

USER MANUAL

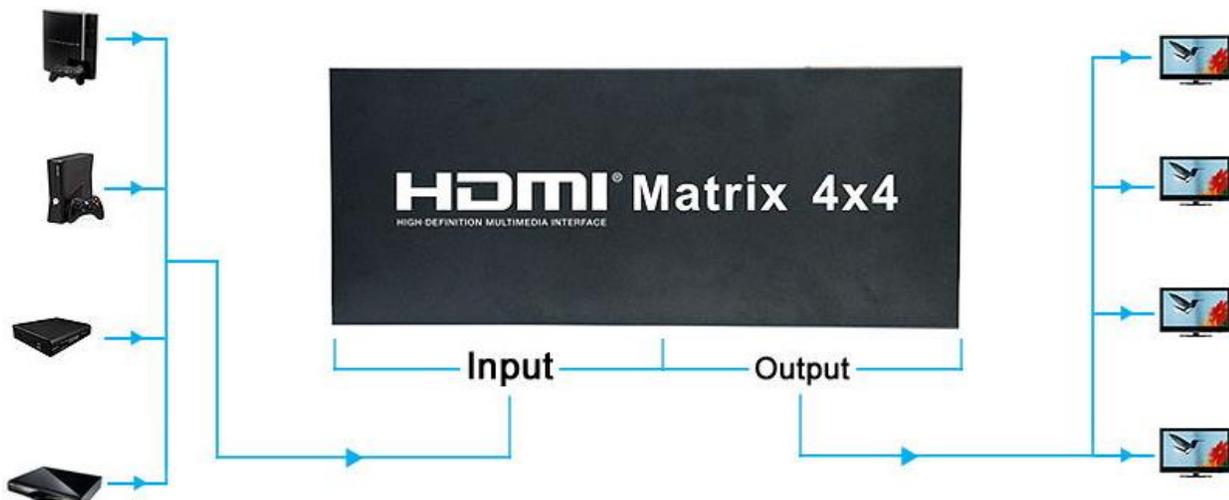
4x4 HDMI Matrix

Enjoy vivid video world

Product Introduce:

The 4x4 HDMI matrix can connect four HDMI signal sources with the four displays at the same time. It can easily and freely split or switch four HDMI signals on four displays or projectors which compatible with HDMI signal. In addition, connect its port with HDMI cable and amplify the HDMI signal.

The equipment our company produced provide solution for the following applications: such as the place limited of noise, transmission distance and safety, data center control, information distribution, the presentation in conference room, teaching environment and corporate training places.



Features :

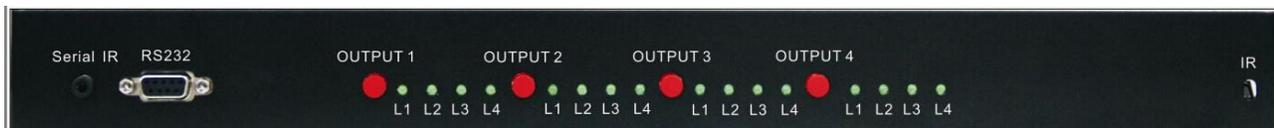
- Four HDMI signals input to be independently distributed or switched to four displays which support HDMI signal input
- Support HDMI 1.3 and HDCP1.4
- Support CEC
- Support true color 12 bit
- Support Blu-Ray DVD24/50/60fs/HD-DVD/xvYCC
- Support audio format DTS-HD/Dolby-trueHD/LPCM7.1/DTS/DOLBY-AC3/DSD

- Support signal timing reset
- Support AWG26 HDMI standard cable, input up to 15 meters, output up to 20 metres
- Input ports can be controlled by IR Remote Control
- Via RS-232 control, the Machine can upgrade the software, and the input and the output can be switched by computer
- No signal loss
- 12V/3A External Power Supply

Physical interface diagram



- ① INPUT1—INPUT 4: HDMI input
- ② OUTPUT1—OUTPUT4: HDMI output
- ③ ON/OFF: Power switch
- ④ DIP: dial switch to switch software for upgrading
- ⑤ IR : used for the IR remote control of this machine
- ⑥ :DC 12V : DC12V/3A power



- ① Serial IR: Used for the machine infrared remote control
- ② RS232: control the machine via the serial port.

