4K60 HDBaseT Extender with Loop-Out

EX-70-H2L

WyreStorm

Quickstart Guide

WyreStorm recommends reading through this document in its entirety to become familiar with the product's features prior to starting the installation process.

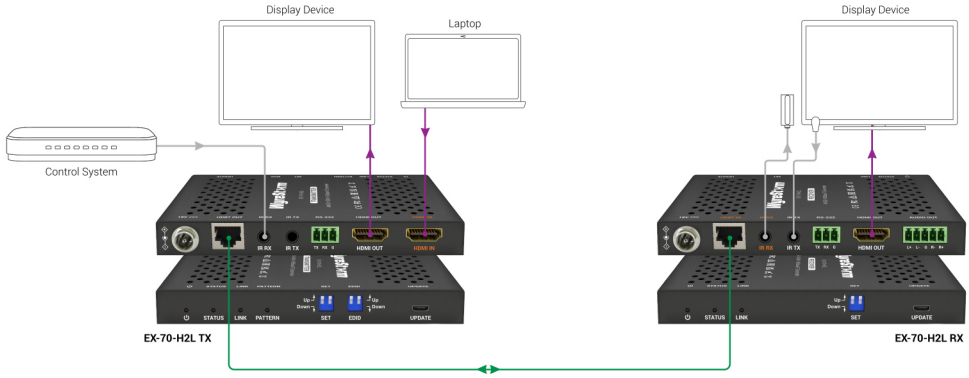
IMPORTANT! Installation Requirements

- Visit the product page to download the latest firmware, document versions, additional documentation, and configuration tools.
- Read through the Wiring and Connections section for important wiring guidelines before creating or choosing premade cables.

In the Box

1x Transmitter Unit
1x Receiver Unit
1x 18V 1A Power Supply (multi-region plugs)
4x Mounting ears
2x 3-Pin Phoenix connectors
1x 5-Pin Phoenix connector
1x IR Receiver
1x IR Transmitter
1x Quickstart Guide (This Document)

Basic Wiring Diagram



Wiring and Connections

WyreStorm recommends that all wiring for the installation is run and terminated prior to making connections to the switcher. Read through this section in its entirety before running or terminating any wires to ensure proper operation and to avoid damaging the equipment.

IMPORTANT! Wiring Guidelines

- The use of patch panels, wall plates, cable extenders, kinks in cables, and electrical or environmental interference will have an adverse effect on signal transmission which may limit performance. Steps should be taken to minimize or remove these factors completely during installation for best results.
- WyreStorm recommends the use of shielded category cable to minimize signal noise and interference.

RS-232 Wiring

The EX-70-H2L uses a 3-pin RS-232 with no hardware flow control. Most control systems and computers are DTE where pin 2 is RX, this can vary from device to device. Refer to the documentation for the connected device for pin functionally to ensure that the correct connections can be made.



WyreStorm Connector			3rd Party Device
Pin 1	TX (Transmit)	---> To --->	RX (Receive)
Pin 2	RX (Receive)	---> To --->	TX (Transmit)
Pin 3	G (Ground)	---> To --->	G (Ground)

IR TX/RX Guidelines

- Using WyreStorm infrared emitters and receivers is the best way to ensure that most IR coding formats are transmitted and received by the system. Other 3rd party emitters and receivers can be used; however, these devices must operate in the same manner as the WyreStorm devices.
- Due to differences in IR across 3rd party control systems their IR ports should never be connected directly to a NetworkHD system as an incompatibility may exist. WyreStorm offers a cable that compensates for voltage differences as well adjusts for differences in the pins used within the port. Refer to the CAB-IR-LINK product page for more information.

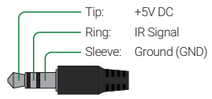
IR TX Port Pinout

Connection for IR TX (transmit) uses a 3.5mm (1/8in) mono plug.



IR RX Port Pinout

Connection for IR RX (receive) uses a 3.5mm (1/8in) stereo jack that outputs +5V DC to power the included IR receiver.



SET DIP

Function	DIP Location	
Test pattern OFF	up	-
Test pattern ON	down	-
RS232 Pass-through	-	up
HDBaseT FW update	-	down

EDID DIP

Function	DIP Location	
Copy from RX HDMI OUT	up	up
Copy from TX HDMI OUT	up	down
Fix 4K@60Hz 2CH	down	up
Fix 1080P@60Hz 2CH	down	down

FW MCU FW update

Front panel (Receiver)

POWER LED On: Device is powered on
Off: Device is powered off

STATUS LED Flashing: Device is working properly

LINK LED On: Device is link properly

SET DIP

Function	DIP Location	
RS232 Pass-through	-	up
HDBaseT FW update	-	down

FW MCU FW update

DIP Switch Settings

SET DIP

Function	DIP Location
Test Pattern Off	
Test Pattern ON	
RS-232 Passthrough	
HDBaseT FW Update	

EDID DIP

Function	DIP Location
Copy from RX HDMI OUT	
Copy from TX HDMI OUT	
Fix 4K@60Hz 2CH	
Fix 1080p@60Hz 2CH	

Firmware MCU FW Update

Front Panel (Receiver)

Firmware
On: Device is powered on
Off: Device is powered off

Status LED
Flashing: Device is working properly

Link LED
On: Device is link properly

SET DIP

Function	DIP Location
RS-232 Passthrough	
HDBaseT FW Update	

Firmware MCU FW Update

Specifications

Audio and Video	
Inputs	**Transmitter:** 1x HDMI In, 1x IR In **Receiver:** 1x UTP In (RJ45), 1x IR In
Outputs	**Transmitter:** 1x HDMI Loop Out, 1x UTP Out (RJ45), 1x IR Out **Receiver:** 1x HDMI Out, 1x IR Out, 1x Audio Out
Video Standards	HDMI 2.0
EDID	Dip Switch
Max. Video Resolution	4K@60Hz 4:4:4
Transmission Distance	70m over Cat6
RS-232	Pass-through
IR	Bidirectional
Power	
Power Supply	DC 18V
PoC	Bi-directional
Environmental	
Operating Temperature	0 to + 45°C (32 to + 113 °F), 10% to 90%, non-condensing
Storage Temperature	-20 to +70°C (-4 to + 158 °F), 10% to 90%, non-condensing
Dimensions and Weight	
Height	15.2mm/0.59in
Width	136.4mm/5.37in
Depth	74.2mm/2.92in
Regulatory	
Safety and Emission	CE | FCC | RoHS | RCM | EAC | UKCA

Note: WyreStorm reserves the right to change product specification, appearance or dimensions of this product at any time without prior notice.

Warranty Information

WyreStorm Technologies ProAV Corporation warrants that its products to be free from defects in material and workmanship under normal use for a period of five (5) years from the date of purchase. Refer to the Product Warranty page on wyrestorm.com for more details on our limited product warranty.