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HDMI

HDMISS04

**1x4 HDMI 2.0a Splitter with EDID Management
& Auto Scaling 4K/1080p**

User Guide



Important Safety Notice

Thank you for purchasing this Antiference HDMI distribution product. Please read the following instructions carefully and retain for future reference.

Please pay careful attention to the following safety considerations:

1. Do not place any items on the device
2. Ensure no liquids are on or near the device as splashes may damage the unit
3. For cleaning, use a damp cloth only without solvents
4. Do not attempt to open the case as there is a danger of electric shock
5. Repairs should be carried out by a qualified technician
6. Place the unit in a well ventilated area to prevent overheating
7. Carry out the installation before connecting the device to a source of power
8. Use only the supplied power supply as 3rd party products may damage the product

Introduction

The HDMISS04 is a 1 to 4 HDMI 2.0a Splitter with auto scaling 4K/1080p. In addition, the device supports HDCP 2.2, HDR and also features an EDID Management system for complete flexibility.

The auto scaling feature enables the user to connection a combination of 4K & 1080p TV sets and the splitter automatically scales to the highest resolution the TV set is capable of.

The splitter is compatible with SKY Q and is a perfect choice when connecting a combination of different TV sets to the SKY box.

With built-in USB firmware update mechanism, the compatibility among many HDMI sources and receivers can be further guaranteed. With full HDR/4K2K@60 4:4:4 8bits and high definition audio support, the HDMISS04 is suitable for high quality HDMI broadcasting, digital signage and education applications.



Features

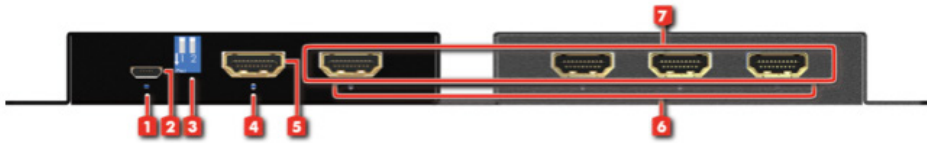
- HDMI2.0a compliant
- Supports 4K2K@60 4:4:4 8bits
- Supports HDR1, which is 4K2K@60 4:2:0 10bits2
- HDCP 2.2 and 1.4 compliant
- Wide frequency range: 25MHz~600MHz
- Video bandwidth: 18Gbps
- Supports resolution downscaling from 4K2K to 1080P!
- Supports default EDID and EDID learning from display
- Supports xvYCC, x.v.Colour & Deep Colour
- Micro-USB firmware update for expanding compatibility
- Supports Dolby Digital, DTS-HD and Dolby TrueHD audio
- Simple installation

Package Contents

1x HDMISS04
1x DC 5V PSU
1x User Guide



Panel Description



1. Power LED: Lit up when device is receiving power
2. Micro-USB Port: Connect to 5V DC power supply unit
3. EDID Management System: See table below

DIP Switch Position		Description
Off [↑]	Off [↑]	Ultra HD(4K2K@60) – 8/10/12bit 3D HDR video & 7.1ch audio
On [↓]	Off [↑]	Ultra HD(4K2K@60) – 8/10/12bit 3D HDR video & 2ch audio
Off [↑]	On [↓]	Full HD(1080p@60) – 12bit 3D video & 7.1ch audio
On [↓]	On [↓]	Learning EDID from output 1

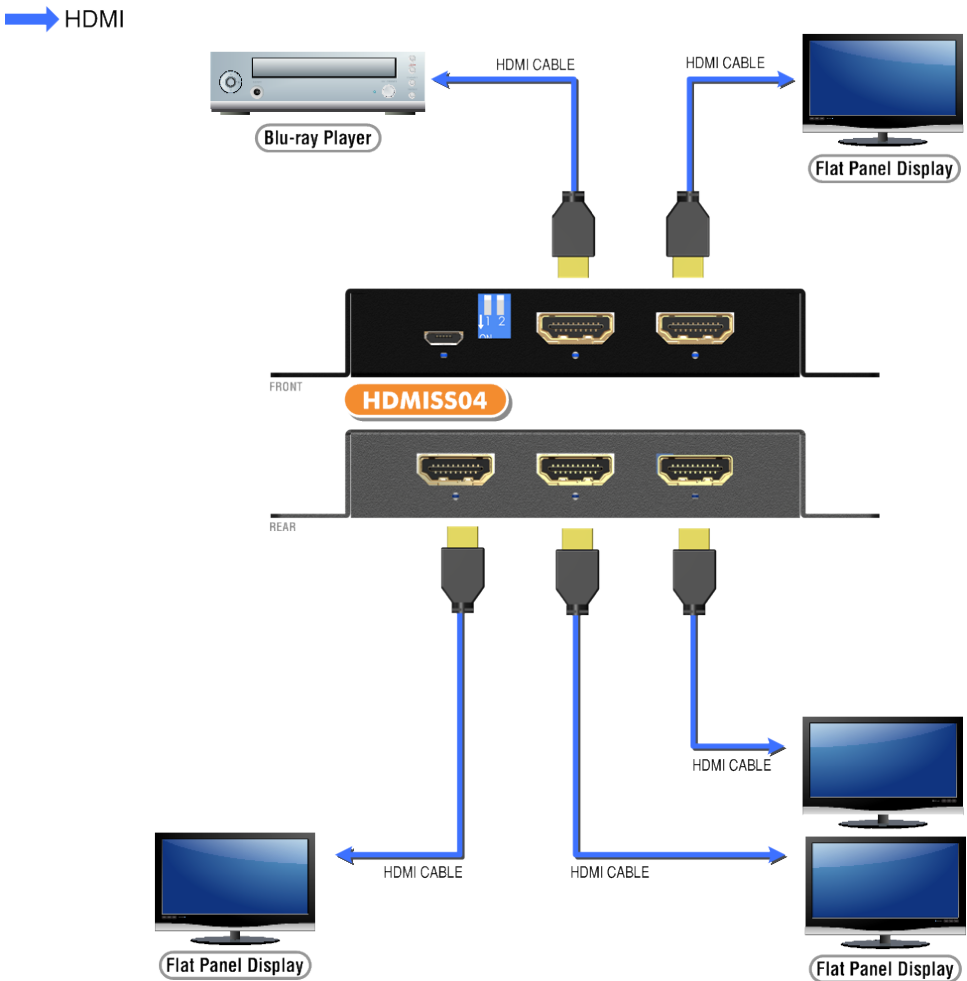
4. Signal LED: Input signal LED indicator
5. HDMI IN: Connect to an HDMI input source
6. Signal LED: Output 1-4 signal LED indicator
7. HDMI OUT 1-4: HDMI outputs to HDMI displays [HDMI OUT1: EDID Learn Default]

