

How to use the app and what can be configured...

Introduction

The MX36 and MX24 Console Switchers operate "straight out of the box" with minimal set-up, all of which can be configured using the front panel interface. However, there are certain features that are more specialised and probably only need to be accessed occasionally. These can be configured remotely using this utility app.

The current features that can be accessed and configured using the app are:

AES output sample rate: This can be switched between 48kHz and 96kHz (default)
 AES external clock input: This can be switched off (on by default)
 AES inputs mode: Each set can be independently configured to operate in 2 channel mode (so ignoring audio and lock status on channels 3&4) for use in stereo AES systems
 AES inputs routing: Each set can be independently configured to route channels 1&2 to 3&4 or mono sum to 3&4 for more effective use in stereo AES systems.

5) Dante Aux inputs: To cascade MX36 units, the auxiliary Dante inputs that route direct to the outputs can be enabled to permit a direct feedthrough (disabled by default)

6) GPI options: Configure the actions of the two general purpose input lines to route mic input or line input direct to the main outputs and choose preset routing and gains plus priority for these inputs.

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Initial Connection to your MX Series

Connect the MX Series to the network via its CONTROL Ethernet port, and run the utility app – if it's the first time it has run, Windows will ask about allowing it through the firewall – be sure to tick **all** options before pressing "Allow Access".

P Windows Secu	urity Alert		×
Windo app	ws Defend	er Firewall has blocked some features of this	
Windows Defender networks.	Firewall has blo	ocked some features of ConsoleSwitch on all public and private	
24	Name:	ConsoleSwitch	
20 C	Publisher:	XTA Electronics Ltd	
	Pat <u>h</u> :	F:\mx36 utility v1.01.exe	
Allow ConsoleSwitd	h to communica	te on these networks:	
Private netw	orks, such as m	ny home or work network	
Public netwo because the	rks, such as the se networks off	ose in airports and cafés (not recommended ten have little or no security)	
What are the risks	of allowing an a	pp through a firewall?	
		Sellow access Cancel	

Your unit should then be located on your network:

IP = 192 : 168 : 0 : 110 V Rescan		
Device Name: Silas-234 XTA MX36		
01: Product: MX 36	^	Calibration
02: Variant: 0		
03: Firmware: V3.3		
04: Software: V1.0		Options
05: Build: 596		
06: Option: External AES Output Sync Fitted		
07: DSP X = 602 V01.02 30.Aug.2019 17:18:24		Сору
08: DSP Y not fitted		
10: MAC Address 99 - 57 - 60 - 00 - 21 - 82		
10: MAC Address: 66 : 57 : 60 : 00 : 21 : 65		
12: Erect Davel Version: V2.2		
13: Module 1 = Analogue In / AES In [0] [0004] V1 0		
14: Module 2 = Analogue In / AES In [0] [0004] V1.0		
15: Module 3 = Analogue In / AES In [0] [0004] V1.0		
16: Module 4 = Analogue In / AES In [0] [0028] V1.0		
17: Module 5 = Analogue Out / AES Out [0] [0004] V1.0		
18: Module 6 = AES In Only [0] [0004] V1.0		
19: Module 7 = AES In / AES Out [0] [000A] V1.0		
20: XLR 1: In Analogue		
21: XLR 2: In Analogue		
22: XLR 3: In Analogue		
23: XLR 4: In Analogue		
24: XLR 5: In Analogue		
25: XLR 6: In Analogue		
26: XLR 7: In Analogue		
27: XLR 8: In Analogue		
28: XLR 9: In Analogue		[]

Whilst it is possible to locate more than one MX Series unit on a single network, and these will be seen as a list of IP addresses in the dropdown beside the "Rescan" button, we would advise you to only connect a single unit at a time to avoid confusion!

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Configuring the AES Options

Now that your unit has been located, the "Options" button will be available - press the "Options" button to access some configuration choices as shown below:

