SWT3-31-HU-TR

3x1 4K60 USB−C/HDMI Switcher Extender

SWT3 31 HU TR is a high−performance auto−switcher with one USB−C and two HDMI/USB inputs, HDMI output and extended−range HDBaseT 3.0, flexibly set for transmit (output) or receive (input) link, for extension of 4K60Hz (4:4:4) HDMI, USB 2.0, Ethernet, RS−232, IR and power signals over twisted pair cable. The local and remote connected USB peripherals, such as a room camera and microphone, are switchable for use of the switcher active USB host, for convenient hybrid meeting operation with both room and online participants

FEATURES

Hybrid-meeting Collaborative Switching - Controllable coupled–signals switching of both AV and USB host inputs, for concurrent connection with AV output and space USB devices, allows collaborative hybrid meeting where multiple meeting participants are switched to share their content with both room and online meeting participants

BYOD Ease and Convenience - Connect any DP−Alt−Mode−capable USB−C device as an AV presentation source, while providing the connected device with USB 2.0 and Ethernet connection, and (if PD−2.0−capable) up to 60 watts of power, via a single USB−C cable connection only

High Performance Standard Extender - Professional HDBaseT extender for providing extended–reach signals over twisted–pair copper infrastructures. SWT3–31–HU–TR is a standard extender that can be connected to any market–available HDBaseT–compliant extension product. For optimum extension reach and performance, use recommended Kramer cables

HDMI Signal Switching - HDCP 2.3 compliant, supporting deep color, x.v.Color™, CEC, HDMI uncompressed audio channels, Dolby TrueHD, DTS−HD, 2K, 4K, and 3D as specified in HDMI 2.0

Flexible USB Switching and Extension - An active USB 3.2 host is connected to the switcher extender on either the transmitter or receiver sides. USB 2.0 signals are extended between the switcher extender transmitter and receiver sides, enabling connection and switching of the active USB host to both local USB 3.1 and remote USB 2.0 devices, such as camera and audio devices, or HID (Human Interface Devices) mouse or keyboard devices

HDMI Mirroring - On switcher transmitter side, active USB–C or HDMI input signal is transmitted on HDBT output, and in parallel mirrored to HDMI output port for connecting a local monitor or adding an additional unit in a daisy chain

I-EDIDPro™ Kramer Intelligent EDID Processing™ - Intelligent EDID handling, processing and pass−through algorithm that ensures Plug and Play operation

Multi–channel Audio Transmission - Up to 32 channels of digital stereo uncompressed signals for supporting studio–grade surround sound

Audio De-embedding - The digital audio signal passing−through to the output, is de−embedded, converted to an analog signal and sent to the stereo balanced analog audio output. This enables playing the audio on a locally connected professional audio system (such as DSP) and speakers, in parallel to playing it on the speakers connected to the AV acceptor device (such as TVs with speakers)

Auto Switcher Ease of Use - Automatically plays the signal of the plugged source on the connected display, according to user–configured preferences, such as last–connected input, or user control commands. Pair−synched kit−like auto−switching of paired Kramer−recommended transmitter and receiver devices, for simple switching in control−less applications

Easy Online Meeting System Integrated Connectivity - Built–in flexible auto–disconnection operation of USB devices, such as room cameras and soundbars, enable detection of BYOD presenter disconnection by online meeting systems for their auto–activation, convenient integration, and ease of end–user operation according to space changing hybrid sessions needs

Display On/Off Operation - Meeting presentation is simplified by manually or automatically turning ON/OFF a CEC–enabled or serially−controlled display when the presentation source is plugged in / unplugged with user–defined shut–down delay

Simple Control - Remote IP−controller connection, browser operation webpage, local panel buttons, or remotely connected contact−closure buttons, for easy and fully flexible user ports selection, signals routing, and switcher control

Built–in Intelligent Control Gateway - Remote IP–driven intelligent control of connected AV, USB and sensor devices via CEC, RS–232, IR or I/O. Eliminating the need for an external control gateway, this feature reduces installation complexity and costs, to enable easy integration with control systems, such as Kramer Control

Ethernet Extension - Ethernet interface data flows in both directions, allowing extension of up to 1 Gbps Ethernet connectivity for LAN communication and device control

Bidirectional RS–232 Extension - Serial interface data flows in both directions, allowing data transmission and device control

