QuickMatrix 4K

Ref. QMX-4K



4K60 multi-layer video mixer and seamless presentation switcher, with ten inputs, two PGM outputs and one dedicated Multiviewer





Versatile 4K Connectivity

The **QuickMatrix 4K** is a powerful 4K60 multi-layer seamless presentation switcher equipped with ten inputs, including eight 4K60 inputs (four HDMI 2.0, two 12G-SDI and two DisplayPort 1.2) and two 1080p inputs with user-selectable HDMI and 3G-SDI connectors. The **QuickMatrix 4K** has two independent 4K60 Program outputs, each with mirrored HDMI and SDI connectors. In addition, the **QuickMatrix 4K** has a dedicated multiviewer to monitor your Program and Preview screens as well as all your inputs.

Quality without Compromise

Based on the extremely robust and reliable **Midra™ 4K** platform as well as on the 5th generation scaling engine inherited from the LivePremier[™] series, the **QuickMatrix 4K** features ultra-low latency 4K60 10-bit 4:4:4 image processing, uncompromising video quality, true seamless switching, HDR support and HDCP 2.2 compatibility, which makes it an ideal solution for medium-sized live events and fixed installations.

Smart Functionalities

The QuickMatrix 4K offer dozens of powerful functionalities that will help you to produce elegant AV presentations: custom output formats, AOI, Luma and Chroma keying, advanced video effects... It also allows to easily de-embed or embed digital audio on all the inputs and outputs. An audio option is also available to add Dante[™] 32x32 audio networking support to the QuickMatrix 4K.

Powerful and Flexible Control Options

The **QuickMatrix 4K** has been designed to be entirely operated from the easy-to-use front panel. You can also use the on-board intuitive HTML5based user interface, the Web RCS, designed to allow for the ease of setup and to ensure flawless control of your presentations. The **QuickMatrix 4K** also features Ethernet control via a standard TCP/IP socket connection supported by all major third-party control systems. The **QuickMatrix 4K** can also be controlled by the free Crestron[®] driver as well as by AW Video-Compositor, a unique drag and drop customizable Crestron[®] user interface. Additionally, the **QuickMatrix 4K** can be operated by a comprehensive range of remote control panel options such as the powerful event controller RC400T or the compact Control Box² and Shot Box². The **Quick-Matrix 4K** is also compatible with various control software such as Universe or Companion.



10 inputs	2 PGM outputs	4K60 4:4:4 10-bit	1 Multi- viewer	HDR	2 layers 4K per output	HDMI 2.0		P .2 12G	-SDI	2RU
QuickMatrix 4K at a glance					Midra™ 4K models		QuickVu 4K	QuickMatrix 4K	Pulse 4K	Eikos 4K
 Compact 2RU rugged chassis 					Inputs		10	10	10	10
Ten inputs (8x 4K60 + 2x 1080p inputs)					Mirrored outputs (HDMI + SDI)		2	2	2	2
► Two 4K60 PGM outputs with mirrored 12G-SDI and HDMI 2.0 plugs					Dedicated multiviewer		✓	✓	✓	✓
 Dedicated multiviewer with resizable widgets 					Mixer mode (1x PGM + 1x AUX)		✓		✓	✓
► Real-time 10-bit 4:4:4 video processing compliant with HDR10 & HLG					Matrix mode (2x PGM)			✓	1	✓
► Two 4K split layers (or one 4K mixing layer) per output					Hard/Soft Edge mode (1x PGM)					✓
Intuitive HTML5-based user interface with live source thumbnails					Background layer		image	image	image	live source
 Advanced audio processing and dynamic routing 					4K split layers per system		2	4	4	4
▶ Optional analog and Dante [™] audio networking card (32x32 chan-					4K foreground layer (still image)		✓	✓	✓	✓

QuickMatrix 4K

Key features

Web RCS: highly intuitive HTLM5-based user interface 10 seamless inputs including 8x 4K60 inputs and 2x 2K60 inputs Two 4K60 PGM outputs with mirrored 12G-SDI and HDMI 2.0 plugs Live video thumbnails shown on GUI 1 still image background + 1 mixing 4K layer (or 2 split layers) + 1 fore-Fully configurable and operable from the front panel ground 4K image layer per output Advanced audio processing and dynamic routing 1 dedicated multiviewer with resizable widgets, including clocks, Innovative 'Quick Preset' feature countdown and timers (max. resolution 2560x1600@60) Custom output formats for non-standard display applications Real-time 4K60 10-bit 4:4:4 processing Area of Interest feature to customize active areas of outputs Ultra low latency (16 msec @60Hz) Easily create and recall memories on your screen and AUX outputs Compliant with HDR10 and HLG - Built-in SDR/HDR converters Fully functional simulator for offline configuration and practice Seamless crossfade on all sources Quiet: 45dB average noise at 1m Versatile 4K connectivity: HDMI 2.0, DP1.2, 12G-SDI Dedicated BNC with loop for Genlock, Blackburst and tri-level sync 8x 4K concurrent still images with alpha channel support Remote services and maintenance Advanced EDID management Backup and restore functions Compatible with HDCP 1.4 and HDCP 2.2