Property Value AES Options Fixed AES Output Clock 96k Hz External Sync Use External if Valid Set A AES Channels 3 & 4 Set B AES Channels 3 & 4 Normal In use Set B AES Channels 3 & 4 Barte Options Ignored Goy of 1 & 2 Darte Options Mono Sum of 1 & 2 Mono Sum of 1 & 2 Darte Options Morophone Evac. to Main Outputs GPI Input 1 Mode Microphone Evac. to Main Outputs GPI Input 1 On Microphone Filter Mice ABV Power Off Microphone Gain Imode Line Input Evac. to Main Outputs GPI Input 2 Mode Line Input Evac. to Main Outputs GPI Input 2 Set A AES Channels 3 & 4 Selects Options Routed to Channels Stereo 1.2 & 3.4 Selects Options for AES channels 3 and 4.	Device Name: L	eola-236 XTA MX36	
□ AES Options Fixed AES Output Clock 96kHz □ External Sync Use External if Valid Set A AES Channels 3 & 4 Normal In use ✓ Set B AES Channels 3 & 4 Normal In use ✓ Set C AES Channels 3 & 4 Normal In use ✓ Set C AES Channels 3 & 4 Ignored ✓ □ Dante Options More Copy of 1 & 2 ✓ □ Dante Auxilary Input Ignored ✓ □ GPI Input 1 ✓ ✓ Mode Microphone Evac. to Main Outputs □ □ GPI Input 1 Options ✓ Routed to Channels 1, 2, 3 and 4 ✓ Microphone Filter On ✓ Microphone Gain 0.0dB ○ □ GPI Input 2 ✓ ✓ Mode Line Input Evac. to Main Outputs ✓ □ GPI Input 2 Options ✓ ✓ Routed to Channels Stereo 1,2 & 3,4 ✓ Set A AES Channels 3 & 4 Selects Options for AES channels 3 and 4. ✓ Save to File ✓ ✓ ✓	Property	Value	
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	Save to File		

Expand the AES Options section to access the following:

1) AES output sample rate: This can be switched between 48kHz and 96kHz (default)

2) AES external clock input: The rear panel mounted BNC input for connection of an external word clock to govern eh output AES sample rate will, by default, override the internal sample rate setting. To prevent unwanted changed to the AES output sample rate, this can be ignored.

3) AES inputs mode: By default, when using redundancy, if either AES input in a set (A/B/C on an MX36, or A/B on an MX24-A) loses lock or is disconnected, then this will trigger a failover event, and all four channels of audio on that set will switch to the backup source. This is to maintain latency through that set (and so not switch half the set to analogue or Dante if one AES input "fails")

However, there will be circumstances where a system only operates in stereo, and the console only has a single stereo AES output stream. To operate using this stream as a primary/secondary source in a redundancy system, the only way to prevent the unit seeing a failure of the AES input if a stream is only present on 1&2 is to "Y-split" it and feed it into 3&4 as well. This is not ideal, so for each AES set, channels 3&4 can be ignored. This means that anything connected to them will not be routed to the outputs and will not trigger a failover event, to automatically change the source.

As well as being able to ignore inputs from 3&4 it is also possible to route what's coming in on 1&2 to 3&4 as either a copy (so 1>3 and 2>4) or as a summed mix (so 1+2 > 3&4).

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Configuring the Dante Auxiliary Input Option

If it is necessary to manage more than three consoles that require redundant failover support, units can be connected in cascade. This requires an audio network connection from all units (even if Dante is not being used as a source type by any of the consoles). The Dante (audio network) connection is required as the Dante outputs from one unit must be connected to the auxiliary (Aux) Dante inputs of the next unit so that the final unit in the cascade can provide a single set of four outputs from all consoles connected to any unit.

D	evice Name:
Property	Value
	Value
Fixed AES Output Clock	96k Hz
External Sync	Use External if Valid
Set A AES Channels 3 & 4	Normal In use
Set B AES Channels 3 & 4	Normal In use
Set C AES Channels 3 & 4	Normal In use
Dante Options	
Dante Auxilary Input	Ignored 🗸
GPI Input 1	
Mode	Disabled
GPI Input 1 Options	
GPI Input 2	
Mode	Disabled
GPI Input 2 Options	
Evac. Options	
Dante Auxilary Input Sets how the Dante Auxilary Inputs	s are handled.
Save to File	
Reset Defaults	Set to Unit Quit

Now that your unit has been located, the "Options" button will be available - press to access configuration choices.

By default the Dante Aux. Inputs will be ignored as above. Change this drop-down list to "Routed to Main Outputs" as below:



Press "Set & Save" and then close the application. Now, anything routed via Dante controller to the Receiver Aux inputs on the unit will immediately be passed through to the main outputs, bypassing the CONSOLE SELECT buttons.

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Quickly Resetting Everything Back to Default – with or without the app...

Pressing the "Reset Defaults" will set all the adjustable parameters in the app back to their default values, but *remember to press "Set to Unit"* to update the unit with these settings!

If you're unsure about the internal setup of the unit and don't have access to the app, but need a known starting point for use, it is also possible to reset to defaults via a front panel button sequence.

Power up while holding in Meter Outs + Select Source Type (Analogue/AES/Dante) in the Line Monitoring Section.



Wait for the relays to engage with a click and the unit is reset to the following settings:

AES Output Clock: 96kHz¹ External Sync: Use if Valid¹

AES Mode on inputs 3&4 for all sets: Normal operation

Dante Auxiliary Bus Inputs: Ignored² (will still appear in Dante Controller but will not be routed to Mains outputs)

GPI ports: Both disabled

Hint – you will know when the GPI ports are disabled as the buttons for mic/line options are functional again!

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¹ MX36 and MX24-D only

 $^{^{\}rm 2}$ MX36 and MX24-A only