

## HDMI® over Single Cat 5e/6 Extender w/ Power over Cable, Ethernet, IR - 1080p

ST121HDT4P



\*actual product may vary from photos

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#### **FCC Compliance Statement**

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- · Reorient or relocate the receiving antenna.
- · Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

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## Introduction

The ST121HDT4P HDMI® over CAT5e/6 Video Extender kit lets you extend HDMI® video and audio up to 330 feet (100 Meters) over a single Cat5e cable. For added benefit both the Transmitter and Receiver are powered by the same power source, connected to the Transmitter and sent to the Receiver using Power Over Cable (POC).

This versatile HDMI® extender also allows you to extend Infrared for an IR Remote Control, and 2 Ethernet LAN connections over the same Cat5e/6 cable.

With support for resolutions of up to 1920x1080 and the accompanying digital audio, this cost-effective HDMI® extender is a plug-and-play solution that can easily be installed using new or existing Ethernet infrastructure wiring.

Backed by a StarTech.com 2-year warranty and free lifetime technical support.

## **Packaging Contents**

- 1x HDMI® Extender Transmitter Unit
- 1x HDMI® Extender Receiver Unit
- 1x Universal Power Adapter (NA/UK/EU)
- · 1x Instruction Manual
- 2x IR Extender Cables

### **System Requirements**

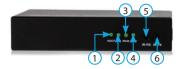
- HDMI® enabled video source device (i.e. computer, Blu-ray Player)
- HDMI® enabled display device (i.e. television, projector)
- Available AC electrical outlet for either the transmitter or receiver
- HDMI® cables for receiver and transmitter.



#### Front View - Transmitter/Receiver Unit

#### **Transmitter Unit**

#### **Receiver Unit**



3 S 1 2 4 6

- 1. HDCP LED
- 2 Link LFD
- 3. Mode LED
- 4. Power LED
- 5. IR-RX Port
- 6. IR-TX Port

- 1. HDCP LED
- 2. Link LED
- 3. Mode LED
- 4. Power LED
- 5. IR-RX Port
- 6. IR-TX Port

### Rear View - Transmitter/Receiver Unit

#### Transmitter Unit

#### **Receiver Unit**





- 2. Cat5e/6 Out (RJ-45 Connector)
- 3. HDMI IN Port
- 4. 100Base-T IN Port 1
- 5. 100Base-T IN Port 2



- 1. Cat5e/6 IN (RJ-45 Connector)
- 2. HDMI OUT Port
- 3. 100Base-T Out Port 1
- 4. 100Base-T Out Port 2

## Installation

## **Preparing Your Site**

- 1. Determine where the local video source (i.e. computer, Blu-ray Player) will be located and set up the device.
- 2. Determine where the remote display will be located and place/ mount the display appropriately.

**NOTE:** This HDMI® extender kit features Power over cable, allowing both the transmitter and Receiver to be powered from a single power source that connects to the transmitter unit. Please ensure that the Transmitter Unit is situated near an available AC electrical outlet. Make sure all devices are turned off before beginning installation.

#### Hardware Installation

- 1. Install Transmitter Unit
  - a) Position the Transmitter Unit near the video source (i.e. Computer, Blu-ray Player).
  - b) Connect an HDMI® cable from the video source device (i.e. computer, Blu-ray Player) to the "HDMI® IN" on the Transmitter Unit.
  - c) Connect the power supply.
  - d) (**Optional**) If using the Extender to extend one or two 10/100 Network signal(s), connect the Ethernet cable(s) from the Network gateway to the 100Base-T IN Port(s) on the Transmitter Unit.
  - e) **(Optional)** If using the Extender kit to transmit an infrared (IR) device signal, and the device receiving the IR signal is on the Receiver side. Connect the IR Transmitter Cable to the IR-RX port on the Transmitter Unit, and position the extended IR sensor directly in front of the video source's IR sensor. Check the manual of your video source device for the IR sensor location. If the device receiving the IR signal is on the Transmitter side, and connect the IR Transmitter Cable to the IR-TX port, and position the IR sensor where the remote control will point.



- 2. Install RI45 terminated Cat5e/6 Ethernet Cable
  - a) Connect an RJ45 terminated Cat5e/6 Ethernet cable (not included) to the RJ45 connector on the Transmitter unit.

#### NOTE:

If you are using surface cabling, ensure you have enough Category 5e unshielded twisted pair (UTP) network cabling to connect the Host Unit to the Remote Unit's location, and that each end is terminated with a RJ45 connector. The cabling should not go through any networking equipment (i.e. router, switch).

#### OR

If you are using premises cabling, ensure that the Category 5 unshielded twisted pair (UTP) network cabling between the Host Unit and the Remote Unit has been properly terminated in a wall outlet in each location and there is a patch cable long enough to connect the Remote Unit and the Host Unit to their respective outlets. The cabling should not go through any networking equipment (i.e. router, switch).

- b) Connect the other end of the Cat5e/6 cable run to the RJ45 connector on the Receiver Unit
- 3. Install Receiver Unit
  - a) Position the Receiver Unit near the video display (i.e. television, projector).
    - b) Connect the video source to the HDMI® OUT on the Receiver Unit using an HDMI® cable.
    - c) (Optional) If using the Extender to extend one or two 10/100 Network signal(s), connect the Ethernet cable(s) from the 100Base-T OUT Port(s) on the Receiver Unit to RJ-45 port on your network device(s).
    - d) (**Optional**) If using the Extender kit to transmit an infrared (IR) device signal, and the device receiving the IR signal is on the Transmitter side. Connect the IR Transmitter Cable to the IR-TX port on the Receiver Unit, and position the IR sensor where the remote control will point. If the device receiving the IR signal is on the Transmitter side, and connect the IR Transmitter Cable to the IR-TX port, and position the extended IR sensor directly in front of the video source's IR sensor. Check the manual of your video source device for the IR sensor location.
- 4. Your source video image will now appear on the remote video display.



# **Specifications**

AV Input	HDMI®
AV Output	HDMI®
Cabling	Cat 5e/6 UTP
Audio	Yes
Local Unit Connectors	2x IrDA (Infrared; SIR/FIR) 1x HDMI (19 pin) Female 3x RJ-45 Female
Remote Unit Connectors	2x IrDA (Infrared; SIR/FIR) 1x HDMI (19 pin) Female 3x RJ-45 Female
Max Distance	100 m / 330 ft
Maximum Digital Resolutions	1080p @ 60Hz, 48-bit
Wide Screen Supported	Yes
Audio Specifications	Supports Dolby® TrueHD, DTS-HD MA
Input Voltage	110 ~ 240V AC
Input Current	2 A
Output Voltage	48 DC V
Output Current	0.5A



# **Technical Support**

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## Warranty Information

This product is backed by a two year warranty.

In addition, StarTech.com warrants its products against defects in materials and workmanship for the periods noted, following the initial date of purchase. During this period, the products may be returned for repair, or replacement with equivalent products at our discretion. The warranty covers parts and labor costs only. StarTech.com does not warrant its products from defects or damages arising from misuse, abuse, alteration, or normal wear and tear.

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