# Exigo PANEL WITH DOOR UNIT AND DIGITISER 

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

## SECTION CONTENTS

SECTION CONTENTS
PUSH BUTTON PANEL EXIGO ..... 2
ELECTRICAL AND MECHANICAL SPECIFICATIONS ..... 2
HOW TO FORM THE PANEL CODE ..... 2
LOUDSPEAKING UNIT WITH BUILT-IN DIGITALIZER DEVICE Ref. 1072/19A. .....  3
Performance ..... 3
Structure ..... 3
Description of terminal boards ..... 3
Technical specifications ..... 3
Default programming ..... 4
Connections ..... 4
Function. ..... 4
Adjustments. ..... 4
16-PUSHBUTTON EXPANSION MODULE Ref. 1038/17 ..... 5
Description of terminals ..... 5
Technical specifications ..... 5
TV CAMERA UNIT ..... 5
Technical specifications ..... 5
Camera unit assembly. ..... 5
Camera lens direction adjustment ..... 6
CAMERA ADAPTER Ref. 1742/13A ..... 7
Adapter installation ..... 7
PANELS FOR SINTHESI FLUSH-MOUNTING BOXES ..... 8
Flush-mounting boxes ..... 8
Door unit installation procedure ..... 9
Name tag back-lighting led fastening procedure .....  9
Name tag assembly and front panel fastening procedure ..... 10
PANELS FOR DEDICATED FLUSH-MOUNTING BOXES ..... 10
Flush-mounting boxes ..... 11
Door unit installation procedure ..... 11
Name tag back-lighting led fastening procedure ..... 12
Name tag assembly and front panel fastening procedure ..... 12DOOR PHONE SYSTEMS IN SINTHESI BOXESExamples of modular constructions with various capacities13
VIDEO DOOR PHONE SYSTEMS IN SINTHESI BOXESExamples of modular constructions with various capacities14
DOOR PHONE SYSTEMS IN DEDICATED BOXES
Examples of modular constructions with various capacities ..... 15
VIDEO DOOR PHONE SYSTEMS IN DEDICATED BOXESExamples of modular constructions with various capacities 16
PROGRAMMING See section 1A

## ELECTRICAL AND MECHANICAL SPECIFICATIONS

Urmet
HOW TO FORM THE PANEL CODE

## PUSH BUTTON PANEL EXIGO

Exigo is the new, 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 SPECIFICATIONS

AND
MECHANICAL

| 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: | white LED diodes |
| Temporary name tags: | Plexiglas |
| Max. wire cross-section area for button and light terminals: | $1.5 \mathrm{~mm}^{2}$ |
| 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.

## HOW TO FORM THE PANEL CODE

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


Engraved font:
0 - none
1-SL43
2 - Aero
Number of engraved lines:
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


SL43 FONT


EXAMPLE OF NAME TAG CUSTOMISATION
PVC PLATE - SL43 FONT


BRASS PLATE - STENCIL FONT

LEMMES

## STRUCTURE

The door unit with digitiser consists of the following parts:


1 Speaker.
2 Main terminal board.
3 Simplified programming dip-switch.
4 Programming adapter connector Ref. 1072/60.
5 Simplified programming button and LED.
6 Microphone.
7 Microphone volume adjustment.
8 Speaker volume adjustment.
9 Button terminal board.
10 Expansion connector Ref. 1038/17.

## DESCRIPTION OF TERMINAL BOARDS

## System terminal boards

NO Electrical lock relay normally open contact
NC Electrical lock relay normally closed contact
C Relay exchange electrical lock common contact
~12 Relay power for electrical lock
~0 Relay power for electrical lock
SN Video power unit on signal for video door phone systems
R Video switching enable signal for video door phone
systems
R1 Video power earth
L1 Bus Line 1st connector
L2 Bus Line 2nd connector
GND Reference earth PA, SP.
SP Open door sensor contact input (closed with closed door)
PA Hall door opener button input (normally open)

## Button terminal boards

P1 $\div$ P18 User button inputs
C Button reference earth

## TECHNICAL SPECIFICATIONS

- Stand-by consumption:
- Active voice consumption:
- Relay contact:
- R, SN signal:
- Working temperature range:
- Humidity:
6.5mA max. 40mA max. 30V 2A
Imax $=80 \mathrm{~mA}$
$-10 \div+50^{\circ} \mathrm{C}$ $90 \%$ RH at $30^{\circ} \mathrm{C}$


## DEFAULT PROGRAMMING

 program the device.The device default settings are:

- System type:
- Station type:
- Code format:
- Station number:
- Off-hook waiting time:
- Busy time:

Code button association
LLLL P1
1002 P2
. .

