

OWNER'S MANUAL

DIGITAL CONFERENCE SYSTEM



H-3300 SERIES

INDICE

1. IMPORTANT SAFETY INSTRUCTIONS-----1
2. DESCRIPTION-----4
3. CONTROLLER FRONT PANEL FUNCTIONS AND CONTROLS - H-3300-----4
4. CONTROLLER REAR PANEL FUNCTIONS AND CONTROLS - H-3300-----4
5. CHAIRMAN AND DELEGATE UNIT FUNCTIONS AND CONTROLS-----5
6. INSTALLATION AND CONNECTION-----5
7. HOW TO USE THE SYSTEM-----7
8. EXTENSION POWER UNIT FRONT PANEL FUNCTIONS AND CONTROLS-----9
9. EXTENSION POWER UNIT REAR PANEL FUNCTIONS AND CONTROLS-----9
10. EXPANSION UNIT CONNECTION-----10
11. TECHNICAL FEATURES-----12

1. IMPORTANT SAFETY INSTRUCTIONS



CAUTION: To reduce the risk of electric shock do not remove cover (or back panel). No user serviceable parts inside. Refer servicing to qualified personnel only.

WARNING: To reduce the risk of fire or electric shock, do not expose this apparatus to rain or moisture.



This symbol is intended to alert the user of the presence of uninsulated dangerous voltage within the product enclosure that may be of sufficient magnitude to constitute a risk of electric shock to persons.



This symbol is intended to alert the user of the presence of important operating and maintenance (servicing) instruction in the literature accompanying the appliance. Please carefully read the owner's manual.

INSTRUCTIONS:

All safety and operating instructions should be read before the product is operated.

Retain these instructions:

All safety and operating instructions should be retained for future reference.

This owner's manual should be considered as a part of the product, it must accompany it at all times, and it needs to be delivered to the new user when this product is sold. In this way the new owner will be aware of all the installation, operating and safety instructions.

Heed all warnings:

All warnings on the product and in owner's manual should be adhered to.

Heed all warnings.

Follow all instructions:

All operating and user's instructions must be followed.

Sentences preceded by  symbol contain important safety instruction. Please read it carefully.

DETAILED SAFETY INSTRUCTIONS.

Water and moisture:

This apparatus should not be used near water (i.e. bathtub, kitchen sink, swimming pools, etc.)

Ventilation:

This apparatus should be placed in a position that doesn't interfere with its correct ventilation. This unit, for example, should not be placed on a bed, sofa cover or similar surfaces that could cover ventilation openings, or placed in a built-in installation, such a bookcase or a cabinet that could block air flow through ventilation openings.

Heat:

This apparatus should be placed away from sources of heat, like radiators, heat registers, stoves or other products (including amplifiers) that produce heat.

Power sources:

- This apparatus should only be connected to a power source of type specified in this owner's manual or on the unit.
- If the supplied AC power cable plug is different from wall socket, please contact an electrician to change the AC power plug.
-

Grounding or Polarization:

- All precautions must be observed in order to avoid defeating grounding or polarization.
- Unit metal parts are grounded through the AC power cord.
- If the AC power outlet doesn't have grounding, consult an electrician for outlet grounding.

Power cable protection:

The power cable should be routed in such a way that it will not be walked on or pinched by items placed upon or against it, paying particular attention to cables at their connections, receptacles and wall outlet.

Cleaning:

- You can clean the exterior of the unit with compressed air or a damp cloth.
- Don't clean the unit using solvents like trichloroethylene, thinners, alcohol, or other volatile or flammable fluids.

Non use periods:

The unit AC power cable should be unplugged from the outlet if it's unused for long periods.

Objects or liquid entry into the unit:

Be careful that no objects fall into the unit or that no liquid is spilled inside the unit through ventilation openings.

Safe power line use:

- Hold the plug and the wall outlet firmly while disconnecting the unit from AC power.
- When the unit will not be used for a long period of time, please unplug the power cord from AC power outlet.
- To avoid power cable damage, don't strain the AC power cable and don't bundle it.
- In order to avoid damage to the unit's power cable, be sure that the power cable is not walked on or pinched by heavy objects.

Unit relocation:

Before relocating the unit, please control the unit is turned off. The power cord must be unplugged from the wall outlet, and all the connecting cables should be disconnected as well.

Do not open this unit:

Do not attempt to open or repair this unit yourself. For any problem not described in this owner's manual, please refer to qualified personnel only or consult us or your National Distributor. Any improper operation could result in fire or electric shock.

