

D16

Video Wall Processor

Specification V1.0



Overview

D16 is a video splicer with powerful video signal receiving and processing capability. It includes 16 HDMI output ports, supports 4K and 2K video signal input, and has a load capacity of up to 33.17 million pixels, which can greatly meet the needs of different customers.

Features

Input

- Input Resolution: Max 4096×2160@60Hz.
- 4K input interface: 1×DP1.2, 1×HDMI2.0.
- 2K input interface: 2×HDMI1.4, 2×DVI.
- U-DISK interface: 1×USB3.0.

Output

- Loading capacity: 33.17 million.
- Output Resolution: Max 1920×1080@60Hz.
- 2K output interface: 16×HDMI1.4.

Audio

- Input Interface: 1×3.5mm.
- Output Interface: 1×3.5mm, support HDMI and DP audio outputs.

Function

- Up to 6 window displays, 1 layer per window. ¹
- Freely moving the window.
- Freely cropping and zooming in and out. The size is at least 64×64.
- Picture adjustment for adjusting the hue, saturation, contrast and brightness compensation of the device output.
- Brightness and color temperature adjustment.
- Scene polling with 128 scene parameters.
- Upgrade program and play photos、 videos with U-disk.
- OSD is used to play videos, pictures and adjust the screen display.

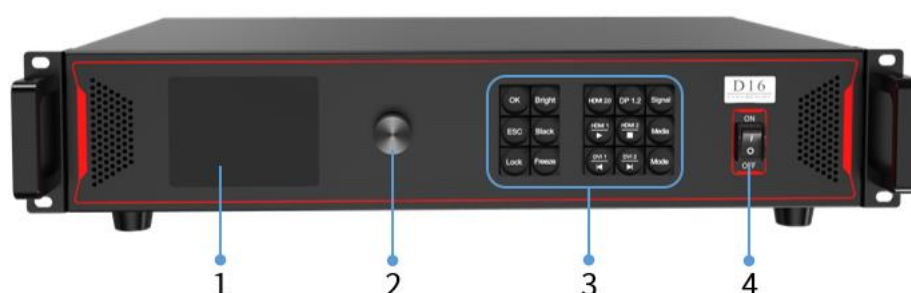
¹ When one 4K input signal, it can also support four 2K input. when two 4K input signals, only 2 windows can be opened.

Control

- USB port for control or cascading.
- RS232 protocol control.
- LAN port for TCP/IP control.
- Android APP for phones and tablets.

Appearance description

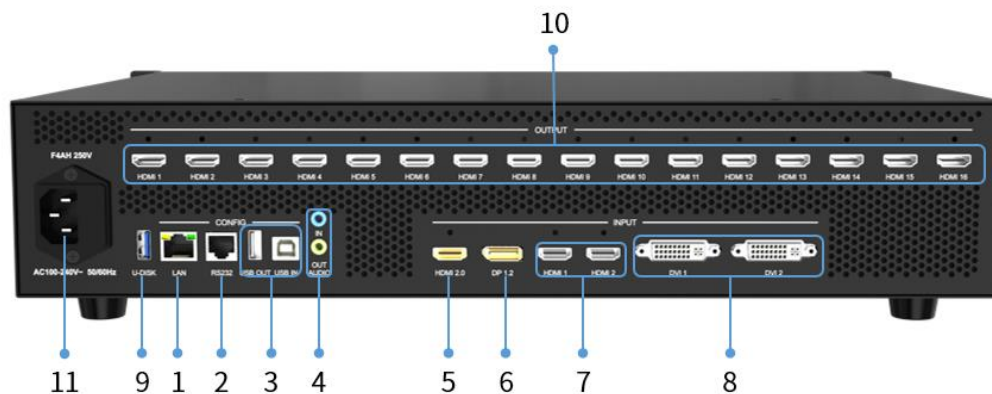
Front panel



No.	Item	Function
1	3.5" LCD	• Resolution is 480×320. • Display operation menu and system information.
2	Knob	• Press the rotary knob to enter a submenu or confirm a selection, • Rotate the knob to select menu items or adjust parameters.
3	Function button	• OK: Enter. • Bright: Adjust brightness. • ESC: Exit the current interface. • Black: Make the output screen show a black screen. • Lock: Lock the front panel keys. • Freeze: Freeze the output screen. • HDMI 2.0、DP1.2 、HDMI 1/ 、HDMI 2/ 、DVI 1/ 、DVI 2/ : In single-screen mode, click to switch directly to the corresponding signal. In U-disk play mode, some keys can be used as play, stop, previous and next function keys. • Signal: View signal status. • Media: Media playback function buttons. • Mode: Choose a preset scene.
4	Power Switch	Switch the device on or off

* The product pictures are for reference only, please refer to the actual product.

