

gofanco[®]

PRO-HDRsplit4P

4K HDR 1x4 splitter

User's Guide



Congratulations for owning a gofanco product. Our products aim to meet all your connectivity needs wherever you go.

Have fun with our products!

Please read this manual carefully before first use.

If you need more information about our products, please visit www.gofanco.com.

For technical support, please email us at support@gofanco.com.

For drivers/manuals download, please go to <http://www.gofanco.com/download>.

1. Introduction

The PRO-HDRsplit4P **1x4 HDMI 2.0a Splitter with Built-in & User Adjustable EDID Management** provides the most cost effective and advanced HDMI splitter solution on the market, by which the high definition video and high quality audio can be transmitted to 4 different locations without losing quality. PRO-HDRsplit4P supports HDR and the true 4K2K video!

With built-in USB firmware update mechanism, the compatibility among countless HDMI sources and receivers can be further guaranteed. With the upmost HDR/4K2K@60 4:4:4 8bits and high definition audio support, PRO-HDRsplit4P is suitable for high quality HDMI broadcasting, digital signage and education applications!

2. Features

- HDMI 2.0a compliant
- Supports 4K2K@60 4:4:4 8bits
- Supports HDR*, which is 4K2K@60 4:2:0 10bits**
- 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.Color & Deep Color

- Mini-USB firmware update for expanding compatibility
- Supports Dolby Digital, DTS-HD and Dolby TrueHD audio
- Easy installation

* HDR = High Dynamic Range.

** The video bandwidth of 4K2K@60 4:2:0 10bits (HDR) is 384 MHz, and the 4K2K@60 4:4:4 8bits is 594MHz.

*** Does NOT support resolution downscaling from 4K2K@60 4:2:2 to 1080P

(1) Resolution downscaling from 4K2K@60 4:2:2 to 1080P

(2) Frame rate conversion

(3) 4K2K@60 4:2:2 to 4K2K@60 4:2:0

PRO-HDRsplit4P can bypass 4K HDR data content, but can NOT process it and make HDR content 100% fit into 1080p

