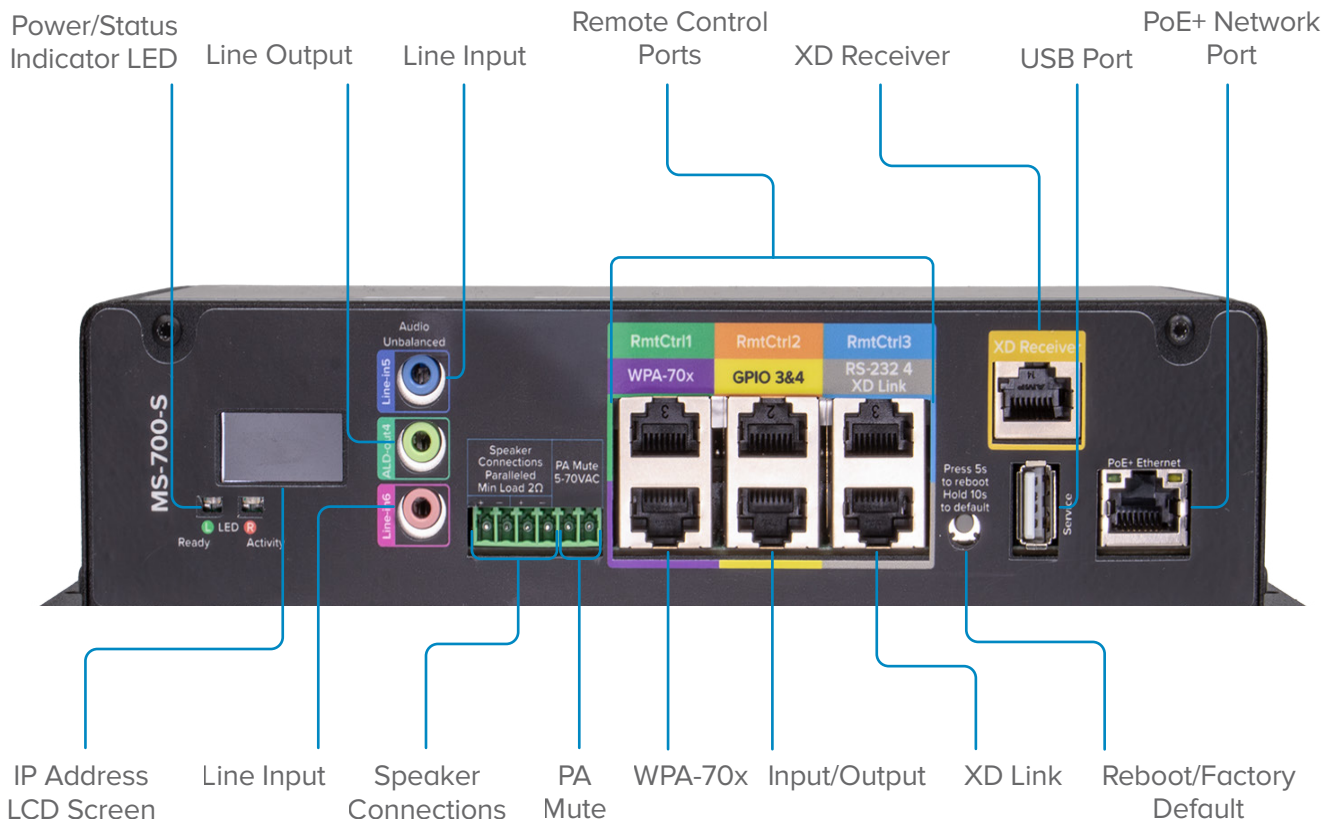


MS-700-S OPTIMUM AMPLIFIER

QUICK START GUIDE



DESCRIPTION

The **MS-700-S Optimum Amplifier** is a networked classroom amplifier. This amplifier has network-based intercom, paging, emergency notification, and provides full-duplex audio. It is easy-to-use, easy to-install, and has simple user interface software. The entire unit utilizes Power over Ethernet (PoE+). Intercom and paging functionalities[†] are built-in. When used in conjunction with an Uninterruptable Power Supply (UPS), during emergencies, paging can still be heard, even when the power goes out. This unit can be installed as part of the SAFE (Signal Alert For Education) System[®].

FUNCTIONAL SUMMARY

GENERAL PURPOSE IO

- (4) Discrete Inputs
- (4) Discrete Outputs

AUDIO

- (2) Unbalanced Audio In
- (3) Balanced Audio In
- (1) Unbalanced Audio Out
- (3) Balanced Audio Out
- Amplified Audio Out (min 2 Ω load)

SERIAL COMMUNICATION

- (4) RS-232 Connections

WALL PLATE ACCESSORY

- (1) Port

REMOTE POWER

- (4) 24 V Out Ports

XD RECEIVER

- (1) Port

[†] Dependent on PoE Switch.

INTERFACES

REMOTE PORTS (RMTCTRL)

- Audio Out (Balanced)
- Audio In (Balanced)
- RS-232
- 24 V DC
- Also Connects to the ITC2

WALL PLATE AUDIO (WPA) PORT

- Connects to Audio Enhancement® Wall Plates

IO PORT (GPIO 3 & 4)

- (2) Input
- (2) Output

SERIAL + XD LINK (RS-232 4 XD LINK)

- RS-232
- 24 V DC
- XD Link

USB PORT (FOR SERVICE ONLY)

- Remove USB Dongle from bag on side of MS-700-S and Install in USB Port.

