

What's in the Box?

PART NO.	QTY	DESCRIPTION
HDX-Ultra-TX	1	HDX-Ultra Transmitter
HDX-Ultra-RX	1	HDX-Ultra Receiver
Power Supply	1	PS5VDC2A
CCHDMM06	1	6ft HDMI Cable
User Manual	1	

Technical Specifications

VIDEO	
Format	HDMI 1.3 and HDCP compliant
HDTV Resolutions	480p, 720p, 1080i, 1080p/60Hz/48bit
TV Resolution	480i
Input Interface (TX)	HDMI Type A 19-pin Female TMDS
Output Interface (RX)	HDMI Type A 19-pin Female TMDS
Input Cable Length (TX)	Up to 40 ft.
Output Cable Length (RX)	Up to 40 ft.
AUDIO	
Format	Dolby TrueHD, DTS-HD MA
Input Interface	HDMI (Integrated)
Output Interface	HDMI (Integrated)
IR	
Signal Type	38 KHz
Interface	3.5 mm Jack Socket (Female)
RS-232	
Baud Rate	Up to 19,200 bps
Input Interface (TX)	DB-9 (Serial) Female
Output Interface (RX)	DB-9 (Serial) Male
SYSTEM	
Interface	RJ-45
Cable Requirements	CAT5/5e/6
Maximum Length	330 feet (100 meters)
OTHER	
Power	External 100-240 VAC/5VDC2A @10W
Dimensions	5"W x 1.125"H x 4.125"D
Weight	0.6 lbs.
Approvals	UL, CE, ROHS Compliant
Operating Temp.	32-131°F (0-55 °C)
Storage Temp.	-4-185 °F (-20-85 °C)
Humidity	Up to 95%

© Copyright 2011 Smart-AVI, All Rights Reserved

NOTICE

The information contained in this document is subject to change without notice. Smart-AVI makes no warranty of any kind with regard to this material, including but not limited to, implied warranties of merchantability and fitness for any particular purpose.

Smart-AVI will not be liable for errors contained herein or for incidental or consequential damages in connection with the furnishing, performance or use of this material.

No part of this document may be photocopied, reproduced or translated into another language without prior written consent from Smart-AVI.

For more information, visit www.smartavi.com.

Touchboards

205 Westwood Ave, Long Branch, NJ 07740
 Phone: 866-94 BOARDS (26273) / (732)-222-1511
 Fax: (732)-222-7088 | E-mail: sales@touchboards.com

Smart-AVI
 SMART AUDIO VIDEO INNOVATION

SmartAVI, Inc. / Twitter: [smartavi](https://twitter.com/smartavi)
 11651 Vanowen St., North Hollywood, CA 91605
 Tel: (818) 503-6200 Fax: (818) 503-6208
<http://www.SmartAVI.com>

Smart-AVI
 SMART AUDIO VIDEO INNOVATION

Installation Manual

HDX-Ultra

HDMI, IR and RS-232 Extender over a single CAT5 UTP Cable



Watch and Control HDTV 1080p video over 330ft (100m) from the source

www.smartavi.com

Introduction

The HDX-Ultra uses only one CAT5 UTP cable to extend HDMI signals such as HDTV output over 330ft (100m) from the source. It is capable of transmitting high-resolution HD video up to 1080p. Controlling your video source is easy with the HDX-Ultra's bi-directional IR and RS-232 extension. Whether it's for a home entertainment system or a commercial installation, the HDX-Ultra delivers flexibility and control.

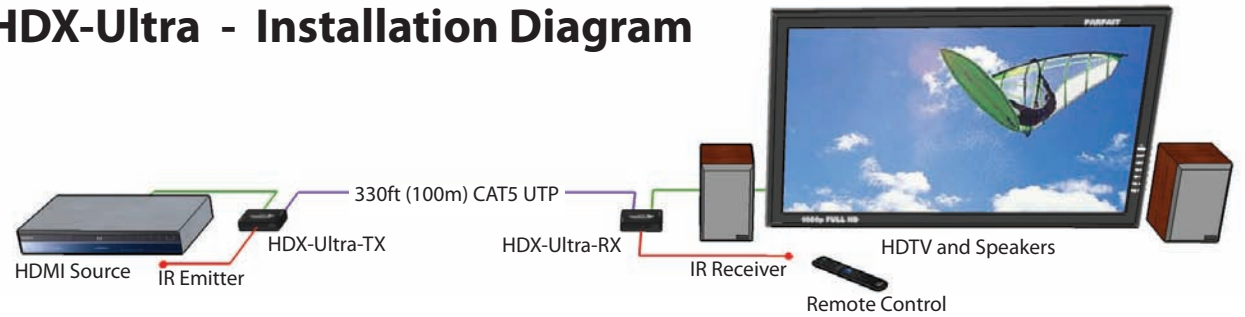
Features

- Extends HDMI output over one CAT5/5e/6 UTP cable
- Extends IR and RS-232 control signals for remote control
- Delivers uncompressed HD video up to 1080p@60Hz@48bits and 3D
- Data signals up to 3.4Gbps
- HDMI 1.3 and HDCP compliance
- IR and RS-232 communication are bi-directional
- Transmits high-quality Dolby TrueHD, DTS-HD MA audio signals
- Transmits 1080p resolution over 330 feet (100 meters) from the source

Applications

- Home Theater
- Corporate or Educational Presentations
- Call Centers
- Industrial
- Information Terminals/Kiosks
- Airport Installations
- Educational Environments

HDX-Ultra - Installation Diagram





Installation



1. Power off the HDMI source, display and speakers.
2. Connect an HDMI cable from the HDMI source to the HDMI port on the HDX-Ultra transmitter.
3. Connect an IR emitter/receiver (optional) to the IR ports on the HDX-Ultra transmitter.
4. Connect an RS-232 compliant device (optional) to the RS-232 port on the HDX-Ultra transmitter.
5. Connect the HDX-Ultra transmitter to the HDX-Ultra receiver using a CAT5 UTP cable (up to 330ft/100m).
6. Connect an IR emitter/receiver (optional) to the IR ports on the HDX-Ultra receiver.
7. Connect an RS-232 compliant device (optional) to the RS-232 port on the HDX-Ultra receiver.
8. Connect an HDMI cable from the HDMI port on the HDX-Ultra receiver to the HDMI Display.
9. Power on the HDX-Ultra transmitter and receiver by plugging in their power adapters (5VDC2A).
10. Power on the HDMI source, displays and speakers.



RS-232 SPECIFICATIONS

CONNECTOR	PIN	NAME	DESCRIPTION
DB9 MALE - RECEIVE 	2	RxD	Receive Data on DB9 Male
	3	TxD	Transmit Data on DB9 Male
	5	SGND	Ground
DB9 FEMALE - TRANSMIT 	2	TxD	Transmit Data on DB9 Female
	3	RxD	Receive Data on DB9 Female
	5	SGND	Ground

CAT5/5e/6 CABLE SPECIFICATIONS

CONNECTOR	PAIR	PINS	
RJ-45 MALE 	RJ-45 FEMALE 	1	1 & 2
		2	3 & 6
		3	4 & 5
		4	7 & 8
CAPACITANCE	14 pf/ft (46.2 pf/m)		
CONDUCTOR GAUGE	24 AWG		
IMPEDANCE	100 +/- 15 ohms		