Rear panel



Control

1	LAN	Interface type: RJ45, connect to local area network.
2	RS232	Interface type: RJ11(6P6C) *, serial port protocol control, used to connect to the central control.
3	USB IN	Interface type: USB2.0 Type B, connect to a computer for parameter debugging or for cascading input.
	USB OUT	Interface type: USB2.0 Type A, cascade output.

Audio

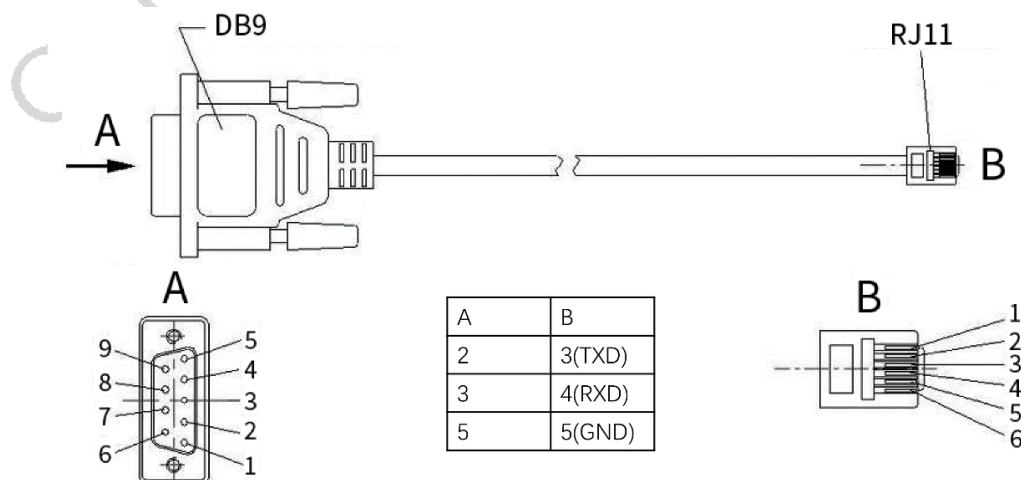
4	AUDIO IN	Interface type: 3.5mm, receive audio signals from computers and other equipment.
	AUDIO OUT	Interface type: 3.5mm, support HDMI, DP audio decoding and output audio signals to devices such as active speakers.

Input

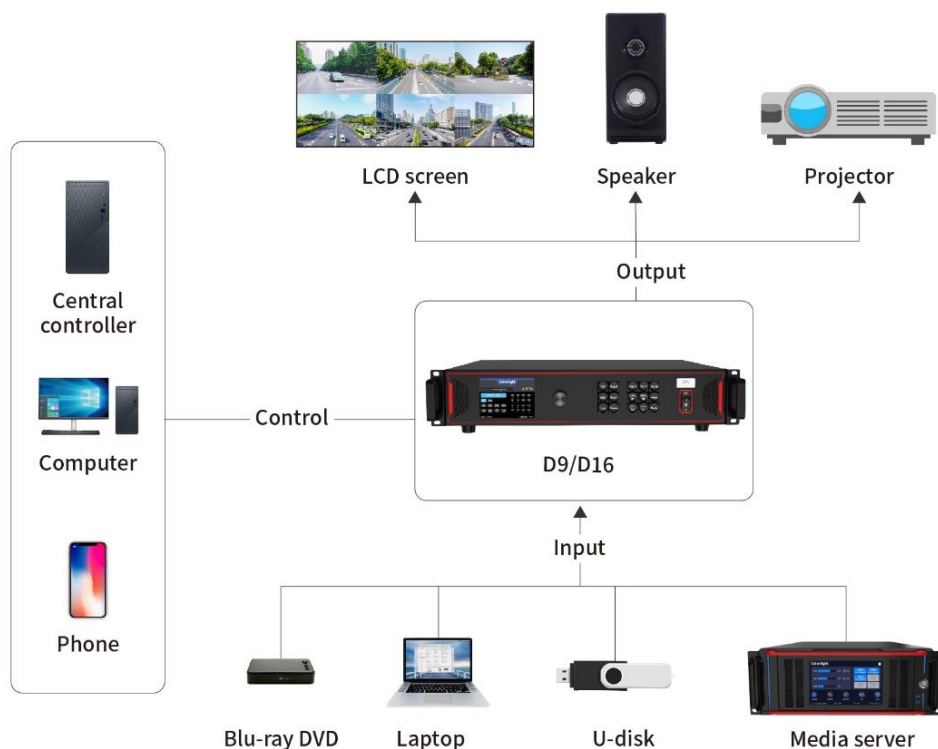
5	HDMI 2.0	1×HDMI 2.0, support audio input. - Maximum input resolution: 4096×2160@60Hz, maximum pixel clock: 600MHz. - Customization resolution: up to 8192 pixels in width or in height. - EDID.
6	DP 1.2	1×DP 1.2, support audio input. - Maximum input resolution: 4096×2160@60Hz, maximum pixel clock: 600MHz. - Customization resolution: up to 8192 pixels in width or in height. - EDID.
7	HDMI 1, HDMI 2	2×HDMI 1.4, support audio input. - Maximum input resolution: 1920×1200@60Hz, maximum pixel clock: 165MHz. - Customization resolution: up to 4096 pixels in width or in height. - EDID.