DISPLAY

- PoE+ Warning
- IP Address
- Firmware Version

LEDS

Power LED

- Red While Booting
- Green When Operational

Status LED

- Red While Booting and Getting an IP Address
- Green Blink When Operational With Activity On The Ethernet Port

3.5 MM AUDIO

- (2) Line In (Unbalanced)
- (1) Line Out (Unbalanced)

SPEAKER CONNECTION X2 (2 Ω MIN LOAD)

- Amplified Audio Out (min 2 Ω load)

PA MUTE

- Audio is muted when 5-70 V AC is present

POE+ ETHERNET

- IEEE 802.3 at required

XD RECEIVER PORT

- Connects to an XD Receiver to add a microphone to the classroom.
- A splitter cable is needed to split the Power and Data Lines.

RESET BUTTON

CONFIGURATION SET UP IN EPIC

Follow the instructions in the EPIC System Admin Manual - Managing Devices.



Click or scan QR code to access.

When setting up, the capabilities must be set to indicate what receiver is connected to the MS-700-S.

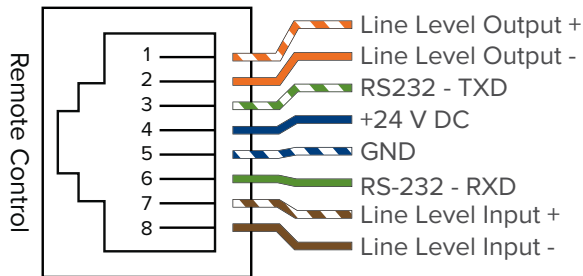
Device Name *	MS-700-S
IP *	10.10.10.115
User Name	admin
Device Password	Control1
Extension *	500
Infoview Enabled	☐ Yes ☒ No
ITC Enabled	☒ Yes ☐ No
Capabilities	☒ XD Enabled ☐ TLD Enabled ☐ None
XD Receiver ID *	A68D5
MAC Address	12:34:56:78:AB

CONNECTOR DETAILS

NOTE

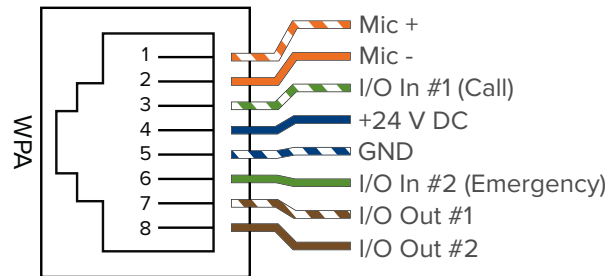
Some pinouts for the MS-700-S are different than the MS-600.

RMTCTRL PORTS

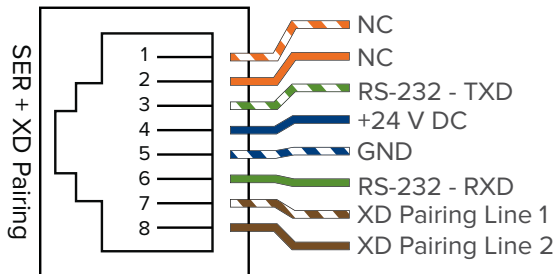


7 & 8 on RmtCtrl Port 1 is a SIP interface

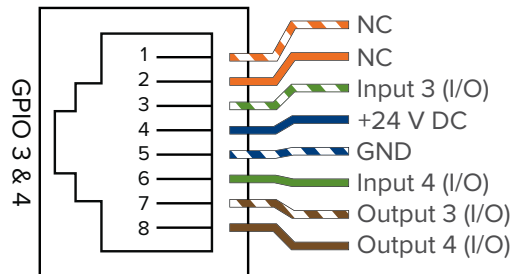
WALL PLATE AUDIO



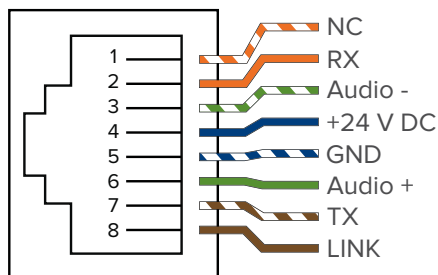
SER + XD LINK



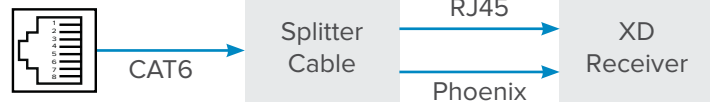
GPIO 3 & 4



XD RECEIVER



MS-700-S
XD Receiver Port



When connecting via the XD Receiver port, use the included splitter cable to convert the CAT6 connection from the MS-700-S to RJ45 & Phoenix connections to the XD Receiver.

TROUBLESHOOTING

REBOOT BUTTON FUNCTIONALITY

Reboot

Press and hold button (5 seconds).

Factory Reset Procedure

Press and hold for 10 seconds wait for *Status LED* to flash green and release.



REBOOTING ISSUE

If MS-700-S is constantly rebooting and has peripherals plugged in, such as an ITC, it might be pulling too much power.

NO AUDIO

If there is no audio going through the speakers (bells, paging, intercom, teacher mic) check the audio output to see if there is any audio passing through there. This can be done by connecting a pair of wired headphones to the audio out of the MS-700-S and playing audio through the MS-700-S. If you hear audio through the headphones, it is most likely not a problem with the MS-700-S and more related to the speakers or speaker wiring.