoor station code is used to identify the single stations of the same user. This means that intercom calls can be address to the single user in the same apartment. All the users indoor stations will ring at the same time in the event of intercom calls to different apartments, door unit calls and floor calls. Extension 0 rings immediately when a call is received. Extensions 1, 2 and 3 will ring in sequence after each other.

## LINE TERMINAL SETTINGS



A line terminal jumper is fitted in the door phone. Activate the terminal for devices wired at the end of a line from which another section does not start from the device terminals (end of line).

## PERFORMANCE

## CALL RECEPTION

The user's apartment station will ring with the programmed tone when a call is received according to the source:

- From main door unit
- From secondary door unit
- Intercom call
- Floor calls
- From switchboard

The electric lock can be operated from the calling door unit also without picking up the handset when a call is received
Indoor station 0 will ring immediately if there are several stations in the apartment. Extensions 1, 2 and 3 will ring in sequence after each other.

## INTERCOM CALL FORWARDING

After programming the button for the intercom function, pickup the handset and press the button.
The following cases can occur according to the calling indoor station state:

- Indoor station free: the calling indoor station will output a confirmation tone (2 beeps) and the called indoor station will ring. Communication is established when the called user picks up.
- Indoor station busy: the indoor station outputs a warning tone (4 beeps in rapid sequence). Hang up and try again later.


## FLOOR CALL FUNCTION

The indoor station is equipped with a pair of terminals (CP) for connecting the floor call button. The indoor station will ring with the set tone for 3 s when the button is pressed. Connect this button only to one indoor station if there are several indoor stations in parallel. Extensions 1, 2 and 3 will ring in sequence after each other.

## SUPPLEMENTARY RINGER

The apartment stations are provided with a pair of terminals (S+, S-) for connecting a supplementary ringer or relay. This ringer is controlled when any call tone is generated.

## DOOR OPEN LED

The apartment units provided with indicator LED to indicate the open state of the door.
The LED will light up if the door of the main calling station is open and will blink if the secondary calling station door is open.
The function is only active for the last called door phone or on which the door opening button was pressed and corresponding to the last calling door unit.

5
The function is able only if a sensor is connected to the calling station.
Urmet $\quad$ SIGNO DOOR PHONE

## OPTIONAL PROGRAMMING

The following programming operations are needed after testing the basic operation of the system, only if are required.

## INTERCOM FUNCTION

Buttons ••• can be programmed in 2Voice systems for intercom call functions.
One button can be programmed to call another user in the column or to call an indoor station in parallel. All indoor stations of the called user will ring in the first case. Only the specifically programmed indoor station will ring in the second case.

## INTERCOM FUNCTION BETWEEN VARIOUS USERS

- Go to the indoor station to be programmed as caller (indoor station A).
- Hold the door opener button pressed and pick up the handset. The indoor station A outputs a tone to indicate that programming mode is in progress.

- Press the button to be programmed. The indoor station will output a confirmation tone.

- Go to the user that the button will call (user B) and press the door opener button. The indoor stations will be beep to indicate that they have been programmed.
Alternatively, go to a calling station and press the calling button of user $B$. The indoor station being programming (A) will beep to indicate that it has been programmed. The indoor stations of user $B$ will ring when this occurs. Ignore this call.

- Hook up the handset of indoor station A. It will beep to indicate exit from programming mode.
- Check programmed function: release the handset $A$ and press the programmed button. Check that all indoor stations of user B ring and check audio.
- You will need to program indoor station B to call A to make the opposite call possible.

The other functions listed in the "Buttons functions" table will not be lost if the buttons are programmed for this function because the intercom call is made with the handset off-hook.

## INTERCOM FUNCTION IN THE SAME APARTMENT

- Go to the apartment station to be programmed as caller (indoor station C1).
- Hold the door opener button pressed and pick up the handset. The indoor station C1 outputs a tone to indicate that programming is in progress.

- Press the button to be programmed. The indoor station C1 will output a confirmation tone.

- Go to the indoor station that the button will call (apartment station C2) and press the door opener button. The indoor stations C1 and C 2 will be beep to indicate that they have been programmed.

- Hook up the handset of indoor station C1. It will beep to indicate exit from programming mode.
- Check programmed function: pick up the handset C1 and press the programmed button.
- Check that the indoor station C2 rings and check audio.
- You will need to program indoor station C2 to call C1 to make the opposite call possible.

4
The other functions listed in the "Button functions" table will not be lost if the buttons are programmed for this function because the intercom call is made with the handset off-hook.

## CALL TONE PROGRAMMING

In 2VOICE system each user can select the door phone call ring tone and the floor call ring tone among the 5 available ones.

## DOOR PHONE CALL RING TONE

1. By keeping the door lock release button pressed, press and release the button
2. The apartment station emits a call ring tone.
3. By keeping the door lock release button pressed, press again the button to change the call ring tone.
4. When the call ring tone has been selected, release the door lock release button.
5. The call ring tone is programmed.


The selected call ring tone is the same for all door phone calls. However, the call ring tone source can be identified thanks to the call ring tone timing:

| Call source | Time | Ring total duration |
| :--- | :--- | :---: |
| Main call station | 3 s ON | 3 s |
| Secondary call <br> station | $0,4 \mathrm{~s}$ ON 0,2 s OFF <br> for 5 times | $2,8 \mathrm{~s}$ |
| Intercom | $0,5 \mathrm{~s}$ ON 0,5 s OFF <br> for 3 times | $2,5 \mathrm{~s}$ |
| Switchboard | $0,1 \mathrm{~s}$ ON 0,05 s OFF <br> for 3 times pause <br> 0,2 s repeated for 5 <br> times | $2,8 \mathrm{~s}$ |

## FLOOR CALL RING TONE

1. By keeping the door lock release button pressed, press and release the button ${ }^{\bullet}$
2. The apartment station emits a call ring tone.
3. By keeping the door lock release button pressed, press again the button to change the call ring tone.
4. When the call ring tone has been selected, release the door lock release button.
5. The call ring tone is programmed.


## PROGRAMMING DATA DELETING

To delete all optional programming data (intercom call codes), perform the following operations:

- By keeping the door lock release button pressed, pick the handset up.
- Press at the same time the buttons and and keep them pressed for 3 seconds until a tone confirming the deletion is emitted.
- Release the buttons and and hang the handset up.

4
The deleting procedure does not change the previously selected call ring tones.

Warning: when programmed data are deleted, also the column code will be deleted; it will be automatically acquired after about 5 minutes.

## ATLANTICO DOOR PHONE Ref．1183／1



Atlantico door phone has the following characteristics：
－Innovative style，with simple and essential lines designed by Michele De Lucchi．
－Plastic finishing（ABS）：polished for buttons and embossed for other elements．
－Handset with telephone cable and connectors．
－Telephone handset hook switch placed in the lower part of the cover
－Button for door lock release function
－Additional button for intercom call and opening of the second electric lock．
－Easy installation with screws and screw anchors，without masonry works．

4
Several door phones cannot be fitted in parallel in the same apartment with 1183／1 door phones．

## BUTTONS FUNCTION

| State | Button | Pedestrian door lock <br> release |
| :--- | :---: | :---: |
| Idle and on <br> hook | Driveway door <br> lock release |  |
| Off－hook <br> waiting time <br> （call received） | Pedestrian door lock <br> release | Driveway door <br> lock release |
| Speaking | Pedestrian door lock <br> release | Driveway door <br> lock release |
| Idle and <br> off hook | Pedestrian door lock <br> release | Intercom call <br> （default：switchboard <br> call） |

## TECHNICAL CHARACTERISTICS

Power supply voltage：
Standby current consumption：
Max．current consumption：
Operating temperature range：
Compliant with：
Max．humidity：
$36 \div 48 \mathrm{Vdc}$ 3，0mA max 70mA max $-5^{\circ} \mathrm{C} \div+45^{\circ} \mathrm{C}$ EN 61000－6－3
EN 61000－6－1 90\％UR

## INSTALLATION

To install Atlantico door phone perform the following operations：
1．Remove the door phone cover．
2．Fix the base to the wall with the provided screws and screw anchors．
3．Configure the programming switches and connect the door phone to the system．
4．Mount again the cover．


5 For installation on flush mounting box Mod．503，fix the door phone to the wall using the provided screws and screw anchors．


DESCRIPTION OF TERMINALS
Line
Line
CONFIGURATION

Default settings: default indoor station settings are:
USER= 127
The dip switches must always be arranged in the correct setting for correct operation of the system in this case.
CODE: user code
Set a number from 0 to 127 according to the following rules:

- No two apartments in the system can have the same user code.
- User codes be consecutive in the same column must.
4 Use the CODE dip switches from 2 to 8 (2= most significant bit - 8= least significant bit) to set the required code. Dip switch 1 must be OFF.


ON
USER 24
123

ON
 USER 28


USER 32
ON


ON


USER 40


USER 44



O

$\begin{array}{r}1234567 \\ 12414 \\ \hline\end{array}$
ON


| $\square$ |
| :--- |
| 12 |
| 1 |
| USE |
| ON |
| $\square$ |
| 12 |

1234567
USER 26


 USER 54


ON
 USER 59


USER 78


USER 7



ON


USER 90


123456
USER 110


## LINE TERMINAL SETTINGS



A line terminal jumper is fitted in the door phone. Activate the terminal for devices wired at the end of a line from which another section does not start from the device terminals (end of line).

## PERFORMANCE

## CALL RECEPTION AND VIDEO SHIFTING FUNCTION

The user's apartment station will ring with the programmed tone when a call is received according to the source:

- From main door unit
- From secondary door unit
- Intercom call
- Floor calls
- From switchboard

The electric lock can be operated from the calling door unit also without picking up the handset when a call is received.

## INTERCOM CALL FORWARDING

After programming the button for the intercom function, pickup the handset and press the button.
There is no feedback tone neither if the system is free nor if it is engaged.

## OPTIONAL PROGRAMMING FOR ADDITIONAL FUNCTIONS

The following programming operations are needed after testing the basic operation of the system, only if are required.

## INTERCOM FUNCTION

The button on 1183/1 door phones can be programmed for intercom calls.
The button can be programmed to call another user in the column.

## INTERCOM FUNCTION BETWEEN VARIOUS USERS

- Go to the indoor station to be programmed as caller (indoor station A).
- Hold the door opener button pressed and pick up the handset.
- Press the button to be programmed.

- Go to the user that the button will call (user B) and press the door opener button.
Alternatively, go to a calling station and press the calling button of user $B$. The indoor stations of user B will ring when this occurs. Ignore this call.

- Hook up the handset of apartment station A. It will beep to indicate exit from programming mode.
- Check programmed function: release the handset $A$ and press the programmed button. Check that all indoor stations of user B ring and check audio.
- You will need to program indoor station B to call A to make the opposite call possible.
5
The other functions listed in the "Buttons functions" table will not be lost if the buttons are programmed for this function because the intercom call is made with the handset off-hook.


## CALL TONE PROGRAMMING

In 2VOICE system each user can select the door phone call ring tone among the 5 available ones.

## DOOR PHONE CALL RING TONE

1. By keeping the door lock release button pressed, press and release the button 1.
2. The apartment station emits a call ring tone.
3. By keeping the door lock release button pressed, press again the button 1 to change the call ring tone.
4. When the call ring tone has been selected, release the door lock release button.
5. The call ring tone is programmed.


The selected call ring tone is the same for all door phone calls. However, the call ring tone source can be identified thanks to the call ring tone timing.

| Call source | Time | Ring total duration |
| :--- | :--- | :---: |
| Main call station | 3 s ON | 3 s |
| Secondary call <br> station | $0,4 \mathrm{~s}$ ON 0,2 s OFF <br> for 5 times | $2,8 \mathrm{~s}$ |
| Intercom | $0,5 \mathrm{~s}$ ON 0,5 s OFF <br> for 3 times | $2,5 \mathrm{~s}$ |
| Switchboard | $0,1 \mathrm{~s}$ ON 0,05 s OFF <br> for 3 times pause <br> 0,2 s repeated for 5 <br> times | $2,8 \mathrm{~s}$ |

## PROGRAMMING DATA DELETING

To delete all optional programming data (intercom call codes), perform the following operations

- By keeping the door lock release button pressed, pick the handset up.
- Press at the same time the door lock release button and the button 1 and keep them pressed for at least 3 seconds.
- Release the buttons and hang the handset up.

The deleting procedure does not change the previously selected call ring tones.

Warning: when programmed data are deleted, also the column code will be deleted; it will be automatically acquired after about 5 minutes.

## SIGNO HOUSE PHONE WITH 10 ADDITIONAL BUTTONS Ref. 1183/3



The door phone Ref. 1183/3 has the same aspect and electric characteristics as Signo Ref. 1183/2 door phone, but it is provided with 10 buttons used for additional services and with automatic door lock release function after a call.
As in the basic version, on the front side there is the led-backlit button used to open the door and in the button number 7 body there is a led used to signal an open door.
Also in this model, the call is electronically managed with a dedicated loudspeaker; its volume can be adjusted with a switch. When the switch is in "Mute" position, a little red flag comes out of the door phone body to indicate the absence of the call ring tone.


BUTTONS FUNCTIONS

| State | Button |  |  | 7 |  |
| :--- | :--- | :--- | :--- | :--- | :---: |
| Stand-by <br> and on <br> hook | Door lock <br> release | Garage door <br> lock release | Special <br> function | Special <br> function | Automatic <br> door lock <br> release |
| Waiting for <br> pick-up <br> (receiving <br> a call) | Door lock <br> release | Garage door <br> lock release | Special <br> function | Special <br> function | Automatic <br> door lock <br> release |
| Audio | Door lock <br> release | Garage door <br> lock release | Special <br> function | Special <br> function | Automatic <br> door lock <br> release |
| Stand-by <br> and off <br> hook | Door lock <br> release | Chiamata <br> intercom. <br> (default: not <br> programmed) | Programmable <br> intercom. <br> (default: call to <br> switchboard) | Chiamata <br> intercom. <br> (default: not <br> programmed) | Automatic <br> door lock <br> release |

## TECHNICAL SPECIFICATIONS

Power voltage:
Stand-by consumption:
Max. consumption:
Working temperature range:
Reference standards:
Max. humidity:
$36 \div 48 \mathrm{Vdc}$
3,0mA max
70mA max
$-5^{\circ} \mathrm{C} \div+45^{\circ} \mathrm{C}$
EN 61000-6-3
EN 61000-6-1 90\%UR

## INSTALLATION

- Remove the door phone hood.
- Fix the base to the wall with the screws and bolts included.
- Configure the programming switches and make the connections.
- Refit the hood.


DESCRIPTION OF TERMINALS
$\begin{array}{ll}\begin{array}{l}\text { Line } \\ \text { Line }\end{array} \\ \begin{array}{l}\mathrm{CP}\end{array} & \left\{\begin{array}{l}\text { Bus line in } \\ \mathrm{CP}\end{array}\right. \\ \begin{array}{l}\text { S+ } \\ \mathrm{S}_{-}\end{array} & \} \text {Sloor call } \\ \end{array}$

## CONFIGURATION



Default settings: default indoor station settings are:
USER= 127
INDOOR STATION $=0$
The dip switches must always be arranged in the correct setting for correct operation of the system in this case.

CODE: user code.
Set a number from 0 to 127 according to the following rules:

- No two apartments in the system can have the same user code.
- Indoor stations in parallel in the same apartment must have the



INT: apartment station code.
Set a number from 0 to 3 according to the following rules:

- The indoor station code must be 0 if there is only one station in the apartment.
- Up to 4 apartment stations can be connected in parallel using the same user code and different indoor station codes.


INT $=0$



| 或 |
| :---: |
| $\mathrm{INT}=3$ |

The indoor station code is used to identify the single stations of the same user. This means that intercom calls can be address to the single user in the same apartment. All the users indoor stations will ring at the same time in the event of intercom calls to different apartments, door unit calls and floor calls. Extension 0 rings immediately when a call is received. Extensions 1, 2 and 3 will ring in sequence after each other.

## LINE TERMINAL SETTINGS



A line terminal jumper is fitted in the door phone. Activate the terminal for devices wired at the end of a line from which another section does not start from the device terminals (end of line).

## PERFORMANCE

## CALL RECEPTION

The user's apartment station will ring with the programmed tone when a call is received according to the source:

- From main door unit
- From secondary door unit
- Intercom call
- Floor calls
- From switchboard

The electric lock can be operated from the calling door unit also without picking up the handset when a call is received.
Indoor station 0 will ring immediately if there are several stations in the apartment. Extensions 1, 2 and 3 will ring in sequence after each other.

## INTERCOM CALL FORWARDING

After programming the button for the intercom function, pickup the handset and press the button.
The following cases can occur according to the calling indoor station state:

- Indoor station free: the calling indoor station will output a confirmation tone ( 2 beeps) and the called indoor station will ring. Communication is established when the called user picks up.
- Indoor station busy: the indoor station outputs a warning tone (4 beeps in rapid sequence). Hang up and try again later.


## FLOOR CALL FUNCTION

The indoor station is equipped with a pair of terminals (CP) for connecting the floor call button. The indoor station will ring with the set tone for $3 s$ when the button is pressed. Connect this button only to one indoor station if there are several indoor stations in parallel. Extensions 1, 2 and 3 will ring in sequence after each other.

## ADDITIONAL RINGER MANAGEMENT

The door phone is equipped with a pair of terminals (S-, S+) for connecting a supplementary ringer or a relay. This ringer is controlled when any call tone is generated.

## AUTOMATIC DOOR LOCK RELEASE

This feature allows to automatically send a pedestrian door lock release command after a call coming from door units. This feature can be activated/deactivated with the button no. 7 and is signalled by turning on the led on the button.

## OPEN DOOR LED / AUTOMATIC DOOR LOCK RELEASE

The door phone is provided with a led that signals open door state or automatic door lock release feature active.
To signal an open door in a main call module, the led is steady on; to signal an open door in a secondary call module the led blinks fast; to signal an automatic door lock release feature active the led blinks slowly. Automatic door lock release signalling has priority over open door signal.
Open door signalling is active only on the last called door phone where the door lock release button has been pressed. This signalling is referred to the last calling door unit.
Open door signalling is available only if a suitable sensor has been connected to the door unit.

## OPTIONAL PROGRAMMING FOR ADDITIONAL FUNCTIONS

The following programming operations are needed after testing the basic operation of the system, only if are required.

## INDOOR STATION INTERCOM FUNCTION

Buttons $\bullet$ or buttons from 1 to 6 can be programmed in 2Voice systems for intercom call functions.
One button can be programmed to call another user in the column or to call an indoor station in parallel. All indoor stations of the called user will ring in the first case. Only the specifically programmed indoor station will ring in the second case.

## INTERCOM FUNCTION BETWEEN VARIOUS USERS

- Go to the indoor station to be programmed as caller (indoor station A).
- Hold the door opener button pressed and pick up the handset. The indoor station A outputs a tone to indicate that programming mode is in progress.

- Press the button to be programmed. The indoor station will output a confirmation tone. Buttons can be $\bullet,{ }^{\bullet}$ or buttons from 1 to 6.

- Go to the user that the button will call (user B) and press the door opener button. The indoor stations will be beep to indicate that they have been programmed.
Alternatively, go to a calling station and press the calling button of user B. The indoor station being programming (A) will beep to
indicate that it has been programmed. The indoor stations of user $B$ will ring when this occurs. Ignore this call.