Damages requiring services:

- Do not attempt to perform operations not described in this user's manual.
- In the following cases please refer to an authorized service center or skilled personnel:
 - When the unit works improperly or it doesn't work at all.
 - If power cord or plug is damaged.
 - If liquid has spilled, or objects have fallen into the unit.
 - The unit has been exposed to rain.
 - The unit doesn't operate normally or exhibits a marked change in performance.
 - If the product has been dropped or has been damaged in any way.

Maintenance:

The user shouldn't attempt maintenance not described in this user's manual. All maintenance should be performed by qualified personnel only.

IMPORTANT SAFETY INSTRUCTIONS:

- Install this unit following owner's manual instructions.
- Do not install, connect or disconnect power supply when the unit is powered, otherwise there is a high risk of electric shock.
- Do not open the unit, there are no user serviceable parts inside.
- If you detect a particular smell from the unit, please immediately turn it off and disconnect the AC power cord.
- Don't block the unit's ventilation openings.
- Avoid using this unit in overload for a long period.
- Don't force commands (switches, controls, etc.)
- To obtain good speaker wire contact, please tighten the screw terminals firmly.

- **⚠** For safety reasons, do not defeat the grounding connection. Grounding is for user safety.
- Use only connectors and accessories suggested by the manufacturer. .
- This unit should be fitted in an equipment rack (see INSTALLATION) and kept far from:
 - Wet places
 - Direct exposure to heat sources (like sun light)
 - Improperly ventilated places
- Disconnect the power cord during storms or when the unit is not in use.
- **⚠** In order to prevent fire and reduce risk of electric shock, it is necessary to keep the unit far from dripping water. Please don't put cups, vases or other object containing liquids over the unit. In case of interference from source signal, THD value will raise over 10%. Don't place this unit in a bookshelf or in other enclosed spaces.
- We are not responsible for any damage that occurs due to a incorrect installation of the unit.

Thank you for choosing this product and for trusting our brand, which strives to be synonymous with professionalism, precision, high quality and reliability. All of our products comply with EC regulations regarding audio equipment for continuous use.

2. DESCRIPTION

This conference system uses digital technologies according to the European Community's IEC914 and ISO standards.

It is composed of a controller – H-3300 – and two microphone units – Delegate and Chairman – that feature high sensitivity, a wide frequency response, an internal loudspeaker and a cardioid electret microphone with a lighted ring for the visual identification of the microphone in use. The system is pre-cabled to ensure fast and easy installation.

The device may include up to 64 microphone units, daisy-chained on four independent lines (or a maximum of 30 microphone units on each line).

The system involves the use of several expansion units – H-08EX. Every expansion unit can support up to 60 microphone units divided on six lines (never use more than 30 microphone units on each line).

Adding four expansion units, the system can control up to 254 microphone units.

Main Functions:

- It directly powers and controls 64 microphone stations.
- President station has priority on others.
- Three operating modes: FREE MODE, LIMIT MODE and FIFO MODE
- One microphone input (MIC) and one line input (LINE) for external units.
- TAPE output for recordings and line output (LINE) for amplification (balanced and unbalanced).
- Microphone sensitivity level control.
- Support video and voting with video/voting processor

Product complies with CE regulations

3. CONTROLLER FRONT PANEL FUNCTIONS AND CONTROLS – H-3300

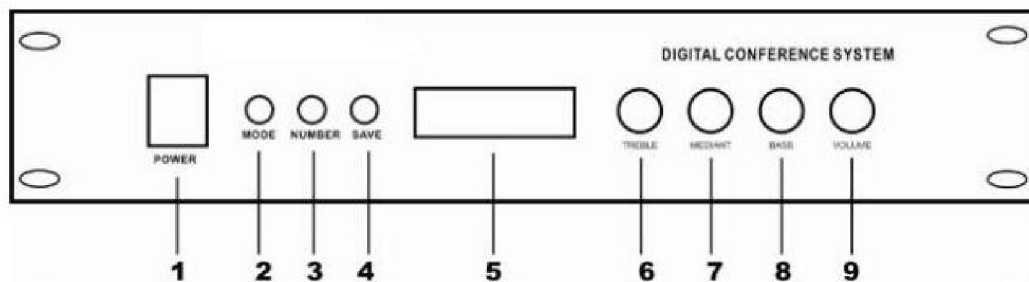


Fig.1

- ① POWER: Main power on/off switch
- ② MODE: Select the conference modes: FREE/LIMIT/FIFO
- ③ NUMBER: Select the active microphone number
- ④ SAVE: To save the mode and number setting
- ⑤ LCD display: To display the current system working mode
- ⑥ TREBLE: Sets the treble level of external speaker
- ⑦ MEDIANT: Sets the mediant level of external speaker
- ⑧ BASS: Sets the bass level of external speaker
- ⑨ VOL: Sets the system amplifier audio level of external speaker

