Konvision

KXM-5520M
55 INCH 4K HDR
Mini-LED MASTERING MONITOR

- Mini LED
- 2304 Zone Local Dimming
- 1500 nits
- 1,000,000:1 Contrast
- ≥80% BT.2020
- 12G SDI
- 4K UHD
- 8K Signal
- HDR HLG&PQ
- 10 bit Color Depth
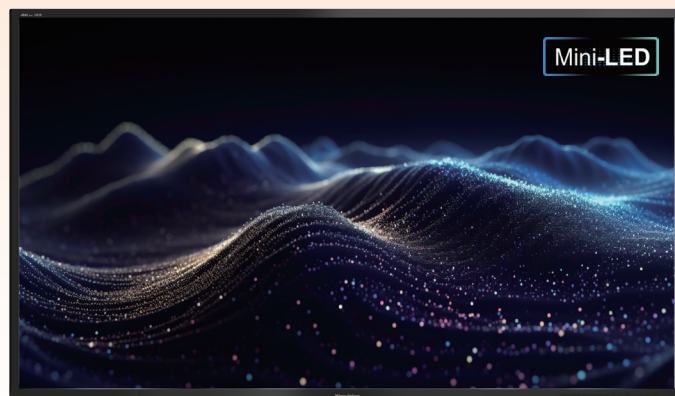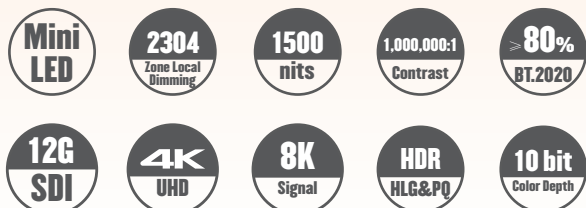
INTRODUCTION

The KXM-5510M is a 55-inch 4K HDR mastering monitor featuring Mini-LED full-array local dimming technology with 2304 zones. It delivers 3840×2160 4K resolution, 1500nits brightness, 1,000,000:1 contrast, and ≥80% BT.2020 color gamut with HDR HLG/PQ support. Equipped with 4×12G-SDI input/loop-out, it supports 4K&8K signal processing and 4K HDR to HD SDR down-conversion, making it ideal for HDR mastering production, UHD/HD live production, filming, and post-production workflows.

HIGHLIGHTS

- 178°(H/V) full viewing angle IPS LCD panel with 3840×2160 4K resolution
- Mini-LED backlight with 2304-zone local dimming
- 1500nits brightness, 1,000,000:1 contrast, ≥80% BT.2020 coverage
- 12-bit video processing with zero-latency display
- 4×12G-SDI input/loop-out (8K quad-link, 4K single/quad-link)
- 4×12G-SDI quad-link (SQD/2SI) up to 8K60p
- 1×SFP+ fiber interface for SDI conversion input
- 1×HDMI 2.0 input, up to support 4096×2160P60Hz
- 3D LUT calibration compatible with ColourSpace/Calman
- Color spaces: Rec.709/EBU/DCI-P3/DCI-P3 D65/Rec.2020
- Gamma options: 2.0/2.2/2.4/2.6
- HDR support: HLG (1.03/1.11/1.16/1.20/1.27/1.33), ST2084 PQ/(softroll)
- VPID/Payload ID auto-recognition for color space/EOTF matching
- Multiple camera color space/EOTF conversions to standard color space
- USB/Ethernet for 3D LUT loading and firmware updates
- Quad view mode for simultaneous SDI/HDMI/SFP+signals
- Independent vrightness/gamuts/EOTF settings per window in quad-view mode
- Instant single-view switch from any window in quad-view mode
- 4K HDR to 2K SDR down-conversion with custom 3D LUT output
- HDR area display, HDR/SDR ratio graph and pixel measurement
- Waveform, Vector, Histogram, CIE Chromaticity Diagram, CIE Color Volume
- Mirror, Rotation, Zoom, Freeze, Full Scan, Overscan, H/V delay
- False Color, Zebra, Focus Assist, Blue/Mono Only
- Darkness Check, Highlight Check
- Aspect ratio, Center Marker, Safe Area, Markers with BOX control
- Audio Level Meter, Audio Phase, 5.1/7.1 Surround Phase
- Each SDI support 16ch embedded audio meters & 2-channel outputs
- Supports 4.1-channel audio
- VITC1/2, LTC timecode; static/dynamic UMD/IMD; tri-color Tally
- 5 scene presets, 5 customizable shortcut keys
- GPI remote control for Tally/assist functions/scene preset
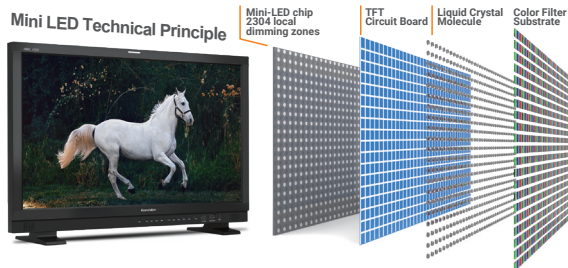- Aluminum alloy casing, dual power inputs with speakers/headphone jack

