## **Specifications**

Environment	HDMI 1.4a (3D)		
Devices	DVD/Blu-Ray, plasma, projectors, monitors, TV, PC, laptops		
Transmission	Transparent to the user		
	25 to 340 MHz		
Frequency			
Signals	HDMI 1.4 protocol		
Connectors	Six (6) HDMI Type A 19-pin female		
	Seven (7) 3.5mm Stereo Jack One (1) RS232 connector		
	One (1) 2.1 mm Power Jack		
1 ED			
LEDs	One (1) Power: Green		
	Sixteen (16) port selection: Green		
Manual Control	Rocker switch on the front of the unit		
Remote Control	Included		
Resolution	480i to 1080p @ 50/60 fps		
	1080p @ 24/50/60 fps		
	3840 X 2160 @ 24/25/30 fps		
	VGA to UXGA		
Color	8, 10 & 12 bit		
Audio	LPCM, compressed (Dolby, DTS) and HBR		
HDCP	Revision 1.4		
Cable	HDMI Cable		
Temperature	Operating: 0° to 40°C Storage: -20° to 60°C		
	Humidity: up to 90% non-condensing		
Enclosure	Metal enclosure		
Bracket	Wall mount brackets included		
Dimensions	10.24" x 4.45" x 1.02" (260 mm x 113 mm x 26 mm)		
Weight	2.72 lbs (1.23 Kg)		
Power Supply	5VDC, 1A with interchangeable blade for US, UK and Euro		
Compliance	Regulatory: FCC, CE, RoHS		
Warranty	2 years		
Order Information	500442 HDMI 4X2 Matrix Switch, UHD-4K		



HDMI 4X2 Matrix Switch, UHD-4K (500442)

#### **Quick Installation Guide**

### Overview

The HDMI 4x2 Matrix Switch (500442) allows Four (4) HDMI sources to be distributed to Two (2) HDMI display. The switcher supports up to 4K (3840 x 2160), 8-bit color and HD audio. The splitter is HDCP 1.4 compliant and features LED diagnostics. Additionally, all HDMI connectors are on the rear panel for neater cabling. Applications include; commercial and residential AV systems, classroom projector systems, digital signage, boardroom systems, collaborative PC systems, medical information systems.

# **Pre-Installation Check**

Identify the connectors as indicated on the product





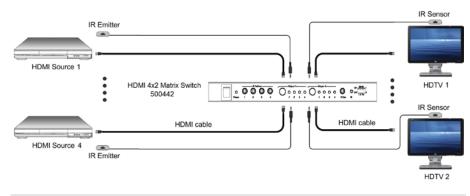
8495 Dalton Road, Mount Royal, Quebec, Canada. H4T 1V5 Tel: (514) 905-0588 Fax: (514) 905-0589 Toll Free (North America): (877) 689-5228 E-mail: <u>videoease@muxlab.com</u> URL: <u>www.muxlab.com</u>

94-000792-A SE-000792-A

#### Installation

In order to install the HDMI 4X2 Matrix Switch, please follow the steps below:

- 1. Connect the HDMI video source(s) to the input connector(s) of the switcher.
- 2. Connect the HDMI display equipment(s) to output connector(s) of the switcher.
- 3. Connect the 5VDC power supply to the switcher first, and then plug the power supply into an AC power outlet.
- 4. Power on the HDMI equipment and verify the image quality.
- 5. If infrared remote control is needed, connect the IR Sensor to the 3.5mm Stereo Jack of the IR Sensor Jack and the IR Emitter to the 3.5mm Stereo Jack of the IR Emitter Jack.
- Note: You can differentiate the IR Sensor and the IR Emitter by looking at the head. The IR Sensor has a black plastic head and the IR Emitter have dark red hemispheric head.
- 6. Position the IR Sensor so that it is directed to the hand-held remote control. For a clear IR signal reception, aim the hand-held remote control to the top of the IR Sensor enclosure.
- Position the IR Emitter as close as possible to the source's IR Sensor (i.e. DVD player). For a clear IR signal reception, the IR Emitter can be glued on the source's IR Sensor. The IR Emitter's signal is transmitted from the side of the enclosure.
- 8. The following diagram shows the final configuration.



### **Remote Control**

- 1. The output sections enable the up, down & direct selection of the input port.
- The EDID section configures the EDID for a specific input port or all ports. See the EDID configuration table to know the resolution associated with the EDID Index. To set a desired EDID; press the appropriated EDID Index key followed by the input port.

## **EDID Configuration**

Select the fix EDID that will be applied to all input port. Selecting "1111" will enable the control of the EDID by software.

EDID Index No.	EDID Selector	Description
Auto	0000	Auto
1	0001	1080p, 2CH AUDIO
2	0010	1080p, DOLBY/DTS 5.1
3	0011	1080p, HD AUDIO
4	0100	1080i, 2CH AUDIO
5	0101	1080i, DOLBY/DTS 5.1
6	0110	1080i, HD AUDIO
7	0111	3D, 1080p, 2CH AUDIO
8	1000	3D, 1080p, DOLBY/DTS 5.1
9	1001	3D, 1080p, HD AUDIO
10	1010	4Kx2K, 2CH AUDIO
11	1011	4Kx2K, DOLBY/DTS 5.1
12	1100	4Kx2K, HD AUDIO
Out 1	1101	Copy EDID from HDMI Output 1
Out 2	1110	Copy EDID from HDMI Output 2
	1111	Software Control mode

# Troubleshooting

The following tables describe some of the symptoms, probable causes and possible solutions in respect to the installation of the HDMI 4X2 Matrix Switch.

Picture/Sound	Probable Cause	Possible Solution
No Image	Wiring	Check continuity
		Check correct wiring
No Image	Synchronization	Power off the source and the
		display. Power on the devices.
Flickering Image	Synchronization	Check HDMI cable length
Choppy Sound	Synchronization	Check HDMI cable length
Noise in image	Weak signal	Check HDMI cable length
_	_	_
Green or pink hue	Cable	Check HDMI cables and replace.
IR not functioning	Remote control not directed to	Make sure the IR Sensor is directed
	the IR Sensor or IR Emitter	towards the remote and the IR
	not directed to the source.	Emitter to the equipment
IR not functioning	Interference from sunlight,	Place the IR equipment away for
	Fluorescent, Neon or Halogen	the interfering light
	lights	
IR not functioning	Interference from RF radiation	Place the IR equipment away for
	from the TV	the RF radiation

If you still cannot diagnose the problem, please call MuxLab Customer Technical Support at 877-689-5228 (toll-free in North America) or (+1) 514-905-0588 (International).