2nd edition main numeric (0001-9999) 1

- 40 s 20s
- Door opener time: 3s

1082 P82
To restore default settings, insert the programming device and hold bs (back space) button pressed for longer than three seconds until you hear a beep.
Alternatively, without the programming device, hold the programming button (5) pressed for longer than three seconds until you hear a beep.

## CONNECTIONS

IMPORTANT: Observe the instructions contained in section 1 for wiring and maximum distances.

Up to 18 user buttons can be connected directly to the door unit. When a higher number of user is required, a Ref. 1038/17 expansion module can be connected. This allows the addition of 16 user buttons to the 18 basic buttons. Up to four expansion units can be potentially connected to each door unit, for a total of 82 user buttons.
Position two call units side by side if a station with more than 82 users is required. The door unit is programmed by default with a jumper between the earth and the "SP" signal to simulate the door closed contact. Remove the jumper and connect the sensor between GND and SP when the open door contact is required.
Internal calling station circuits are power by bus voltage.

## FUNCTION

## CALLS

Up to 82 users can be potentially called by pressing the corresponding buttons on the panels associated to the door unit with digitiser Ref. 1072/19A.
Additionally, a concierge switchboard Ref. 1072/42 can be called, simply by pressing a call button associated to code 0000 during programming (day mode only). A courtesy ring, similar to that generated on a called door phone, will be heard.

## STAIRCASE LIGHTS FUNCTION

Press the button programmed for this function. A command will be sent to the special decoder and a confirmation beep will be heard. The staircase light function is assigned to button P1 by default.
If the staircase lights button is pressed during the programming procedure, it will be reprogrammed with the user code corresponding to the position.

## BUSY FUNCTION

This function is only required in systems with more than one calling device. This function is used to ensure that a conversation lasts sufficiently long following a call. An intermittent beep will be heard on the speaker for the time before the busy time-out and the panel will be disabled

Two cases can occur:

## BUSY TIME BEFORE THE CALL USER GOES ON-HOOK

This is the maximum time for the user to lift the handset or open the door without loosing the call after the ring.

BUSY TIME AFTER USER GOES ON-HOOK
This is the minimum guaranteed conversation time from when the handset is lifted.

## ADJUSTMENTS

## VOLUME REGULATION

Volume levels are calibrated by default so not to require adjustments in most cases.
Use a screwdriver to adjust the trimmers if required.

## TROUBLESHOOTING

Establishing the cause of problems related to a door unit with digitiser Ref. 1072/19A is simple (e.g. no courtesy tone after a call button is pressed):

- Short-circuit on push-button panel side (L1, L2).
- Neither bus couplers are programmed as masters


## TV CAMERA UNIT Ref. 1810/40



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

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


## TECHNICAL SPECIFICATIONS

## Lens:

standard
Shutter:
Focus: standard

Minimum light for acceptable pictures:
Coax video output:
Frequency:
,2 Lux min

Operating temperature range:
Power voltage:
Maximum uptake: composite CCIR 50 Hz $-5 \div 50^{\circ} \mathrm{C}$ $13 \div 26$ Vdc 120 Max CCD 1/4"

## CAMERA UNIT ASSEMBLY

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


- Consumption:
- Current in user button:
- Working temperature range:
- Humidity:

1mA Max
~1mA
$+0^{\circ} \mathrm{C}-+50^{\circ} \mathrm{C}$ $90 \%$ RH at $30^{\circ} \mathrm{C}$



PUSH BUTTON PANEL EXIGO


## DESCRIPTION OF TERMINAL BOARDS

| T | Camera on control in digital systems |
| :--- | :--- |
| R2 | Camera power positive in digital systems |
| +TC | Camera power positive in analogic systems |
| R1 | Camera power negative |
| V5/B | Video signal earth |
| V3/A | Video signal |

## 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.
$\qquad$

IMAGING ANGLES


Measurements in centimetres

CAMERA ADAPTER Ref. 1742/13A


The device is used in Bibus II^ Ed. VOP video door phone systems. It transforms the composite video signal from the camera into two different video signals (A and B).