SPECIFICATION

| Panel	
Model No.	KXM-5520M
Backlight	Full Array 2304 Local Dimming Zones Backlight
Size	55″
Resolution	3840×2160
Aspect Ratio	16:9
Viewing Angle	178°(H) / 178°(V)
Brightness	1500cd/m²
Contrast Ratio	1,000,000:1
Color Depth	10bit
Input	
4×BNC	12G/6G/3G/HD/SD-SDI（SDI1/SDI2/SDI3/SDI4)
1×HDMI	HDMI 2.0
1×SFP+	12G/6G/3G/HD/SD-SDI SFP+
Output	
4×BNC	12G/6G/3G/HD/SD-SDI（SDI1/SDI2/SDI3/SDI4)
Remote Interface	
1×RJ45	10/100M Ethernet Input Interface
1×RJ45	GPI Input Interface
2×RJ45	RS422 Input and Loop Out Interface
Audio In & Out	
Audio In	16-Channels SDI & 2-Channel outputs
Audio Out	3.5mm Headset Jack, 2×3.0W Speakers Support 4.1-Channel Audio
Audio Meter Display	Vertical/horizontal, transparent/opaque display
General	
Input Voltage	AC 100-240V 50/60Hz
Power	≤500W
Installation	VESA MIS-D (200×200mm)/(400×400mm)
Net Weight	≈32.5kg
Accessory	Power Cord

*Specifications may be changed without prior notice.

▪ 4K Panel with Mini-LED Full Array Local Dimming

It features a 55-inch 10-bit IPS LCD panel with 178°(H)/178°(V) viewing angle and 3840×2160 4K resolution and equipped with Mini-LED full array backlight technology featuring 2304 independent dimming zones. Advanced algorithm enables precise brightness adjustment for each zone based on content, delivering superior backlight uniformity.

Mini LED Technical Principle | Mini-LED chip 2304 local dimming zones | TFT Circuit Board | Liquid Crystal Molecule | Color Filter Substrate

▪ 4x12G-SDI Input/Loop Out, 4K/UHD Monitoring

Equipped with 4x12G-SDI, 1xHDMI, and 1xSFP+ fiber optic interfaces. It supports 4×3G-SDI quad-link or 1×12G-SDI single-link 4K input. Quad-link input supports SQD and 2SI formats.

4x12G-SDI Input/Loop Out
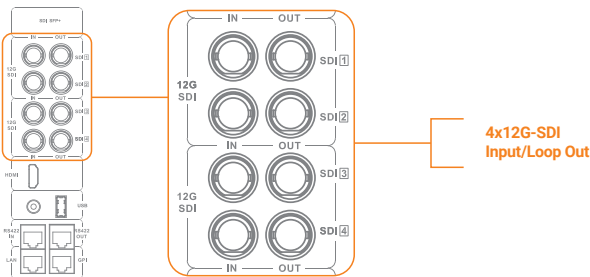
▪ Multiple HDR/Color Spaces Available

Supports high dynamic range (HDR) monitoring, providing standard HDR EOTF (Electro-Optical Transfer Function) with built-in various standard color spaces and Gamma. It also supports VPID reading display and Payload ID recognition, automatically matching color space and EOTF.