Optional Analog and Dante[™] audio networking card

- ▶ De-embed audio from sources and route directly to Dante[™] network
- ▶ Re-embed audio from external audio processor for sending to display
- ▶ 32x32 Dante[™] channels @48 kHz
- Dual redundancy Ethernet ports
- 2 analog stereo mini jack line inputs 1/8" (3.5 mm)
- ▶ 2 analog stereo mini jack line outputs 1/8" (3.5 mm)



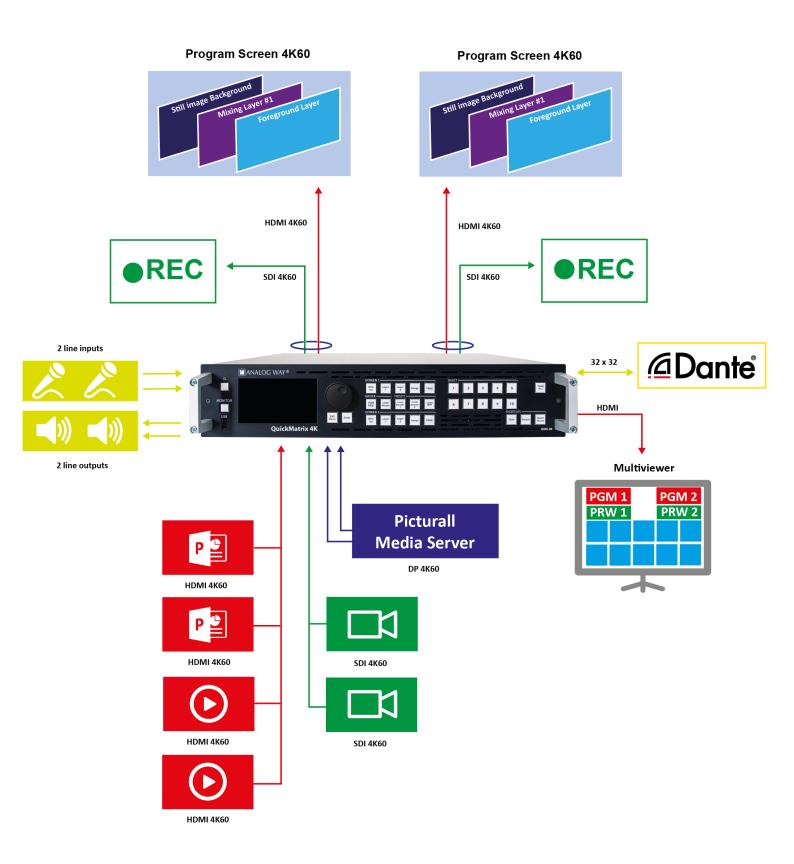
The QuickMatrix 4K has a extensive ecosystem for control and management



Some controllers or drivers might not be available in software v1. Contact your sales manager for more information.

QuickMatrix 4K

with Dante audio option



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Technical specifications

10 SEAMLESS INPUTS

4x HDMI 2.0

▶ up to 4K60 8-bit 4:4:4 or 4K60 12-bit 4:2:2

2x DisplayPort 1.2

- ▶ up to 4K60 10-bit 4:4:4 or 4K60 12-bit 4:2:2
- 2x 12G/6G/3G-SDI (level A & B)
- ▶ up to 4K60 10-bit 4:2:2
- 2x HDMI 1.4 or 3G-SDI (user selectable input plug)

▶ up to 2K60 10-bit 4:4:4 (HDMI) or 2K60 10-bit 4:2:2 (SDI)

Support custom input formats up to 4096 width

2 HDMI OUTPUTS + 2 MIRRORED SDI OUTPUTS

2 independent PGM outputs, each with one HDMI 2.0 + one mirrored 12G/6G/3G-SDI (level A & B) plug

- ▶ up to 4K60 8-bit 4:4:4 or 4K60 12-bit 4:2:2 (HDMI)
- ▶ up to 4K60 10-bit 4:2:2 (SDI)
- support custom output formats up to 4096 width

