



PU-304-KIT Digital Audio over CAT6 Extender TXRX Set

OPERATIONS MANUAL



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SAFETY PRECAUTIONS

Please read all instructions before attempting to unpack, install or operate this equipment and before connecting the power supply.

Please keep the following in mind as you unpack and install this equipment:

- Always follow basic safety precautions to reduce the risk of fire, electrical shock and injury to persons.
- To prevent fire or shock hazard, do not expose the unit to rain, moisture or install this product near water.
- Never spill liquid of any kind on or into this product.
- Never push an object of any kind into this product through any openings or empty slots in the unit, as you may damage parts inside the unit.
- Do not attach the power supply cabling to building surfaces.
- Use only the supplied power supply unit (PSU). Do not use the PSU if it is damaged.
- Do not allow anything to rest on the power cabling or allow any weight to be placed upon it or any person walk on it.
- To protect the unit from overheating, do not block any vents or openings in the unit housing that provide ventilation and allow for sufficient space for air to circulate around the unit.

REVISION HISTORY

VERSION NO.	DATE	SUMMARY OF CHANGE
RDV1	15/02/2012	Preliminary Release





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1. INTRODUCTION

The PU-304-KIT is designed to send digital audio signals over 150m. This device supports both Coaxial and Optical signals and can transmit these signals up to 150m. The PU-304-KIT can be powered using a USB cable or the supplied PSU adaptor for added flexibility in a compact design. Digital SPDIF signals are supported up to a sample rate of 96Khz, and support for Stereo and Multichannel digital audio (LPCM, DTS, Dolby Digital, Dolby Digital Plus), also provided.

2. APPLICATIONS

III Transmit dual SPDIF (coaxial and optical) over single CAT cable..

3. PACKAGE CONTENTS

III Digital Audio Transmitter over single CAT6 cable

- III Digital Audio Receiver over single CAT6 cable
- 5V/1 A DC power adaptor
- **III** Operation manual

4. SYSTEM REQUIREMENTS

Coaxial/Optical audio input source and amplifier or speaker output and single CAT6 cable for connecting transmitter and receiver.

5. FEATURES

- III Supports Coaxial or Optical digital audio S/PDIF signal
- Supports stereo and multi-channel (7.1, DTS, Dolby Digital etc.) digital audio
- III Supports industry standard Category 5/5e/6 cable
- III Digital audio S/PDIF performance sampling rate 96 kHz
- III Supports single Coaxial input to Coaxial signal output
- **W** Supports single Optical input to Optical signal output





5. OPERATION CONTROLS AND FUNCTIONS

5.1 Transmitter Front and Rear Panels



Coaxial In

Connect to source audio equipment such as DVD or Blu-ray players with a Coaxial digital audio output.

Optical In

Connect to source audio equipment such as DVD or Blu-ray players with an Optical digital audio output.

B DC 5V

Plug the 5V DC power supply into the unit and connect the adaptor to an AC outlet. Note: *only one unit out of the two needs to be powered*.

USB 5V

Connect with a USB cable for power supply from computer or notebook.

G CAT6 Out

Connect to the receiver unit with a single CAT6 cable.





5.2 Receiver Front and Rear Panels



USB 5V

Connect with a USB cable for power supply from computer or notebook.

CAT6 In

Connect to the receiver unit with a single CAT6 cable.

Coaxial OUT

Connect to an amplifier or active speakers with coaxial input.

Optical Out

Connect to an amplifier or active speakers with optical input.

5 DC 5V

Plug the 5V DC power supply into the unit and connect the adaptor to an AC outlet. Note: *only one unit out of the two needs to be powered*.





5.2 Receiver Front and Rear Panels



Power LED

The blue LED will light when the device is powered.

5.4 RJ45 Pin Assignment

TRANSMITTER			RECEIVER	
Pin	Definition	Cat5/5e/6	Pin	Definition
1	Signal A		1	Signal A
2	Signal B		2	Signal B
3	Signal C		3	Signal C
4	GND		4	GND
5	GND		5	GND
6	Signal D		6	Signal D
7	DC5V		7	DC5V
8	DC5V		8	DC5V



6. CONNECTION DIAGRAM







7. SPECIFICATIONS

TRANSMITTER			
Input	1× Coaxial & 1× Optical		
Output	1× CAT6		
RECEIVER			
Input	1× CAT6		
Output	1× Coaxial & 1× Optical		
CAT6 Cable Distance	150 m		
Sample Rate	32/44.1/48/88.2 & 96KHz		
ESD Protection	Human Body	± 6kV (air-gap dis-	
	Model:	charge)	
		± 4kV (contact dis-	
		charge)	
Dimension	22mm (H) × 70mm (W) × 50mm (D)		
Weight	50 g		
Operating Temperature	0 °C~45 °C/32 °F~104 °F		
Storage Temperature	-20 °C ~ 60 °C/-4 °F~140 °F		
Relative Humidity	20~90% RH (non-condensing)		
Power Consumption	2W		

8. ACRONYMS

ACRONYM	COMPLETE TERM
3G	3 rd Generation
SDI	Serial Digital Interface





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