- Hook up the handset of indoor station A. It will beep to indicate exit from programming mode.
- Check programmed function: release the handset $A$ and press the programmed button. Check that all indoor stations of user B ring and check audio.
- You will need to program indoor station B to call A to make the opposite call possible.
5
The other functions listed in the "Buttons functions" table will not be lost if the buttons are programmed for this function because the intercom call is made with the handset off-hook.


## INTERCOM FUNCTION IN THE SAME APARTMENT

- Go to the apartment station to be programmed as caller (indoor station C1).
- Hold the door opener button pressed and pick up the handset. The indoor station C1 outputs a tone to indicate that programming is in progress.

- Press the button to be programmed. The indoor station C1 will output a confirmation tone. Buttons can be $\bullet, \bullet^{\circ}$ or buttons from 1 to 6 .

- Go to the indoor station that the button will call (apartment station C2) and press the door opener button. The indoor stations C1 and C2 will be beep to indicate that they have been programmed.

- Hook up the handset of indoor station C1. It will beep to indicate exit from programming mode.
- Check programmed function: pick up the handset C 1 and press the programmed button. Check that the indoor station C 2 rings and check audio.
- You will need to program indoor station C2 to call C1 to make the opposite call possible.
4
The other functions listed in the "Button functions" table will not be lost if the buttons are programmed for this function because the intercom call is made with the handset off-hook.


## CALL TONE PROGRAMMING

In 2Voice system each user can select the door phone call ring tone among the 5 available ones.

## DOOR PHONE CALL TONE

- Hold the door opener button pressed. Press and release the button - The indoor station will play a tone.
- Hold the door opener button pressed and press the button : again to change the tone.
- Release the door opener button when you have chosen the tone you want. The tone is now programmed.


The selected call ring tone is the same for all door phone calls. However, the call ring tone source can be identified thanks to the call ring tone timing:

| Call source | Time | Ring total <br> duration |
| :--- | :--- | :---: |
| Main call station | 3 s ON | 3 s |
| Secondary call station | $0,4 \mathrm{~s}$ ON $0,2 \mathrm{~s}$ OFF for <br> 5 times | $2,8 \mathrm{~s}$ |
| Intercom | $0,5 \mathrm{~s}$ ON $0,5 \mathrm{~s}$ OFF for <br> 3 times | $2,5 \mathrm{~s}$ |
| Switchboard | $0,1 \mathrm{~s}$ ON $0,05 \mathrm{~s}$ OFF <br> for 3 times pause 0,2 s <br> repeated for 5 times | $2,8 \mathrm{~s}$ |

## FLOOR CALL TONE

- Hold the door opener button pressed. Press and release the button
- The indoor station will play a tone.
- Hold the door opener button pressed and press the button again to change the tone.
- Release the door opener button when you have chosen the tone you want. The tone is now programmed.



## PROGRAMMING DATA DELETION

Proceed as follows to delete all optional programming data (intercom calling code):

- Hold the door opener button pressed and pick up the handset.
- Press and at the same time for 3 seconds until you hear the deletion tone.
- Release buttons and and hang up.

4
The deletion procedure will not change the programmed calling tones.

Warning: when programmed data are deleted, also the column code will be deleted; it will be automatically acquired after about 5 minutes.

## ACCESSORIES

## Download from www.urmetdomus.com Technical Manuals area.

## SECTION CONTENTS

WIRELESS CALL REPEATER Ref. 4311/13 ..... 2
TECHNICAL CHARACTERISTICS .....  2
INSTALLATION .....  2
Connection example. ..... 2
CALL REPEATER RELAY Ref. 788/22 ..... 3
INSTALLATION. .....  3
Connection example ..... 3
THREE-TONE ADDITIONAL RINGER Ref. 1072/59 ..... 3
Connection example ..... 3
12Vac ELECTRONIC ADDITIONAL RINGER Ref. 9854/40 ..... 4
TECHNICAL CHARACTERISTICS .....  4
ADDITIONAL RINGER INSTALLATION 4

## WIRELESS CALL REPEATER Ref. 4311/13

WIRELESS CALL REPEATER
TECHNICAL CHARACTERISTICS - INSTALLATION
UTMet


The Ref. 4311/13 can be used to radio transmit the call signal from a door phone or video door phone system to a Mistral receiver.
The call repeater can be used in combination with the following ringers:

- Ringer with a range up to 200 m and flash.

Powered by battery or power supply unit
Ref. 4311/2

- Ringer with a range up to 150 m , flash and 230Vca mains power supply

Ref. 4311/3
All ringers, their characteristics and installation modes are included in "Products technical manuals - Door phone and video door phone systems".

The device is ready to be powered by a 9V battery (not included) which ensures system operation also in unfavourable conditions. The battery must be replaced approximately every two years or when the device performance degrades.

## TECHNICAL CHARACTERISTICS

Power supply
Transmission frequency:
Operating temperature range:
alkaline 6LR61 9V battery 868,35MHz $+5 \div 40^{\circ} \mathrm{C}$

## INSTALLATION

Install the device away from sources of heat and in a place protected from humidity and water sprays.
Be very careful when handling printed circuit components and particularly the metallic antenna, that must not be moved from its original position.
Before final installation of the device, make a test call to check that the radio signal is correctly picked up by the receiver.

- Open the lid using a screwdriver as a lever in the points shown (A).
- Using the bolts and provided holes (B), fasten the product near the door phone or in a position where the device connection wires can be reached.


- Connect the terminal board according to the connection diagram shown below. Do not disconnect the two-pin battery wire from the terminal board
- Connect the battery (D).
- The signal can be sent to the receiver during programming by pressing the button (C) on the printed circuit. The indicator LED will start blinking.
- For receiver programming procedure, refer to paragraphs concerning Mistral radio ringers.


## CONNECTION EXAMPLE



CALL REPEATER RELAY Ref. 788/22


The device Ref. 788/22 allows to implement the call repeater function.
In all system types, connect the call signal to the repeater relay: in this case, the device will switch the relay contact, repeating the call melody envelope.
The output contact can switch resistive loads up to $1 \mathrm{~A}-24 \mathrm{~V}$.

## INSTALLATION

To fasten the device to the wall or inside other devices, use the 2 fixing holes present on the housing fin (screws are not provided).


To power the call repeater relay, it is suggested to use a power supply Ref.1090/850, whose characteristics and installation modes are described in "Products Technical Manuals - Door phone and video door phone systems".

CONNECTION EXAMPLE


THREE-TONE ADDITIONAL RINGER Ref. 1072/59


The three-tone additional ringer Ref. 1072/59 can be used to repeat the door phone call in places where the door phone or video door phone call ring tone can not be heard.
It must be self-powered (by a 9V 6AM6-6LF22 battery), because the apartment station can not power it.
The ringer is equipped with two jumpers, marked by W1 and W2. Remove one jumper to make it work as two-tone or one-tone, according to the following table:

| Tone type | Jumpers |  |  |
| :--- | :---: | :---: | :---: |
|  | W 1 | W 2 |  |
| Three-tone | X | X | All the two jumpers on |
| Two-tone | X |  | Only jumper W1: W2 must be removed |
| One-tone |  | X | Only jumper W2: W1 must be removed |

## CONNECTION EXAMPLE



## 12Vac ELECTRONIC ADDITIONAL RINGER Ref. 9854/40



The electronic ringer Ref. 9854/40 can be used as additional ringer: the call coming from the door unit activates both the apartment station ringer and the additional ringer Ref. 9854/40.
$\left\langle{ }^{*}\right.$ For comnection, a sutitaber reayy $m$ ust be b ssed.

TECHNICAL CHARACTERISTICS

Power consumption:
Operating voltage:
Call tone:

35mA with 12Vac power supply 12Vac nominal with tolerance from 10 to 18 Vac two-tone with loudspeaker with 1200 and 1800 Hz frequency

ADDITIONAL RINGER INSTALLATION


To fasten the device to the wall, use the fixing holes on the housing base (screws are not provided).


## CONCIERGE SWITCHBOARD

## Download from www.urmetdomus.com Technical Manuals area.

## INDICE DI SEZIONE

CONCIERGE SWITCHBOARD Ref. 1083/40 ..... 2
LIST OF DETAILS ..... 2
Keypad ..... 2
Ringer. ..... 2
Display ..... 2
DESCRIPTION OF CONNECTIONS .....  2
TECHNICAL CHARACTERISTICS ..... 2
INSTALLATION ..... 3
Table top installation .....  3
Wall installation .....  3
Video module installation ..... 4
EXAMPLES OF SYSTEMS WITH DIFFERENT CAPACITIES .....  5
OPERATING INSTRUCTIONS ..... 7
Usage types ..... 7
Turning on and off the switchboard ..... 7
Day/night mode switching ..... 7
Standby .....  7
Displaying name directory and calling a user ..... 7
Call from apartment stations ..... 8
Stored calls coming from apartment stations .....  8
Calling an apartment station using its code ..... 8
Call from main station ..... 9
Door lock release function. .....  9
Management of codes for special services .....  9
Open door indications .....  9
Auto-on function ..... 10
Keypad lock activation/deactivation ..... 10
Date/time adjustement ..... 10
Ringer volume ..... 10
Call diversion function to cordless phone ..... 10
Displaying codes and names in case of logical codes operating mode ..... 11
CONFIGURATION ..... 11
Linguage ..... 11
Busy time ..... 11
Monitor presence ..... 11
System configuration ..... 12
Call repeat (S+, S-) ..... 13
Communication interruption ..... 13
Power-on password ..... 13
User codes type ..... 14
Function buttons ..... 14
Name management ..... 14
Diagnostic services (polling) ..... 15
Default values and restore. ..... 16
PROGRAMMING VIA PC ..... 16

CONCIERGE SWITCHBOARD Ref. 1083/40


The switchboard Ref. 1083/40 is only used in 2VOICE system to perform:

- communication function to/from apartment stations, with capability to store not answered calls (up to 50);
- concierge service (with or without local answer of calls coming from main call stations and addressed to apartment stations).
The switchboard Ref. 1083/40 is available in only one version, table top or wall mounting (see the chapter Installation); it can also be provided with a video module Ref. 1732/41 with bracket Ref. 1732/91.
To connect the switchboard, use a dedicated system power supply Ref. 1083/20.
After configuration, the switchboard is ready for all system users.


## LIST OF DETAILS



1 - On/off button with green led
2 - Day/Night mode switching button with green led
3 - Button used to display the list of the doors left open with red led
4 - Button used to switch the communication to the apartment station
5 - Button used to display the list of stored calls coming from apartment stations with red led
6 - Button used to establish the communication between the door unit and the apartment station
7 - Button used to call/confirm
8 - Button used to display the log of the alarms received from apartment stations with red led (for future uses)
9 - Button used to switch the communication to the call station
10 - Auto-on button
11 - Programmable functions buttons
12 - Alphanumeric keypad
13 - Button used to correct errors
14 - Secondary door lock release button
15 - Main door lock release button
16 - Second function button
17 - Clock setting button (date/time)
18 - Scroll arrows
19 - Display contrast adjustment
20 - Dedicated door phone
21 - Pedestrian door lock release button of the main call station 22 - Display

## KEYPAD

The keypad includes dual function buttons used to enter call codes used to call apartment stations, special codes, call station codes used to open the door and search/enter user names. The functions of all the buttons are described in detail in next paragraphs.

## RINGER

The ringer is electronically modulated and the volume can be adjusted on 5 levels, as described in the paragraph "Ringer Volume".

## DISPLAY

The switchboard is provided with a 10 or 20 characters on 5 rows backlit display; the 5 rows give different information according to the system status. The last row always indicates date and time (except during configuration).
The switchboard display is backlit with leds with a 10 " timeout. Backlight is enabled when the handset is picked up, when any button is pressed and a call or an alarm indication is received.

## DESCRIPTION OF CONNECTIONS

LINE: connection to 2Voice system
POWER: dedicated power supply 1083/20 connection
S+, S-: call repeat signal

TECHNICAL CHARACTERISTICS

Power supply (POWER):
Max. current consumption:
Max. switching voltage S+, S-:
Max. switching current:
Operating temperature range:
$48 \mathrm{Vdc} \pm 10 \%$
140 mA
30 Vdc
100 mAdc on resistive load
$-5 \div 45^{\circ} \mathrm{C}$

CONCIERGE SWITCHBOARD

## INSTALLATION

## TABLE TOP INSTALLATION

By default, the switchboard is configured for table top installation, with the specific support which ensures the best inclination.

The wiring junction box must be wall mounted with the provided double-sided adhesive tape or with screws and screws anchors.


## WALL INSTALLATION

1 - Remove the table support and the two feet from the switchboard bracket.


2 - Extract the switchboard fixing hook.


3 - Remove the switchboard from the bracket.


4 - Remove the door phone cover of the switchboard.


5 - Unscrew the base of the switchboard door phone from the bracket.


6 - Fix the bracket to the wall with screws and screw anchors.


7 - Mount again the door phone base by screwing it to the bracket.


8 - Put again the door phone cover.


9 - Put again the door phone body in its seat and fix it with the locking hook.


The wiring junction box must be wall mounted with the provided double-sided adhesive tape or with screws and screws anchors.


## VIDEO MODULE INSTALLATION

The video module, provided with the bracket Ref. 1732/91, can be installed on the right of the switchboard.
1 - Fix the video module bracket to the switchboard bracket with two little brackets and 4 screws which must be placed in the specific seats.


2 - Extract the switchboard fixing hook.


3 - Remove the switchboard from the bracket.


4 - Connect the video module cable to the switchboard bracket.


5 - Make a hole in the switchboard plastic side.


6 - Place again the switchboard body and fix it with the locking hook.

4. If the video module must be placed near a table top mounted switchboard, before starting operations described above, install the suitable support and the 2 feet provided with the video module bracket.
UTMEt CONCIERGE SWITCHBOARD

## EXAMPLES OF SYSTEMS WITH DIFFERENT CAPACITIES

LT To connect the switchboard use the 2Voice dedicated cable, observing the following distances:

| Between switchboard and 2Voice dedicated power <br> supply | 5 m |
| :--- | :---: | :---: |
| Between switchboard and 4-user distributor Ref. <br> $1083 / 55$ | 50 m |
| Between switchboard and column interface Ref. <br> $1083 / 50$ | 50 m |
| Between switchboard and door units interface | 50 m |
| Between switchboard and 2Voice power supply | 50 m |

Switchboard connection in door phone systems without call stations


Switchboard connection in systems with one column and one call station


Switchboard connection in systems with one column and up to 2 call stations


Switchboard connection in systems with one column and up to 4 call stations


Switchboard connection in systems with more than one column, each one with some secondary call stations and 1 main call station


Switchboard connection in systems with 32 columns max., each one with some secondary call stations and up to 4 main call stations


## OPERATING INSTRUCTIONS

## USAGE TYPES

The switchboard operates according to its configuration during the installation phase and to its operating status. The possible switchboard operation modes are described below.

## SWITCHBOARD OFF

When the switchboard is off, it operates as it was not present in the system. Calls coming from main call stations directly reach apartment stations. Calls coming from apartment stations and addressed to the switchboard are lost.


## SWITCHBOARD ON

When the switchboard is turned on, it resumes DAY or NIGHT operation mode, previously configured.

## NIGHT SERVICE

In this condition, the concierge service is disabled and calls coming from main stations are directly sent to apartment stations. The switchboard can receive calls from apartment stations; if not answered, calls are saved in the memory. The switchboard can call any apartment station.


## DAY SERVICE

In this condition, the switchboard performs the concierge service, intercepting calls coming from main call stations and addressed to apartment stations. The switchboard can receive calls from apartment stations; if not answered, calls are saved in the memory (up to 50). The switchboard can call any apartment station.


## TURNING ON AND OFF THE SWITCHBOARD

Case 1: switchboard without access password.
To turn the switchboard on, press the button $\bigcirc$. The display shows:


In this screen the software version number is indicated below.

After 2 seconds, the switchboard starts operating in the mode active before it was turned off.
If the switchboard is in working mode DAY, the led (2) is on; if it is in NIGHT mode, the led (2) is off.
To turn the switchboard off, keep the button SHIFT (16) pressed while pressing the button $\bigcirc$ (1).

Case 2: switchboard with access password.
To turn the switchboard on, press the button $\bigcirc$ (1). The display shows:


In this screen the software version number is indicated below. After 2 seconds, the following screen is displayed:


Enter the access password programmed by the installer and press the button $\Omega$ (7). The switchboard starts operating in the mode active before it was turned off.
If the switchboard is in working mode DAY, the led (2) is on; if it is in NIGHT mode, the led (2) is off.
If the password entered is wrong or if one minute is elapsed from power on, the switchboard turns off again.

## DAY / NIGHT MODE SWITCHING

To switch from DAY to NIGHT mode, keep the button SHIFT (16) pressed while pressing the button ${ }^{\sigma_{\text {漟 }}(2) \text {. }}$
The operating mode DAY is indicated by the led (2) which turns on, in NIGHT mode the led stays off.

STANDBY
$\square$

During standby, the display only shows date and time.

## DISPLAYING NAME DIRECTORY AND CALLING A USER

When pressing the buttons $\triangle$ or (18), the display shows the following screen

NAME LIST: $x \times x x / n n n n$ УУУУУУУУУУУУУУУУУУYУ УУYYYYYYYYYYYYYYYYYY 13/03/2010 15:30:30
where:
$\mathbf{x x x x} \quad$ progressive index of selected name
nnnn total number of names in the directory
yyyyyy user name
To search for a name, scroll the list with the buttons or $\triangle$ (18) or press an alphanumeric button (12) to reach the first user which name starts with the selected letter (for example, to search for the name ROSSI, press an arrow button to gain access to the directory and the button 7 for 3 times to select letter R; then search for the user with arrows).
To call the selected user pick the handset up and press the button々 (7).

## CALL FROM APARTMENT STATION

During a call coming from an apartment station, the switchboard rings and the display shows the following screen:

|  |  |
| :--- | :---: |
| CALL FROM: | iiiii |
| YYYYYYYYYYYYYYYYYYYY |  |
| YYYYYYYYYYYYYYYYYYYY |  |
| $13 / 03 / 2010$ | $15: 30: 30$ |

where:
iiiii: physical code of the caller (Liiii - in case of logical code) yyyyyy: caller name
The switchboard attendant can answer the call by picking the handset up; if he does not answer within 10 seconds, the call is stored in the call memory ( 50 max.).

## STORED CALLS COMING FROM APARTMENT STATIONS

If there is at least one stored call, the led of call memory (5) is on. When pressing the button $\bigcirc \bigcirc$ (5), the following screen is displayed:

where:
nn: call progressive number in memory
iiiii: physical code of the caller (Liiii - in case of logical code)
yyyyyy: caller name
With the buttons $\triangle$ or (18) the user can scroll the list of stored calls (the total number of stored calls is 50 ).
When the memory is full, no more calls are stored in the memory.

After selecting a call stored in the memory, the user can be called by picking the handset up and pressing the button $\Omega$ (7).
In this case, the indication is automatically deleted from the memory.

To manually delete a call indication, select it with the buttons or (18), press the button $X$ (13) and press the button (1) to confirm.