4. CONTROLLER REAR PANEL FUNCTIONS AND CONTROLS - H-3300

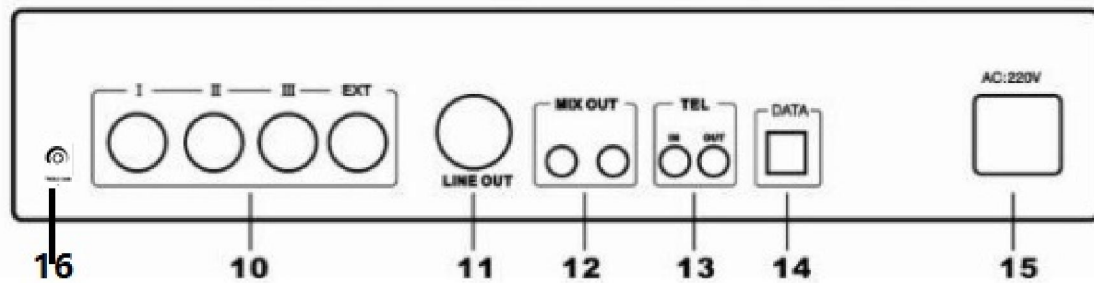


Fig.2

- ⑩ DELEGATES: 4 group input per Chairman/Delegate unit. Up to 30 units can be connected to each line (do not exceed this quantity), or up to 64 units total
- 11 LINE OUT: Balanced signal output (male XLR3). Connect mixer or amplifier to this output
- 12 MIX OUT: Unbalanced signal output (RCA) Left and right channel
- 13 TEL IN/OUT: Connect telephone coincidence to support telephone meeting.
- 14 DATA:RJ45 interface, use for connect video/voting processor to support video tracking & voting Function
- 15 AC POWER SOCKET: Power 230VAC 50/60Hz , FUSE 8A
- 16 TREBLE GAIN: Rotate this control counterclockwise to emphasize high frequencies

5. CHAIRMAN AND DELEGATE UNIT FUNCTIONS AND CONTROLS

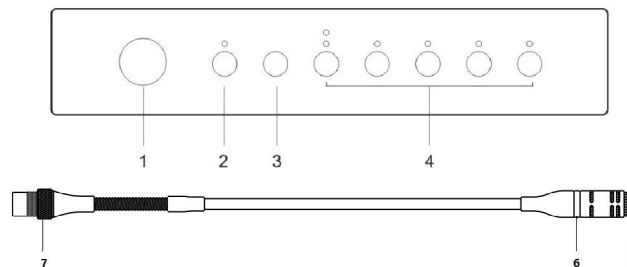


Fig.3

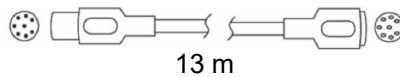
- ① Microphone socket to fixed the gooseneck microphone
- ② Microphone on/off key: Press this key to speak (the unit will be immediately enabled unless the limit of simultaneously enabled units has been reached), press again to turn off microphone
- ③ Priority key (for chairman unit only): When press and hold this key 1 second on chairman microphone unit, all active delegate microphones will be switched off.
- ④ Voting/Electing/Sign-in Key
- ⑤ Electret condenser cardioid microphone
- ⑥ Indicator light on active microphone: When microphone is active, indicator light switches on
- ⑦ Socket with screw thread

6. INSTALLATION AND CONNECTION

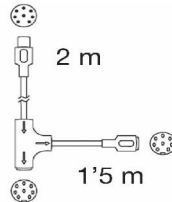
Connect the unit to 230 V AC 50/60 Hz mains . Use the connection cables provided to connect the daisy-chained microphone units to the 4 **Delegates (figure 2, ref. 10)** as shown in **figure 4**, paying attention not to connect more than 30 microphones units to each line and no more than 64 microphone units altogether. The configuration shown in figure 4 cannot allow more than 30 microphone units on each loop. In any case, the maximum limit of 64 microphone units cannot be exceeded. The system can host more than one Chairman microphone. They can be inserted at any position on the chain.

