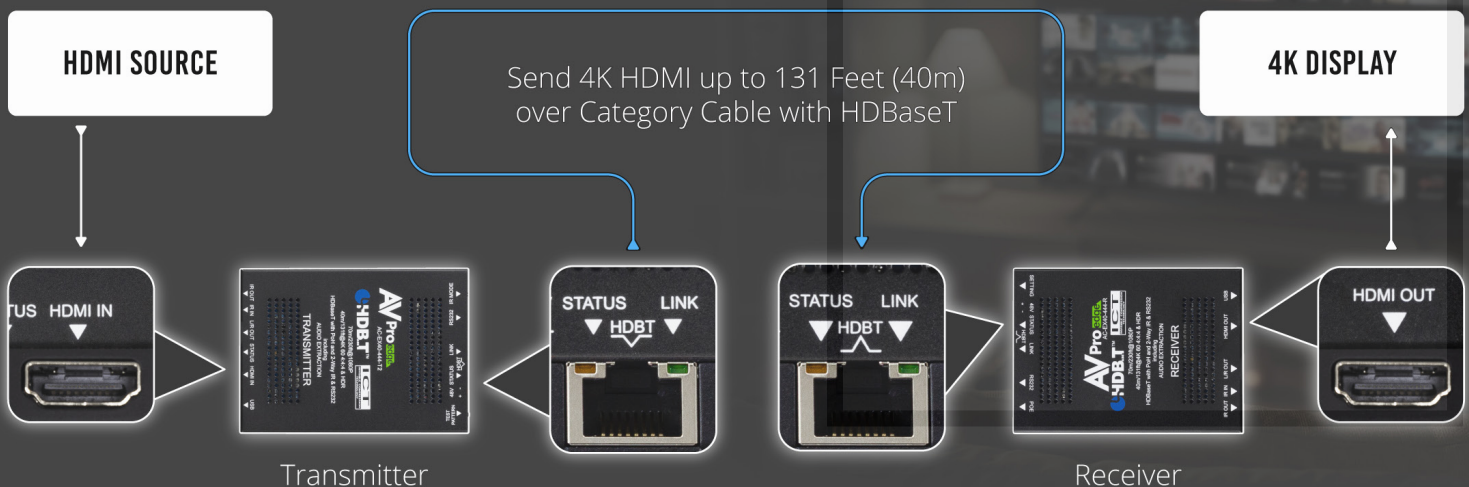# AVProedge

Ultra Slim 40M (70M 1080P) 4K 60 4:4:4 HDR, HDBaseT HDMI Extension Kit

AC-EX40-444-KIT

The AC-EX40-444-KIT revolutionized HDMI extension as the first AVPro Edge product to implement Invisible Compression Technology (ICT) remaining unmatched and unrivalled as the industry benchmark for transporting 18Gbps, UHD 4k60 4:4:4 video signals, including HDR formats, over a single CAT-5e/6a/7 cable.

ICT is an in-house custom-engineered, compression-transparent, proprietary algorithm that continues to uphold AVPro Edge's reputation as the standard for video excellence in HDMI matrix switching and signal extension. An industry first at its debut, ICT continues as the class-leading solution for commercial and residential integrators seeking to maintain state-of-the-art image fidelity at system-detached display locations. UHD 4K and HDR through its many versions is a mainstay for residential entertainment, and commercial integrators are discovering it to be a captivating feature for sports-themed entertainment venues as broadcast providers routinely deliver games in 4K, even augmenting special events with HLG. The AC-40-444-KIT was first in the family of five AVPro Edge 18Gbps extension kits capable of transporting UHD 4K50/60 signals to end points as distant as 150 meters over category cable (CAT 6A recommended). A variety of features including scaling, EDID management, onboard test patterns, bi-directional IR, RS-232, and kit power, plus audio breakouts, bolster functionality, problem solving, and installation ease.