## CALLING AN APARTMENT STATION USING ITS CODE

By entering a physical or logical code with the keypad, the display shows the following screen:

|  |  |
| :---: | :---: |
|  |  |
|  |  |
|  |  |
| $13 / 03 / 2010$ | $15: 30: 30$ |

where:
iiiii is the entered code.
Initial 0 of a code can be omitted.
The user can be called by pressing the button $\Omega(7)$ with the handset picked up.
After the call has been sent to an apartment station, the display shows:

| -111 1 |  |
| :---: | :---: |
| CALL FOR: | iiiii |
| УУУУУУУУYУУ | УУУYYУ |
| YYYYYУYYYYУ | УУYYYУ |
| 13/03/2010 | 15:30:30 |

where:
iiiii: physical code of the called user (Liiii - in case of logical code)
yyyyy: name of the called user
When the switchboard establishes a communication with the called user, the display shows the following screen:

## 「iiiii <br> USER IN COMM.: iiiii <br> УУYУYУYYУYYYYУYYYY УУYУYУYYYYУYYYYYYY 13/03/2010 15:30:30

## where:

iiiii: physical code of the called user (Liiii - in case of logical code)
yyyyy: name of the called user

## BUSY SIGNAL

When the switchboard performs a call or an auto-on function, but the system is busy, the following screen appears for 2 seconds:


## CALL FROM MAIN STATION

During the concierge service in DAY mode (interception of calls coming from main stations and call forwarding to apartment stations, if required), when the switchboard receives a call from a main call station, the following screen is displayed:

| eefiiiic |  |
| :--- | :--- |
| CALL FoR: | iiiii |
| yyyyyyyyyyyyyyyyyyy |  |
| yyyyyyyyyyyyyyyyy |  |
| 13/03/2010 | $15: 30: 30$ |

where:
ee: $\quad$ number of the main call station $(00 \div 03)$
$\mathbf{f}$ : is a symbol showing the status of communication; it can be:
... When the switchboard has not yet answered the call
$\rightarrow$ When the switchboard is in communication with the call station
$\Gamma$ When the switchboard is in communication with an apartment station
$\uparrow \quad$ When the switchboard has established a communication between the main call station and an apartment station.
iiiii: physical code of the called user (Liiii - in case of logical code)
yyyyyy: name of the called user
c: when the symbol BELL appears in this position, it means that the switchboard has not yet called the apartment station iiiii; if the attendant presses the button $\Omega$ (7), the user iiiii is directly called and this symbol disappears.
After receiving a call, the switchboard can call users by entering the code iiiii followed by the button $\Omega(7)$. When in this condition, the switchboard attendant will be able to:

- establish again a communication with the call station $\square_{\square}^{\circ}$ (9)
- call again the user $\S$ (4)
- establish a communication between the call station and the user $\downarrow$ 个 (6)
4 When in this last condition, the switchboard can not establish again a communication with the call station or with the user.

If the switchboard attendant has not yet answered the call coming from the call station, by pressing the auto-on button (10) the attendant can see images coming from the additional cameras connected to the main station.

## DOOR LOCK RELEASE FUNCTIONS

At any time, the switchboard allows to open any door associated to the main or secondary call station.

## Main entrance door opening

The following 2 conditions are possible:

## 1) After a call coming from a main call station:

when the switchboard is performing the concierge service in DAY mode and is in communication with a main call station, the attendant can:

- press the button $\mathbb{\square}$ (15) or the door lock release button on the handset to open the pedestrian door of the caller main station;
- press the button SHIFT (16) + $\mathbb{C}$ (15) to open the driveway gate of the caller main station.


## 2) In any other situation:

when the switchboard is NOT in conversation, to open the pedestrian door of a main call station press the button $\mathbb{N}$ code of the main call station $(0 \div 3)$ and press the button $\Omega(7)$ to open the door.

|  |  |
| :--- | :---: |
| MAIN DOOR.: | 2 |
| PRESS $\Omega$ TO OPEN |  |
| $13 / 03 / 2010 \quad 15: 30: 30$ |  |

- when the switchboard is NOT in conversation, to open the driveway gate of a main call station press the button SHIFT (16) + $\square \checkmark$ (15), enter the ID code of the main call station $(0 \div 3)$ and press the button $\Omega(7)$ to open the gate. The display is similar to the previous one.
- When the switchboard is NOT in conversation, to open the pedestrian door of a secondary call station press the button $\backsim \backsim$ (14) followed by the button $\Omega$ (7), enter the ID code of the secondary call station $(0 \div 3)$, enter the address of the secondary $(0 \div 1)$ and press the button $\Omega(7)$ to open the door..

|  |  |
| :--- | :---: |
| SEC. DOOR: | $15-0$ |
| PRESS $\Omega$ TO OPEN |  |
| $13 / 03 / 2010$ | $15: 30: 30$ |

In this example, the attendant has opened the door connected to the secondary call station with ID = 15 and secondary address 0 .

- When the switchboard is not in conversation, to open the driveway gate of a secondary call station press the button SHIFT (16) + Cu (14) followed by the button $\Omega(7)$, enter the ID code of the secondary call station $(0 \div 31)$, enter the address of the secondary and press the button $\Omega(7)$ to open the gate. The display is similar to the previous one.


## MANAGEMENT OF CODES FOR SPECIAL SERVICES

The switchboard is enabled to manage electric actuators by using decoders for special services Ref. 1083/80.
Press and keep the button "0" pressed for 3 s and enter the actuator special code ( $1 \div 255$ ); the display shows the following screen:


Confirm the command with the button $\Omega$ (7).
After the button $\Omega(7)$ has been pressed, the display returns to standby mode.
It also possible to use the function buttons (11), which can be programmed to directly activate special decoders (see in the chapter "Configuration" the paragraph "Function Buttons").

## OPEN DOOR INDICATIONS

The switchboard is provided with a led (3), used to indicate the status of doors of main and secondary call stations.
The feature depends on the status of the terminal pin SP in the call stations and needs an open door sensor.
The following operating states are possible:
led off: all main and secondary entrance doors are closed;
led on: on one or more main or secondary entrance doors, the door is open. The condition of open door is signalled by call stations only if this event lasts for at least 30 seconds.
When the led (3) is on, by pressing the button 狪 (3) the attendant can access the list of doors left open:

|  |  |
| :--- | ---: |
|  |  |
| SECONDARY: | $13-1$ |
| OPENED DOOR |  |
| $13 / 03 / 2010$ | $15: 30: 30$ |

In the example, the indication shows that the door of the secondary call station with ID = 13 and secondary address 1 is open.
Use the buttons $\triangle$ or (18) to scroll the list of open doors.

## AUTO-ON FUNCTION

The switchboard provided with an optional video module can perform the auto-on function on main call stations. This means that the switchboard attendant can establish a video connection (and also audio, if required) with a main call station even if no one has called him from that station.
To perform the auto-on function, press the button (10); the additional video module of the switchboard shows the image coming from the main call station with ID=0; to display images coming from the other additional cameras of the main station 0 and then images coming from other main call stations, press again the button (10). The display shows:

```
OO - SWTCHB
AUTO ON
13/03/2010 15:30:30
```

If the attendant wants to establish an audio communication with the main call station which is sending images, he can pick the handset up, as if the switchboard had been called.

## KEYPAD LOCK ACTIVATION / DEACTIVATION

If the attendant must leave his station, he can activate the keypad lock. To do this, press at the same time the buttons SHIFT (16) and X (13)


If the keypad is locked, the switchboard does not execute commands from the keypad, included DAY/NIGHT service switching and turning off. To deactivate the keypad lock, repeat the above described operation.
The keypad lock condition is kept even if the switchboard is unpowered and then powered.

## DATE/TIME ADJUSTMENT

Date and time can be configured/changed by pressing at the same time the buttons SHIFT (16) + $\bigvee(17)$. The display shows:


Date and time must be entered using the numeric keypad (12) as follows: Day/Month/Year/Hour/Minutes/Seconds.
After entering the last digit of seconds, confirm with the button $\Omega$ (7).

If date/time settings must not be changed, press the button $X$ (13) for 3 seconds.

## RINGER VOLUME

When the device is in standby mode, the ringer volume can be adjusted; for adjustment, keep the button SHIFT (16) pressed and select the desired volume $(1 \div 5)$ with the buttons $\triangle$ and $\nabla$ (18). During volume adjustment, the display shows the following screen:


CALL DIVERSION FUNCTION TO CORDLESS PHONE

It is possible to temporarily divert the switchboard call reception service (according to the operating status day/night) to a cordless phone connected to an interface Ref. 1083/67, suitably connected to the system and configured. To do this, press the function button SHIFT (16) + F1 or SHIFT (16) + F2 or SHIFT (16) + F3.
The function buttons F1, F2 and F3 must be previously programmed for the function.

The display shows:

|  |  |
| :--- | ---: |
|  |  |
| DIVERTED TO: |  |
| $13 / 03 / 2010$ | $15: 30: 30$ |

where:
ddddd is the physical code of the interface Ref. 1083/67 which manages the call diversion. In this condition, the telephone connected to 1083/67 can only answer the calls coming from apartment stations. If during diversion the switchboard operating status is "day", from this telephone the attendant can also answer calls coming from main call stations and open the door. In any case, calls can not be diverted to apartment stations.
With the function "call diversion to cordless phone" active, from the switchboard the attendant can only deactivate the function by pressing again the same button SHIFT (16) + button function which has activated the call diversion.


If the switchboard is configured with logical codes, in all screens with user codes, these are displayed with their logical code preceded by "L". If the code can not be displayed, the respective physical code is displayed (i.e. without the prefix "L").
For example, if a call is received from the main station 1 which has called the user of the column 14 with dip switch set to value 123:

- if the received physical code 14123 in the switchboard directory is associated to the user ROSSI with logical code 1000, the display shows:

```
01 - L1000
CALL FOR: L1000
ROSSI
13/03/2010 15:30:30
```

- if the received physical code 14123 in the switchboard directory is NOT associated to any user, the display shows:

| $01-14123$ |
| :---: |
| CALI FOR: 14123 |
| 13/03/2010 $15: 30: 30$ |

## CONFIGURATION

To access the configuration menu, keep the button SHIFT (16) pressed and press repeatedly and quickly the button $\oint_{y}$ (4). The first screen displayed is the screen for selecting the language.

To quit configuration, keep the button $X$ (13) for 3 seconds in any screen.
However, the switchboard quits the configuration mode for timeout after 300 seconds of inactivity.

## LANGUAGE

In this screen the language of switchboard interface can be selected.


## BUSY TIME

The value set in this screen defines the assured communication time, starting from the moment of the answer to a call.

```
    BUSY TIME
        1 0
(1,10,20,30,...,70S)
```

To change the busy time, use the buttons $\triangle$ and $\triangle$ (18). 8 different timings can be set: 1 s , $10 \mathrm{~s}, 20 \mathrm{~s}, 30 \mathrm{~s}, 40 \mathrm{~s}, 50 \mathrm{~s}, 60 \mathrm{~s}, 70 \mathrm{~s}$. This value must be the same as that configured in system call stations.
When the busy time has been selected, press the button $\Omega(7)$ to confirm and go to the next screen.

## MONITOR PRESENCE

In this screen, it can be specified if the optional additional monitor is present or not. Allowable values are $0=\mathrm{NO}$ (no additional video module) and $1=$ YES (presence of additional video module).

```
MONITOR
    1
(0=NO
    1=YES)
```

To set this parameter, use the buttons $\triangle$ and $\triangle$ (18) and press the button $\Omega(7)$ to confirm and go to the next screen.

## SYSTEM CONFIGURATION

| IN | RISER |
| :---: | :---: |
| 0 |  |
| ( $0=\mathrm{NO}, 1=\mathrm{YES})$ |  |

Set YES with the buttons and (18) only if the switchboard is installed in a one-riser system in the following cases:

1) system with 0, 1, 2, 3 or 4 main stations (with interface Ref. 1083/75, if present) without secondary stations and without column interfaces Ref. 1083/50;
2) system with a single column interface Ref. 1083/50 without connection LINE IN and with $0,1,2$ call stations.

Press the button $\Omega(7)$ to confirm and go to the next screen.


System configuration
in riser = YES

call stations

System configuration
in riser = YES

main call stations

System configuration
in riser = NO



## CALL REPEAT ( $\mathrm{S}^{+}, \mathrm{S}$-)

In this screen the user can define if the ringer repeat must be activated or not and if this must be activated only for special call types; the following screen appears:

| $\mathrm{S}+\mathrm{S}=$ |
| :---: |
| $(0=\mathrm{NO}, 1=\mathrm{EX}, 2=I N, 3=A)$ |

The values selectable with the buttons $\triangle$ and $\nabla$ (18) are:
0 call repeat on S+ and S- disabled
1 call repeat on S+ and S- enabled only for calls coming from main call stations
2 call repeat on S+ and S- enabled only for calls coming from apartment stations
3 call repeat on S+ and S- enabled for all the calls
Press the button $\Omega(7)$ to confirm and go to the next screen.

## COMMUNICATION INTERRUPTION

In this screen the user can define if the interruption of a call during offhook waiting time or assured communication time must be enabled or not.
During a call, a conversation, or an auto-on function with or without audio, the involved column or, more in general, the system devices in busy state, can be interrupted or not by a call coming from a call station, according to the configuration of this switch.

```
INT. COMM.
    0
    (0=NO 1=YES)
```

To set this parameter, use the buttons and (18) and press the button $\Omega(7)$ to confirm and go to the next screen.
This value must be the same as that configured in system call stations.

## POWER-ON PASSWORD

In this screen the user can set the password required when the switchboard is turned on.


Press the button $X$ (13) to delete the current password and enter the new one, using the numeric keypad (12). The password can be composed by 6 numeric characters max.
If the user does not want to protect the switchboard power-on with a password, set it to 000000.
When the parameter has been configured, press the button $\Omega(7)$ to confirm and go to the next screen.

## USER CODES TYPE

In this screen it is possible to configure the user code type, physical or logical.

- Physical code: users are called with a 5-digit code as follows: ccnnn, where cc indicates the riser column (from 00 a 31) and nnn indicates the number of the apartment (from 000 a 127)
- Logical code: users are called with a a number of 1 to 4 digits from 1 to 9999. To use the logical codes, the names must be programmed, assigning the logical call code to the physical code of the apartment.

CONCIERGE SWITCHBOARD

## CODE TYPE

0
(0=PHYSIC, 1=LOGIC)

To set this parameter, use the buttons $\triangle$ and $\triangle$ (18) and press the button $\Omega(7)$ to confirm and go to the next screen.
In order to use logical code type, each code must be associated to a physical code in the directory..

## TASTI FUNZIONE

In the switchboard there are 6 programmable function buttons (11). The following codes can be associated to each function button:

- a special code to activate the special decoder Ref. 1083/80
- a code used to divert a call to a telephone managed by the interface Ref. 1083/67
For each of the 6 function buttons the setting screen is the following:

| BUI |
| :---: | :---: | :---: | :---: |
| $(0=N O, 1=S P E C, 2=T E L)$ |

To configure this parameter use the buttons $\triangle$ and $\nabla$ (18):

- if the value 0 is selected, no special function will be assigned to the button,
- if the value 1 is selected, the function of special code sending will be associated to the button and the display shows the following screen:


Enter the special code to be associated to the button ( $1 \div 255$ ) and press the button $\Omega(7)$ to configure the next function button;

- if the value 2 is selected, the call diversion function will be associated to the button and the display shows the following screen:


Enter the physical code which is the diversion destination and press the button $\Omega(7)$ to configure the next function button. This function is available only for buttons F4, F5, F6.

The same procedure can be used to program the remaining 5 function buttons.

## NAME MANAGEMENT

| NAMES |
| :---: |
| (1=INS, $2=$ MOD, $3=$ DEL $)$ <br> $(0=C L E A R ~ A L L) ~$ |

In this screen the user can enter, change or delete a user from the device.

- To enter a name, select (1) on the numeric keypad (12)


## NAME INS.

PHY:00012 LOG:1000
ROSSI
PAOLO

With the alphanumeric keypad enter the physical code followed by the button $\Omega(7)$, the logical code (this one is not requested if the device is programmed to operate with physical codes) followed by the button $\Omega$ (7) and then enter the user name using the numeric keypad as it was the keypad of a mobile.

| Button | 1 touch | 2 touches | 3 touches | 4 touches | 5 touches |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Blank | 1 |  |  |  |
| 2 | A | B | C | 2 |  |
| 3 | D | E | F | 3 |  |
| 4 | G | H | I | 4 |  |
| 5 | J | K | L | 5 |  |
| 6 | M | N | O | 6 |  |
| 7 | P | Q | R | S | 7 |
| 8 | T | U | V | 8 |  |
| 9 | W | X | Y | Z | 9 |

Symbols can be selected with the buttons $\triangle$ and $\boxed{\square}$ (18).
When all data have been entered, press the button $\Omega(7)$ to confirm.
When names are being entered, the following configurations are not accepted by the system

- 2 users with the same name
- In logical code mode, enter 2 users with different physical code and the same logical code.
- To change a name, select (2) on the numeric keypad (12):


## NAME MOD. 0001/0083

PHY:00012 LOG:1000
ROSSI
PAOLO

The progressive number of the current name and the total number of names stored in the memory appear in the second row.
Scroll the list using the buttons and (18) and press the button $\Omega(7)$ to select the name to be changed. Follow the same procedure described in the section concerning name entering.
When all data have been entered, press the button $\Omega(7)$ to confirm and store data or press $X$ (13) to delete.

- To delete a name, select (3) on the numeric keypad (12):


## DEL. NAME 0001/0083

PHY:00012 LOG:1000 ROSSI

PAOLO

Scroll the list using the buttons $\triangle$ and (18) and select the name to be deleted, then press the button $\Omega$ (7). After a confirm request, the name will be deleted.

- To delete all the list stored in the memory, select (0) on the numeric keypad (12) and the display will show the following screen for name deleting:


## LIST DEL.

DELETE ALL NAMES?
( $0=\mathrm{NO}, 1=\mathrm{YES}$ )
Press (1) on the numeric keypad (12) to delete all the names or (0) to cancel the operation and return to the initial screen.
L'The configuration is kept even if the list is deleted

## DIAGNOSTIC SERVICES (POLLING)

This screen allows to poll apartment stations (AS), main call stations (MCS) and secondary call stations (SCM) present in the system:

|  | POLLING |
| :---: | :---: |
|  | ( $0=$ NO POLLING <br> $1=$ AS, $2=\mathrm{MCM}, 3=S C M$ ) |

If the value 0 is entered, no query is performed and the switchboard returns to the beginning of the configuration menu.
By selecting with the buttons $\triangle$ and (18) the value 1, the following screen is displayed:

```
    AS POLL.
    PHYSICAL CODE:.....
    INTERNAL CODE:
```

Enter the apartment station physical code, press the button $\Omega(7)$, enter the internal code and press the button $\Omega(7)$ to poll the device; after few seconds, the display will show the device status and FW version:

## AS POLL.

PHYSICAL CODE: 21000
INTERNAL CODE.: 1
PRESENT FW: 3.0
or, if the device has not answered:
AS POLL. PHYSICAL CODE: 21000 INTERNAL CODE.: 1

ABSENT ! !

- By selecting with the buttons and (18) the value 2, the display shows the following screen:


Enter the ID code of the secondary call station, press the button $\Omega$ (7) to poll the device; after few seconds, the display will show the device status and FW version:

MCM POLL.

PRESENT FW: 3.0
or, if the device has not answered:


ABSENT ! !