8	DVI 1, DVI 2	• 2×DVI. • Maximum input resolution: 1920×1200@60Hz, maximum pixel clock: 165MHz. • Customization resolution: up to 4096 pixels in width or in height. • EDID.
9	U-DISK	• U-disk interface, in single-screen mode, can play video/picture in U-disk. • U-disk format: support NTFC, FAT32, exFAT. • Image format: support jpeg、jpg、png、webp、gif、bmp. • Maximum image resolution:4096×2160. • Video format:support 3gp、avi、flv、m4v、mkv、mp4、tp、ts、vob、wmv、mpeg. - Video encoding format: MPEG-1/2、MPEG-4、H.264/AVC、H.265/HEVC、GOOGLE VP8、MOTION JPEG. - Audio encoding format: MPEG Audio、Windows Media Audio、AAC Audio、AMR Audio. • Video resolution: - Maximum: 4096×2160@60Hz (H.264/AVC、MVC、H.265/HEVC) - Maximum: 1920×1080@60Hz (MPEG-1/2、MPEG-4、GOOGLE VP8、VC-1)
Output		
10	HDMI	• 16×HDMI. • Support custom resolution, output resolution: Max 1920×1080@60Hz(All output ports). • Loading capacity: 33.17 million pixels.
Power supply		
11	AC100-240V~, 50/60Hz	Connect to AC power supply, including power protection device

* RJ11 (6P6C) to DB9 connecting line diagram is as follows:



Application



Signal format

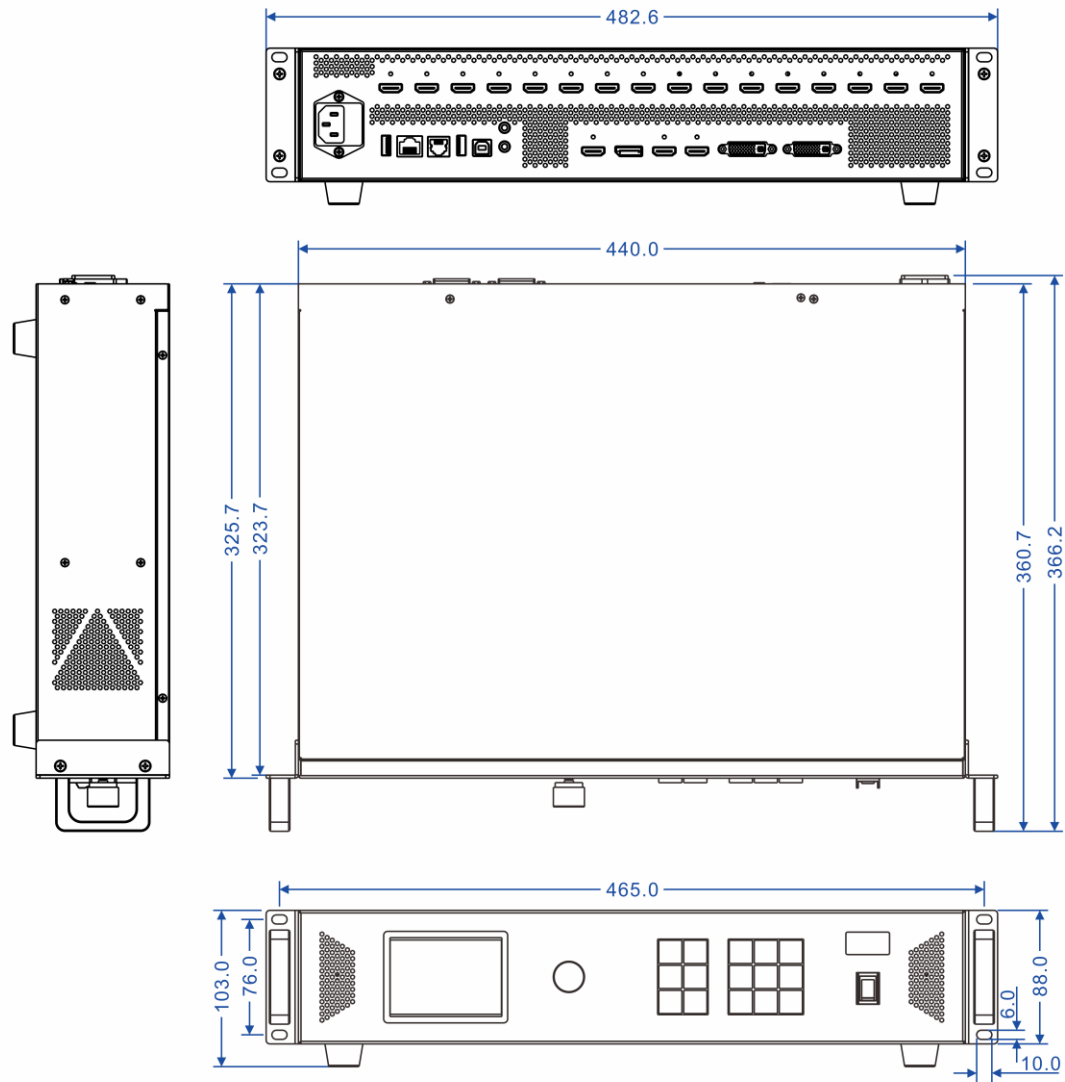
Input	Color space	Sampling	Color depth	Max Resolution	Frame rate
Input					
HDMI2.0	YCbCr	4:2:2	8bit	4096×2160@60Hz	23.98, 24, 25, 29.97, 30, 50, 59.94, 60, 120, 144
	YCbCr	4:4:4	8bit		
	RGB	4:4:4	8bit		
DP1.2	YCbCr	4:2:2	8bit	4096×2160@60Hz	23.98, 24, 25, 29.97, 30, 50, 59.94, 60, 120, 144
	YCbCr	4:4:4	8bit		
	RGB	4:4:4	8bit		
HDMI1.4	YCbCr	4:2:2	8bit	1920×1200@60Hz	23.98, 24, 25, 29.97, 30, 50, 59.94, 60
	YCbCr	4:4:4	8bit		
	RGB	4:4:4	8bit		
DVI	YCbCr	4:2:2	8bit	1920×1200@60Hz	23.98, 24, 25, 29.97, 30, 50, 59.94, 60
	YCbCr	4:4:4	8bit		
	RGB	4:4:4	8bit		
Output					
HDMI	RGB	4:4:4	8bit	1920×1080@60Hz	23.98, 24, 25, 29.97, 30, 50, 59.94, 60

Parameters

Size (W×H×D)	
Chassis size	482.6mm (19") × 103.0mm (4.1") × 366.2mm (14.4")
Packing size	550.0mm (21.7") × 168.0mm (6.6") × 520.0mm (20.5")
Weight	
Net weight	4.8kg (10.58lbs)
Total weight	7.5kg (16.53lbs)
Electrical Characteristics	
Input power	AC100-240V, 50/60Hz, 2.1A max
Power rating	50W
Work condition	
Temperature	-20°C~65°C (-4°F~149°F)
Humidity	0%RH~80%RH, no condensation
Storage condition	
Temperature	-30°C~80°C (-22°F~176°F)
Humidity	0%RH~90%RH, no condensation
Certification	
CCC. * If there is no certification for the country or region where the product is sold, please contact Colorlight to confirm it right away. Otherwise, if the relevant legal risks are caused, the customer shall bear it or Colorlight has the right of recourse.	

Reference dimensions

Unit: mm



Statement

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Service Phone

4008 770 775

Colorlight Cloud Tech Ltd.

Official Website: www.colorlightinside.com
Head Office Address: Room 37F-39F, Building 8, Zone A,
Shenzhen International Innovation Valley, Vanke Cloud City, Dashi Yilu,
Nanshan District, Shenzhen, China