- ① - Prepare conference controller H-3300, chairman microphone, delegate microphone, main extension cable and microphone branch cable (Y type)
- The controller H-3300 is supplied with a main extension cable (13 m with one male DIN-8 connector for connection to the controller, one female DIN-8 connector for connection to the

microphone Y type branch cable), one male-female XLR cable, one RCA-6.3 mm jack audio cable and one power cable



- Chairman microphone and delegate microphone are supplied with a branch/interconnection Y type cable (2+1.5 meters) with one female DIN-8 connector for connection to the main extension cable or to the previous microphone, 2 male DIN-8 connector for connection to microphone and extend the line to the next microphone



- ② Connect the main extension cable (male DIN-8 13 m) to one of the sockets group (DELEGATES) of the controller. In each of the 4 lines you can connect 30 mics maximum. Connect the other end of the extension cable (female DIN-8 13 m) to Y type microphone branch cable (male DIN-8 2 m), connect the chairman or delegate microphone to the Y type microphone branch cable (male DIN-8 1.5 m), and the male DIN-8 connector to the next Y type microphone branch cable (female DIN-8 2m) to extend the microphones

Note: *Paying attention not to connect more than 30 microphones units to each line and no more than 64 microphone units altogether, microphone quantity in one system may decreased according to different microphone type and cable length.*

- ③ If desired, contact any of the line-level outputs (balanced XLR or unbalanced RCA) to the input of an amplifier.
- ④ Connect the controller to 230 V AC 50/60 Hz mains by power cable.
- ⑤ To talk on a microphone, please press the on/off key. When you finish talking, turn off the microphone by pressing the key again. If microphone is active, indicator light switches on.
- ⑥ When chairman press and hold the PRIOR key 1 second on chairman microphone unit, all active delegate microphones will be switched off and the chairman microphone will active.

For discuss function

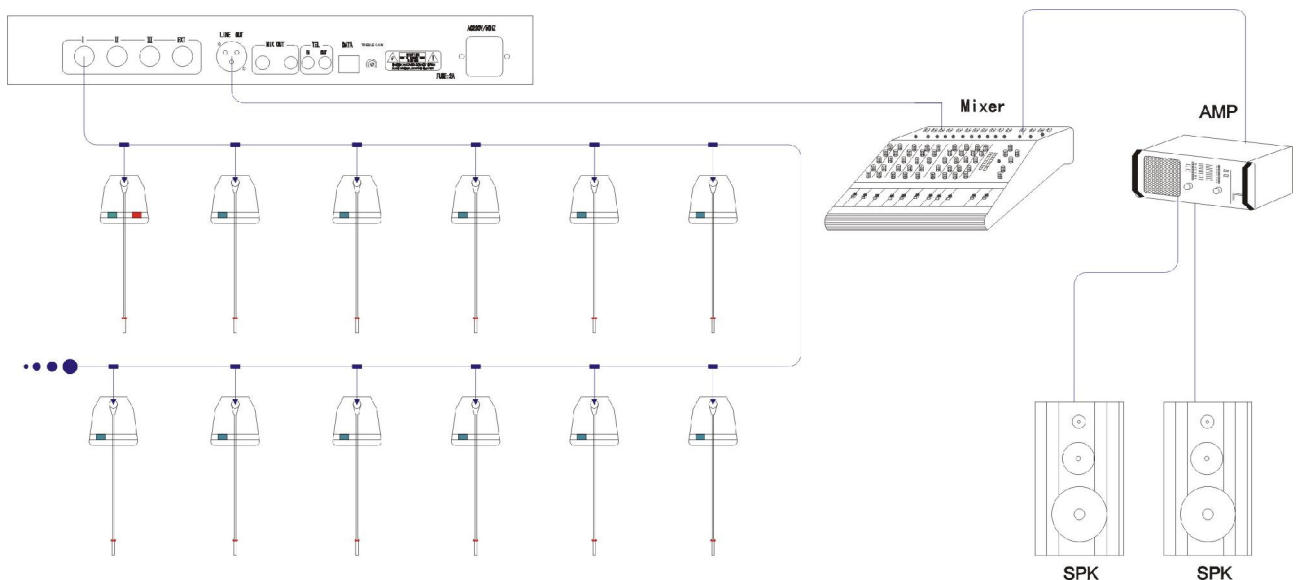
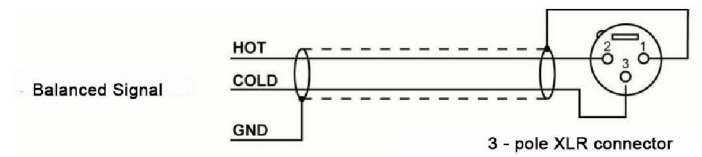