- By selecting with the buttons $\triangle$ and $\nabla$ (18) the value 3, the display shows the following screen:


Enter the ID code of the secondary call station, press the button $\Omega$ (7), enter the address and press the button $\Omega$ (7) to poll the device; after few seconds, the display will show the device status and FW
version:

| SCM | POLI. |  |
| :---: | :---: | ---: |
| ID CODE: |  | 03 |
| ADDRESS: |  | 0 |
| PRESENT FW: | 3.0 |  |
|  |  |  |

or, if the device has not answered:

| SCM POII . |  |
| :---: | ---: |
| ID CODE : |  |
| ADDRESS : |  |
| ABSENT ! ! |  |
|  |  |
|  |  |

## DEFAULT VALUES AND RESTORE

The switchboard factory defaults are:
Language: Italian
Busy time: 30 sec .
Monitor presence:
System configuration:
Call repeat:
Communication interruption:
Power-on password:
User code type:
Function buttons:
no
no
disabled
no
no (000000)
physical
not programmed
To restore these values, unpower the switchboard, keep the buttons X , 8,6 pressed and power the switchboard on waiting for few seconds.
This operation does not delete the name directory.

## PROGRAMMING VIA PC

The switchboard is provided with a USB port for easy programming of configuration data and name directory.
Access the configuration menu by keeping the button SHIFT (16) pressed and pressing repeatedly and quickly the button $\S_{1}$ (4).
Connect the switchboard to the PC where the software 2Voice_PC has been installed (it can be downloaded from www.urmetdomus.it) and perform the programming procedure described in the instruction manual of 2Voice_PC software.


# POWER SUPPLY UNITS AND VARIOUS DEVICES 

## SECTION CONTENTS

| SYSTEM POWER SUPPLY Ref.1083/20 | 2 |
| :--- | ---: |
| 4-USER DISTRIBUTOR Ref.1083/54 -/55 | 3 |
| COLUMN INTERFACE Ref.1083/50 | 4 |
|  |  |
| DOOR UNITS INTERFACE Ref.1083/75 | 5 |
| SPECIAL DECODER Ref. 1083/80 | 6 |
| CONTROL CAMERAS DEVICE Ref. 1083/69 | 11 |
| CCTV BUS INTERFACE Ref. 1783/69 | 12 |
| SAFETY TRANSFORMER Ref. 9000/230 | 15 |
| DPDT MONOSTABLE RELAY Ref. $788 / 52$ | 15 |
| SYSTEM CABLES | 16 |
| POWER LINE PROTECTION DEVICE | 16 |

POWER LINE FILTER 230VAC 4000VA Ref.1332/86 ..... 17
VIDEO SWITCH 4 IN - 1 OUT Ref.1038/69 ..... 18

## SYSTEM POWER SUPPLY

Ref.1083/20 ( $\subset$ (1ㅏ)


The power supply unit Ref. 1083/20 is dedicated to 2VOICE system. It provides power supply for system devices.
According to system type, several power supply units are needed:

- In systems with only one riser column and only one call station, one power supply unit is enough.
- For each column interface Ref. 1083/50, one power supply unit must be added.
- For each door unit interface Ref. 1083/75, 2 power supply units must be added.

The following table contains the number of needed power supply units, according to the system type and the number of devices to be installed, following indications in chapters 1 and 2.

| Call stations |  | No. of column interfaces Ref. 1083/50 | No. of door units interfaces Ref. 1083/75 | No. of columns (K) | Max. No. of users | No. of power supplyunits |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| main | secondary |  |  |  |  |  |
| 1 | 0 | 0 | 0 | $1{ }^{*}{ }^{*}$ | 128 | 1 |
|  |  | 1 | 0 | 1 | 128 | 1 |
|  |  | 0 | 1 | 1 | 128 | 2 |
|  | 1 | 1 | 0 | 1 | 128 | 1 |
|  | Max $2 \times \mathrm{K}$ | K | 0 | Max 16 | $128 \times \mathrm{K}$ | $1+\mathrm{K}$ |
|  |  | K | 1 | Max 32 | $128 \times \mathrm{K}$ | $2+\mathrm{K}$ |
| 2 | 0 | 1 | 0 | 1 | 128 | 1 |
|  |  | 0 | 1 | 1 | 128 | 2 |
|  | Max $2 \times \mathrm{K}$ | K | 1 | Max 32 | $128 \times \mathrm{K}$ | $2+\mathrm{K}$ |
| 3 | 0 | 0 | 1 | 1 | 128 | 2 |
|  | Max $2 \times \mathrm{K}$ | K | 1 | Max 32 | $128 \times \mathrm{K}$ | $2+\mathrm{K}$ |
| 4 | 0 | 0 | 1 | 1 | 128 | 2 |
|  | Max $2 \times \mathrm{K}$ | K | 1 | Max 32 | $128 \times \mathrm{K}$ | $2+\mathrm{K}$ |

(*) on one riser only
The system power supply unit can power the backlight of all name holders for the button panel: present in the system on condition that each one has 32 name holders max. If in the push button panel there are more than 32 name holders, an additional suitable power transformer must be used.

## TECHNICAL CHARACTERISTICS

| Power supply: | 230Vac $+/-10 \% 50 / 60 \mathrm{~Hz}$ |
| :--- | ---: |
| Power: | 80 W |
| Output: | 48 Vdc |
|  | With electronic overload protection |
| Operating temperature range: | $-10^{\circ} \mathrm{C} \div+35^{\circ} \mathrm{C}$ |
| Compliant with: | EN $61000-6-3$ |
|  | EN 61000-6-1 |
|  | EN60065 |
| Weight: | about 1000 g |

## INSTALLATION

The housing can be DIN bar or wall mounted with screws and screw anchors. However, the power supply must be kept in dry places, protected against bad weather, observing safety regulations

## TERMINAL PINS DESCRIPTION


Pins LINE1 e LINE2 are in parallel.

This device allows to split the column video signal to 4 apartment stations and other distributors.
The device is provided with an input, a passing output and 4 derived outputs.
The distributor Ref. 1083/55 also includes a PTC protection to prevent damages caused by short circuits on derived lines.

## TECHNICAL CHARACTERISTICS

Power supply voltage:
Max. current consumption:
Operating temperature range:
Compliant with:
$36 \div 48 \mathrm{Vdc}$ 9,0mA max
$-5^{\circ} \mathrm{C} \div+45^{\circ} \mathrm{C}$
EN 61000-6-3 EN 61000-6-1

## INSTALLATION

The device can be installed in junction boxes. Keep it in dry place, protected against bad weather.

In each column can be installed up to 32 distributors, but in case of connection of apartment stations on the passing output, the number of devices connected on the riser must be reduced to 16.


5 It is not to suggested to connect in cascade the distributors.


## TERMINAL PINS DESCRIPTION

LINE IN 2 terminal pins for data line input
LINE OUT 2 terminal pins for data line output
LINE 1 2 terminal pins for apartment station derived number 1
LINE 22 terminal pins for apartment station derived number 2
LINE 32 terminal pins for apartment station derived number 3
LINE 42 terminal pins for apartment station derived number 4

## LINE TERMINATION



On the device there is a jumper for line termination, that must be put in ON position only on the last distributor where the output line is not connected (LINE OUT).


## OPERATION

In case of short circuit on a derived line, only devices on that line will not work (excluded); the other system devices will keep on operating properly.


L\% After removing the cause of the short circuit, to restore PTC protection, disconnect the cable connected to LINE IN pins for about 60".

COLUMN INTERFACE

## COLUMN INTERFACE Ref. 1083/50 ( $\epsilon$



The column interface Ref. 1083/50 is dedicated to 2VOICE system. It is used to split a column into several risers or to connect up to 32 independent columns in the system
Each interface can manage one column, with 128 apartment stations max. and 2 call stations max., directly connected to the interface.
The device is also equipped with a normally open relay contact, that switches for one second each time the door lock release button is pressed in an apartment station of that column.
5 The column interface must always be powered by a system power supply unit.

## TECHNICAL CHARACTERISTICS

Power supply voltage (LINE IN):
Power supply voltage (POWER):
Standby current consumption (LINE IN):
Max. current consumption (LINE IN):
Standby current consumption (POWER):
Max. current consumption (POWER):
Operating temperature range:
Compliant with:
Max. AUX switched load:
$36 \div 48 \mathrm{Vdc}$
$36 \div 48 \mathrm{Vdc}$
25mA max
70mA max
30mA max
100mA max
$5^{\circ} \mathrm{C} \div+45^{\circ} \mathrm{C}$
EN 61000-6-3
EN 61000-6-1
100mA@60V

## DEFAULT PROGRAMMING

Column interfaces are factory preset as follows:
Incoming line (dip-switch 1):
Column interface number:
ON (not connected)
ON

## INSTALLATION

The housing can be DIN bar or wall mounted with screws and screw anchors. However, the interface must be kept in dry places, protected against bad weather, observing safety regulations.

## TERMINAL PINS DESCRIPTION

| $Z$ | 2 terminal pins for line termination |
| :--- | :--- |

LINE IN 2 terminal pins for data line input
LINE OUT 2 terminal pins for data line output
INO 2 terminal pins for call station connection
IN1 2 terminal pins for call station connection
POWER 2 terminal pins for device power supply (with system power supply unit)
LINE 12 terminal pins for riser 1 of the apartment stations column

LINE 22 terminal pins for riser 2 of the door units column

LINE 3
LINE 42 terminal pins for riser 4 of the door units column
AUX $\quad 2$ pins for normally open relay contact (max 100mA @ 60Vdc)

くThe 128 apartment stations can be installed in any of the 4 risers that compose the column.

## CONFIGURATION

On the device there are 6 configuration dip-switches with the following functions:
DIP 1: if there are devices connected to LINE IN, it must be set to OFF, otherwise it must be set to ON.


DIP $2 \div$ 6: used to program the column unique code, with values between 0 and 31 .

To set the desired code use the dip-switch from 2 to 6 ( $2=$ more significant bit - $6=$ less significant bit).


## LINE TERMINATION

By opening the jumper between the pins $Z$, the line termination is removed. The termination must be active in all the devices cabled at the end of a line, i.e. when there is a line on the LINE IN input and there is no output line on the LINE OUT pins.


DOOR UNITS INTERFACE
Ref.1083/75 C $\epsilon$


The door units interface Ref. 1083/75 is dedicated to 2VOICE system and is used to connect from 1 to 4 main call stations (INO $\div$ IN3). It is equipped with 4 output lines (LINE1 $\div$ LINE4) for columns connection.
On the output lines can be directly connected up to 128 apartment stations. To connect more than 128 apartment stations and for secondary call stations connection, column interfaces must be used. The output lines must be homogeneous: it is not allowed to connect a column interface to one riser and apartment stations directly to other risers.



4
The door units interface always needs 2 system power supply units Ref. 1083/20, one for call stations and the other for output lines.

## TECHNICAL CHARACTERISTICS

Power supply voltage (POWER IN):
$36 \div 48 \mathrm{Vdc}$
Power supply voltage (POWER LINE):
$36 \div 48 \mathrm{Vdc}$
Power supply voltage (POWER IN):
Max. current consumption (POWER IN):
Standby current consumption (POWER LINE):
Max. current consumption (POWER LINE):
Operating temperature range:
Compliant with:
30mA max
100mA max
25mA max
70mA max
$-5^{\circ} \mathrm{C} \div+45^{\circ} \mathrm{C}$
EN 61000-6-3
EN 61000-6-1

## INSTALLATION

The housing can be DIN bar or wall mounted with screws and screw anchors. However, the power supply must be kept in dry places, protected against bad weather, observing safety regulations.

## TERMINAL PINS DESCRIPTION

POWER IN $\quad 2$ terminal pins for call stations power supply (with system power supply unit)
INO $\quad 2$ terminal pins for main call station 0 connection
IN1 2 terminal pins for main call station 1 connection
IN2 2 terminal pins for main call station 2 connection
IN3 2 terminal pins for main call station 3 connection
POWER LINE 2 terminal pins for riser power supply, street side (with system power supply unit)
LINE $1 \quad 2$ terminal pins for riser 1 of apartment stations column or for street side riser
LINE 22 terminal pins for riser 2 of apartment stations or for street side riser
LINE $3 \quad 2$ terminal pins for riser 3 of apartment stations or for street side riser
LINE $4 \quad 2$ terminal pins for riser 4 of apartment stations or for street side riser
4 On the outputs lines can be connected up to 32 column interfaces.

## SPECIAL DECODER Ref. 1083/80



The special decoder Ref. 1083/80 is dedicated to 2Voice system and allows to activate electric loads by means of a 230 Vac 5 A contact relay with commands sent by users with apartment stations, call stations or switchboard.
Device main features are:

- Monostable operating mode with activation time adjustable from 1 second to 16 minutes, or toggle mode.
- Activation with system events (4 max.) programmable by the installer.
- A remote button can be connected for activation.


A - User code dip-switch used to identify the decoder in the system
B - Competence area jumpers:
$S$ = only the device used to acquire the event
$C=$ all devices of the riser column used to acquire the event
$\mathrm{Q}=$ any system device
C - Switch mode jumper
$M=$ monostable
T = toggle
D - Programming button and led
E - Trimmer used to adjust the activation timer in monostable mode (M)

F - Remote button connection terminal pins (PC)
G - Line connection terminal pins (LINE)
H - Terminal pins of relay contact used to activate electric loads (C-NC-NA)

## TECHNICAL SPECIFICATIONS

Power supply voltage:
$36 \div 48 \mathrm{Vdc}$
Current consumption in standby:
Max. current consumption:
Operating temperature range: 3,0mA max
30mA max
Compliant with:
$-10^{\circ} \mathrm{C} \div+50^{\circ} \mathrm{C}$
C-NC-NA contact switching:
EN 61000-6-3, EN 61000-6-1
30Vcc 5A
250Vca 5A

## CONFIGURATION

## DEFAULT PROGRAMMING

All decoders are configured in factory as follows:


SCQ jumper
$=$ position Q (all devices can activate the decoder)
M/T jumper
CODE dip-switch
timer
programmed event
= position M (monostable)
= user 127 (dip1 OFF dip $2 \div 8$ ON)
$=1$ second
$=$ call to switchboard from user 0 , column 0 , apartment station

With the factory configuration, all system users (SCQ jumper = Q) can activate the decoder in monostable mode ( $\mathrm{M} / \mathrm{T}$ jumper $=\mathrm{M}$ ) by pressing the 'call to switchboard' button.
To restore default programmed events, press and keep the programming button pressed for 5 seconds. During this time the red led turns on and when it turns off the decoder will restore default configurations.

## INSTALLATION

The special decoder can be installed in a service panel on DIN rail (6 18 mm DIN modules) or wall mounted with screws and screw anchors (not provided).
For installation, follow general installation instructions of 2Voice system in the system booklet provided with the power supply ref. 1083/20.
Please observe also the following rules:

- The special decoder can be installed only using the 4-user distributor 2Voice ref. 1083/55; connect it to one of the 4 distributor outputs.
- In-out connection is not allowed. The decoder must always be connected as last device of a branch.
- Between the door units interface ref. 1083/75 and the column interface ref. 1083/50 only 2 special decoders can be connected.
- If connected to the column, the decoder must be counted within the max. number of apartment stations that can be connected, according to the different system types.

4. For panic alarm signal to the switchboard, the decoder must be installed in the column.

## SWITCHING MODE



The relay contact can be switched in two modes:

- Monostable - after a programmed event for activation or after the remote button connected to PC terminal pins is pressed, the relay contact switches for a variable time of 1 second to 16 minutes; this time can be programmed with the trimmer "timer".
- Toggle - after an activation due to a programmed event or after the remote button connected to PC terminal pins has been pressed,


## SPECIAL DECODER

the relay contact switches and the trimmer position is irrelevant; the relay keeps this state until a new command is received.

Switching mode: monostable


Switching mode: toggle


L
In case of power supply interruption, the relay contact doesn't switch its position.
When power supply is restored, if the special decoder is in monostable mode the contact goes back to standby position, if in toggle mode the contact keeps the position assumed before power supply interruption.

To test the activation time in monostable mode, short circuit temporarily the terminal pins PC and check the relay activation time.

## OPERATING MODE

The special decoder must be properly configured and programmed: its relay can be activated by an event, if this is included in the programmed ones and matches the configuration.
The programmable events (4 max.) that will activate the relay (in monostable or toggle mode as configured with the jumper $\mathrm{M} / \mathrm{T}$ ) can be the following:

- pedestrian door lock release button pressed in apartment station
- driveway door lock release button pressed in apartment station
- 'call to switchboard' button pressed in apartment station
- special function button pressed in apartment station
- intercom call from apartment station to special decoder
- sending of pedestrian door lock release command from switchboard
- sending of driveway door lock release command from switchboard
- sending of special code from call station or switchboard

Alternatively to the above described operation mode, the special decoder can be used to send the alarm indication to the concierge switchboard by pressing the remote button (PC). In this case, the dipswitch 1 must be in ON position.

## EVENTS PROGRAMMING IN STANDARD OPERATING MODE (DIP 1 = OFF)

1 to 4 events can be programmed, which will activate the special decoder relay, according to the configuration performed with dipswitches and jumpers.
1 - Press the programming button and release it when the led turns on.
2 - Generate the first event that the special decoder must acquire (for example, press the door lock release button of a system apartment station).
3 - The led blinks once to indicate that the first event has been programmed. The led stays on to indicate that the special decoder is still in programming phase.
4 - Generate the other events which the special decoder must acquire. For each event the led will blink for the same number of times as the events programmed: 2 times for the second event, 3 for the third. After programming the fourth event, the led will turn off to indicate the exit from programming mode.
5 - If the installer doesn't want to program different events, generate the same event for 4 times.

0In case of no events reception for a time greater than 5 minutes, the special decoder automatically quits the programming mode and turns the led off (the events already acquired stay stored).

Programming details and behaviour of the special decoder for each single programmable event are described below.

## EVENT: PEDESTRIAN DOOR LOCK RELEASE BUTTON FROM APARTMENT STATION

Program the event by pressing the pedestrian door lock release button of an apartment station, which must activate the special decoder relay (see paragraph about events programming).
Assume that this apartment station is in the column number "Column ID" and has user code "CODE".

When the programming procedure has been performed, the relay is activated according to the position of the jumper SCQ:

- Position Q: the pedestrian door lock release button of any system user activates the decoder.
- Position C: the pedestrian door lock release button of any user of the column "Column ID" activates the decoder.
- Position S: the pedestrian door lock release button of all apartment stations (also those in parallel) of the user in the column "Column ID" and user code "CODE" (the one used to acquire the event) activates the decoder.

Lb
The position of special decoder dip-switches CODE is irrelevant for the operation with pedestrian door lock release button.

EVENT: DRIVEWAY DOOR LOCK RELEASE BUTTON FROM APARTMENT STATION
Program the event by pressing the driveway door lock release button of an apartment station, which must activate the special decoder relay (see paragraph about events programming).
Assume that this apartment station is in the column number "Column ID" and has user code "CODE".
When the programming procedure has been performed, the relay is activated according to the position of the jumper SCQ:

- Position Q: the driveway door lock release button of any system user activates the decoder.
- Position C: the driveway door lock release button of any system user in the column "Column ID" activates the decoder.
- Position S: the driveway door lock release button of all apartment stations (also those in parallel) of the user in the column "Column ID" and user code "CODE" (the one used to acquire the event) activates the decoder.

3
The position of special decoder dip-switches CODE is irrelevant for the operation with driveway door lock release button.

