

## 676T

| HDMI | 4K/60 UHD (4:4:4)

4K60 4:4:4 HDMI and RS-232 Transmitter over Ultra-Reach MM/SM Fiber Optic



676T is a high-performance HDMI fiber transmitter for ultra-reach extension of 4K@60Hz (4:4:4) HDMI signals. 676T converts the HDMI and RS-232 input signal to an optical signal that is transmitted over a fiber optic cable to a compatible receiver that converts it back to HDMI and RS-232 signals. 676T includes a multi-mode SFP+ transceiver, but can be used with any Kramer certified SFP+ transceiver, such as a single-mode SFP+ transceiver

## FEATURES

High Performance Standard Fiber Extender - HDMI fiber transmitter for providing ultra-reach signals over either multi-mode or single-mode optical fiber infrastructures, using Kramer pluggable OSP SFP+ units (multi-mode SFP+ included). Near-zero latency video chroma sub-sampling conversion technology, is employed to auto-adapt above 10G HDMI signals to 10G optical link signal data-rate. Note: To ensure specified performance, support, and warranty of this product, use only Kramer's certified hi-performance OSP SFP+ pluggable optical units

Multi-drop Signal Distribution - Use optical splitters to extend the input signals from a single transmitter to multiple receivers, for displaying the same content on multiple display devices using optical splitting only, with no need for AV distribution amplifiers

HDMI Signal Extension - HDCP 2.2 compliant and supports up to 18G (6G per channel) data rate, LPCM 7.1, Dolby True HD, and DTS-HD as specified in HDMI 2.0

**Power Saving** - With CEC ON/OFF function, shut down a display device automatically when not in use, and auto power it ON upon presentation start

I-EDIDPro<sup>™</sup> Kramer Intelligent EDID Processing<sup>™</sup> - Intelligent EDID handling, processing and pass-through algorithm that ensures Plug and Play operation for HDMI source and display systems Bidirectional RS-232 Extension - Serial interface data flows in both directions, to enable data transmission and control of devices

Cost-Effective Maintenance - Status LED indicators for power, source, sink and fiber link connections detection facilitate easy local troubleshooting

Easy Installation - DigiTOOLS® rack mountable fan-less enclosure enables side-by-side mounting of 3 units in a 1U rack space with the recommended rack adapter



## TECHNICAL SPECIFICATIONS

Inputs	HDMI: On a female HDMI connector
Outputs	Fiber Optic: On LC connector(s)
Ports	RS-232: On a 3-pin terminal block connector
	USB: On a female micro USB connector for firmware upgrade
Video	Max Bandwidth: 18Gbps
	Max Resolution: 4096x2160@60Hz 4K@60 (4:4:4)
	Compliance: HDMI 2.0 and HDCP 2.2
Extension Line	Optical Fiber: Multi-mode (MM) or single-mode (SM)
	Optical Module: Kramer 10Gbps SFP+ IEEE 802.3ae compliant modules (MM is included)
Multi-mode Line	Compliance: G.651.1 OFNR fiber
	Max Reach over OM3 MM Fiber: 3km (1.8 miles)
Single-mode Line	Compliance: G.652D OFNR fiber
	Max Reach over OS1 SM Fiber: 33km (20.5 miles)
STANDARDS COMPLIANCE	Laser Safety Compliance Class 1
	SFP Regulatory Certifications FDA CDRH 21 CFR 1040 and Laser Notice No. 50, UL and CUL EN60950-2:2007, RoHS6, EMC EN 55022 and EN 55024, IEC 62368-1 and IEC 60825-1 and -2
Extended RS-232	Baud Rate 300 to 115200
User Interface	Indicators: Source detection, sink detection, optical link and power LEDs
	Controls: Reset button
Power	Consumption: 480mA
	Source: 12V DC, 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: Tool
	Type: Aluminum
	Cooling: Convection ventilation
Accessories	Included: MM SFP+ transceiver, power adapter, power cord, mounting bracket set

Product Dimensions	12.00cm x 7.15cm x 2.44cm (4.72" x 2.81" x 0.96" ) W, D, H
Product Weight	0.2kg (0.5lbs) approx
Shipping Dimensions	49.00cm x 18.60cm x 58.80cm (19.29" x 7.32" x 23.15" ) W, D, H
Shipping Weight	0.7kg (1.6lbs) approx