- Color Spaces: Rec.709/EBU/DCI-P3/DCI-P3 D65/Rec.2020
- HDR EOTF: HLG (1.03/1.11/1.16/1.20/1.27/1.33), ST2084 PQ/(softroll)
- Gamma: 2.0/2.2/2.4/2.6

▪ Camera Gammas to Standard Gamuts Conversion

Built-in various mainstream camera gamma curves enable the conversion of camera color space and EOTF to standard color space and EOTF.

Color Space Conversion

Log Original

Camera Log:
- Arri Wide Gamut 3/LogC3
- Arri Wide Gamut 4/LogC4
- Canon Cinema Gamut/Canon Log2/3
- DJI D-Gamut/D-Log
- Panasonic V-Gamut/V-Log
- Sony S-Gamut/S-Log2
- Sony S-Gamut3/S-Gamut3.Cine/S-Log3

▪ 3D LUT Color Calibration

Tetrahedral 3D LUT interpolation color calibration technology. Compatible with ColourSpace and Calman calibration software, Konvision monitors apply K10-A/CR100 probe(professional level) to achieve a precise color. Monitor's also workable with universal colorimeters including CA210, CA310, CS200, CR100, CR250, X-Rite i1 Display.

▪ Customizable 3D LUT Import & Output

Users can load and save 8 custom 3D LUTs via USB port/network port. Custom LUTs can also be set to output with the video display, effectively simplifying the color grading process for DIT and post-production work.
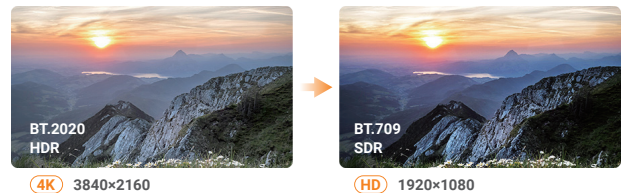
▪ Quad-View：Mixed Inputs & Frame Rates

The Quad view mode supports the simultaneous input of four different signal sources, allowing for mixed resolution and frame rate signals to be displayed together via SDI/HDMI/SFP+. Each split window can independently set Color Space and EOTF, as well as display HDR waveforms separately. This enables centralized monitoring of the entire system in a limited space, with the ability to quickly switch to a single view from any window.

4K(23.98/24/25/29.97/30/50/59.94/60) | WIN A: SDI/HDMI | WIN B: SDI 2 | FHD 1080p(23.98/24/25/29.97/30/50/59.94/60)

FHD 1080i(50/59.94/60) | WIN C: SDI 3 | WIN B: SDI 4 | HD 720p(50/59.94/60)

Mixed Inputs & Frame Rates

▪ 4K HDR-HD SDR Down-Conversion

Single-link SDI can realize 4K-HD down-conversion and HDR-SDR conversion. Support NBCU LUTs, CMG LUTs production standards, to meet the 4K HDR and HD SDR high-quality production needs.

BT.2020 HDR | **BT.709 SDR**

4K 3840×2160 | **HD** 1920×1080

▪ Professional Image Analysis Tools

Pixel Measurement
Measures the color information of 32 pixels

Focus Assist
Outlines the focus area using a peak focus algorithm

False Color
Applies brightness coloring to regions of the image based on various standards

Waveform
Provides brightness information at different regions

Histogram
Reflects the overall brightness levels of the image

Vectorscope
Displays detailed color distribution and differences within the image

Zebra
Use zebra to mark areas where exposure exceeds the preset value

Aspect Ratio
Offers various standard markers for size and safety area selections

Box Frame
Allows custom adjustment of box brame size and position