- ③: Output1: the key of HDMI output 1
- ④: Output1: the key of HDMI output 1
- ⑤: Output1: the key of HDMI output 1
- ⑥: Output1: the key of HDMI output 1
- ⑦: IR : used for the IR remote control of this machine
- ⑧: L1-L4: Input signal Indicator L1----L4

RS-232 settings:

Baud rate.....9600

Data bits..... 8

Parity CheckNone

Stop bits.....1

Cyclic redundancy check.....None

HDMI 4X4 serial port instruction manual

1.video switch

Cir "+" cmd +Enter

Cmd value range: ≥ 0 and $\leq ff$

1) 4 outputs switch to the same input : cir a1~a4+Enter

For example:

Cir a4+Enter: All outputs switch to input 4

2) One to one switch : cir f0+Enter

For example:

cir f0+Enter: indicate output1->input1,output2->input2~output4->input4

3) all output++switch: cir aa+Enter

For example:

cir aa+Enter: indicate output1~output4 the selected input make an addition switch

4) all output - -switch: cir ab+Enter

For example:

cir ab+Enter: indicate output1~output4 selected input make an subtraction switch

5) single output- -switch: cir xc+Enter

"x" value range 0~3,

For example:

cir 1c+Enter: indicate output2 selected input make an addition switch

6) single output++switch: cir xd+Enter

"x" value range 0~3,

For example:

cir ,1d+Enter: indicate output2 selected input make an subtraction switch

7) Any output switch to any input: cir xy+Enter

"X" value range 0~3, "y" value range 0~3

For example:

Cir 03+Enter: indicate output1 switch to input4

Cir 12+Enter: indicate output2 switch to input3

1. EDID switch

The EDID This machine provided include:

- 1) 1080I 2ch 2d
- 2) 1080I 6ch 2d
- 3) 1080I 8ch 2d
- 4) 1080P 2ch 2d
- 5) 1080P 6ch 2d
- 6) 1080P 8ch 2d
- 7) 1080P 2ch 3d
- 8) 1080P 6ch 3d
- 9) 1080P 8ch 3d
- 10) 1280X1024 DVI
- 11) 1080P DVI
- 12) 1920X1200 DVI

serial command:

sid+" "x1+" "x2+Enter

x1 indicate the input port , value range 1~f, 1~4 indicate input1~input4,"f" indicate all input

x2 indicate the selected EDID , value range 1~c, corresponding EDID are above listed1~12 EDID。

For example:

sid 2 a+Enter
Indicate input2 select 1280X1024 DVI EDID

Specification:

HDMI resolution.....	24/50/60fs/1080p/1080i/720p/576p/576i/480p/480i
Support audio color format	12bit
Support audio format.....	DTS-HD/Dolby-trueHD/LPCM7.1/DTS/Dolby-AC3/DSD
Max baud rate.....	2.25Gbps
Input and output TMDS signal.....	0.5~1.5Volts p-p
Input and output DDC signal.....	5Volts p-p (TTL)
Input cable distance.....	≤15m HDMI AWG26
Output cable distance.....	≤20m AWG26 HDMI standard cable
Max working current.....	2.0A
Power adapter format Input.....	input:AC(50HZ, 60HZ) 100V-240V;output: DC12V/3A
Operating Temperature range.....	(-15 to +55°C)
Working humidity range.....	5 to 90%RH (No Condensation)
Dimension (L x W x H).....	435*184*46 (mm)
Weight.....	1900g

Operating and Connecting

§1 Connect HDMI cable from HDMI source device into HDMI matrix input port

§2 Connect HDMI cable from HDMI matrix Output port into display

§3 Connect 12V External power adapter to the HDMI matrix

§4 the customer can switch the input signal to corresponding output port via the button on front panel.

§5 How to use RS-232 port?

Through RS - 232 port you can update software and monitor the state of the input and output signals. And can switch signals. When connect the computer, The customer can easily switch the signals via computer.

Notes:

Please use correctly and maintenance properly, to ensure product performance and work properly

1. Should Stay away from damp, high temperature, dusty, corrosion and oxidation gas environment in order to avoid damage
2. All parts should avoid strong vibration, no collision tapping and drop fall, to avoid damage.
3. Do not touch the unit power adapter plugs with wet hand
4. Unplug the adapter plug from the power socket, please hold the plug, don't pull the power cord
5. please turn off the power supply when not use the machine.(unplug the power adapter plug when not use for a long time)
6. Please do not open the machine cover, do not touch any device in the machine.
7. Please use the power adapter provided or approved by the manufacturer

Pls Check the connecting cable carefully before the power on, Must ensure all interface are right connected.Common fault diagnosis and processing method is as follows:

No.	fault phenomenon	Reason and solution
1	No electricity	1.Check that if power plug is properly inserted into the power outlet 2.Check that if the power is on.

2	No image	<p>1. Confirm television has been turned on and is connected to the machine.</p> <p>2. Whether the input signal source open and connect in good condition.</p> <p>3. Check the connection state of the system.</p> <p>4. Check whether the cable is in good condition.</p> <p>5. Cable quality (HDMI cables is required to conform to the HDMI standard).</p>
3	Image blurring	<p>1. reconnect the port, in case of poor connection of socket interface</p> <p>2. cable quality (HDMI cables is required to conform to the HDMI standard).</p>
4	Remote control	<p>1. Check that if the remote battery insulation slices were taken out</p> <p>2. Whether the remote is with batteries</p>

The Package includes:

- 1. HDMI Matrix x1pc
- 2. IR Remote Control x1pc
- 3. 12V DC Power adapter x1pc
- 4. User Manual. x1pc