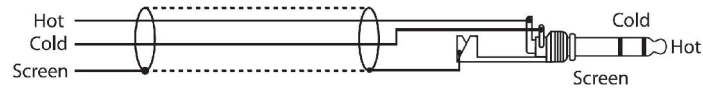
Fig.4

TYPE OF CONNECTIONS

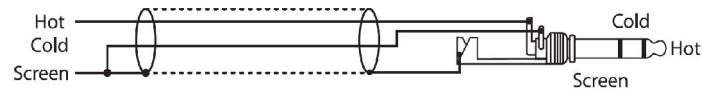
Balanced connection:



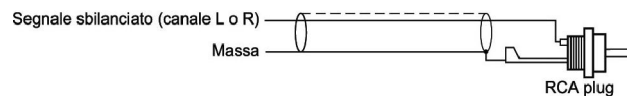
Balanced connection with TRS jack



Unbalanced connection with TRS jack



RCA Connection



7. HOW TO USE THE SYSTEM

Turn on controller, the controller LCD will display current working mode (**fig1. ref.5**)

MODES OF OPERATION:

- **FREE MODE**

When this mode is selected, the display will read FREE MODE. In this mode, an unlimited number of participants can speak simultaneously.

- **LIMIT MODE**

When this mode is selected, this display will show LIMIT MODE, plus the number of delegates that can speak simultaneously. Once this number of delegates is reached, no further delegates will be allowed to intervene until the number of active delegate stations again falls below this limit.

- **FIFO MODE**

When this mode is selected, the display will read FIFO MODE (First In-First Out), plus the number of delegates who can speak simultaneously. In this mode, the controller keeps track of the order in which the delegate stations are activated. Once the preset limit of simultaneous delegates has been reached, and a new delegate presses the **MIC ON/OFF** key (**fig. 3 ref. 2**) on his microphone base, the **FIRST** station that was active when this limit was reached will be made inactive, and the new delegate station will be activated.

Activation and Deactivation of previous Operating Modes

Using the **MODE** button (fig. 1 ref. 2), select the desired operating mode and press **SAVE** (fig. 1, ref. 4). If the mode requires a numeric limit of delegates, this can be selected pressing the **Number** button (fig. 1, ref. 3) and pressing **SAVE** to complete the setup.

FUNCTIONS:

- **C. ONLY MODE**

When this function is activated, the display will show "C.ONLY MODE" followed by the check mark "√". When deactivated, the display will show "X" beside this function.

C.ONLY MODE √:

When the PRESIDENT presses the **PRIORITY** key (fig. 3, ref. 3), all DELEGATES will be excluded, and the DELEGATE microphones will not reactivate when their **MIC ON/OFF** key is pressed. These will remain excluded until the PRESIDENT again presses the **MIC ON/OFF** key.

C.ONLY MODE X:

When the PRESIDENT presses the **PRIORITY** key (fig. 3, ref. 3), all DELEGATES will be excluded, but the DELEGATE microphones will be reactivated normally when their **MIC ON/OFF** keys are pushed.

In either case (C.ONLY MODE "√" or "X"), the number of DELEGATES who can speak simultaneously will be determined by the previously selected limit.

- **A. OFF MODE**

When this function is activated, the display will read A.OFF MODE followed by the check mark "√". When deactivated, the display will show "X" beside this function.

A.OFF MODE √:

All activated DELEGATE stations will be automatically deactivated after 45 seconds of inactivity. In order to speak again the delegate will have to press MIC ON/OFF again (fig. 3, ref. 2)

A.OFF MODE X:

There are no time limits for the activated DELEGATE bases

This function does not affect the PRESIDENT base

- **MUSIC MODE**

When this function is activated the display will read MUSIC MODE followed by the check mark "√". When deactivated, the display will show "X" beside this function."

MUSIC MODE √:

When the PRESIDENT presses the **PRIORITY** button (fig. 3, ref. 3), the DELEGATE speaker monitors will reproduce a warning tone.

MUSIC MODE X:

When the PRESIDENT presses the **PRIORITY** button (fig. 3, ref. 3), the DELEGATE speaker monitor will not produce a warning tone

- **AUTO CODING**

Each mic has a number ID which is affected (very important to setup the auto-track and voting function

Controller:

- The controller starts the setup of the mic code by turn on the controller+ hold and press **Number** button (fig. 1, ref. 3)
- For that, use the buttons **MODE** and **Number** to select the start number,once the selected start number, press **SAVE** button, operator can start coding, usually system setup the code from 1
- In general, you assign number 1 to the chairman mic.
- The first setting code will transmitted to all the delegate mic.