## EVENT: ‘CALL TO SWITCHBOARD BUTTON FROM APARTMENT

 STATIONProgram the event by pressing the 'call to switchboard' button of an apartment station, which must activate the special decoder relay (see paragraph about events programming).
Assume that this apartment station is in the column number "Column ID" and has user code "CODE".

When the programming procedure has been performed, the relay is activated according to the position of the jumper SCQ:

- Position Q: the 'call to switchboard' button of any system user activates the decoder
- Position C: the 'call to switchboard' button of any system user in the column "Column ID" activates the decoder.
- Position S: the 'call to switchboard' button of all apartment stations (also those in parallel) of the user in the column "Column ID" and user code "CODE" (the one used to acquire the event) activates the decoder.

LThe position of special decoder dip-switches CODE is irrelevant for the operation with 'call to switchboard' button.

## EVENT: ‘SPECIAL FUNCTIONS' BUTTON FROM APARTMENT

 STATIONProgram the event by pressing a 'special function' button of an apartment station, which must activate the special decoder relay (see paragraph about events programming).
Assume that this apartment station is in the column number "Column

ID", has user code "CODE" and the number of the special function associated to that button is "SPEC".

When the programming procedure has been performed, the relay is activated according to the position of the jumper SCQ:

- Position Q: the 'special function' button "SPEC" of any system user activates the decoder.
- Position C: the 'special function' button "SPEC" of any system user in the column "Column ID" activates the decoder.
- Position S: the 'special function' button "SPEC" of all apartment stations (also those in parallel) of the user in the column "Column ID" and user code "CODE" (the one used to acquire the event) activates the decoder.

5
The position of special decoder dip-switches CODE is irrelevant for the operation with 'special function' button.

## EVENT: INTERCOM CALL FROM APARTMENT STATION

- Assign to the special decoder a user code from 0 to 127 using dip-switches CODE; in the system special decoders must not have the same user code as other devices (apartment stations or other decoders), even if belonging to different columns.
5
To set the desired code use dip-switches CODE from 2 to 8 (2=most significant bit - 8=least significant bit); the dip-switch 1 must be OFF.
- Program the buttons of concerned apartment stations to perform a direct intercom call to the previously configured special decoder:
- Go to the apartment station to be programmed.
- Keep the door lock release button and pick the handset up. The apartment station emits a tone to indicate the access to programming mode.

- Press the button to be programmed; the apartment station emits a confirmation tone.

- Go to the special decoder and press the programming button until the red led turns on, then release the button
- The apartment station in programming mode emits a beep to confirm the programming.
- Press again the programming button of the special decoder until the red led turns off.
- Hang up the apartment station handset, that emits a beep to confirm the exit from programming mode.
- Program the event by pressing the intercom call button of an apartment station that must activate the special decoder relay (see paragraph concerning events programming).
Assume that this apartment station is in the column number "Column ID" and has a user code "CODE".

When the programming procedure has been performed, the relay is
activated according to the position of the jumper SCQ:

- Position Q: the intercom call button of any system user activates the decoder.
- Position C: the intercom call button of any system user in the column "Column ID" activates the decoder.
- Position S: the intercom call button of all apartment stations (also those in parallel) of the user in the column "Column ID" and user code "CODE" (the one used to acquire the event) activates the decoder.


## EVENT: PEDESTRIAN DOOR LOCK RELEASE COMMAND FROM

 SWITCHBOARDProgram the event by sending a pedestrian door lock release command from the switchboard (see paragraph about events programming).

When the programming has been performed, the relay is activated each time a pedestrian door lock release command is sent from the switchboard.

5The position of dip-switches CODE and jumpers SCQ of special decoder is irrelevant for the operation with pedestrian door lock release command from switchboard.

## EVENT: DRIVEWAY DOOR LOCK RELEASE COMMAND FROM

 SWITCHBOARDProgram the event by sending a driveway door lock release command from the switchboard (see paragraph about events programming). When the programming has been performed, the relay is activated each time a driveway door lock release command is sent from the switchboard.

4The position of dip-switches CODE and jumpers SCQ of special decoder is irrelevant for the operation with driveway door lock release command from switchboard.

## EVENT: SPECIAL CODES COMMAND FROM CALL STATION OR SWITCHBOARD

Program the event by sending a special code "SPEC" from a call station or from the switchboard that must activate the special decoder relay (see paragraph about events programming). The device from which the special code is sent can be a secondary call station in the column number "Column ID", a main call station or a switchboard.

When the programming has been performed, the following events will occur:

- Sending of special code "SPEC" from the switchboard activates the decoder.
- Sending of special code "SPEC" from a main call station activates the decoder.
- Sending of special code "SPEC" from a secondary call station activates the decoder, according to the position of jumper SCQ:
- Position Q: Sending of special code "SPEC" from any secondary call stations activates the decoder.
- Position C or S: Sending of special code "SPEC" from any secondary call stations in the column "Column ID" activates the decoder.
4 The position of special decoder dip-switches CODE is irrelevant for the operation with special functions buttons
Urmet SPECIAL DECODER


## OPERATING MODE TO SIGNAL PANIC ALARM TO SWITCHBOARD (DIP1 = ON)

5 This function can be used in systems provided with concierge switchboard with software version 3.1 or higher.

In this operating mode the special decoder must be programmed as follows:
1 - Move the dip-switch 1 in position ON
2 - Assign to the special decoder a user code from 0 to 127 using dip-switches CODE
4
To set the desired code use dip-switches from 2 to 8 (2 = most significant bit - $8=$ least significant bit).
The user code can be the same used in apartment stations of the same apartment.

When the programming has been performed, by pressing the remote button (PC) a panic alarm is sent to the switchboard, with indication of the column where the decoder is installed and the programmed user code (CODE).
At the same time the relay is activated, according to the configurations of the toggling mode.

## OPERATION EXAMPLES

Operation example if the following events are programmed:

- Pedestrian door lock release button pressed from an apartment station;
- Gate door lock release button pressed from an apartment station;
- "Call to switchboard" button pressed from an apartment station;
- "Special functions" buttons pressed from an apartment station;
- Intercom call from an apartment station (*).
(*) the event will be active on all the devices where the intercom call to user 127 has been programmed.




## CONTROL CAMERAS DEVICE Ref. 1083/69



The video switch Ref. 1038/69 is a device which can be used to perform the auto-on function on 4 control cameras connected to a call station.
Press several times the auto-on button on a video door phone apartment station; the display will show the images coming from the call station camera and those of the cameras directly connected to the call station, then the images coming from cameras connected to the switch, in cyclic mode.
If in the system there are other call stations, after the cameras connected to the switch, the image displayed will be the one coming from other stations.
Each time the auto-on function is performed, the cycle always starts from the main call station camera IDO.

The device can not only switch the video signal, but also cameras power supply, allowing to power one only camera at a time.

## ELECTRICAL SPECIFICATIONS

Power voltage (+V, OV):
Max. current consumption:
(+12, 0V): $12 \mathrm{Vcc} \pm 10 \%$ (max. current 50 mA$)$ Power supply voltage ( $\mathrm{R} 2, \mathrm{OV}$ ):
$12 \mathrm{Vcc} \pm 10 \%$ (max. current 2A)
Working temperature range:
from -5 to $+50^{\circ} \mathrm{C}$
Humidity:
Maximum distance between button contacts and
terminals (RES)
300m

## INSTALLATION

The housing can be mounted on a DIN rail or wall mounted with screws and screw anchors; however, the device must be kept in dry places, protected against bad weather, observing safety regulations.

To power the video switch, it is suggested to use the power supply Ref. 789/2; its characteristics and installation modes are described in "Door phone - Video door phone products Technical Manual" in the section "Power supply, Relays, Various Devices".

## TERMINAL PINS DESCRIPTION

RE; OV input for camera 1 activation referred to 0 V
RF; OV input for camera 2 activation referred to 0 V
RG; OV input for camera 3 activation referred to $0 V$
RH; OV input for camera 4 activation referred to OV
R2; OV power supply input for cameras
+V; OV power supply input for video switching 18Vcc
+12; OV power supply input for video switching 12Vcc
AU; BU video signal output for the monitor with differential connection
AU; V5 video signal output for the monitor with coaxial connection

A5; B5 differential video signal input, pass through
A5; V5 coaxial video signal input, pass through
RES; OV input used to reset the switch position among cameras, referred to OV (in this case, remove the jumper between the terminal pins RES and 0 V )
$\mathbf{T}$; OV input for cameras cyclic activation, referred to OV (in this case, remove the jumper between the terminal pins RES and OV)

A1; B1 differential video signal input for camera 1
A2; B2 differential video signal input for camera 2
A3; B3 differential video signal input for camera 3
A4; B3 differential video signal input for camera 4
A1; V5 coaxial video signal input for camera 1
A2; V5 coaxial video signal input for camera 2
A3; V5 coaxial video signal input for camera 3
A4; V5 coaxial video signal input for camera 4
TC1; V5 power supply output for camera 1
TC2; V5 power supply output for camera 2
TC3; V5 power supply output for camera 3
TC4; V5 power supply output for camera 4
$\stackrel{\Delta}{ }$
Cameras must be connected in sequence, starting from input 1.

## CONFIGURATION

Set the jumper on the device to the position shown in the table according to the number of cameras used.


| $\begin{array}{c}\text { NO. OF } \\ \text { CAMERAS }\end{array}$ | JP1 | JP2 | JP3 | JP4 | FUNCTION |
| :---: | :---: | :---: | :---: | :---: | :--- |
| 2 | ON | - | - | - | Video signal switch A1 $\div \mathrm{A} 2$ |$]$| 3 | - | ON |
| :---: | :---: | :---: |
| 4 (default) | - | - |
| ON | - | Video signal switch <br> A1 $\div \mathrm{A} 2 \div \mathrm{A} 3 \div \mathrm{A} 4$ |
| $5(* *)$ | - | - |

(**) The pass through camera (A5) must be directly powered.

CCTV BUS INTERFACE Ref. 1783/69


The device Ref.1783/69 allows to connect up to 4 control cameras with balun impedance adapter to 2 Voice systems
Cameras can be assigned to the single user number 0 or 1 or assigned to all the system users.
This interface can be seen as a secondary call module. For this reason, in each riser the sum of secondary call stations and CCTV bus interfaces can not exceed 2
LI is possible to use Ref.1083/69 or Ref.1038/69 devices even if in the system is installed one or more Ref.1783/69.

## TECHNICAL CHARACTERISTICS

Power supply voltage:
Standby current consumption:
Maximum current consumption:
$36 \div 48 \mathrm{Vcc}$ 10 mA 100 mA

## FACTORY SETTINGS

The device is factory configured with following defaults:

| ID |  | 1 |
| :--- | :--- | :--- |
| B/S | BROAD. |  |
|  | 1 | AP0 |
|  | 2 | AP0 |
|  | 3 | AP0 |
|  | 4 | AP0 |
| ON/OFF <br> TELECAMERE | 1 | AP1 |
|  | 2 | AP1 |
|  | 3 | AP1 |
|  | 4 | AP1 | $\begin{array}{cc}\text { SEL/AP } & \text { ON/OFF } \\ \text { TELECAMERA } & \text { 而 TELECAMERA }\end{array}$



## INSTALLATION

The device is designed for DIN rail installation and also for wall mounting installation with screws and screw anchors.


To connect the interface Ref.1783/69 to the system, it is mandatory to use the 2Voice system cable Ref.1083/90 or Ref.1083/92 and to observe the regulations concerning secondary call stations that are shown in the system booklet.
For cameras connections, use the cables described below, observing the maximum extension indications:

| Cable type | Maximum length | Video balun |
| :---: | :---: | :---: |
| CAT5 | 200 m | Ref.1093/300A (*) |
| Coax RG59 | 50 m | NO |

(*) between the video balun Ref.1093/300A impedance adapter and the camera, a RG59 coax cable with a maximum length of 50 m can be used.

## TERMINAL PINS DESCRIPTION

A1 negative input (or coax cable shield) camera number 1 B1 positive input (or coax cable central conductor) camera number 1
A2 negative input (or coax cable shield) camera number 2
B2 positive input (or coax cable central conductor) camera number 2
A3 negative input (or coax cable shield) camera number 3
B3 positive input (or coax cable central conductor) camera number 3
A4 negative input (or coax cable shield) camera number 4
B4 positive input (or coax cable central conductor) camera number 4
LINE IN
LINE IN
LINE OUT
LINE OUT $\}$ outgoing BUS line

## CONFIGURATION



ID：in a riser column it is possible to install 2 CCTV bus interfaces or one secondary call station and one CCTV bus interface；the two devices must have different addresses（0 or 1）．


B／S：The images coming from cameras connected to the interface can be seen by all the users（BROAD）or assigned to users 0 and 1 of the column（SEL／AP）by means of the dip switch＂SEL／AP TELECAMERA＂．

| $\begin{aligned} & \text { ID B/S } \\ & 1 \\|_{\mathrm{SEL} / \mathrm{AP}}^{\mathrm{BROAD} .} \end{aligned}$ | Cameras are assigned to users 0 and 1 | $\begin{gathered} \text { IDB/S } \\ 10 \square \mathrm{BROAD} . \\ \square_{\text {SEL/AP }} \end{gathered}$ | Broadcasting function：all the users can see the images coming from cameras． |
| :---: | :---: | :---: | :---: |

SEL／AP CAMERAS：by setting the＂B／S＂dip－switch to SEL／AP，it is possible to assign all the cameras to the user 0 （APO）or to the user 1 （AP1）．The dip－switch number corresponds to the camera number（dip number 1 ＝camera connected to A1，B1 terminal pins）．

|  | Camera 1 is assigned to the user 0 |  | Camera 1 is assigned to the user 1 |
| :---: | :---: | :---: | :---: |
|  | Camera 2 is assigned to the user 0 | SEL／AP TELECAMERA 12234 AP1 WO DO | Camera 2 is assigned to the user 1 |
| SEL／AP TELECAMERA $123 \quad 4$ AP1 DG日G APO | Camera 3 is assigned to the user 0 | SEL／AP TELECAMERA 13234 AP1 WDO： APO | Camera 3 is assigned to the user 1 |
|  | Camera 4 is assigned to the user 0 | SEL／AP TELECAMERA 12334 AP1 D円G日 APO | Camera 4 is assigned to the user 1 |

L．Cameras can be associated only to users with CODE 0 and 1；the other users can see cameras images only if the＂Broadcasting＂ function is enabled．
For example，if it is requested to assign the cameras number 1 （A1，B1） and 4 （A4，B4）to the user 0 and the other cameras to the user 1 ，set the dip switch in the following way：


RESET：If the CCTV Bus interface is removed from the system in order to be used in another system，is necessary to reset it．To do this and erase all the active settings，open and close again the jumper ＂RESET＂．

ON／OFF CAMERAS：If no camera is connected to an input or if it is needed to exclude temporarily the selected camera from those displayed，put the respective dip－switch in OFF position．The dip－ switch number corresponds to the camera number（dip number $1=$ camera connected to A1，B1 terminal pins）．

| ON／OFF TELECAMERA 1234 日GYMON OFF | Camera 1 is disabled |  | Camera 1 is enabled |
| :---: | :---: | :---: | :---: |
| ON／OFF TELECAMERA 1234 BQOB ON OFF | Camera 2 is disabled | ON／OFF TELECAMERA 1234 OQTON OFF | Camera 2 is enabled |
| ON／OFF TELECAMERA 1234 Mam ON OFF | Camera 3 is disabled | ON／OFF TELECAMERA 1234 ON MCDO OFF | Camera 3 is enabled |
| ON／OFF TELECAMERA 12344 MY日 ON OFF | Camera 4 is disabled | ON／OFF TELECAMERA 1234 MBGOON OFF | Camera 4 is enabled |

For instance，if no camera is connected to A3，B3 terminal pins，set the dip－switch as follows：


## CONNECTION IN 2VOICE SYSTEMS

In-out connection in a one-riser system with one main call
station

Connection in a system with one main call station and one secondary call station


Connection of 8 control cameras derived from a column interface Ref.1083/50


4
During auto-on, cameras connected to the Bus interface Ref.1783/69 are shown after the sequence described in the system booklet at the paragraph "Auto-on function on control cameras".
UTMEL SAFETY TRANSFORMER

## SAFETY TRANSFORMER

Ref. 9000/230 ( $\in$ ( 1 (1) (8)


The transformer Ref.9000/230 is used to power the buttons modules name holders when it is not possible to power them directly from the Bus.
It has been designed following the regulations in force about insulating and security transformers. In this way it is compliant with requirements about protection against direct und indirect contacts, as requested by regulations concerning electric systems. It is also provided with IMQ mark approval.

## TECHNICAL CHARACTERISTICS

Power supply:
Power:
18VA
Secondary:
12Vac
Max. load:
Protections:
with PTC
Power dissipation after 1 hour standard work
(*) After removing the cause of the short circuit, to restore PTC protection, unpower for about 60".

## INSTALLATION

The housing can be DIN bar or wall mounted with screws and screw anchors, using suitable adapters.


However, it must be kept in dry places, protected against bad weather, observing safety regulations.

## TERMINAL PINS DESCRIPTION

230~ 2 terminal pins 230Vac power supply input
$0 \sim 12 \quad 2$ terminal pins 12Vac power supply output

## DPDT MONOSTABLE RELAY Ref. 788/52



This device can be used as call repeater, additional electric locks or electric loads activator like, for example, additional lamps for cameras installed far from the push button panel.

## TECHNICAL CHARACTERISTICS

Power supply:
12Vac nominal
Max. current consumption:

Relay contacts max. current: $12 \mathrm{Vdc} ; 18 \mathrm{Vac} ; 18 \mathrm{Vdc}$ at 12 Vcc 40 mA at 18 Vcc 60 mA at 12Vac 100 mA at 18 Vac 150 mA 5A @ 100V

## INSTALLATION

The housing can be DIN bar or wall mounted with screws and screw anchors. However, the relay must be kept in dry places, protected against bad weather, observing safety regulations.


## TERMINAL PINS DESCRIPTION

The relay is equipped with two poles, suitable to command circuits with voltage not higher than 100 V and max. current of 5 A .


## TIME DELAY RELAY Ref.1032/81



The device Ref. 1032/81 allows to time the activation of an additional ringer or the activation of a driveway electric lock.
Timing can be performed as follows:
a. By putting the jumper AR in "NO" position, the timer will activate the relay output when the external command "SE2" is received, only for the time configured by the potentiometer (TIME), regardless if the input signal is still present or not.
b. With the jumper AR in "SI" position, the timer will activate the relay output at least for the preset time: if the input "SE2" signal lasts longer than the configured time, the output will be kept active.
The device is equipped with two leds that indicate if the SE2 (LI) input and the (LO) relay output are active.

## TECHNICAL CHARACTERISTICS

Power supply voltage on +24 :
Power supply voltage on $+12 / \sim$ :
Continuous current from AP:
Timing range:
Operating temperature range:
Max. switching capacity (resistive load):
Max. switching voltage:
Max. switching power (resistive load):
Min. load:
Max. current consumption at 12 Vdc :

## INSTALLATION

The housing can be DIN bar or wall mounted with screws and screw anchors. However, the relay must be kept in dry places, protected against bad weather, observing safety regulations.