3. Package Contents

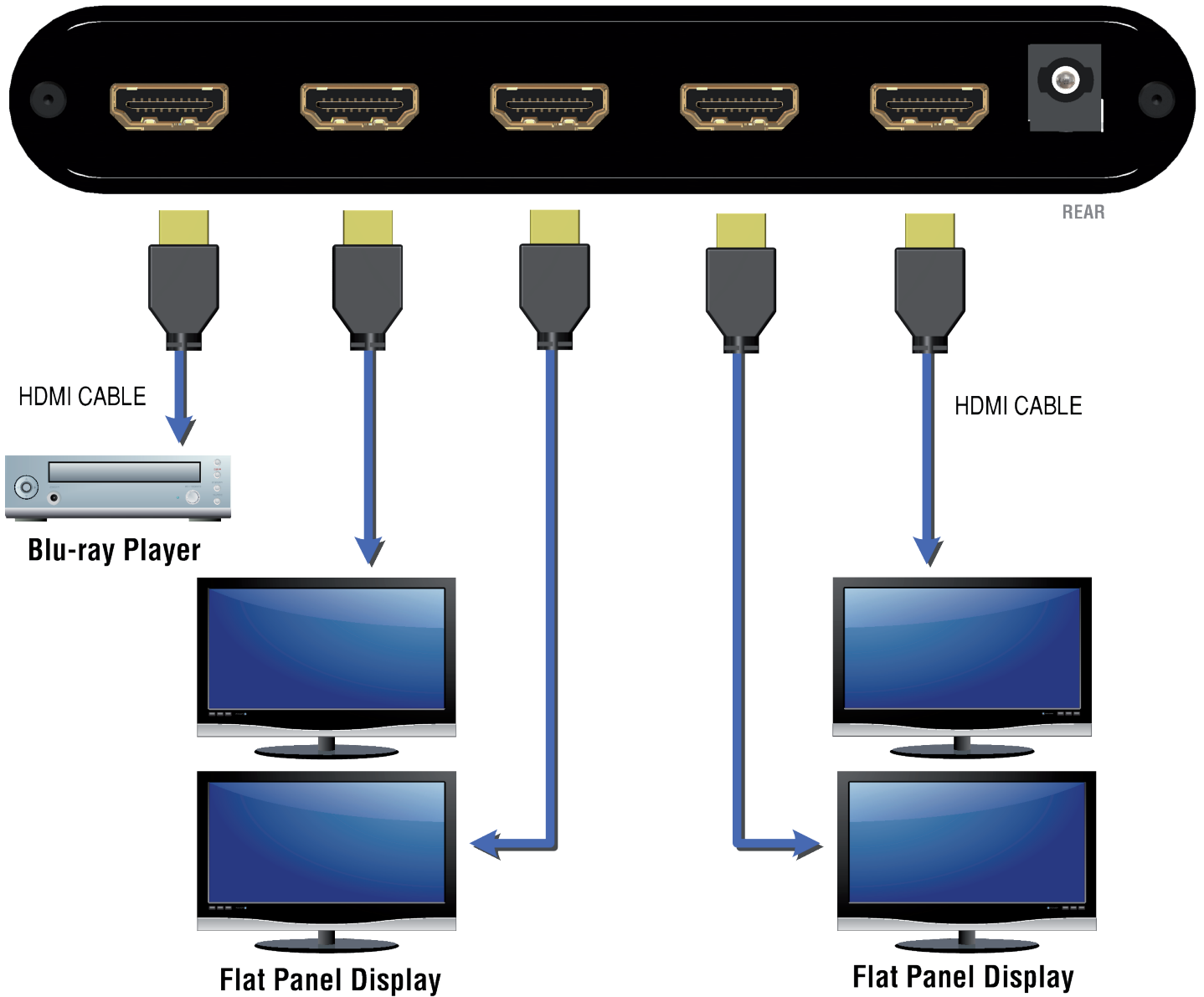
- 1x PRO-HDRsplit4P
- 1x DC 5V wall wart
- 1x User Manual

4. Specifications

Item	Description	
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, DVD-Audio, LPCM, SACD, MPCM	
ESD protection	Human body model — ±15kV [air-gap discharge] & ±8kV [contact discharge]	
PCB stack-up	4-layer board [impedance control — differential 100Ω; single 50Ω]	
Firmware update	Feasible via Mini-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 D x H]	Model	150 x 68 x 24mm [5.9" x 2.7" x 0.9"]
	Package	198 x 137x 74mm [7.8" x 5.39" x 2.91"]
	Carton	420 x 400 x 300mm [16.53" x 15.75" x 11.81"]
Weight	Model	216g [7.6 oz]
	Package	435g [1 lbs]
Fixedness	Wall-mounting case	
Power supply	5V 2A DC	
Power consumption	10 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]	

