

MP-DA16UHD-4K

HDMI V2.0 1×16 Splitter with Downscaling & AOC Support



PRODUCT OVERVIEW

The MP-DA16UHD-4K is an HDMI V2.0 1×16 splitter designed to distribute one HDMI input to sixteen HDMI outputs. It supports up to 4K@60Hz 4:4:4 8-bit video, HDR10 and Dolby Vision, with automatic 4K-to-1080p downscaling for compatibility with 1080p displays. The unit also provides stereo analog L/R audio de-embedding, smart EDID and HDCP management, CEC, and RS232 control.

KEY FEATURES

- HDMI V2.0 with 4K@60Hz 4:4:4 8-bit, HDR10 and Dolby Vision support.
- 1 HDMI input distributed to 16 HDMI outputs.
- HDCP 2.2 compliant.
- Compatible with HDMI AOC cables; provides up to 5V/100mA power on each output.
- Automatic 4K to 1080p downscaling.
- Stereo analog L/R audio output for HDMI audio de-embedding.
- Smart EDID management and HDCP management via 4-pin DIP switch.
- CEC and RS232 control; Micro-USB firmware upgrade port.

TECHNICAL SPECIFICATIONS

VIDEO

Input	1 × HDMI
Input Connector	1 × Type-A female HDMI
Input Video Resolution	Up to 4K@60Hz 4:4:4 8-bit, HDR10, Dolby Vision
Output	16 × HDMI
Output Connector	16 × Type-A female HDMI
Output Video Resolution	Up to 4K@60Hz 4:4:4 8-bit, HDR10, Dolby Vision; supports 4K-to-1080p downscaling
HDMI Output / AOC	Up to 5V/100mA power for AOC cable
HDMI Standard	V2.0
HDCP Version	2.2
HDMI Audio Signal	LPCM 7.1; Dolby Atmos®, Dolby TrueHD, Dolby Digital Plus, DTS:X™, and DTS-HD Master Audio™ pass-through

ANALOG AUDIO

Output	1 × AUDIO
Connector	1 × RCA (L+R)
Frequency Response	20Hz–20kHz, ±1dB
Max Output Level	2.0Vrms ±0.5dB
THD+N	<0.05%, 20Hz–20kHz bandwidth, 1kHz sine at 0dBFS/max level
SNR	>80dB, 20Hz–20kHz bandwidth
Crosstalk Isolation	<–80dB
L-R Level Deviation	<0.05dB
Output Load Capability	1kΩ and higher
Noise Level	–80dB

CONTROL, PANELS & APPLICATION

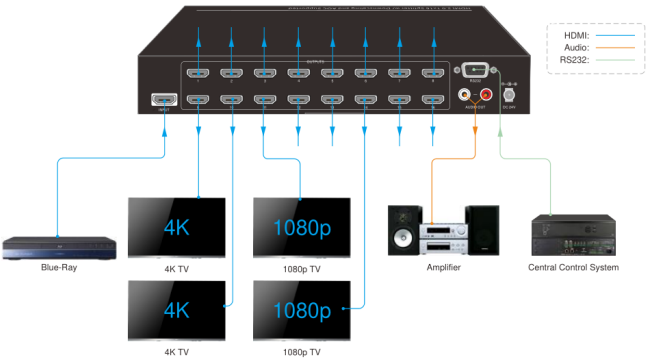
CONTROL

Control Ports	EDID switch, FW, RS232
Control Connectors	4-pin DIP switch, Micro-USB, Female DB9
RS232 Default	9600 baud, 8 data bits, 1 stop bit, no parity
RS232 Functions	System commands, EDID/ HDCP settings, video output enable/disable, auto-downscaler control, baud-rate setting

GENERAL

Bandwidth	18Gbps
Operating Temperature	-5°C to +55°C
Storage Temperature	-25°C to +70°C
Relative Humidity	10%–90%
External Power Supply	Input: AC 100–240V, 50/60Hz; Output: 24V DC 1.25A
Power Consumption	26W (Max)
Dimensions (W×H×D)	268 × 40 × 125mm
Net Weight	1.14kg

SYSTEM CONNECTION



The manual's system diagram (page 5) shows a Blu-ray source feeding the splitter, with HDMI distribution to 4K and 1080p TVs, analog audio to an amplifier, and RS232 connection to a central control system.

DOWNSCALING, EDID & PACKAGE CONTENTS

VIDEO DOWNSCALING

3840×2160 @ 60Hz, 4:4:4	Supported → 1080p@60Hz 4:4:4
3840×2160 @ 50Hz, 4:4:4	Supported → 1080p@50Hz 4:4:4
3840×2160 @ 30Hz, 4:4:4	Supported → 1080p@30Hz 4:4:4
3840×2160 @ 25Hz, 4:4:4	Supported → 1080p@25Hz 4:4:4
3840×2160 @ 24Hz, 4:4:4	Supported → 1080p@24Hz 4:4:4
3840×2160 @ 23Hz, 4:4:4	Supported → 1080p@23Hz 4:4:4
3840×2160 @ 60/50/30/25/24/23Hz, 4:2:0	Supported → corresponding 1080p output at 4:4:4

EDID / HDCP MANAGEMENT

000	Obtains EDID from first detected display, priority OUT1→OUT16
001	1920×1080@60Hz 8-bit Stereo
010	1920×1080@60Hz 8-bit High Definition Audio
011	3840×2160@30Hz 8-bit Stereo Audio
100	3840×2160@30Hz Deep Color High Definition Audio
101	3840×2160@60Hz Deep Color Stereo
110	3840×2160@60Hz Deep Color HDR LPCM 6CH
Switch 4 OFF	Automatically follows HDCP version of display device
Switch 4 ON	Automatically follows HDCP version of source device

PACKAGE CONTENTS

- 1 × MP-DA16UHD-4K 1×16 Splitter
- 2 × Mounting Ears with 4 Screws
- 4 × Plastic Cushions
- 1 × RS232 Cable (Female DB9 to Male DB9)
- 1 × Power Adapter (24V DC, 1.25A)
- 1 × User Manual

Source: MP-DA16UHD-4K User Manual, Version MP-DA16UHD-4K_2023V1.0. Specifications and diagrams in this sheet are based on the supplied manual.