## TERMINAL PINS DESCRIPTION

+24 22-27Vdc power supply input
$+12 / \sim \quad 10-15 \mathrm{Vdc}$ or $10-15 \mathrm{Vac}$ power supply input
-/~ Common power supply contact
-/~ Common power supply contact
SE2 Timer command input, activated by connecting it to the common power supply contact
AP Door lock release output
NO Normally open contact
NC Normally closed contact
C $\quad \mathrm{NO}$ and NC contacts common, usually connected to power supply common signal with AMCR jumper.

## JUMPERS AND PRESETS

AR: Recycle enabled.
AMCR: Relay common ground enabling.
TIME: Potentiometer to set the delay for the output relay disabling; the max. delay is obtained by turning the potentiometer clockwise.

## SYSTEM CABLES



In order to obtain the best system features, it is advisable to connect all the system devices with the dedicated cable, available in reels of two different lengths:
100 m Ref.1083/90
200 m Ref.1083/92
These cables have the following characteristics:

- Multipole cable, composed by 1 twisted pair with a PVC fire resistant external sheath.
- Excellent noise immunity.
- Cable section: $1 \mathrm{~mm}^{2}$.
- Pair impedance: $1000 \mathrm{hm} \pm 10 \%$ from 1 MHz to 15 MHz .
- 100 m cable attenuation: $<4,95 \mathrm{~dB}$ at 10 MHz .
- External diameter: 6,4mm.
- Colour: brown.

POWER LINE PROTECTION DEVICE 230Vac 4000VA Ref.1332/85


This is a voltage surge varistor power line protection device. With overvoltage caused by atmospheric events, the device immediately limits the mains voltage amplitude and preserve the devices installed downstream to the device. Install the power line filter 230V 4000VA Ref. 1332/86 downstream to the power protection device to ensure better system operation.
Protection level: compliant with standard IEC 61643-1 and A1: class III with Uoc 6 kV

## TECHNICAL CHARACTERISTICS

Power supply protection threshold voltage
Made of self-extinguishing material
Nominal voltage:
$\geq 300$ Veff

Max. voltage:
Max. current:
Operating frequency:
Power:
Temperature range:

## INSTALLATION

The device must be mounted on a DIN bar in a closed electrical panel. Check electrical connections before powering the circuit. Find the phase wire with a phase detector and connect it to the terminal pin "1", IN side.

## IMPORTANT

The device must be protected by a 18 A differential magnetothermic earth-fault protection and differential switch with threshold current equal to 30 mA .
The protection device must be connected to mains ground conductors.
Device efficacy will be better at lower earth system resistance. For this reason, the system must comply with standards CEI 64-8/1 V1 edition 01/2001 booklet 5902. Please follow the specifications described in CEI 64-8/4 edition 01/1998 booklet 4134 concerning safety regulations.

CONNECTION EXAMPLE

POWER LINE FILTER 230VAC 4000VA
Ref. $1332 / 86$


This is a two-cell, high-attenuation, one-phase filter for frequencies $>0.1 \mathrm{MHz}$, active on common and differential mode interference. The device is intended to prevent the propagation of external radiofrequency interference on the power mains which could cause faults in the electrical and electronic devices connected to the mains. Install a power
line protection device 230V 4000VA Ref. 1332/85 upstream to the power filter to ensure better system operation.

## TECHNICAL CHARACTERISTICS

One-phase, two-cell, high-attenuation filter active on common and differential interference $\mathrm{f}>0.1 \mathrm{Mhz}$.
Contained in a 2 DIN modules, self-extinguishing enclosure
Nominal voltage:
230Vac
Max. voltage:
55Vac
Operating frequency:
50 Hz
Attenuation:
60 dB at a frequency of 2 MHz
Max. current:
Power:
4000VA
Temperature range:
$-25^{\circ} \mathrm{C}+40^{\circ} \mathrm{C}$

## INSTALLATION

The device must be fastened on a DIN bar in a closed electrical panel.
Check electrical connections before powering the circuit. Locate the phase wire with a phase detector and connect it to the terminal pin "1", IN side.

## IMPORTANT

The device must be protected by a suitable restricted earth-fault protection with current flow equal to 18 A and differential switch with opening current equal to 30 mA .
The protection device must be connected to earth.
Filter efficacy will be better at lower earth system resistance. For this reason, the system must comply with standards CEI 64-8/1 V1 edition 01/2001 booklet 5902.
Implement specifications described in CEI 64-8/4 edition 01/1998 booklet 4134 concerning safety regulations.

## VIDEO SWITCH 4 IN - 1 OUT Ref.1038/69



The video switch Ref. 1038/69 can be used to connect to a call station 4 surveillance cameras. Images coming from these cameras are displayed during auto-on function.
By pressing repeatedly the auto-on button on a video door phone apartment station, the user will see first the images coming from the call station camera, then those coming from the camera connected to terminal pins V3A and V5A, and then, cyclically, the images coming from the cameras connected to the video switch.
If in the system there are other call stations, after the images coming from the cameras connected to the switch, the user will see the video signal coming from the other stations.
E. Each time the auto-on function is activated, the cycle starts again from the main call station IDO camera.

## TECHNICAL CHARACTERISTICS

Power supply voltage (+V, OV): $16 \div 25 \mathrm{Vdc}$
Current consumption: 118 (L) $\times 114$ (L) $\times 52(\mathrm{H})$
Dimensions in mm: 300 m

## INSTALLATION

The housing is suitable for wall mounting with screws and screw anchors in dry places, protected against bad weather.

## TERMINAL PINS DESCRIPTION

To power the video switch, it is suggested to use the power supply unit Ref. 789/2, whose characteristics and installation modes are described in "Door Phone - Video Door Phone Products Technical Manual", in the section "Power supply, Relays, Various Devices".

## CONFIGURATION

Set the jumper on the device to the position shown in the following table, according to the number of cameras connected to the switch.

| Number of cameras | JP1 | JP2 | JP3 |
| :---: | :---: | :---: | :---: |
| 2 | ON |  |  |
| 3 |  | ON |  |
| 4 |  |  | ON (*) |

(*) default
Cameras must be connected in sequence, starting from input I1.

## INSTALLATION DIAGRAMS

This section contains basic connection diagrams for 2VOICE systems. All technical diagrams are available in the site www.urmetdomus.com in the Reserved Area - system technical diagrams.

## INDEX

Description Diagram Page
DIAGRAMS NUMERIC INDEX
DIAGRAMS NUMERIC INDEX ..... 3 ..... 3
DIAGRAMS SELECTION TABLES .....  4
LIST OF DIAGRAMS NOTES .....  7
DEVICES LIST ..... 10
CALL STATIONS REPLACEMENT IN DIAGRAMS ..... 12
CONNECTION OF A DOOR PHONE RISER TO 1 CALL STATION (floor connection in parallel) SC124-0278 ..... 13
CONNECTION OF A COLUMN WITH 4 DOOR PHONE RISERS MAX TO 2 CALL STATIONS (floor connection in parallel) SC124-0280 ..... 14
CONNECTION OF A COLUMN WITH 4 DOOR PHONE RISERS MAX. TO 4 CALL STATIONS
(floor connection in parallel) .SC124-0281A. ..... 15
CONNECTION OF 16 COLUMNS MAX. WITH DOOR PHONES TO 1 MAIN CALL STATION
EACH GROUP IS CONNECTED TO 1 OR 2 SECONDARY CALL STATIONS (floor connection in parallel) SC124-0296 ..... 16
CONNECTION OF N COLUMNS WITH DOOR PHONES TO 4 MAIN CALL STATIONS MAX. EACH GROUP IS CONNECTED TO 1 OR 2 SECONDARY CALL STATIONS (floor connection in parallel) .SC124-0282A ..... 18
CONNECTION OF A RISER WITH VIDEO DOOR PHONES AND DOOR PHONES TO 1 CALL STATION
(floor connections with 4-user distributor) SV124-0954B ..... 20
CONNECTION OF A COLUMN WITH 4 VIDEO DOOR PHONES/DOOR PHONES
RISERS MAX. TO 2 CALL STATIONS
(floor connections with 4-user distributor) SV124-0955B ..... 21
CONNECTION OF A COLUMN WITH 4 VIDEO DOOR PHONES/DOOR PHONES RISERS MAX. TO 4 MAIN CALL STATIONS SV124-0997B ..... 22
CONNECTION OF N COLUMNS, EACH ONE WITH 4 VIDEO DOOR PHONES/DOOR PHONES RISERS MAX., TO 1 MAIN CALL STATION. (each column is connected to 1 or 2 secondary call stations) SV124-0962B ..... 24
CONNECTION OF N COLUMNS, EACH ONE WITH 4 VIDEO DOOR PHONES/DOOR
PHONES RISERS MAX., TO 4 MAIN CALL STATIONS
(each column is connected to 1 or 2 secondary call stations) .SV124-0963C ..... 26
CONNECTION OF A RISER WITH VIDEO DOOR PHONES AND DOOR PHONES TO 1 SWITCHBOARD AND 1 CALL STATION SV124-1098 ..... 28
CONNECTION OF A COLUMN WITH 4 RISERS MAX. OF VIDEO DOOR PHONES AND DOOR PHONES TO 1 SWITCHBOARD AND 4 CALL STATIONS SV124-1155 ..... 29
CONNECTION OF A RISER WITH VIDEO DOOR PHONES AND DOOR PHONES
TO 1 SWITCHBOARD AND TO 4 MAIN CALL STATIONS MAX SV124-1156 ..... 30
CONNECTION OF 16 COLUMNS MAX. WITH VIDEO DOOR PHONES AND DOOR PHONES
TO 1 SWITCHBOARD AND 1 MAIN CALL STATION (each column is connected to 1 or 2 secondary call stations) SV124-1100A ..... 32
CONNECTION OF N COLUMNS WITH VIDEO DOOR PHONES AND DOOR PHONES TO 1 SWITCHBOARD AND 4 MAIN CALL STATIONS MAX. (each column is connected to 1 or 2 secondary call stations) SV124-1099A ..... 34
CONNECTION OF A DOOR PHONE RISER TO 1 SWITCHBOARD AND 1 CALL STATION (floor connection in parallel) SC124-0307 ..... 36
CONNECTION TO A CALL STATION WITH:
A1) 2 CONTROL CAMERAS
B1) 5 CONTROL CAMERAS SV124-1020A ..... 37
CALL REPEAT EXAMPLES:
A) C) D) Without timingB) With timing from 1 to 30 sSV124-102439
EXAMPLES OF SWITCHBOARD CALL REPEAT:A) With additional ringer Ref. 1072/59B) With electronic ringer Ref. 9854/40 and timing from 1 to 30 sSV124-111840
SECTION 6 INDEX
EXAMPLES OF SWITCHBOARD CALL REPEAT:
C) With 5A/100Vdc max. load with relay box Ref. $788 / 52$D) With $1 \mathrm{~A} / 24 \mathrm{Vdc}$ max. load with relay box Ref. $788 / 52$SV124-111841
CONNECTION OF A RELAY TO A CALL STATION TO ACTIVATE AN ADDITIONAL ELECTRIC LOCK SV124-1026A ..... 42
CONNECTION OF AN ADDITIONAL ELECTRIC LOCK
A) activated at the same time as the system one
B) manual independent activation (button) SV124-1029A ..... 43
CONNECTION OF 5 CONTROL CAMERAS TO ONE CALL STATION SV124-1089A ..... 44
CONNECTION OF 5 CONTROL CAMERAS TO ONE CALL STATION SV124-1113 ..... 45
SPECIAL DECODER CONNECTION AND PROGRAMMING WITH CONNECTION DERIVED BY THE DISTRIBUTOR SV124-1157 ..... 46
SPECIAL DECODER CONNECTION AND PROGRAMMING WITH CONNECTION BETWEEN DOOR UNITS INTERFACE AND COLUMN INTERFACE SV124-1157 ..... 49
CONNECTION OF N COLUMNS WITH VIDEO DOOR PHONES AND DOOR PHONES WITH 8 DISTRIBUTORS MAX. TO ONE RISER OF THE DOOR UNITS INTERFACE SV124-1164 ..... 52
CONNECTION OF N COLUMNS WITH VIDEO DOOR PHONES AND DOOR PHONES WITH 4 DISTRIBUTORS MAX. TO ONE RISER OF THE DOOR UNITS INTERFACE SV124-1165 ..... 54
REPLACEMENT OF A VIDEO DOOR PHONE CALL STATION WITH A DOOR PHONE ONE EQUIPPED WITH AN ADDITIONAL CAMERA SV124-1158 ..... 56
DIAGRAMS NUMERIC INDEX
Diagrams ..... Page
SC124-0278 ..... 13
SC124-0280 ..... 14
SC124-0282A ..... 18
SC124-0296 ..... 16
SC124-0307 ..... 36
SV124-0954B ..... 20
SV124-0955B ..... 21
SV124-0962B ..... 24
SV124-0963C ..... 26
SV124-0997B ..... 22
SV124-1020A ..... 37
SV124-1024. ..... 39
SV124-1026A ..... 42
SV124-1029A ..... 43
SV124-1089A ..... 44
SV124-1098 ..... 28
SV124-1099A ..... 34
SV124-1113 ..... 45
SV124-1118 ..... 41
SV124-1155. ..... 29
SV124-1157 ..... 46
SV124-1158 ..... 56
SV124-1164 ..... 54

## DIAGRAM SELECTION TABLES

DOOR PHONE SYSTEMS DIAGRAMS

| Call stations (PE) |  | No. of columns (K) | Max. distance between PE and apartment station | System max. extension | No. of column interfaces Ref.1083/50 | No. of door units interfaces Ref.1083/75 | Diagram | Page |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\frac{\sqrt{\bar{N}}}{\sum}$ | Z O O O © © |  |  |  |  |  |  |  |
| 1 | 0 | 1with switchboard | 800m | 800m | 0 | 0 | SC124-0307 (*) | 36 |
|  |  | 1 | 800m | 800m | 0 | 0 | SC124-0278 (*) | 13 |
|  |  |  | 800m | 800m | 1 | 0 | SC124-0280 | 14 |
|  |  |  | 1000m | $800+400 \mathrm{~m}$ | 0 | 1 | SC124-0281A | 15 |
|  |  |  | 1600m | $800+600+400 \mathrm{~m}$ | 1 | 1 | SC124-0282A | 18 |
|  |  | 16 max | 800m | 800xK +200m | K | 0 | SC124-0296 | 16 |
|  |  | $\begin{gathered} 20 \max \\ \text { on } 1 \text { branch } \end{gathered}$ | 1400m | $800 x K+400+400 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
|  |  | $\begin{gathered} 32 \text { max } \\ \text { on } 2 \text { branches } \end{gathered}$ | 1400m | $800 x K+800+400 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
|  |  | $\begin{gathered} 32 \text { max } \\ \text { on } 4 \text { branches } \end{gathered}$ | 1600m | $800 x \mathrm{~K}+2400+400 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
|  | $\begin{aligned} & 2 x K \\ & \max \end{aligned}$ | 16 max | 800m | 800xK +200m | K | 0 | SC124-0296 | 16 |
|  |  | $\begin{gathered} 20 \mathrm{max} \\ \text { on } 1 \text { branch } \end{gathered}$ | 1400m | $800 x K+400+400 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
|  |  | $\begin{gathered} 32 \text { max } \\ \text { on } 2 \text { branches } \end{gathered}$ | 1400m | $800 x K+800+400 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
|  |  | $\begin{gathered} 32 \text { max } \\ \text { on } 4 \text { branches } \end{gathered}$ | 1600m | $800 x K+2400+400 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
| 2 | 0 | 1 | < 800m | 800m | 1 | 0 | SC124-0280 | 14 |
|  |  |  | 1000m | $800+800 \mathrm{~m}$ | 0 | 1 | SC124-0281A | 15 |
|  | $\begin{aligned} & 2 x K \\ & \max \end{aligned}$ | $\begin{gathered} 20 \mathrm{max} \\ \text { on } 1 \text { branch } \end{gathered}$ | 1400m | $800 x K+400+800 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
|  |  | $\begin{gathered} 32 \text { max } \\ \text { on } 2 \text { branches } \end{gathered}$ | 1400m | $800 x K+800+800 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
|  |  | $\begin{gathered} 32 \text { max } \\ \text { on } 4 \text { branches } \end{gathered}$ | 1600m | $800 x \mathrm{~K}+2400+800 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
| 3 | 0 | 1 | 1000m | $800+1200$ m | 0 | 1 | SC124-0281A | 15 |
|  | $\begin{aligned} & 2 x K \\ & \max \end{aligned}$ | 20 max on 1 branch | 1400m | $800 x K+400+1200 m$ | K | 1 | SC124-0282A | 18 |
|  |  | 32 max on 2 branches | 1400m | $800 x K+800+1200 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
|  |  | 32 max on 4 branches | 1600m | $800 x K+2400+1200 \mathrm{~m}$ | K | 1 | SC124-0282A | 18 |
| 4 | 0 | 1 | 1000m | $800+1600 \mathrm{~m}$ | 0 | 1 | SC124-0281A | 15 |
|  | $\begin{aligned} & 2 x K \\ & \max \end{aligned}$ | $\begin{gathered} 20 \mathrm{max} \\ \text { on } 1 \text { branch } \end{gathered}$ | 1400m | $800 x K+400+1600 m$ | K | 1 | SC124-0282A <br> (*) | 18 |
|  |  | 32 max on 2 branches | 1400m | $800 x \mathrm{~K}+800+1600 \mathrm{~m}$ | K | 1 | SC124-0282A <br> (*) | 18 |
|  |  | $\begin{gathered} 32 \text { max } \\ \text { on } 4 \text { branches } \end{gathered}$ | 1600m | $800 x K+2400+1600 m$ | K | 1 | SC124-0282A <br> (*) | 18 |