AVProedge
AC-EX40-444-KIT

CONNECTION DIAGRAM

HDMI
CAT 6A

HDMI SOURCE

Send 4K HDMI up to 131 Feet (40m) over Category Cable with HDBaseT

4K DISPLAY

Transmitter

Receiver

PRODUCT SPECIFICATIONS

VIDEO	
VIDEO RESOLUTIONS	UP TO 4K 60HZ 4:4:4
VESA RESOLUTIONS	UP TO DCI 4K (4096x2160)
HDR FORMATS/RESOLUTIONS	420, 422, 444 (10 AND 12 DEEP COLOR) HDR10, HDR10+, HLG
COLOR SPACE	YUV (COMPONENT), RGB (CSC: REC. 601, REC. 709, BT2020, DCI, P3 D6500)
CHROMA SUB-SAMPLING	4:4:4, 4:2:2, 4:2:0 SUPPORTED
DEEP COLOR	UP TO 16 BIT (1080), UP TO 12 BIT (4K)
AUDIO	
AUDIO FORMATS SUPPORTED HDMI	PCM 2.0 CH, LPCM 5.1 & 7.1, DOLBY DIGTAL, DTS 5.1, DOLBY DIGITAL PLUS, DOLBY TrueHD, DTS-HD MASTER AUDIO, DTS-X, DOLBY ATMOS
AUDIO FORMATS SUPPORTED EXTRACTED (2CH PORT)	PCM 2 CH (NO DOWNMIX)
DISTANCE	
HDBASET (CAT) DISTANCE (4K)	40M (131 FEET)
HDBASET (CAT) DISTANCE (FULL HD)	70M (230 FEET)
HDMI LEAD IN/OUT (UP TO 4K60 4:4:4)	UP TO 50 FEET (BULLET TRAIN HDMI)
HDMI LEAD IN/OUT (W/ AOC CABLE) (UP TO 4K60 4:4:4)	UP TO 130 FEET (W/ BULLET TRAIN AOC)
BANDWIDTH	18 GBPS (W/ITC)
HDCP	HDCP 2.2 AND EARLIER
PORTS	
HDMI (TX & RX)	TYPE A
AUDIO (EXTRACTED ANALOG) (TX & RX)	3 PIN TERMINAL BLOCK (UNBALANCED)
IR TX (TX & RX)	3.5MM MONO (2 CONDUCTOR)
IR RX (TX & RX)	3.5MM STEREO (3 CONDUCTOR)
RS232 (TX & RX)	3 PIN TERMINAL BLOCK
POWER (TX & RX)	2 PIN TERMINAL BLOCK
ENVIRONMENTAL	
OPERATING TEMPRATURE	23 TO 125°F (-5 TO 51°C)
STORAGE TEMPRATURE	-4 TO 140°F (-20 TO 60°C)
HUMIDITY RANGE	5-90% RH (NO CONDENSATION)
POWER CONSUMPTION	9 WATTS MAX PAIR
POWER SUPPLY	INPUT: AC 100-240V ~ 50/60HZ OUTPUT: DC 48V .5A (WALL VERSION)
DIMENSIONS (SINGLE UNIT ONLY, Tx & Rx ARE SAME) (LENGTH/WIDTH/HEIGHT)	MM: 203 x 165 x 91 INCH: 5.05 x 3.62 x .47
WEIGHT (UNIT) (TX OR RX EACH ALONE)	.3LBS (.13KG)
WEIGHT (PACKAGED)	2LBS (.90KG)

*SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE. MASS & DIMENSIONS ARE APPROXIMATE.

KEY FEATURES

- HDMI 2.0(a/b)
- 18Gbps Bandwidth Support (Using ICT)
- Ultra Slim (.47 inch/12mm)
- Up to 4K60 4:4:4 Support
- Full HDR Support (HDR 10 & 12 Bit)
- HDR, HDR10+ and HLG Support
- Dolby Vision Support
- 4K--> 1080p Down-scaling for Mixed Systems
- EDID Management and EDID Emulate
- 4K & HD Test Patterns built in to Tx and Rx for troubleshooting
- L/R Audio Extraction on Tx and Rx
- HDCP 2.2 (and all earlier versions supported)
- CEC Pass Through
- 3D Support
- 70M (230ft) on 1080P (CAT6a)
- Up to 40m (131ft) on 4K (up to 4K60 4:4:4, HDR) (CAT6a)
- Bi-directional 48v PoH (Power Over HDBaseT, only one Power Supply Needed)
- I-Pass Feature for control system "pass-through"
- 3-20v protection circuit built in for safe IR transport
- Bi Directional RS232 Transport
- LED Status, Link, Power indication lights
- Use single UTP/STP LAN cable (CAT-5E/6A) with substitute HDMI cable to achieve long distance transmission.
- Supports uncompressed PCM 2- Ch., LPCM 5.1 & 7.1, Dolby Digital, DTS, Dolby TrueHD, DTS HD-Master Audio, Atmos
- ESD protection circuitry (Inputs & Outputs) to 7KV
- Can Cascade

IN THE BOX
- AC-EX40-444-RX (Receiver)
- AC-EX40-444-TX (Transmitter)
- 48V Power Supply (x1 supplied as Rx is powered by Tx)
- 1 x IR Tx Unit
- 1 x IR Rx Unit
- 3 Pin Terminal Blocks for Audio & RS232 Ports (x4)
- Mounting Ears