

HDMI UHD 18GBPS DOWNSCALER



INTRODUCTION

Mixed resolution deployments are always a source of frustration for both you and your client; that cherished legacy TV (that should have been replaced) must coexist with the fantastic new 4K HDR TV in the living room. Of course, they want to watch the same thing in both rooms!

With no latency or tearing, our 6G HDMI 4K downscaling solution can convert your 4K content to 1080p in real time. It's ideal for a quick fix to your mixed resolution deployments, and its low profile allows it to sit perfectly behind the TV.

FEATURES

- Seamlessly downscales 4K UHD Signals to 1080p
- Designed for installations featuring mixed resolution TVs
- Simple set up using HDMI inputs and outputs
- Rotating dial switch for selecting downscale mode
- Perfect for use with neo matrix systems
- Discreet design, only 1.8 cm high. perfect for placing or mounting behind TV
- Optional optical port for using

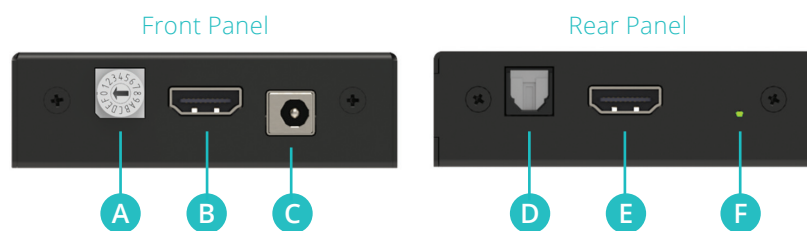
INSIDE THE BOX (KIT)

- 1 x HDMI UHD 18Gbps Downscaler
- 1 x Power Cable
- 1 x Quick Start Guide

SPECIFICATIONS

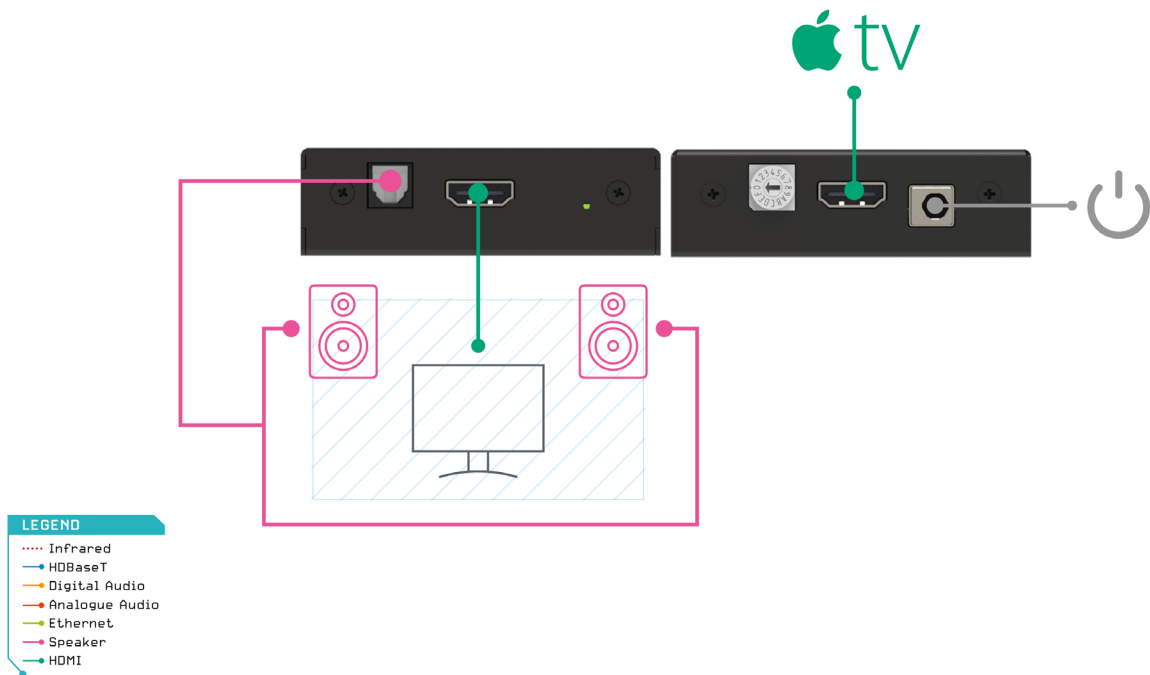
SKU:	P8-HDMI2-2KDS
Input	HDMI 2.0a
Outputs:	HDMI 2.0a, Toslink (Optical)
Max Video Output Clock Speed:	Input: 594 Mhz, Output: 340 Mhz
Video Impedance:	100 Ω
Input Video Signal:	3.3 V DC bias, 400-600 mVp-p
Input DDC Signal:	5 volts p-p (TTL)
Transmission Distance:	Input - 2-metre (4K/1080p), Output - 2-metre (4K/1080p)
Max In/Out Resolution Supported:	Up to 3840 x 2160p @ 60 Hz
Colour Supported:	4:4:4 (8-bit), 4:2:2 (10-bit) or 4:2:0 (12-bit) all but at 3840 x 2160p @60 Hz
Scale Video Down from	3840x2160p @24/25/30/60 Hz to 1920x1080p @ 24/25/30/60 Hz
Audio Input Format:	5.1 Dolby Digital or 2 channel Stereo PCM
Audio Output Format:	5.1 Dolby Digital or 2 channel Stereo PCM
Power Supply:	5 V DC / 10 W power supply (CE/FCC certified)
Power Consumption:	Max 2Amp @ 5 V 10 Watts
ESD Protection:	8kV (Air-gap discharge) $\pm$ 4 kV (Contact discharge)
Surge Protection:	IEC 61000-4-4 (EFT) 40A (5/50ns) IEC 61000-4-5 (Lightning) 25A (8/20 μ s)
Product Dimensions:	7.9 x 1.8 x 8.3 cm
Product Weight:	100g
Operating Temp Range:	0 to +35°C (32 to +95°F)
Operating Humidity Range:	5 to 90% RH (no condensation)
Certification:	CE, FCC, RoHS