Microphone:

- This coding information is displayed on all the microphone LCD, press the on/off button of the corresponding mic to the affected the number.
- The other mics are always show the coding information but with an incremented number of a unit.
- All mic LED (**fig. 3, ref. 6**) will start flash during setup code, the LCD will off after setup code.
- Please restart the system to save the system code setup of mic

Activation/Deactivation of functions

Select a function using the scroll button **MODE** (**fig. 1, ref. 2**) and activate/disactivate pressing the **SET** button (**fig. 1, ref. 3**)

8. EXTENSION POWER UNIT FRONT PANEL FUNCTIONS AND CONTROLS

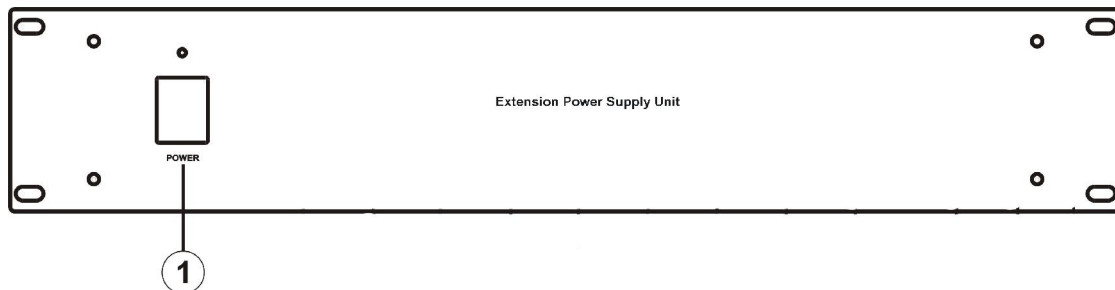


Fig.5

- ① POWER: Main power on/off switch

9. REAR PANEL FUNCTIONS AND CONTROLS

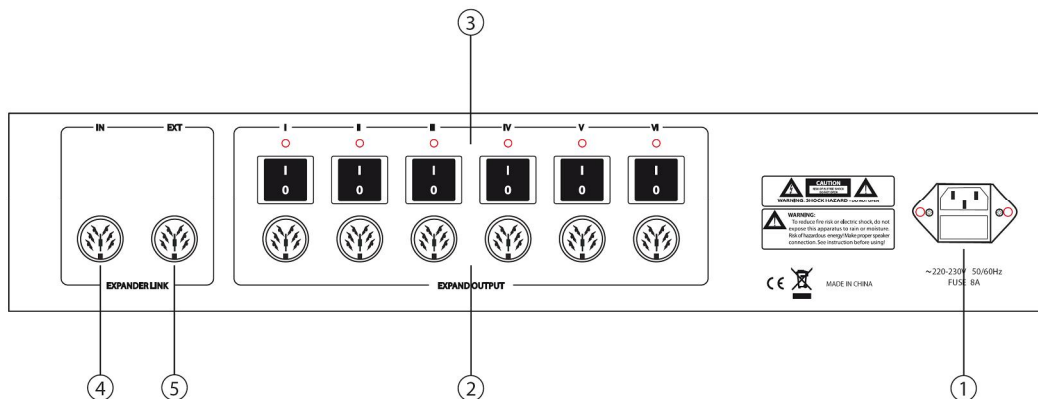


Fig.6

- ① AC POWER SOCKET: Power 230VAC 50/60Hz , FUSE 8A
- ② EXPANDER OUTPUT: 6 inputs for Chairman/Delegate units. Each line can be connected to up to 30 units (do not connect more than 30). One extension power unit can manage up to 60 units.
- ③ In-line Power Switches: After connecting the microphones to the system, set the switches of the lines involved on the "I" position. The LED light will indicate that the line is powered.
- ④ EXPANDER LINK IN: Connect this input to one of the 4 controller outputs using the cable Provided
- ⑤ EXPANDER LINK OUT: Connect this output to the next expansion unit input using the provided cable There is no limit to the number of expansion units that can be connected, yet the total number of manageable microphone units must not exceed 254.