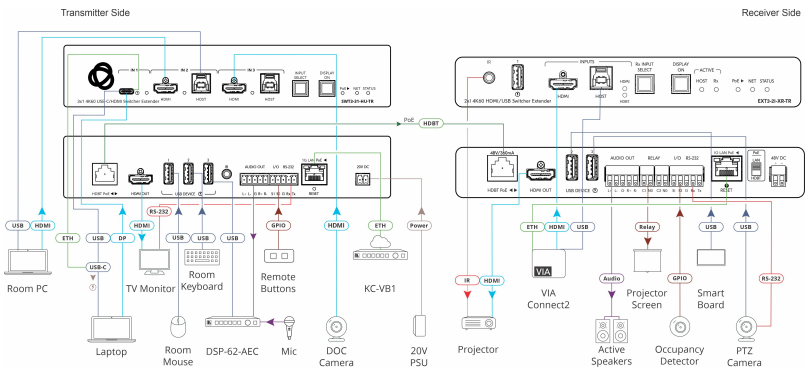
Bidirectional Infrared Extension - IR interface data flows in both directions, allowing remote control of peripheral devices located at either end of the extended line

Secured Network Connection - Standard IT−grade 802.1x authentication for secured IT LAN connectivity

Comprehensive Management - Local panel indication LEDs to facilitate easy local maintenance and troubleshooting. Remote IP–driven firmware upgrade and management via user–friendly embedded web pages and optional whole site management system, ensure lasting and field proven deployment

Easy and Elegant Installation - Flexible selectable PoE powering via LAN port or 2−way PoE powering via HDBT port connections, and 1U half−rack fan–less enclosure for under table, dropped–ceiling mounting, or side–by–side mounting of 2 units in a 1U rack space with the recommended rack adapter, for easy switcher deployment

TECHNICAL SPECIFICATIONS

Inputs	1 DP Alt Mode & PD 3.0 USB-C: On a USB type–C female connector
	2 HDMI: On an HDMI female connector
	1 HDBT 2-way PoE: On an RJ−45 female connector
Outputs	1 HDBT 2-way PoE: On an RJ−45 female connector
	1 HDMI: On an HDMI female connector
	1 Balanced Stereo Audio Line: On 5–pin terminal block connector
Ports	3 USB 3.2 Host: On a USB–C & USB−B female connectors
	3 USB 3.2 Device: On USB type–A female connectors
	1 PoE accepting 1000BaseT Ethernet: On an RJ–45 female connector for LAN connection & extension
	1 RS–232: On a 3–pin terminal block
	1 IR: On a 3.5mm mini jack for IR extension
	2 GPIO: On a 2–pin terminal block
Extension Line	Reach: Up to 100m (330ft), using Kramer HDBaseT cables
	Standards Compliance: HDBaseT 3.0
Video	Max Data Rate: 18Gbps bandwidth (6Gbps per graphic channel)
	Max Resolution: 4K@60Hz (4:4:4) resolution
	Content Protection: HDCP 2.3
	HDMI Support: Deep Color, 3D, HDR as specified in HDMI 2.0b
USB Features	USB 3.2 Data Rate: Up to 10Gbps
	Integrated USB Hubs: 1
	Standards Compliance: USB 3.2 GEN 2, 2.0 and 1.1
Extended USB	USB 2.0 Data Rate: Up to 480Mbps
	Transmitted Data Bandwidth: Up to 300Mbps
	Standards Compliance: USB 2.0 and 1.1
Extended Ethernet	Max Data Rate: 1 Gbps
Extended RS-232	Baud Rate: 300 to 115200
Analog Audio	Max Output Signal Level: 15dBu
	Impedance: 500Ω
	Bandwidth: 20Hz — 20kHz
	THD + N: 0.002% @1kHz at nominal level
	S/N Ratio: −93dB, 20Hz — 20kHz
	Coupling: DC

Power	Power Adapter: Source: 20VDC Max. Consumption: 6A Max. Power: 120W PoE Consumption: 144mA Max. Power: 7.8W USB-C Charging Max. Power: 60W Note: When powered with 20V power supply only Compliance: PD 3.0 USB Device Charging Max. Total Current: 2A
Environmental Conditions	Operating Temperature: 0° to +40°C (32° to 104°F) Storage Temperature: −40° to +70°C (−40° to 158°F) Humidity: 10% to 90%, RHL non−condensing
Regulatory Compliance (Standards Compliance)	Safety: CE, UL Environmental: RoHs, WEEE
Enclosure	Size: 0.5 1U 19” rack Material: Aluminum Cooling: Fan Ventilation
Accessories	Included: 20V Power adapter and cords, USB−C multi−signal cable
Product Dimensions	21.46cm x 16.30cm x 4.36cm (8.45" x 6.42" x 1.72") W, D, H
Product Weight	0.9kg (1.9lbs) approx
Shipping Dimensions	34.50cm x 21.00cm x 6.70cm (13.58" x 8.27" x 2.64") W, D, H
Shipping Weight	1.7kg (3.7lbs) approx