## ADAPTER INSTALLATION

1. Insert the adapter device to the side of the TV camera unit and secure it with the screw provided
2. Remove connector $\mathbf{A}$ from the TV camera module.
3. Insert connector $\mathbf{A}$ in the coupling of the device and connector $\mathbf{B}$ in the coupling of the TV camera.
4. Position the conductors inside the groove of the device.


## 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
Ref. 1143/101
with 2 calling buttons Ref. 1143/102
with 3 calling buttons $\qquad$ Ref. 1143/103
with 4 calling buttons Ref. 1143/104
with 5 calling buttons Ref. 1143/105
with 6 calling buttons with 7 calling buttons Ref. 1143/106
with 8 calling buttons Ref. 1143/107 with 10 calling buttons _-

## Video door phone panels

with 1 calling button $\qquad$
with 2 calling buttons $\qquad$ Ref. 1743/102
with 3 calling buttons Ref. 1743/103
with 4 calling buttons with 5 calling buttons
$\qquad$ Ref. 1743/104
with 6 calling buttons Ref. 1743/105
with 7 calling buttons
$\qquad$ Ref. 1743/106
with 8 calling buttons Ref. 1743/107
with 9 calling buttons Ref. 1743/108
with 10 calling buttons Ref. 1743/109

Fill in the order form 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.


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 box +15 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 $>8$ , and then drill at the points indicated by $\sim \infty$.


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

## SINGLE LED CIRCUIT



MULTIPLE LED CIRCUIT


## NAME TAG ASSEMBLY AND FRONT PANEL FASTENING PROCEDURE

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)

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
Ref. 1121/103
with 4 calling buttons
Ref. 1121/105
with 5 calling buttons
Ref. 1121/105
with 6 calling buttons
Ref. 1121/106

## Door phone panels with 2 rows of buttons

with 4 calling buttons
Ref. 1121/204
with 6 calling buttons ............................................................................. Ref. 1121/206
with 8 calling buttons
Ref. 1121/208
with 10 calling buttons .................................................. Ref. 1121/210
with 12 calling buttons .................................................... Ref. 1121/212
with 14 calling buttons
Ref. 1121/214
with 16 calling buttons ................................................... Ref. 1121/216
with 18 calling buttons .................................................. Ref. 1121/218
with 20 calling buttons .................................................. Ref. 1121/220
Video door phone panels with 1 row of buttons
with 3 calling buttons Ref. 1721/103
with 4 calling buttons
Ref. 1721/104
with 5 calling buttons Ref. 1721/105
with 6 calling buttons
Ref. 1721/106

## Video door phone panels with 2 rows of buttons

with 4 calling buttons
Ref. 1721/204
with 6 calling buttons
Ref. 1721/206
with 8 calling buttons Ref. 1721/208
with 10 calling buttons Ref. 1721/210
with 12 calling buttons Ref. 1721/212
with 14 calling buttons ............................................................................Ref. 1721/214
with 16 calling buttons Ref. 1721/216
with 18 calling buttons Ref. 1721/218
with 20 calling buttons 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 BOX INSTALLATION PROCEDURE

Apply 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 $=1.5$ mm.

## DOOR UNIT INSTALLATION PROCEDURE

1 ROW OF BUTTONS


2 ROWS OF BUTTONS


Screws $B$ are provided with the door unit

## 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.


## NAME TAG ASSEMBLY AND FRONT PANEL FASTENING PROCEDURE

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.


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


|  |  | 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 | 1072/19A | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| $\begin{aligned} & \text { EXPANSION } \\ & \text { MODULE } \end{aligned}$ | 1038/17 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| FLUSH- | 1145/52 | 1 | 1 |  |  |  |  | 2 | 2 |  |  |
| MOUNTING | 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 |
|  |  |  |  | U1 | TO | S | N | M | E |  |  |



PUSH BUTTON PANEL EXIGO

|  |  | 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 | 1072/19A | 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 COLOURS | 1810/40 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| ADAPTATION DEVICE | 1742/13A | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| FLUSH- | 1145/53 | 1 | 1 |  |  |  |  | 2 | 2 | 2 | 2 |
| MOUNTING | 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 |  |  |  |  |  |  |  |  |  |







