DIGITUS®

4K Wireless Video Extender, 30 m (USB-C - HDMI)

Quick Installation Guide
DS-55324

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1. Introduction

Experience wireless audio and video transmission in sharp UHD 4K/30Hz with the 4K Wireless HDMI Extender. The set is designed for easy setup without a driver or software thanks to Plug & Play. With a range of up to 30 meters with an unobstructed view, it guarantees reliable transmission. AES 128 encryption and the WPA2 protocol ensure secure data transmission. Compatible with HDMI 2.0/1.4 and HDCP 2.2/1.4. This is ideal for home theaters, conference rooms and training facilities. Discover the freedom of wireless entertainment.

2. Main Features

- Wireless HDMI signal transmission up to 30 m (with unobstructed view)
- Point-to-point connection - 1x transmitter (source) + 1x receiver (output device)
- Supports resolutions up to Full HD (2160p / 30 Hz)
- Power supply via USB-C connection
- AES 128 bit encryption
- WPA2 protocol
- HDMI 2.0
- DP 1.2
- HDCP 2.2/ 1.3

3. Package Contents

- 1x Transmitter unit
- 1x Receiver unit
- 2x USB-A to USB-C cable (100 m)
- 1 x HDMI extension cable (15 cm)

- 1 x USB-C extension cable (10 cm)
- 1x QIG

4. Product Features

Features	Description
Plug and play	Connect the transmitter and receiver to the HDMI ports of the source and output device, wait for the connection, share simply by pressing a button
App Free	DS-55324 doesn't need any software or app installation, no setup, no IT team
Compatibility	Supports signal sources with USB-C connection (with DP-Alt Mode or Thunderbolt) with Windows, macOS, iOS, iPadOS, Android
Auto Channel Selection	The DS-55324 will select the best Wi-Fi channel automatically after power on to ensure streaming smoothly

Fast Speed with 5G AC MIMO Technology	The DS-55324 comes with the fast 802.11ac technology which increases Wi-Fi speeds by allowing a pair of wireless devices to simultaneously send or receive multiple data streams
Security / Protection	No worries about the data security, the DS-55324 supports

	AES 128-bit security encryption and WPA2/WPA-PSK/WPA2-PSK authentication protocol to protect data. HDCP is supported to protect the content

5. Product Specification

Transmitter Specifications	
USB-C input	DP 1.2
HDCP Version	HDCP 1.4
Input Resolution	2160p/30fps,1080p/60fps,1080p/30fps, 1080p/24fps 1080i/50fps, 1080i/60fps； 720p/30fps, 720p60fps；480p/60fps
Transmission Resolution	Maximum 2160p/30fps
Audio Format	PCM
Audio Channel	2 channels
Latency	Low latency about 100ms
Security	AES 128-bit encryption mechanism
Wireless Standard	Built in high performance 802.11ac Wi-Fi module

Frequency	5150-5350MHz ; 5470-5725MHz; 5725-5850MHz ; 5850-5925MHz The specific frequency bands utilized are upon the legal regulations by each country
Bandwidth	Support 20MHz, 40MHz, 80Mhz
WiFi Power	13 dBm
Auto Pairing & Auto Connection	Automatically establish connection with the most favorable Wi-Fi channel accessible to guaranteeing exceptional wireless performance
Distance	Up to 30 meters in the clear line of sight
LED	1x
Connections	1x USB-C input 1x USB-C (power supply) 1x Connection button 1x Reset button
Power Supply	5V/1A
Power Consumption	Appox. 3W
Dimensions:	81 x 34 x 13 mm
Weight:	39 g
Temperature Range	
Operating	0°C to +40°C (+32°F to +104°F)
Storage	-10°C to +60°C (+14°F to +140°F)

Humidity	
Operating	10% to 80% relative humidity
Storage	5% to 90% relative humidity

Receiver Specification	
HDMI Output Version	HDMI 2.0
HDCP Version	HDCP 2.2
HDMI Output Resolution	Up to 2160p/60fps
Transmission Resolution	Maximum 2160p/30fps
Audio Format	PCM
Audio Channel	2 channels
Latency	As low as 100ms latency (at 60fps)
Security	AES 128-bit encryption mechanism
Wireless Standard	Built in high performance 802.11ac Wi-Fi module
Frequency	5150-5350MHz ; 5470-5725MHz; 5725-5850MHz ; 5850-5925MHz The specific frequency bands utilized are upon the legal regulations by each country

Bandwidth	Support 20MHz, 40MHz, 80Mhz
WiFi	13 dBm
Auto Pairing & Auto Connection	Automatically establish connection with the most favorable Wi-Fi channel accessible to guaranteeing exceptional wireless performance
High Sensitive Antennas	High sensitive antennas provide stable wireless connections and optimal coverage
Distance	Up to 30 meters (clear line of sight)
Connections	1x HDMI output 1x USB-C (power supply) 1x Connection button 1x Reset button
LED	1x
Power Supply	5V/0.6A
Power Consumption	About 4W
Dimension	81 x 34 x 13 mm
Weight	24 g
Temperature Range	
Operating	0°C to +40°C (+32°F to +104°F)
Storage	-10°C to +60°C (+14°F to +140°F)
Humidity	
Operating	10% to 80% relative humidity