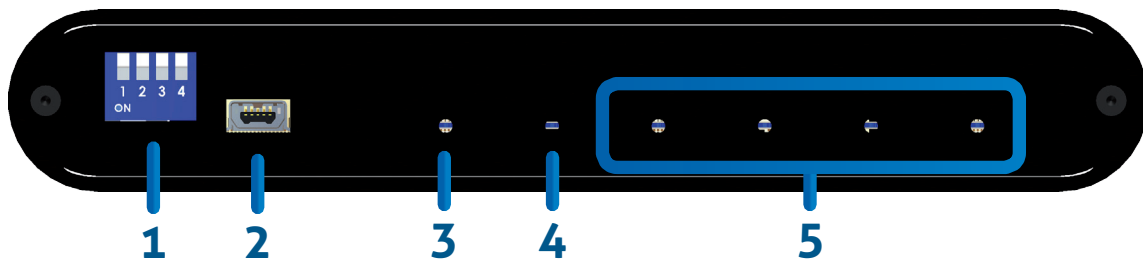
5. Connection Diagram

PRO-HDRsplit4P



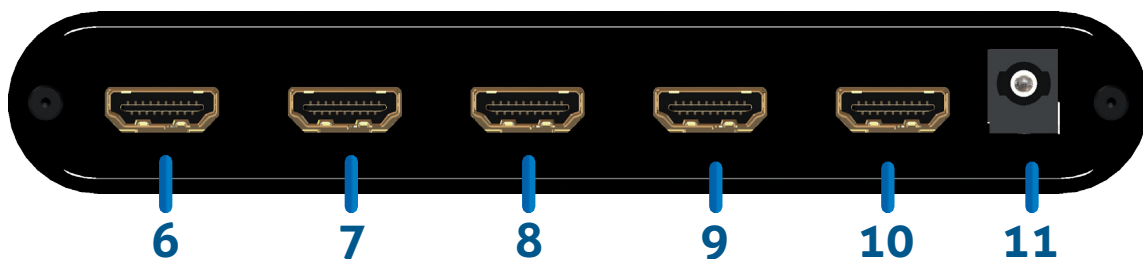
6. Panel Description

Front Panel



1. **EDID MODE:** See more detail in the DIP SWITCH SETTING section
2. **Mini-USB:** For technical support only [firmware update]
3. **Power LED:** Lights on when device is ready
4. **Signal LED:** Input signal LED indicator
5. **Signal LED:** Output 1-4 signal LED indicator
6. **HDMI IN:** Connect to a HDMI input source

Rear Panel



7. **HDMI OUT1:** HDMI outputs to HDMI displays
8. **HDMI OUT2:** HDMI outputs to HDMI displays
9. **HDMI OUT3:** HDMI outputs to HDMI displays
10. **HDMI OUT4:** HDMI outputs to HDMI displays
11. **+5V DC:** Connect to the +5V DC 2A power supply unit



Signal LED light on when device is connect to source and display.

7. Dip Switch Setting

On [↓] Off [↑]

DIP Switch Position			Description
Pin 2	Pin 3	Pin 4	
↑	↑	↑	Ultra HD(4K2K@60) – 8/10/12bit 3D HDR video & 7.1ch audio, 4K to 1080p Auto Scaling
↓	↑	↑	Ultra HD(4K2K@60) – 8/10/12bit 3D HDR video & 2ch audio, 4K to 1080p Auto Scaling
↑	↓	↑	Ultra HD(4K2K@30)(4K2K@60 420) – 8bit 3D HDR video & 7.1ch audio, 4K to 1080p Auto Scaling
↓	↓	↑	AVR Mode, 4K to 1080p Auto Scaling
↑	↑	↓	Full-HD(1080p@60) – 12bit 3D video & 7.1ch audio
↓	↑	↓	Full HD(1080p@60) – 8bit 2D video & 2ch audio
↑	↓	↓	Learning EDID from output 1
↓	↓	↓	Auto EDID analysis learning mode*
DIP Switch Position			Description
Pin 1			
↑			Working Mode
↓			Firmware Update mode

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

8. Installation

Broadcasts HDMI signal to 4 HDMI displays!

- Switch off all devices, including monitors.
- Connect to the displays.
- Connect an HDMI source (such as a Blu-ray Disc player) to the HDMI In.
- Plug in 5V DC power supply.
- Power on the HDMI monitors.
- Power on the HDMI source.

9. Notice

1. If somehow user cannot get video output, please try to adjust EDID dip switch to “[pin2,pin3,pin4]=[↓-↑-↓]” or “[pin2,pin3,pin4]=[↑-↓-↓]” for trouble shooting. Under “[pin2,pin3,pin4]=[↓-↑-↓]”, there will be video output. The only requirement is that the display has to support at least Full HD. If default Full-HD EDID still cannot work, user can switch to “[pin2,pin3,pin4]=[↑-↓-↓]” 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 [pin2,pin3,pin4]=[↓-↑-↓]-Full-HD(1080p@60) – 8bit 2D video & 2ch audio