*Automatic EDID learning will detect all the connected HDMI equipped monitors and analyze all the content of EDID. The EDID with maximal resolution support will be the reference EDID for incoming HDMI source players.

Hardware Installation

1. Start with all devices including EDUs (TVs) powered off.
2. Connect the EDU devices.
3. Connect an HDMI source (such as a Blu-ray and SKY Q) to the HDMI input.
4. Plug in 5V DC power supply.
5. Power on the HDMI EDUs.
6. Power on the HDMI source.

Connection Diagram



Advanced Options

Troubleshooting

1. If for some reason there is no video output, try adjusting the EDID dip switch to “[pin1, pin2]=[↑-↓]” or “[pin1, pin2]=[↓-↓]”.

Under “[pin1, pin2]=[↑-↓]”, there should be video output. The only requirement in this setting is that the display must support at least Full HD 1080p. If the default Full-HD EDID as described still doesn't work then switch to “[pin1, pin2]=[↓-↓]” to learn the EDID from output 1 to customize the EDID information. **(Please note that the display with lowest resolution must be connected to output 1)**

Select to [pin1, pin2]=[↑-↓] - Full-HD(1080p@60) – 12bit 3D video & 7.1ch audio

- 1) Set the dip switch to “[pin1, pin2]=[↑-↓]”
- 2) Power on the device

Select to [pin1, pin2]=[↓-↓] – Learning EDID from output 1

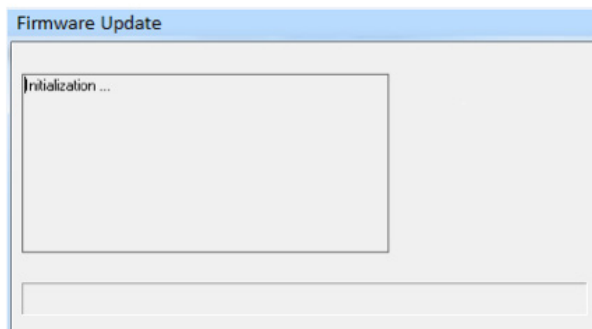
- 1) Set the dip switch to “[pin1, pin2]=[↓-↓]”
- 2) Power on the device
- 3) It will automatically learn EDID from output 1

EDID Mode Note

- a. If the user wants to change EDID mode, please power cycle the device after setting the dip switches to the required positions.

Firmware Updates

2. Firmware update can be updated through the Micro-USB.
 - 1) Save the firmware file (.bin) & software into the same folder.
 - 2) Connect the Micro-USB cable between PC and device
 - 3) Open the firmware update software and then device will start to update the firm ware automatically.
 - 4) After the update process is done, the software will show the “Success” message and then will close automatically.
 - 5) Power cycle the device to complete the process.



Specifications

Technical		
Role of usage	1x4 Distribution Amplifier (Splitter)	
HDMI compliance	HDMI 2.0a	
HDCP compliance	HDCP 2.2 / 1.4	
Video bandwidth	Single-link 600MHz [18Gbps]	
Video support	HDR 4K2K@60(4:2:0 10bits) / 4K2K@60 (4:4:4 8bits)	
Audio support	DTS-HD Master Audio, Dolby TrueHD Dolby Digital, DTS, LPCM	
ESD protection	Human body model — $\pm 15\text{kV}$ [air-gap discharge] & $\pm 8\text{kV}$ [contact discharge]	
Firmware update	Feasible via Micro-USB port	
Input	1x HDMI	
Output	4x HDMI	
HDMI connector	Type A [19-pin female]	
Dip switch	EDID Mode selection	
Mechanical		
Housing	Metal enclosure	
Dimensions [L x W x H]	Model	112 x 62 x 18mm [4.4" x 2.4" x 0.7"]
	Package	198 x 137 x 74mm [7.8" x 5.4" x 2.9"]
	Carton	420 x 400 x 300mm [1'4"x 1'3" x 11.8"]
Weight	Model	170g[6 oz]
	Package	365g[12.9 oz]
Fixedness	Wall-mounting case	
Power supply	5V 1A DC	
Power consumption	4 Watts [max]	
Operation temperature	0~40°C [32~104°F]	
Storage temperature	-20~60°C [-4~140°F]	
Relative humidity	20~90% RH [no condensation]	

Declaration of Conformity

We, ANTIFERENCE LIMITED herewith declare that the HDMI splitter complies with all essential requirements and any other applicable conditions set forth on directive 2014/30/EU.

According to the WEEE (Waste Electrical and Electronic Equipment) EU Directive, do not dispose of this product as household waste or commercial waste. Waste Electrical and Electronic Equipment should be appropriately collected and recycled as required by practices established for your country. For information on recycling of this product, please contact your local authorities, your household waste disposal service or the shop where you purchased the product.

