

DVI KVM over IP Extender with Local DVI Output





Video over IP solution for extending DVI, USB, RS-232, and audio

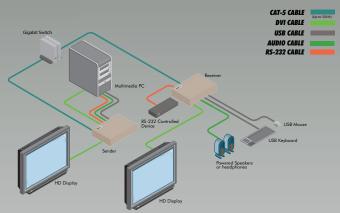
The DVI KVM over IP extends DVI, USB, analog audio, and RS-232, over a Gigabit Local Area Network. Resolutions up to 1920 x 1200 (WUXGA) and 1080p Full HD are supported. HDMI digital audio is also supported when using HDMI sources and displays with HDMI to DVI adapters. Local monitoring of video is made possible by the DVI Local Output connector on the Sender unit. The Sender and Receiver units can be automatically or manually configured to unique IP addresses to allow the connection of multiple Senders and Receivers to the same network. Multiple Receiver units can simultaneously connect to any Sender unit within the network to create a virtual crosspoint matrix of 256 Senders and up to a theoretical limit of just over 65,000 units total, depending on the network bandwidth and number of ports on the network switch. Each Receiver unit has a built in Ethernet switch and two additional RJ-45 Ethernet ports to allow for the connection of computers and other IP-enabled devices. Each Receiver unit allows the connection of four USB devices with up to 500mA current draw per port, providing access to keyboard, mouse, and other compatible devices. USB 2.0 data rates up to 480 Mbps are supported in addition to backward-compatibility with USB 1.1. Two Channel analog audio can be extended from each Sender to the Receiver units for use with headphones or powered speakers. RS-232 serial control can also be extended between each Sender and the Receivers. Built in web server interface makes set up and configuration simple and intuitive. Any combination of Gefen Video over IP HDMI, DVI, and VGA Senders and Receivers can be used together to create a "Virtual Matrix", where each Sender can be accessed by multiple Receivers. The DVI KVM over IP is perfect for large scale remote workstation access and for digital signage applications.

How It Works

If you are connecting multiple Sender units, use the web server interface to assign a unique ID to each one. Use the included DVI cable to connect a computer or other DVI source to the Sender's DVI input. If local monitoring of the source is required, connect a DVI cable from the DVI Local Output on the Sender to a Hi-Def display. Use the included USB and RS-232 cables to connect your computer's USB and RS-232 interfaces to the Sender unit. Connect audio Line Out or Headphone Out from your computer to the Line In of the Sender unit. Connect the DVI output of the Receiver to your Hi-Def display. Connect up to four USB devices, an RS-232 device, and a pair of headphones or amplified speakers to each Receiver unit. Connect the Sender and Receiver units to each other directly or through a Gigabit Ethernet switch, using CAT-5e cables. Each cable run can be up to 330 feet (100 meters) in length. If the Sender is connected to your LAN, you can use the two additional RJ-45 ports on the Receiver to connect computers and other IP enabled devices. Connect the included 5V power supplies to the Sender and Receiver units and to available electrical outlets. Power on all associated equipment. Use the Mode button on the Sender to optimize the picture for sharper still images or smoother video motion. When using multiple Senders, press the + and – buttons on the Receiver to toggle between the different Senders connected to the network, and then press and hold the Select button. When using multiple Receivers, press and hold the USB button to connect your workstation to the selected USB host device.

Note: A Gigabit switch is required. The Gigabit switch must support 8k jumbo frame packets in order for multicast mode to operate. If your LAN is not dedicated to Gefen KVM-LAN products exclusively, then a managed switch is highly recommended.

Wiring Diagram









Features *				
•	Extends DVI, USB, RS-232, and stereo analog audio over IP, using a Gigabit Local Area Network	٠	+ and – / Select buttons on Receiver unit allow selection of multiple Senders	
•	Any combination of HDMI, DVI, and VGA Senders and Receivers can be used together to create a "Virtual Matrix"	٠	USB button on Receiver unit allows multiple Receivers to access a USB host computer	
•	Supports resolutions up to 1080p Full HD and 1920 x 1200 (WUXGA)	•	Mode button on Sender for sharpness or motion optimization of image	
•	Supports a local DVI monitor at Sender side	٠	Easy-to-use web server interface for quick system set-up and firmware upgrade	
•	Supports 4 USB devices at Receiver side, with 500mA current capability per port, USB 2.0 data rates up to 480 Mbps, and backward-compatibility with USB 1.1	٠	Locking power supply connectors	
•	Supports 256 Senders and a total of just over 65,000 Receiver units, depending on the network bandwidth and number of ports of your network switch	٠	1U tall, half-rack width enclosures are rack-mountable using EXT-RACK-1U	
	Three-port Ethernet switch built into the Receiver unit	•	Surface mounting brackets included	

Specifications *				
Maximum Pixel Clock:	165 MHz			
Video Input Connector (Sender):	(1) DVI 29-pin, female, digital only			
Video Local Output Connector (Sender):	(1) DVI 29-pin, female, digital only			
Video Output Connector (Receiver):	(1) DVI 29-pin, female, digital only			
Line Input (Sender):	(1) 3.5mm mini-stereo jack			
Line Output (Receiver):	(1) 3.5mm mini-stereo jack			
USB Host Interface (Sender):	(1) USB Type B, female			
USB Device Connectors (Receiver):	(4) USB Type A, female			
RS-232 Connector (Sender):	(1) DB-9, female			
RS-232 Connector (Receiver):	(1) DB-9, male			
Ethernet connector (Sender):	(1) RJ-45, female			
Ethernet connectors (Receiver):	(3) RJ-45, female			
Mode button (Sender):	(1) tact-type			
+ / USB button (Receiver):	(1) tact-type			
- / Select button (Receiver):	(1) tact-type			
Reset button (Sender/Receiver):	(1) tact-type, recessed			
Link Indicator (Sender/Receiver):	(1) LED, green			
Power Indicator (Sender/Receiver):	(1) LED, blue			
Power Supply:	Sender: 5V DC 2.6A, locking Receiver: 5V DC, 4A, locking			
Power Consumption:	Sender: 10W maximum Receiver: 20W maximum			
Dimensions (Sender/Receiver) (W x H x D):	8.4" x 1.7" x 4.5" (213mm x 43mm x 113mm)			
Shipping Weight:	EXT-DVIKVM-LAN-L (Sender-Receiver package): 8.3 lbs. (3.8 kg) EXT-DVIKVM-LAN-LTX (Sender-only package): 5.7 lbs. (3.0 kg) EXT-DVIKVM-LAN-LRX (Receiver-only package): 5.4 lbs. (2.5 kg)			