

HDMI Matrix Switch Over HDBase-T with Power Over Ethernet (PoE)

VEEMUX®

Route and distribute HD 1080p, Multi-channel Audio, Ethernet, IR, and Power up to 328 feet using CATx cable

- Configure and control the switch through Ethernet, serial port, front panel buttons, or IR remote control.
- Supports HDTV resolutions to 1080p and computer resolutions to 1920x1200.
 - With CAT5e (24 AWG), up to 250 feet.
 - With CAT6 (23 AWG), up to 300 feet.
 - With CAT6a/7 (23 AWG), up to 328 feet.
- Each input can be independently connected to any or all outputs.
- HDCP compliant.
- Supports Power over Ethernet (PoE) – power supply not required at the remote unit.
- HDMI features supported:
 - 24/36-bit Deep Color
 - x.v.Color
 - Dolby TrueHD, DTS-HD Master Audio, Dolby Digital, DTS 7.1 and LPCM
 - 3D
 - Bandwidth up to 225 MHz (6.75 Gbps)
 - Support for CEC (consumer electronic control) compatible devices.
 - Lip Sync
- No loss of audio or video quality between the switch and remote units.
- Bi-directional IR from input and output locations.
- Supports external and internal EDID settings.
- Compact 2RU design.
 - Mounting tabs included.
- Features an Ethernet port on the switch and receivers for connecting network devices such as 100Base-T routers, hubs, smart TVs, or smart Blu-Ray players.



VEEMUX® SM-8X8-C6HDR-POE-HDBT (Front & Back)

The VEEMUX® HDMI Matrix Switch Over HDBase-T with Power Over Ethernet routes uncompressed digital HDMI signal and IR from eight HDMI video sources to eight displays (projectors, monitors, etc.) and speakers via inexpensive CATx cable using HDBase-T technology. It is capable of connecting to as many as eight HDMI video sources directly and eight video displays via receivers with a maximum extension of 328 feet from the switch using CAT6a/7 cable. Power over Ethernet (PoE) provides power to all connected receivers.



Specifications

SM-8X8-C6HDR-POE-HDBT

- Eight female HDMI input connectors
- Eight female RJ45 HDBase-T connectors for sending/receiving high definition video, audio, IR, Ethernet and DDC signals.
- Eighteen female 3.5mm ports for IR transmitters and receivers.
 - IR transport channel is bi-directional - the transmitter or receiver can be connected to the switch.
 - “All IR” input or output transmits signals to multiple transmitters or receivers within direct line-of-sight.
- One female Ethernet port for Telnet and web server control, and/or for connecting a network device such as a 100Base-T router, hub, smart TV or smart Blu-Ray player.
- One female DB9 connector for RS232 control.
- One Mini USB Type B connector for firmware updates only.

Dimensions

- WxDxH (in): 17.24x10.04x3.5 (438x255x88 mm)

Power

- 100 to 240 VAC at 50 or 60 Hz via AC adapters.
 - One powers the switch and the other provides Power over Ethernet (PoE).
- Power consumption: 64W.

Environmental

- Operating temperature: 32 to 104°F (0 to 40°C)
- Storage temperature: -4 to 140°F (-20 to 60°C)
- Operating/storage relative humidity: 20 to 90% non-condensing RH.

Regulatory Approvals

- CE, FCC, RoHS
- TAA compliant

Warranty

- Two years

Package Includes

- One 8x8 HDMI Matrix Switch Over HDBase-T
- Two 24V power supplies (one for PoE)
- One IR remote
- Two IR transmitters
- Two IR receivers
- Mounting tabs
- User manual

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Specifications (continued)

Remote Unit (Receiver)

Video Output

- Supports HDTV resolutions to 1080p and computer resolutions to 1920x1200.
- One female HDMI output connector.
- One female RJ45 HDBase-T connector for sending/receiving high definition video, audio, IR, Ethernet and DDC signals.
- Two female 3.5mm ports for connecting an IR transmitter or receiver.
- One female Ethernet port for connecting a network device such as a 100Base-T router, hub, smart TV, or smart Blu-Ray player.

Dimensions

- WxDxH (in): 4.02x4.53x0.98 (102x115x25 mm)

Power

- Powered by matrix switch via Power over Ethernet (PoE).
- Power consumption: 7W.

Environmental

- Operating temperature: 32 to 104°F (0 to 40°C)
- Storage temperature: -4 to 140°F (-20 to 60°C)
- Operating/storage relative humidity: 20 to 90% non-condensing RH.

Regulatory Approvals

- CE, FCC, RoHS

Cables

- Use HD-xx-MM cable to connect an HDMI source or display.
 - 8-bit resolution: up to 49 ft (15 m).
 - 12-bit resolution: up to 33 ft (10 m).
- Use CAT5e/6/6a/7 solid straight through cables for TIA/EIA 568B wiring terminated with standard RJ45 connectors.
 - CAT5e (24 AWG): up to 250 feet.
 - CAT6 (23 AWG): up to 300 feet.
 - CAT6a/7 (23 AWG): up to 328 feet.
- Cables not included.

Compatible NTI Products

- Combine NTI's video converters, extenders, and scalers for complex applications.
 - Ultra Low-Cost VGA + Audio to HDMI Converter Cable (VGAA-HD-UCLC)
 - ◆ Requires USB power to operate.
 - VGA/Component Video to HDMI Converter (VGACMP-HD)
 - ◆ Supports resolutions to 1600x1200 only.
 - VGA/Component Video/HDMI Scaler/Converter (PCHD-HDMI-SCALER)
 - Multiple HDMI Extender Over HDBase-T with Power over Ethernet (ST-C6HD-HDBT-L8-R).

Control Methods

Front Panel Interface

- Configuration and control can be done using the front panel buttons.
- LED display shows which input device is being used by each output device.

RS232

- Configuration and control can be done through the serial port.

IR Remote Control

- IR control of matrix switch:
 - The matrix switch can be controlled with the included IR remote using the built-in IR receiver on the switch or remotely via an IR receiver or transmitter connected to the remote unit.
- IR control of connected sources:
 - HDMI sources can be controlled remotely using the source's IR remote control through the remote unit's IR receiver and switch's transmitter.
- IR control is bi-directional.

Ethernet Control

- Configuration can be done over the Internet via web server or telnet.
- 10/100Base-T Ethernet interface.
 - **Web Server**
 - ◆ Control the unit's power, input/output ports, and EDID.
 - ◆ Reset the IP configuration of a device.
 - **Telnet**
 - ◆ Commands are similar to RS232 commands.

HDMI Matrix Switch Over HDBase-T with Power Over Ethernet		
NTI Part #	HDMI Inputs	RJ45 Outputs
SM-8X8-C6HDR-POE-HDBT	8	8

HDMI HDBase-T POE Receiver	
NTI Part #	Supported Features
ST-C64KPOE-HDBT-R-LC	HDMI, IR, Ethernet, Power over Ethernet