# Imoware HMV421-4K

# 4K60 4x1 Multiviewer Seamless UHD Video Switcher



## Introduction

This 4K60 4x1 Multiviewer Seamless UHD Video Switcher was developed for the purpose of supporting higher output resolution (4K@60) for multiple sources on a single screen. It can combine up to four video signals onto a single UHD or HD displayer. The user can manage each input, and create combinations of the four inputs on a single display

This device supports full range of input video resolutions up to 4K@60 and audio RCA /Optical de-embedding supported for external audio distribution systems.

This device can be controlled via front panel buttons, IR remote, OSD menu navigation, Controller software, RS-232 commands.

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## Features

☆ HDMI 2.0b, HDCP 2.2 and HDCP 1.x compliant
☆ Support 18Gbps video bandwidth
☆ Input and output resolutions support up to 4K@60Hz
☆ Support LPCM, AC3, DD+, DTS, DTS-HD, up to 7.1 audio channel
☆ Seamless switching between input channels and combined multiple images
☆ Seamless switching in single screen display mode
☆ Fast switching in multiview display mode
☆ Audio de-embedding via analog and optical fiber audio ports
☆ Support volume control and independent audio selection
☆ Support OSD navigation for advanced setting
☆ Support OSD text editing by serial command
☆ Support Black Screen on each HDMI input by serial command
☆ EDID management

## Specifications

| Technical | |
|---|---|
| HDMI Compliance | HDMI 2.0b |
| HDCP Compliance | HDCP 2.2 / 1.x |
| Video Bandwidth | 18Gbps |
| Video Resolution | Up to 4K@60Hz |
| IR Level | 5Vp-p |
| IR Frequency | 38KHz |
| Color Space | RGB, YCbCr 4:4:4, YCbCr 4:2:2, YCbCr 4:2:0 |
| Color Depth | 8bit |
| Audio Formats | **HDMI:** PCM2.0/5.1/7.1CH, Dolby Digital/Plus, DTS, DTSHigh Res<br>**Analog audio [3.5mm L/R]:** PCM2.0<br>**SPDIF (OPTICAL):** Dolby Digital, DTS 5.1, PCM2.0<br>**Note:** It does not support HBR audio. |
| ESD Protection | Human body model — ±8kV (Air-gap discharge) & ±4kV (Contact discharge) |

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| Connection | |
|---|---|
| Input ports | 4 x HDMI IN [Type A, 19-pin female] |
| Output ports | 1 x HDMI OUT [Type A, 19-pin female]1 x L/R OUTPUT [RCA] 1 x OPTICAL OUTPUT [S/PDIF] |
| Control ports | 1 x RS-232 [3pin-3.81mm phoenix connector]1 x IR EXT [3.5mm Stereo Mini-jack] |
| **Mechanical** | |
| Housing | Metal Enclosure |
| Color | Black |
| Dimensions | 220mm [W] x 100mm [D] x 30mm [H] |
| Weight | 620g |
| Power Supply | Input: AC 100 - 240V 50/60Hz Output: DC 12V/2.5A (US/EU standard, CE/FCC/UL certified) |
| Power Consumption | 10W (Max) |
| Operating Temperature | 32 - 104°F / 0 - 40°C |
| Storage Temperature | -4 - 140°F / -20 - 60°C |
| Relative Humidity | 20 - 90% RH (no-condensing) |

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# Application Example



UHDTV

PC

INPUT

TX RX

R  L  OPTICAL  HDMI  HD 1  HD 2  HD 3  HD 4  RS-232  IR EXT  DC 12V

Power Supply

IR Receiver

Audio Amplifier

2.0 Speakers

PC

TV box

DVD or Blu-ray Player