PANEL DESCRIPTIONS



- A Scale** - The scale adjuster to controls the functionality of the Downscaler.
- B HDMI In** - Connect to an HDMI source device (i.e Blu-Ray player) to this port using an HDMI cable.
- C DC 5V** - Use the supplied mains power cable and connect to the chassis. Do not use any other power cables with this product.
- D Optical Out** - Connect an Optical cable between the 'Optical Out' port and the Audio device.
- E HDMI Out** - Use Connect to HDMI sink device (i.e TV) to this port using an HDMI cable.
- F Status** - Status LED indicator

INSTALLATION



1. Connect an HDMI cable between Downscaler 'HDMI OUT' and TV.
2. Connect an HDMI cable between Downscaler 'HDMI IN' and Video Source.
3. For S/PDIF audio output, connect an optical cable between the 'Optical Out' port and the Audio device.
4. Plug-in power jack to 'DC 5V' port.
5. Power on the power adapter.

Status LED Indicator

- RED** - Powering on. This may take a few seconds.
- AMBER** - Detected a change in the video signal and configuring.
- GREEN** - Configured and healthy. Video and audio will be output.

EDID Control

The rotating switch controls the functionality of the Downscaler. To set a particular mode:

1. Power OFF the Downscaler.
2. Using a small flathead screwdriver, turn the arrow to the desired mode number.
3. Power ON the Downscaler.

Scale	Function
0	Use saved EDID after copying from a TV using mode 1
1	Copy EDID from a TV and save it. Switch to 0 after saving EDID
2	Use EDID profile 4K, HDR, 8 Channel Audio
3	Use EDID profile 4K, HDR, 6 Channel Audio
4	Use EDID profile 4K, HDR, 2 Channel Audio
5	Use EDID profile 4K, No HDR, 8 Channel Audio
6	Use EDID profile 4K, No HDR, 6 Channel Audio
7	Use EDID profile 4K, No HDR, 2 Channel Audio
8-F	Reserved. No function.

TROUBLESHOOTING

Should you encounter installation difficulties or issues with device communication, the following checklist of common issues and causes should help resolve your issues. If you still continue to experience issues, please contact your local representative for further assistance.

No Video

- Connected and powered? Double check that all HDMI, and power cables are firmly connected to the correct ports and all devices are correctly powered.
- Cable quality and condition - HDMI cable/connectors can easily be damaged and the quality of material can vary. Always use good quality leads and cables and try swapping cables that are known to be working into the solution to see if this improves your image.

No Audio

- Check the source, if the output is more than 6 channels. Audio will not output if there are more than 6 channels.
- Verify the S/PDIF or TOSLINK cable is working. If you still do not receive a response, please contact a Pulse-Eight representative or your Installer.