(*) not expandable system

## VIDEO DOOR PHONE SYSTEM DIAGRAMS

| Call stations (PE) |  |  | No. of columns (K) | Max. distance between PE and apartment station | System max. extension | No. of column interfaces Ref.1083/50 | No. of door units interfaces Ref.1083/75 | Diagram | Page |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\underset{\sum}{\substack{\bar{K}}}$ | 증 © O © © |  |  |  |  |  |  |  |  |
| 1 | 0 | no | 1 | 400m | 800m | 0 | 0 | SV124-0954B (*) | 20 |
|  |  |  | 1 | 400 m | 800m | 1 | 0 | SV124-0955B | 21 |
|  |  |  | 1 | 400m | $800+200 \mathrm{~m}$ | 0 | 1 | SV124-0997B | 22 |
|  |  |  | 1 | 1000m | $800+600+200 \mathrm{~m}$ | 1 | 1 | SV124-0963C | 26 |
|  |  |  | 16 max | 400m | 800xK +200m | K | 0 | SV124-0962B | 24 |
|  |  |  | 20 max on 1 branch | 800m | $800 x K+400+200 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 2 branches | 800m | $800 x \mathrm{~K}+800+200 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x \mathrm{~K}+2400+200 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  | yes | 1 | 400m | 800m | 0 | 0 | SV124-1098 (*) | 28 |
|  |  |  | 1 | 400m | 800m | 1 | 0 | SV124-1155 | 29 |
|  |  |  | 1 | 400m | $800+200 \mathrm{~m}$ | 0 | 1 | SV124-1156 | 30 |
|  |  |  | 1 | 1000m | $800+600+200 \mathrm{~m}$ | 1 | 1 | SV124-1099A | 34 |
|  |  |  | 16 max | 400m | $800 \times K+200 \mathrm{~m}$ | K | 0 | SV124-1100A | 32 |
|  |  |  | 20 max on 1 branch | 800m | $800 x \mathrm{~K}+400+200 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
|  |  |  | 32 max on 2 branches | 800m | $800 x K+800+200 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x \mathrm{~K}+2400+200 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
|  | $\begin{aligned} & 2 x K \\ & \max \end{aligned}$ | no | 16 max | 400m | 800xK +200m | K | 0 | SV124-0962B | 24 |
|  |  |  | 20 max on 1 branch | 800m | $800 x K+400+200 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 2 branches | 800m | $800 x \mathrm{~K}+800+200 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x K+2400+200 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  | yes | 16 max | 400m | 800xK +200m | K | 0 | SV124-1100A | 32 |
|  |  |  | 20 max on 1 branch | 800m | $800 x K+400+200 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
|  |  |  | 32 max on 2 branches | 800m | 800xK + 800 + 200m | K | 1 | SV124-1099A | 34 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x K+2400+200 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
| 2 | 0 | no | 1 | 400m | 800m | 1 | 0 | SV124-0955B | 21 |
|  |  |  | 1 | 400m | $800+400 \mathrm{~m}$ | 0 | 1 | SV124-0997B | 22 |
|  |  | yes | 1 | 400m | 800 m | 1 | 0 | SV124-1155 | 29 |
|  |  |  | 1 | 400m | $800+400 \mathrm{~m}$ | 0 | 1 | SV124-1156 | 30 |
|  | $\begin{aligned} & 2 x K \\ & \max \end{aligned}$ | no | 20 max on 1 branch | 800m | $800 x \mathrm{~K}+400+400 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 2 branches | 800m | $800 x \mathrm{~K}+800+400 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x \mathrm{~K}+2400+400 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  | yes | 20 max on 1 branch | 800m | $800 x \mathrm{~K}+400+400 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
|  |  |  | 32 max on 2 branches | 800m | $800 x \mathrm{~K}+800+400 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x \mathrm{~K}+2400+400 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
| 3 | 0 | no | 1 | 400m | $800+600 \mathrm{~m}$ | 0 | 1 | SV124-0997B | 22 |
|  |  | yes | 1 | 400m | $800+600 \mathrm{~m}$ | 0 | 1 | SV124-1156 | 30 |
|  | $\begin{aligned} & 2 x K \\ & \max \end{aligned}$ | no | 20 max on 1 branch | 800m | $800 x \mathrm{~K}+400+600 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 2 branches | 800m | $800 x K+800+600 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x K+2400+600 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  | yes | 20 max on 1 branch | 800m | $800 x K+400+600 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
|  |  |  | 32 max on 2 branches | 800m | 800xK + 800 + 600m | K | 1 | SV124-1099A | 34 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x \mathrm{~K}+2400+600 \mathrm{~m}$ | K | 1 | SV124-1099A | 34 |
| 4 | 0 | no | 1 | 400m | $800+800 \mathrm{~m}$ | 0 | 1 | SV124-0997B | 22 |
|  |  | yes | 1 | 400m | $800+800 \mathrm{~m}$ | 0 | 1 | SV124-1156 | 30 |
|  | $2 x K$$\max$ | no | 20 max on 1 branch | 800m | $800 x \mathrm{~K}+400+800 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 2 branches | 800m | $800 x \mathrm{~K}+800+800 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x \mathrm{~K}+2400+800 \mathrm{~m}$ | K | 1 | SV124-0963C | 26 |
|  |  | yes | 20 max on 1 branch | 800m | $800 x \mathrm{~K}+400+800 \mathrm{~m}$ | K | 1 | SV124-1099A (*) | 34 |
|  |  |  | 32 max on 2 branches | 800m | 800xK + 800 + 800m | K | 1 | SV124-1099A (*) | 34 |
|  |  |  | 32 max on 4 branches | 1000m | $800 x K+2400+800 \mathrm{~m}$ | K | 1 | SV124-1099A (*) | 34 |

[^4]
## CONNECTION EXAMPLE

- Control cameras connection

|  | SV124-1020A <br> Page 37 |  | Sv124-1089A <br> Page 44 | SV124-1113 <br> Page 45 |
| :--- | :---: | :---: | :---: | :---: |
|  | es. A | es. B |  |  |
| 2 max with switching device <br> Ref. 1083/69 | $\checkmark$ |  |  |  |
| 5 max with switching device <br> Ref. 1083/69 |  | $\checkmark$ |  |  |
| 5 max with switching device <br> Ref. 1038/69 |  |  | $\checkmark$ |  |
| 4 max with BUS interface <br> Ref. 1783/69 |  |  |  | $\checkmark$ |

- Call repeat

|  | SV124-1024 <br> Page 39 |  |  |  |
| :--- | :---: | :---: | :---: | :---: |
|  | ex. A | ex. B | ex. C | ex. D |
| With ringer Ref.1072/59 | $\checkmark$ |  |  |  |
| With electronic ringer and <br> timing from 1 to 30" |  | $\checkmark$ |  |  |
| With electric charge up to <br> 5A/100Vdc |  |  | $\checkmark$ |  |
| With electric charge up to <br> 1A/24Vdc |  |  |  | $\checkmark$ |

With electric charge up to $1 \mathrm{~A} / 24 \mathrm{Vcc}$

|  | SV124-1118 <br>  <br>  <br>  <br> With ringer Ref.1072/59 40 |  |  |  |
| :--- | :---: | :---: | :---: | :---: |
|  | ex. A | ex. B | ex. C | ex. D |
|  |  |  |  |  |
| With electric charge up to <br> 1A/24Vdc |  |  |  |  |

- Activation of an additional electric lock

|  | SV124-1029 <br> Page 43 |  | SV124-1026A <br> Page 42 |
| :--- | :---: | :---: | :---: |
|  | ex. A | ex. B | ex. C |
|  | $\checkmark$ |  |  |
| Activate at the same time as <br> the pedestrian door lock |  | $\checkmark$ |  |
| Activated with relay for gate |  |  | $\checkmark$ |

- Connection of the street side branch with 4-user distributors

|  | SV124-1164 <br> Pag. 52 | SV124-1165 <br> Pag.54 |
| :--- | :---: | :---: |
| With 8 distributors max. on a <br> branch | $\checkmark$ |  |
| With 4 distributors max. on a <br> branch |  | $\checkmark$ |

- Ref.1083/80 special decoder connection

|  | SV124-1157 <br> Pag. 46 |
| :--- | :---: |
| Some examples of connection <br> and programming | $\checkmark$ |

LIST OF DIAGRAMS NOTES

C4.013 - Fit a 9V (MN1604/6LR61) battery in the ringer.
The ringer is equipped with two jumpers indicated by W1 and W2. Remove one of the two jumpers for two-tone or one-tone operation as shown in the following table:

| SOUND TIPE | JUMPERS |  |  |
| :--- | :---: | :---: | :--- |
|  | W1 | W2 |  |
| THREE-TONE | $\times$ | $\times$ | Both Jumpers <br> inserted |
| TWO-TONE | $\times$ |  | Jumper W1 only: <br> remove W2 |
| ONE-TONE |  | $\times$ | Jumper W2 only: <br> remove W1 |

TV.001 - For wiring and trimming follow the instructions provided with the device.
TV. 008 - Insulate the camera from
the bracket and/or enclosure with
appropriate isolators provided
with product.


| VD. 001 - MINIMUM WIRE SECTION |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BETWEEN POWER UNIT AND VIDEO DEVICES |  |  |  |  |  |
| DISTANCES | m | 50 | 100 | 200 | 400 |
| Wires <br> R1,R2, +TC | Sq.mm | 0,75 | 1 | 1,5 | 2,5 |
| COAXIAL <br> CABLE <br> 75 Ohm | Use a RG 59 coaxial wire <br> for up to 300 m. <br> Use a RG 11 coaxial wire <br> for up to 600 m. <br> Use video amplification de- <br> vices for longer distances. |  |  |  |  |

$$
\text { VD. } 007 \text { = Floor call button. }
$$

| VD. 017 - On switching device set the jumper as written in the table according to the number of used cameras. JUMPER SETTING |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{gathered} \text { N. of } \\ \text { cameras } \end{gathered}$ | JP1 | JP2 | JP3 | JP4 | Video signal switching |
| 2 | ON | -- | -- | -- | A1 $\div$ A 2 |
| 3 | -- | ON | -- | -- | A $1 \div$ A $2 \div$ A 3 |
| 4 | -- | -- | $\begin{aligned} & \text { ON } \\ & (*) \end{aligned}$ | -- | A $1 \div$ A $2 \div$ A $3 \div$ A 4 |
| $\begin{gathered} 5 \\ (* *) \\ \hline \end{gathered}$ | -- | -- | -- | ON | $\left\lvert\, \begin{aligned} & \mathrm{A} 1 \div \mathrm{A} 2 \div \mathrm{A} 3 \div \mathrm{A} 4 \div \mathrm{A} 5 \\ & (\text { loop through }) \end{aligned}\right.$ |
| (*) default setting <br> (**) the pass through camera (A5) must be directly powered |  |  |  |  |  |


| VV. 001 - WIRE CROSS-SECTION AREA. |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| FROM OUTDOOR STATION TO POWER SUPPLY OR TO RISER INTERFACE OR TO DOOR UNIT INTERFACE |  |  |  |  |  |
| Distance | m | 200 | - - |  |  |
| Wires <br> LINE | Used only cable Ref.1083/90 |  |  |  |  |
| FROM LAST INDOOR SET TO POWER SUPPLYOR RISER INTERFACE |  |  |  |  |  |
| Distance | m | 200 | - - | - - | - - |
| Wires <br> LINE | Used only cable Ref.1083/90 |  |  |  |  |
| FROM INDOOR SET TO DISTRIBUTOR |  |  |  |  |  |
| Distance | m | 50 | - - | - - | - - |
| Wires LINE | Used only cable Ref.1083/90 |  |  |  |  |
| FROM POWER SUPPLY TO DOOR UNIT INTERFACE OR TO RISER INTERFACE |  |  |  |  |  |
| Distance | m | 5 | - - |  | - - |
| Wires <br> LINE | Used only cable Ref.1083/90 |  |  |  |  |
| FROM DOOR UNIT INTERFACE TO LAST RISER INTERFACE |  |  |  |  |  |
| Distance | m | 200 | - - | - - | - |
| Wires <br> LINE | Used only cable Ref.1083/90 |  |  |  |  |

The maximum distance between the call outdoor station and the most distant
indoor set must be:
a) 400 m . with or without riser interface.
b) 600 m . using door unit interface and riser interface.

IMPORTANT NOTES
In all cases, to improve interference immunity, do not arrange the system wires near 230v~ and 400v~ power wires which generate strong electromagnetic fields.

VV. 002 - WIRE CROSS-SECTION AREA FOR AUXILIAR SIGNAL.
FROM OUTDOOR STATION TO:

- ELECTRIC LOCK


Outdoor station (pins ILL) can power maximum 32 name tags.
If the number of name tags is greater than 32 , use a transfomer of suitable power, with the following sections and maximum distances.

| Distance | m | 100 | 200 | 300 | -- |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Wires <br> $\sim 0, \sim 12$ | sq.mm | 1 | 1,5 | 2,5 | -- |

FROM INDOOR SET TO:

- FLoor call button

| Distance | m | 10 | -- | -- |
| :---: | :---: | :---: | :---: | :---: |
| Wires <br> CP | sq.mm | 0,28 | -- | -- |

- ADDITIONAL RINGER

| Distance | m | 10 | -- | -- |
| :---: | :---: | :---: | :---: | :---: |
| Wires <br> $\mathrm{S}-, \mathrm{S}+$ | sq.mm | 0,28 | -- | -- |

VV. 003 - EXTENSION LIMITS.
Following extension limit is suggested:
$\mathrm{A}=$ Connection between door unit interface and call stations must not exceed 800 m .
$\mathrm{B}=$ Connections between door unit interface and riser interface must not exceed 800 m .
C = Connections between indoor sets of backbones with riser interface + connections between riser interface with call stations must not exceed 800 m .
INDOOR SET


CALL STATION


DOOR UNIT INTERFACE
vv. 004 - Attention: Don't remove the jumper between pins " Z " of the last

VV. 006 - EXTENSION LIMITS.
Following extension limit is suggested:
A $=$ Connection between outdoor station and last riser interface must not exceed 200 m .
C = Connections between indoor sets of riser with riser interface + connections between riser interface with outdoor stations must not exceed 800 m .


INDOOR SET


RISER INTERFACE

VV. 007 - If door open warning service is needed, the following connection has to be carried out on the call station (for preset devices only).


$$
\begin{aligned}
& \text { VV. } 008 \text { - Setting the dip-switch } \\
& \text { " } 1 \text { " in position OFF. }
\end{aligned}
$$

Vx. 006 - See the instruction book provided with the product for fitting the accessory in the device.



The maximum distance between the call outdoor station and the most distant indoor set must be:
a) 400 m . with or without riser interface.
b) 600 m . using door unit interface and riser interface.

## IMPORTANT NOTES

In all cases, to improve interference immunity, do not arrange the system wires near 230 V and 400 V ~ power wires which generate strong electromagnetic fields.

VX. 014 - Dusk switch or similar device for switching lights on, where relevant.

VX. 021 - Cut or remove the jumpers on the device(s):
a) Between pins "z".

VX.032 - Minimum wire section
Power supply cords and length (12Vdc) have to be configured according to cameras consumption.
See following table:

| Camera <br> Consumption | Wire Section <br> $($ Sq. $\cdot \mathrm{mm})$ | Wire lenght <br> $(\mathrm{m})$ |
| :---: | :---: | :---: |
| $\max 300 \mathrm{~mA}$ | 0,75 | 50 |
|  | 1,5 | 100 |
|  | 2,5 | 150 |
|  | 4 | 240 |


| VX. 033 - Minimum wire section. |
| :--- |
| Power supply cords and length (12Vdc) |
| have to be configured according to |
| cameras consumption. |
| See following table: |
| Camera <br> Consumption |
| Wire Section <br> (Sq.mm) |
| Wire lenght <br> $(\mathrm{m})$ |
| max 500mA |

VX. 037 - On device setting the jum-per/dip-switch "Z" in position ON.

## DEVICES LIST

To implement diagrams described in this section, the following devices can be used:

## APARTMENT STATIONS

## VIDEO DOOR PHONE

## Signo Model

Ref.1740/1 $\ldots \ldots . . . . . . . . . . . . . . . . . . . . ~ B l a c k / W h i t e ~ v i d e o ~ d o o r ~ p h o n e ~(w h i t e) ~$
Ref.1740/40 .................... Colour video door phone (white)
Ref.1740/41 .................... Colour video door phone (anthracite)
Ref.1740/42 ................ Colour video door phone (platinum)

Ref.1740/83 Bracket
Accessories
Ref.1083/96 ....................... Add-on buttons unit
Folio Model
Ref. 1706/5 ........................ Hands-free colour video door phone (black)
Ref.1706/6 ......................... Hands-free colour video door phone (white)
Accessories
Ref.1706/60 ...................... Embedding box
Ref.1706/61 Kit for plasterboard installation

Aiko Model
Ref.1716/1 .......................... Hands-free colour video door phone (black)
Ref.1716/2 .......................... Hands-free colour video door phone (white)
Accessories
Ref.1716/60 ...................... Embedding box
Ref.1716/51 ....................... Coloured mask


BASIC DOOR PHONE
Atlantico Model
Ref.1183/1 Door phone with 1 additional button

COMFORT DOOR PHONE

## Signo Model

Ref.1183/2 ........................ Door phone with 3 additional buttons
Ref.1183/3 ......................... Door phone with 10 additional buttons

## CONCIERGE SWITCHBOARD

VIDEO DOOR PHONE
Ref. 1083/40 ....................... Concierge switchboard
Ref.1732/41.................. Colour video module
Ref.1732/91 ................... Bracket for video module
DOOR PHONE
Ref.1083/40 ...................... Concierge switchboard

## CALL STATION

ELECTRIC VIDEO DOOR ENTRANCE PANEL


## Sinthesi Model

Ref.1083/72 $\qquad$ Camera module and door unit with 2 buttons
Ref.1145/11-/12-/13-/14 ... Button module
Ref.1038/17 ....................... 16-user expander module
Exigo Model
Ref.1083/8 ......................... Loudspeaking unit
Ref.1810/40
TV camera unit
Ref.1038/17 16-user expander module
Ref.1743/xxx o 1721/xxx .. Exigo push button panel
Mikra Model
Ref.1783/1
Push button panel with colour camera
Ref.1783/2
Push button panel with b/w camera
ELECTRIC DOOR ENTRANCE PANEL
Sinthesi Model


Ref.1083/7
Door unit module with 2 buttons
Ref.1145/11-/12-/13-/14 ... Button module
Ref.1038/17
.16-user expander module
Modello Exigo
Ref.1083/8 Loudspeaking unit
Ref.1038/17 16-user expander module
Ref.1143/xxx o 1121/xxx .. Exigo push button panel


CALL MODULE
Sinthesi Model
Ref. $1083 / 13$.................... Call module
Accessories
Ref.1745/40 ....................... Colour camera module
Ref. $1745 / 70$............... Black/white camera module
For other products necessary for call stations installation, see the other sections of the manual.

## ACCESSORIES

Ref.1072/59 ....................... Additional ringer

Ref.9854/40 Electronic ringer

POWER SUPPLY UNITS, RELAY INTERFACES
Ref.1083/20 System power supplyARef.1083/50Column interfaceBRef.1083/75Door units interfaceRef.1083/69Video switchD
Ref.788/52 $\qquad$Relay boxRef.9000/230 $\qquad$Transformer$\boldsymbol{\#}^{B}$Ref.789/2
$\qquad$Additional power supply$\rightleftarrows^{C}$Ref.1032/81
$\qquad$Timing relay$\rightleftarrows^{\mathrm{D}}$Ref.1090/850
$\qquad$Additional power supplyRef.1083/55
$\qquad$4-user distributor
Ref.1038/69
$\qquad$Video switch

Ref.788/22 $\qquad$ Relay call repeater
Ref.1083/90-/92. $\qquad$ Cable for 2VOICE system

Generic transformer12Vac / 15VA electric lock
 $\qquad$ Transmitter / 1 channel passive receiver
青 Ref.1092/801. $\qquad$ 1200 mA plug power supply



Exigo Video Entrance Panel


Sinthesi call module with camera module


Mikra Video Entrance Panel



Sinthesi Call Module
Exigo Entrance Panel



SC124-0280


SC124-0281A


Each group is connected to 1 or 2 secondary call stations (floor connection in parallel)
INSTALLATION DIAGRAMS


SC124-0296

| BACKbone "5" | BACKBONE "6" | BACKBONE "7" | backbone " 8 " |
| :---: | :---: | :---: | :---: |

CONNECTION OF N COLUMNS WITH DOOR PHONES TO 4 MAIN CALL
STATIONS MAX.
Each group is connected to 1 or 2 secondary call stations
(floor connection in parallel)





SV124-0955B


DIAGRAM NOTES
C4. 013 VD. 007 VV. 001 VV. 002 VV. 007 VX. 006 VX. 008 VX. 014 VX. 037



SV124-0997B




SV124-0963C



I EQUIPMENT/CONNECTIONS AS MAIN VIDEO OUTDOOR | Station "a"


11
11

(yyv:0081)


2


DIAGRAM NOTES

| $C 4.013$ | $V D .007$ | $V V .001$ | VV. 002 | VV. 003 | $V V .004$ | $V V .007$ | $V V .008$ | $V X .006$ | $V X .008$ | $V X .014$ | $V X .021$ | $V X .037$ |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |



SV124-1098 $\qquad$


## DIAGRAM NOTES

C4. 013 VD. 007 VV. 001 VV. 002 VV. 007 VX. 006 VX. 008 VX. 014 VX. 037
VV. 010 - Parameters configuration Switchboard:

- System in column: 1 (YES).
- Associated monitor: 1 (YES).