10. EXPANSION UNIT CONNECTION

Method 1:

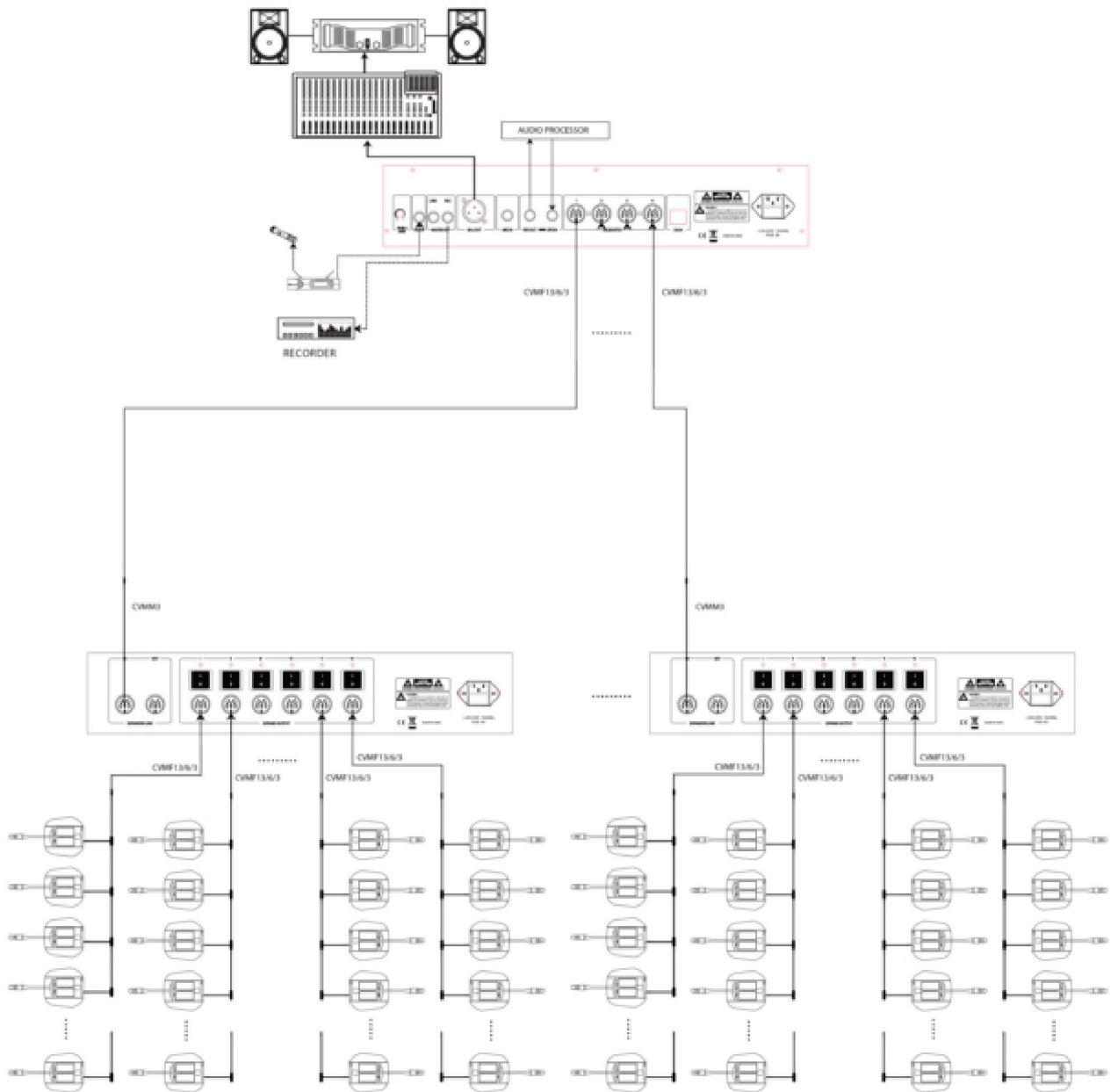


fig.7

Note:

Be sure to keep the shortest possible distance between the central unit and the last microphone. For long distances we advise opting for method 1.