- 1) Set the dip switch to “[pin2,pin3,pin4]=[↓-↑-↓]”
- 2) Power on the device

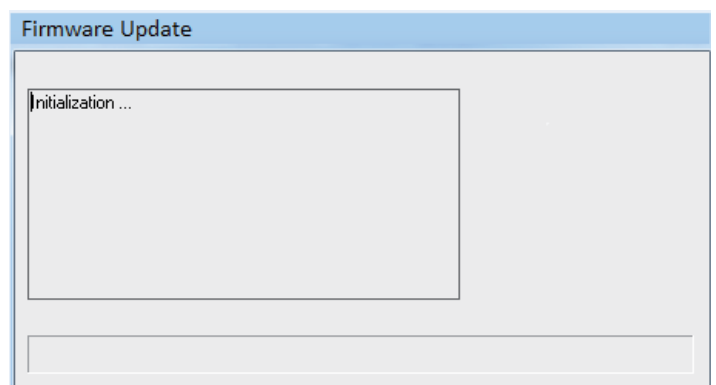
Select to [pin2,pin3,pin4]=[↑-↓-↓] - Learning EDID from output 1

- 1) Set the dip switch to “[pin2,pin3,pin4]=[↑-↓-↓]”
- 2) Power on the device
- 3) It will automatically learn EDID from output 1



If the user wants to change EDID mode, please power cycle the device after setting dip switch.

2. While connecting a new monitor to the splitter under “[pin2,pin3,pin4]=[↓-↓-↓]” (under auto EDID analysis learning mode), experiencing a short period of time without displaying might be expected. The splitter will do Automatic EDID learning and generate the best EDID among all connected monitors.
3. Firmware update is proceeded through Mini-USB.
 - 1) Save the firmware file(.bin) & software in the same folder.
 - 2) a) Power on the device, b) connect the Mini-USB cable between PC and device, & c) set the PIN1 dip switch to “On [↓]”(firmware update mode)
 - 3) Open firmware update software and then device will start to update firmware automatically.
 - 4) After update process is done, software will show “Success” message and then be closed automatically.
 - 5) Set the PIN1 dip switch to “Off [↑]”(working mode)
 - 6) Power cycle the device



11. Limited Warranty

The SELLER warrants the **PRO-HDRsplit4P 1x4 HDMI 2.0a Splitter with Built-in & User Adjustable EDID Management** free from defects in the material and workmanship for 1 year from the date of purchase from the SELLER or an authorized dealer. Should this product fail to be in good working order within 1 year warranty period, The SELLER, at its option, repair or replace the unit, provided that the unit has not been subjected to accident, disaster, abuse or any unauthorized modifications including static discharge and power surge. This warranty is offered by the SELLER for its BUYER with direct transaction only. This warranty is void if the warranty seal on the metal housing is broken.

Unit that fails under conditions other than those covered will be repaired at the current price of parts and labor in effect at the time of repair. Such repairs are warranted for 90 days from the day of reshipment to the BUYER. If the unit is delivered by mail, customers agree to insure the unit or assume the risk of loss or damage in transit. Under no circumstances will a unit be accepted without a return authorization number.

The warranty is in lieu of all other warranties expressed or implied, including without limitations, any other implied warranty or fitness or merchantability for any particular purpose, all of which are expressly disclaimed.

Proof of sale may be required in order to claim warranty. Customers outside Taiwan are responsible for shipping charges to and from the SELLER. Cables and power adapters are limited to a 30 day warranty and must be free from any markings, scratches, and neatly coiled.

The content of this manual has been carefully checked and is believed to be accurate. However, The SELLER assumes no responsibility for any inaccuracies that may be contained in this manual. The SELLER will NOT be liable for direct, indirect, incidental, special, or consequential damages resulting from any defect or omission in this manual, even if advised of the possibility of such damages. **Also, the technical information contained herein regarding the PRO-HDRsplit4P features and specifications is subject to change without further notice.**

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