SV124-1156


DIAGRAM NOTES
C4. 013 VD. 007 VV. 001 VV. 002 VV. 007 VX. 006 VX. 008 VX. 014 VX. 037
VV. 010 - Parameters configuration Switchboard:

- System in column: 1 (YES).
- Associated monitor: 1 (YES).


SV124-1100A


DIAGRAM NOTES
C4.013 VD. 007 VV. 001 VV. 002 VV. 004 VV. 006 VV. 007 VV. 008 VX. 006 VX. 008 VX. 014 VX. 021 VX. 037
VV. 010 - Parameters configuration
Switchboard:

- System in column: 0 (NO).
- Associated monitor: 1 (YES).


EQUIPMENT/CONNECTIONS as main video outdoo STATION "A"


四



## DIAGRAM NOTES

C4.013 VD. 007 VV. 001 VV. 002 VV. 003 VV. 004 VV. 007 VV. 008 VX. 006 VX. 008 VX. 014 VX. 021 VX. 037
VV.010 - Parameters configuration Switchboard:

- System in column: 0 (NO).
- Associated monitor: 1 (YES).

RISER
SV124-1099A


SC124-0307


SV124-1020A
EXAMPLE A1)


EXAMPLE B1)


DIAGRAM NOTES
VD. 001 VV. 002 VX. 006 VX. 008 VX. 032 VX. 033 TV. 001 TV. 008

EXAMPLE A2)



Urmet | CALL REPEAT EXAMPLES |
| :--- |
| A) C) D) Without timing |
| B) With timing from 1 to 30 s |




DIAGRAM NOTES

EXAMPLES OF SWITCHBOARD CALL REPEAT:
A) With additional ringer Ref. 1072/59

Urmet
B) With electronic ringer Ref. 9854/40 and timing from 1 to 30s

SV124-1118
A)

B)


- 4 USERS DISTRIBUTOR

Ref.1083/55

- COLUMN INTERFACE

Ref.1083/50

- DOOR UNITS INTERFACE Ref.1083/75



## DIAGRAM NOTES

C4.013 VX. 008
VV. 010 - Parameters configuration
Switchboard:

- Associated monitor: 1 (YES).
C)

D)



## DIAGRAM NOTES

C4.013 VX. 008
VV.010 - Parameters configuration
Switchboard:

- Associated monitor: 1 (YES).

EXAMPLE A1


EXAMPLE B1

INSTALLATION DIAGRAMS

EXAMPLE A2


EXAMPLE B2

$\qquad$

SV124-1029A
EXAMPLE A)


EXAMPLE B)


DIAGRAM NOTES
VV. 002 VX. 008


SV124-1113

To the next distributors or to INO - IN1 terminal pins of a column interface Ref.1083/50


From door units interface or
from column interface or
from power supply

SV124-1157


SPECIAL DECODER CONNECTION AND PROGRAMMING WITH CONNECTION DERIVED BY THE DISTRIBUTOR

BLOCCO A



SV124-1157


SPECIAL DECODER CONNECTION AND PROGRAMMING WITH CONNECTION BETWEEN DOOR UNITS INTERFACE AND COLUMN

## STANDARD PROGRAMMING (EXAMPLES)

Example 1: activation of special
decoder after pressing the pedestrian door lock release button of any system user.

VV. 016 - Special service decoder must be configured as follows:
Program the event:
B 1)press the pedestrian door lock release button from apartment
$\square \quad$ Station (default)

- release button from apartment
station
$3)$ press the call button to
switchboard from apartment station $\square$ 4) press the special function
$\square$ 5) sending the pedestrian door lock release command from
switchboard
$\square$ 6) sending the driveway door switchboard


Follow the indications provided in the instruction booklet in the "OPERATING MODE" chapter.

Example 4: activation of special decoder after pressing the intercom call button of any system user.

VV. 017 - Special service decoder must be configured as follows:

CODE


Set a unique code on decoder with the dip-switch 1 in OFF position.

Program the apartment station button to perform a direct intercom call to the decoder

Program the event:
$B$ intercom call sending from apartment station to special decoder

Toggle
time:
$00: 00$

Follow the indications provided in the instruction booklet in the the instruction booklet i
xample 2: activation of special decoder after pressing the driveway door lock relese button of any system user in riser 1.

VV. 016 - Special service decoder must be configured as follows:
Program the event:
$\square$ 1)press the pedestrian door lock release button from apartment
\& 2) press the driveway door lock 2) press the driveway door lock
station 3) press the call button to
switchboard from apartment station $\square$ 4) press the special function
5) sending the pedestrian door lock release command from
switchboard
$\square$ 6) sending the driveway door lock release command from ard


Follow the indications provided in the instruction booklet in the "OPERATING MODE" chapter.

Example 5: activation of special decoder after pressing the intercom call button of any system user in riser 1.

```
VV.017 - Special service decoder must
be configured as follows:
                CODE
OOFF
```

Set a unique code on decoder with the dip-switch 1 in OFF position.

Program the apartment station button to perform a direct intercom call to the decoder

Program the event:

- intercom call sending from apartment station to special decoder


Toggle
time:
$00: 00$

Follow the indications provided in the instruction booklet in the the instruction booklet in

Example 3: activation of special decoder after pressing the driveway door lock release button of user 4 in riser 1.

VV. 016 - Special service decoder must be configured as follows:
Program the event:
$\square$ 1)press the pedestrian door lock
release button from apartment
\& 2) press the driveway door lock 2) press the driveway door loc
station 3) press the call button to
switchboard from apartment station $\square$ 4) press the special function
$\square 5)$ sending the pedestrian door lock release command from switchboard
$\square$ 6) sending the driveway door lock release command from switchboard


Follow the indications provided in the instruction booklet in the "OPERATING MODE" chapter.

Example 6: activation of special decoder after pressing the intercom call button of user 4 in riser 1.

```
VV.017 - Special service decoder must
be configured as follows:
                                    CODE
OOFF
```

Set a unique code on decoder with the dip-switch 1 in OFF position.

Program the apartment station button to perform a direct intercom call to the decoder

Program the event:

1. intercom call sending from apartment station to special decoder


Follow the indications provided in the instruction booklet in the the instruction booklet in

Example 7: activation of special
decoder after pressing the pedestrian
door lock release command from
switchboard.

VV. 016 - Special service decoder must be configured as follows:
Program the event:
$\square$ 1)press the pedestrian door lock release button from apartment
station (default)
$\square$ 2) press the driveway door lock
release button from apartment
$\square \quad$ 3) press the call button to

- Switchboard from apartment station

4) press the special function
button from apartment station
i. 5) sending the pedestrian door
lock release command from
$\square \begin{aligned} & \text { switchboard } \\ & 6 \text { ) sending the driveway door }\end{aligned}$ lock release command from switchboard


| $\square$ (JUMPER) | (irrelevant <br> for events 5-6) |
| ---: | :--- |
| SCQ |  |
| (JUMPER) | Toggle <br> time: |
|  | $00: 00$ |

Follow the indications provided in the instruction booklet in the "OPERATING MODE" chapter.

Example 8: activation of special
decoder after sending special code from main outdoor station or switchboard.

VV. 018 - Special service decoder must be configured as follows:
Program the event:
B sending of special code from outdoor station or switchboard


Follow the indications provided in the instruction booklet in the "OPERATING MODE" chapter.


Example 9: activation of special decoder after sending special code from any secondary outdoor station.

VV. 019 - Special service decoder must be configured as follows: Program the event:
B sending of special code from outdoor station or switchboard


Follow the indications provided in the instruction booklet in the "OPERATING MODE" chapter.


SV124-1164


SV124-1164




SV124-1158



## PROGRAMMING EXAMPLES FOR BASIC SYSTEMS

## PROGRAMMING EXAMPLES FOR BASIC SYSTEMS

This section contains some examples of devices programming. Indications concern base systems; for other system types not present in this section or for programming of optional or specific functions, see sections dedicated to each product and section 2.
Programmings can be associated to diagrams in section 6, as shown in the following table:

| $\qquad$ | 1.1 | 1.2 | 1.5 | 2.1 | 2.2 | 2.3 | 2.4 | 2.5 | 3.1 | 3.2 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SC124-0278 |  |  | $\checkmark$ | $\checkmark$ |  |  |  |  |  |  |
| SC124-0280 |  |  | $\checkmark$ |  | $\checkmark$ |  |  |  |  |  |
| SC124-0281 |  |  | $\checkmark$ |  |  | $\checkmark$ |  |  |  |  |
| SC124-0296 |  |  | $\checkmark$ |  |  |  | $\checkmark$ |  |  |  |
| SC124-0282 |  |  | $\checkmark$ |  |  |  |  | $\checkmark$ |  |  |
| SC124-0307 |  |  | $\checkmark$ | $\checkmark$ |  |  |  |  | $\checkmark$ |  |
| SV124-0954 | $\checkmark$ |  |  | $\checkmark$ |  |  |  |  |  |  |
| SV124-0955 |  | $\checkmark$ |  |  | $\checkmark$ |  |  |  |  |  |
| SV124-0997 |  | $\checkmark$ |  |  |  | $\checkmark$ |  |  |  |  |
| SV124-0962 |  | $\checkmark$ |  |  |  |  | $\checkmark$ |  |  |  |
| SV124-0963 |  | $\checkmark$ |  |  |  |  |  | $\checkmark$ |  |  |
| SV124-1098 | $\checkmark$ |  |  | $\checkmark$ |  |  |  |  | $\checkmark$ |  |
| SV124-1155 |  | $\checkmark$ |  |  | $\checkmark$ |  |  |  | $\checkmark$ |  |
| SV124-1156 |  | $\checkmark$ |  |  |  | $\checkmark$ |  |  | $\checkmark$ |  |
| SV124-1100 |  | $\checkmark$ |  |  |  |  | $\checkmark$ |  |  | $\checkmark$ |
| SV124-1099 |  | $\checkmark$ |  |  |  |  |  | $\checkmark$ |  | $\checkmark$ |

## 1 PROGRAMMING OF COLUMN DEVICES

### 1.1 CONNECTION OF A COLUMN ON A RISER WITH DISTRIBUTORS

If the column is realized with a single riser, program devices as follows:

(*) see apartment station settings tables par. 4

### 1.2 CONNECTION OF A COLUMN ON SEVERAL RISERS WITH DISTRIBUTORS

If the column is split in more than one riser, program devices as follows (the number of users in each riser is not relevant):
PROGRAMMING EXAMPLES FOR BASIC SYSTEMS


### 1.3 CONNECTION OF APARTMENT STATIONS WITH CALL IN PARALLEL

In order to call two or more apartment stations at the same time, set the CODE parameter to the same value and change INT parameter values. The connection of apartment stations in parallel can be in/out mode and derived from a distributor.

(*) $^{\star}$ see apartment station settings tables par. 4

### 1.4 IN/OUT CONNECTION OF A RISER



(*) see apartment station settings tables par. 4

## 2 STREET SIDE DEVICES PROGRAMMING

### 2.1 CONNECTION OF A COLUMN TO A CALL STATION



### 2.2 CONNECTION OF A COLUMN SPLIT ON 4 RISERS TO 2 CALL STATIONS

2.2.1 EXAMPLE OF DOOR UNITS PROGRAMMING, ONE MAIN AND THE OTHER SECONDARY

2.2.2 EXAMPLE OF DOOR UNITS PROGRAMMING, BOTH MAIN

(**) see call stations setting tables par. 5
(\#) see column interface settings par. 6

2.3 CONNECTION OF A COLUMN SPLIT ON 4 RISERS TO 4 CALL STATIONS
2.4 CONNECTION OF 16 COLUMNS MAX. (EACH ONE WITH TWO SECONDARY CALL STATIONS) TO A MAIN CALL STATION

$\qquad$
URTIU PROGRAMMING EXAMPLES FOR BASIC SYSTEMS
2.5 CONNECTION OF N COLUMNS (EACH ONE WITH TWO SECONDARY CALL STATIONS) TO 4 MAIN CALL STATIONS


3 CONCIERGE SWITCHBOARD PROGRAMMING
3.1 SWITCHBOARD CONNECTION IN COLUMN

SWITCHBOARD


SWITCHBOARD WITH VIDEO MODULE

3.2 VIDEO SWITCHBOARD CONNECTION ON STREET SIDE BRANCH


## 4 APARTMENT STATION SETTINGS TABLES

### 4.1 SIGNO APARTMENT STATIONS

The dip-switch settings described in this paragraph are valid for the following devices:
Ref. 1140/2
Ref. 1140/3
Ref. 1740/1 (*)
Ref. 1740/40 (*)
Ref. 1740/41 (*)
Ref. 1740/42 (*)

## white door phone

white door phone with additional buttons black/white video door phone, white colour video door phone, white colour video door phone, anthracite colour video door phone, platinum
(*) settings for the bracket Ref. 1740/83
"CODE" parameter



### 4.2 FOLIO AND AIKO APARTMENT STATIONS

The dip-switch settings described in this paragraph are valid for the following devices:
Folio Ref. 1706/5 colour video door phone, black Folio Ref. 1706/6 colour video door phone, white Aiko Ref. 1716/1 colour video door phone, black Aiko Ref. 1716/2 colour video door phone, white
"CODE" parameter



USER 84


USER 91


USER 98


USER 105


USER 112



USER 85


USER 92


USER 106


USER 113


USER 120



USER 127


USER 86


USER 93


USER 100


USER 114


USER 121


USER 87


USER 94


USER 108


USER 122


USER 95


USER116



USER 89


USER 96


USER 103


USER 117



USER 97


USER 104

"INT" parameter

"Z" line termination parameter
Termination active


### 4.3 ATLANTICO APARTMENT STATIONS

The dip-switch settings described in this paragraph are valid for the following devices:
Ref. 1183/1 white door phone
"CODE" parameter


USER 0


USER 7


USER 14


USER 21


USER 28


USER 35


USER 42


USER 49


USER 56


USER 63


USER 70


USER 77


USER 8


USER 22


USER 29


USER 36


USER 43


USER 50


USER 57


USER 64


USER 71



USER 16


USER 23


USER 30


USER 37

|  |
| :---: |
|  |  |
|  |  |

USER 44


USER 51


USER 58

|  |
| :---: |
|  |  |
|  |  |

USER 65


USER 72


USER 79


USER 10


USER 17


USER 31


1234567
USER 38


USER 45


USER 52


USER 59

| ON |  |  |
| :---: | :---: | :---: |
| $\square \square \square \square \square \square \square \square \square \square$ |  |  |
| 12345678 |  |  |

USER 66


USER 73


USER 11


USER 18


USER 32


USER 39


USER 53


USER 60


USER 67


USER 74




USER 87


USER 94


USER 98


USER 105


USER 119


USER 126


USER 93


USER 107


USER 114


USER 121


USER 108


12345678



USER 96


USER 103


USER 110
USER 109


USER116


USER 117



USER 97


USER 104


USER 118


## Z" line termination parameter

Termination active
$\mathrm{Z}=\mathrm{ON}$


Termination not active
Z = OFF

CALL STATION SETTINGS TABLES

## 5 CALL STATION SETTINGS TABLES

### 5.1 SINTHESI CALL STATIONS

The dip-switch settings described in this paragraph are valid for the following devices:
Ref. 1083/72 camera module and 2-button door unit
Ref. 1083/7 2-button door unit module
For Sinthesi call module settings, see programming procedure described in section 3B of the manual. "ID" parameter

"AUX" parameters

|  |  | OFF |  | ON |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| AUX 1 | Station type |  | Main |  | Secondary |
| AUX 2 | Secondary station address |  | Secondary 0 |  | Secondary 1 |
| AUX 3 | Door opener |  | Free |  | Privacy |
| AUX 4 | Interruption |  | On |  | Off |
| AUX 5 | Camera lights |  | Off |  | On |

"DOOR TIME" parameter

"CONV TIME" parameter


### 5.2 MIKRA CALL STATIONS

The dip-switch settings described in this paragraph are valid for the following devices:
Ref. 1783/1 push button panel with colour camera and door unit
Ref. 1783/2 push button panel with black/white camera and door unit
"ID" parameter

"AUX" parameters


Parametro "DOOR TIME"


Parametro "CONV TIME"


### 5.3 EXIGO CALL STATIONS

The dip-switch settings described in this paragraph are valid for the following devices:
Ref. 1083/8 door unit
"ID" parameter


|  |
| :---: |
|  |  |
|  |  |
|  |  |
|  |  |


"AUX" parameters

AUX 1 Station type

AUX 2 Secondary station address

AUX 3 Door opener

AUX 4 Interruption

AUX 5 Not used

| OFF |  | ON |  |
| :---: | :---: | :---: | :---: |
|  | Main |  | Secondary |
|  | Secondary 0 |  | Secondary 1 |
|  | Free |  | Privacy |
|  | On |  | Off |
| ON <br> MrO <br> 12345 | -- |  | -- |

"DOOR TIME" parameter

"CONV TIME" parameter


## 6 COLUMN INTERFACE SETTINGS TABLES

The dip-switch position described in this paragraph is valid for the column interface Ref. 1083/50.
"CODE 1" parameter


Line IN connected

"CODE 2ㅜㅇ" parameter


COLUMN 0

"Z" line termination parameter


Termination not active $Z=O F F$

Today, you can observe, retrieve information, choose and add all Urmet products to your system estimate with a few simply clicks of a mouse on your computer without having to browse, read and understand catalogues and manuals.
This and more thanks to our "Domus Draw" program which has now become an indispensable working tool for professionals (installers, wholesalers, retrofitters, architects, etc.).

Domus Draw implements a few, simple commands for:

- Creating and saving all system estimates either automatically and/or manually.
- Printing estimates to paper or pdf file
- Creating system estimates using different user modes.
- Retrieving information about systems and applications by consulting instruction booklets and technical documents of the various products or consulting the wiring diagrams of the system to be created.
- Watching demo footage with sound for easily understanding how to use the program.
- Connecting to the Urmet web site to find out about new features and get real-time updates.
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PER LE SEGUENTI ATTIVITA'
FOR THE FOLLOWING ACTIVITIES
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Progettazione, sviluppo e produzione di sistemi di citofonia, videocitofonia, sicurezza e telefonia
Design, development and production of door entryphone systems, video door entryphone systems, security systems and telephone systems
Riferirsi al manuale della qualità per l'applicabilità dei requisiti della norma ISO 9001:2000 Refer to quality manual for details of applications to ISO 9001:2000 requirements

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30 novembre $1995 \quad 17$ marzo 2003


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[^0]:    4 This relay is NOT suitable to manage directly power loads, but can only be used as command relay.

[^1]:    The number of name holders could be reduced according to distance and section of the used cable.

[^2]:    (\#); (§) alternative
    $\left({ }^{\circ}\right)$ optional, alternative

[^3]:    PUSH BUTTON PANEL

[^4]:    (*) not expandable system