Method 2:

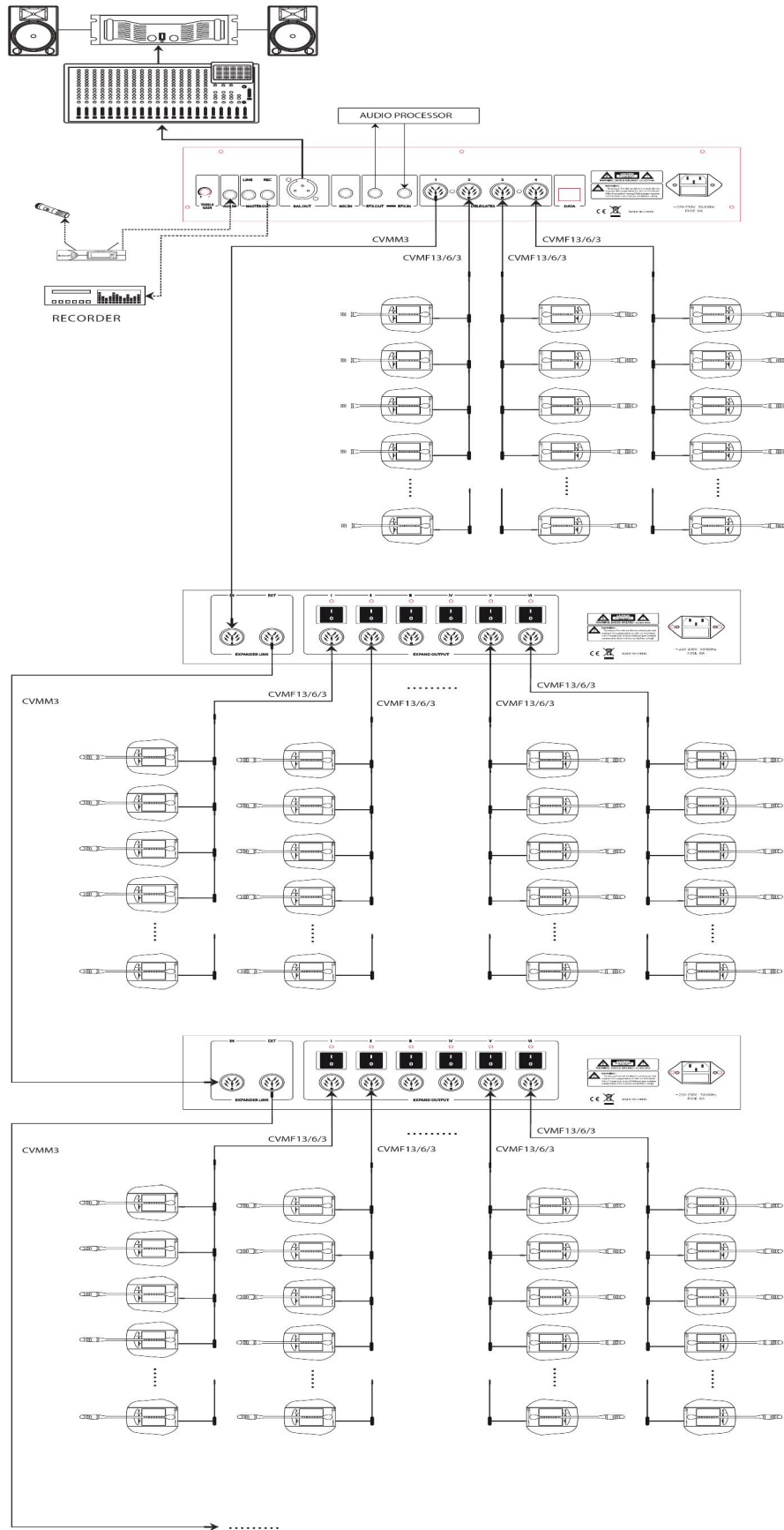


fig.8

11. TECHNICAL FEATURES

Descriptions	controller
Characteristics	Supply power to microphones DC18V Control the active microphone number Allows the connection of up to 64 microphones (expandable up to 254 units)
Response	40-18000 Hz
Inputs	4 x group microphone input line DIN-8 1 x TEL in (RCA) 1 x Aux (RCA) 8 x Video in (RCA)
Outputs	1 x Master (male XLR3) 2 x MIX out (RCA x 2) 1 x TEL out (RCA)
Power supply	230 V AC 50/60 Hz, 115W
Dimension	488 x 84 x 360 mm, 2 U rack 19"
G.W	8kg
Accessories	1x 13 m DIN-8 main cable 1x 1.8 m power cable 1X 2 m XLR M-F cable 2x 1.65 m RCA-TRS cable 2x fuse 1x manual



This product complies with the latest Directive 2014/30/UE (Electromagnetic Compatibility) according to the following standards:

**EN 55013:2013, EN 55020:2007+A11:2011,
EN61000-3-2:2014, EN61000-3-3:2013**

furthermore, it complies with Directive 2014/35/UE (Low Voltage) according to the following standard:

EN 60065:2014

We maintains a policy of constant research and development, therefore we reserve the right to apply improvements to existing equipment without prior notice.