LAYERS

1 still image background + 1 mixing 4K layer or 2 split layers + 1 foreground 4K image (per output)

1 MULTIVIEWER OUTPUT

1x HDMI 1.4 + 1x mirrored 3G-SDI up to 2560x1600@60 8-bit 4:2:2 17 resizable widgets - customizable layouts with 20 memories Monitor the Program and Preview screens and all the inputs Built-in clocks, countdown and timers

ADVANCED AUDIO PROCESSING

De-embed/embed audio channels on all inputs/outputs (PCM)

- ▶ 8 channels per HDMI 2.0, 12G-SDI or DisplayPort 1.2 input
- ▶ 4 channels per 3G-SDI input and 2 channels per HDMI 1.4 input
- ▶ 8 channels per active output

Level control, Mute, Balance, Delay, 1kHz Sinus Pattern features

Fixed or dynamic routing (breakaway or top layer)

Optional Analog and Dante™ audio networking card

- ▶ 2 analog stereo mini jack line in and line out 1/8" (3.5 mm)
- ► 32x32 Dante[™] audio channels @48kHz
- Dual redundancy Ethernet ports AES67 support

PROCESSING

Based on Analog Way exclusive 5th generation scaling engine

Ultra low latency (16msec @60Hz)

BT.601; BT.709; BT.2020 color spaces support

Split layers mode: double the live layer count (no crossfade effect)

Advanced EDID management

Keying, Area of Interest and advanced output/screen test patterns

Layer and screen freeze feature

Compliant with HDR10 and HLG - Built-in SDR/HDR converters

Compatible with HDCP 1.4 and HDCP 2.2

QUICK PRESET FUNCTION

3 Quick Preset modes : Fade to Black, Image or Master Preset

Audio routing configurable to follow the Quick Preset mode

STILL IMAGES

4x 4K concurrent still images for the foreground layer

4x 4K concurrent still images for the background

Alpha-channel support

Still image library with 50 memories

Multi-file download/upload via Web RCS

Capture from live inputs

TRANSITIONS & EFFECTS

True A/B mix effect

Layer border effects and colors with separate shadow

Multiple transition effects

Layer effects: H/V Flip, Transparency, Luma/Chroma Key, DSK ...

Color effects: B&W, Negative, Sepia and Solarize

CONTROL

Full-featured Front Panel with 480x272 color LCD screen

Web RCS: on-board intuitive web-based user interface

Shot Box² / Control Box²: Cost effective control solutions

RC400T: Ergonomic event controller

Compatible with Companion and Universe control solutions

Simple REST API (HTTP) and advanced JSON TCP protocol

Creston drivers & AW VideoCompositor (Premium Creston GUI)

OTHER FEATURES

Live monitoring of inputs & PGM on the large color TFT LCD display 200 user definable screen memories and 50 master memories Dedicated BNC with loop for Genlock, Blackburst and tri-level sync I/O connector status LEDs for easy troubleshooting

USB host type A: firmware update, configuration import/export...

Fully functional simulator for offline configuration & practice Gigabit Ethernet via Neutrik RJ45

Dimension (in Rack Units – RU) ► 2RU

Thermal dissipation ► 273 BTU/hr

back to factory

Power Supply

Safety compliance

UL Listed E359143)

▶ 1x Power supply cord

▶ 1x User Manual (pdf)

1x Rackmount kit
 1x Ethernet cross-cable

Supplied with

instructions

▶ 3-year warranty on parts and labor

► Fuse cartridge F4A 250VAC 5x20mm

▶ IEC/UL/EN 62368-1, CSA22.2#62368-1,

▶ 1x Remote Control Software (Web RCS)

► 1x Quick Start Guide including safety

▶ 100-240 VAC. 3A 50/60Hz

Max consumption: 80 W

Dimension (without rack ears & mounting) Warranty

- ▶ W 17.32'' x H 3.46'' x D 17.08''
- ► L 440 mm x H 88 mm x P 434 mm

Dimension (with handles)

- ▶ W 19" x H 3.46" x D 18.66"
- L 482.5 mm x H 88 mm x P 474 mm

Weight without accessories

7.60 kg / 15.43 lbs

Shipping weight (accessories included) ► 10.60 kg / 22.04 lbs

Operating conditions

Temperature: 0 to 40°C (32 to 104°F)
 Humidity: 10% to 80%, non condensing

Noise (@1,6m height @25°C)

- ► Front: 45 DBa@1m
- ▶ Rear: 45 DBa@1m

Specifications subject to change without prior notice

QMX4K_EN-12/16/2020