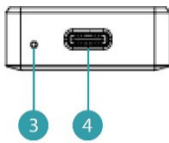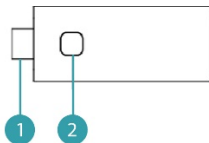| Storage	5% to 90% relative humidity

6. Overview

6.1 Transmitter Unit

1. USB-C in	Connect with the video port of the source devices
2. Connection button	Short press: start screen sharing Long press: long press up to 10 seconds for connection (pairing) reset
2. LED	To display different statue
3. Reset button	Press up to 3 seconds for system reset
4. USB-C	Power supply

LED indicator of the Transmitter Unit	Description
Static red	Transmitter unit system is booting on

Flashing red	Transmitter unit is searching for Receiver unit
Flashing blue	Waiting for connection
Static blue	Connected
Purple	No video input signal

6.2 Receiver Unit

1. HDMI output	Connect with the HDMI port of the source devices
2. Connection button	Short press: start screen sharing Long press: long press up to 10 seconds for connection (pairing) reset
2. LED	Indicator connections status
3. Reset button	Press up to 3 seconds for system reset

LED indicator of the Receiver Unit	**Description**
Flashing blue	Waiting for connection
Static blue	Connected

7. Installation

Installing the transmitter

1. Connect the transmitter unit to the video port of the source device
2. Connect the supplied USB cable to the transmitter (USB-C port) and to a USB-A port on the signal device or to a USB charging adapter and power socket

Installing the receiver

1. Connect the receiver unit to the HDMI connection of the TV, monitor or projector
2. Connect the supplied USB cable to the receiver (USB-C port) and to a USB-A port on the output device or to a USB charging adapter and power socket

8. Pairing Transmitter and Receiver

A set of DS-55324 includes one receiver and one transmitter, which are paired before shipment. Normally you don't need to pair them again thanks to auto-pair feature.

However, if you need to re-pair, you need to follow the instruction below to pair the transmitter with the receiver:

1. Power on receiver via USB-C and connect with display via video port.
2. Power on Transmitter and wait around 5-10 seconds, the button light of Transmitter will turn flash red. Then hold the reset button (button number 3.) up to 3 seconds till the button flash fast for factory reset, then the Transmitter will restart and the LED light will turn from red to flashing blue after 30s

automatically.

3. Click the Transmitter button to stream when the Transmitter LED is turning to flash blue.

9. Wireless Video Transmission

1. Connect the receiver to the video port of the output device (see Installation Receiver)
2. Connect the transmitter to the video port of the signal source device (see Installation Transmitter)

3. The LED Indicator will turn red when it is booting up.
4. The LED Indicator will become blue and flash when the device is ready to stream.
5. Click the button to start casting, the LED indicator will become constant blue.

10. Remark

1. For video source devices with at least 5V/0.5A power output via the HDMI port, the wireless transmitter can be powered directly via the HDMI port without additional power supply via the USB-C port.
2. However, we always recommend the additional power supply via the USB-C port with the supplied cable for optimal transmission and stable connection
3. The transmission distance with limited visibility cannot be determined across the board and depends on the conditions on site
4. Walls, glass, etc. shorten the signal coverage or cause signal loss

11.   Safety Instructions

Please read the following safety instructions carefully before commissioning:

Observe all warnings and instructions concerning the device
1. Do not expose the device to rain, moisture, vapors or liquids
2. Do not insert objects into the device
3. Do not attempt to repair the unit yourself or open the housing. You risk electric shock!
4. Provide sufficient ventilation to avoid damage due to overheating
5. Make sure that the unit is switched off and in a safe environment before starting up the unit
6. During thunderstorms, damage can occur to connected electrical equipment due to overvoltage caused by lightning strikes
7. Do not operate the device during thunderstorms

8. Disconnect the device from connected electrical devices during thunderstorms

9. Use the device only inside buildings

10. Return the device to your dealer in case of repair

11. Dust, humidity, vapors and strong cleaning agents or solvents can cause damage to the unit

Disconnect the device from the power supply and connected devices before cleaning.

13. Clean the device with a dust-free cloth

14. Use only the supplied power supply for operation

15. To completely disconnect the system from the power supply, you must unplug the power supply from the power outlet. You can disconnect the device from the power supply via the power supply unit.

Frequency Range & Maximum Transmit Power

WiFi Standard: IEEE 802.11.b/g/n/ac 5.8G

Channel: 36/40/44/48

Core Frequency: 5150-5350MHz ; 5470-5725MHz; 5725-5850MHz ; 5850-5925MHz

（The specific frequency bands utilized are upon the legal regulations by each country）

Bandwidth: Support 20MHz, 40MHz, 80Mhz

Transmitter power: 13 dBm

SW version:

TX: 4.2.3

RX: 3.2.1

HW version:

TX: V31TX-VPLAY-V1

RX: V30RX-LC01-01

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