

DCT-1DD

Coaxial to Analog Audio Converter with Dolby® Digital & DTS® 2.0 Decoder







Operation 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 DD/MM/YY | SUMMARY OF CHANGE |
|-------------|---------------|---------------------|
| VR0 | 24/07/15 | Preliminary Release |
| | | |
| | | |



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1. INTRODUCTION

The Coaxial to Analog Audio Converter (DAC) with Dolby[®] Digital & DTS[™] 2.0 Decoder provides the ideal solution for converting an coaxial digital audio signal to analog stereo audio. It provides high quality sound conversion. The Dolby Digital & DTS 2.0 function guarantees that Dolby digital/DTS2.0 audio signals are downmixed to analog stereo without loss of quality. This unit is perfect for use in computer audio systems or digital mixing consoles.

2. APPLICATIONS

- · Converting digital coaxial audio into analog stereo
- Converting Dolby Digital formatted audio into analog stereo
- Converting DTS 2.0 formatted audio into analog stereo
- · HDTV with only digital audio output to analog amplifier input
- Improving the digital to analog conversion quality from any stereo optical digital audio source

3. PACKAGE CONTENTS

- Coaxial to Analog Audio Converter with Dolby Digital Decoder & DTS 2.0 Decoder
- Operation Manual

4. SYSTEM REQUIREMENTS

Digital audio source device such as DVD/Blu-ray player or Media player with an coaxial output cable and to a device such as an amplifier or AV receiver with analog stereo input.



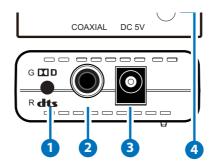
5. FEATURES

- Supports coaxial digital audio signal input and conversion into analog audio signal L/R output
- Supports LPCM 2CH audio sampling rates from 32 to 96 kHz (32, 44.1, 48, 88.2 and 96 kHz)
- Supports DTS 2.0 5.1CH audio sampling rates up to 96 kHz
- Supports Dolby Digital 5.1CH audio sampling rates up to 48 kHz
- Supports Dolby Digital & DTS 2.0 audio downmixing to 2-channel audio
- Supports S/PDIF bitstream 24-bit of data for the left and right channels
- Compact, elegant design and easy to install



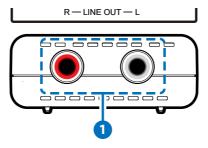
6. OPERATION CONTROLS AND FUNCTIONS

6.1 Front Panel



- 1 Dolby/DTS LED Indicator: When the source audio is encoded with Dolby Digital the LED will illuminate in green and when with DTS 2.0 the LED will illuminate in red other types of audio the LED will not illuminate.
- **2 COAXIAL IN:** Connect the Coaxial input to an Coaxial digital audio source, such as a Games Console, HDTV or Set-top Box.
- 3 **POWER 5V:** Plug the 5V DC power supply into the unit and connect the adaptor to an AC outlet.
- 4 Power LED: The LED will illuminate when connected to power.

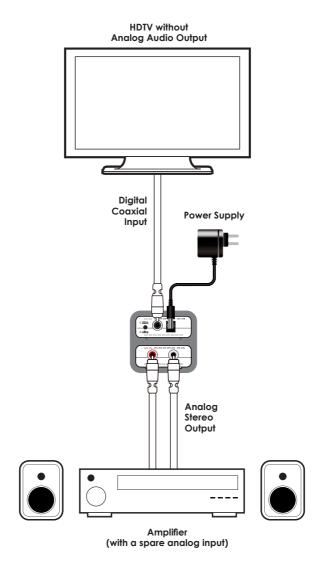
6.2 Rear Panel



1 R/L LINE OUT: Connect the R/L analog audio output to the input of your AV Receiver or audio system.



7. CONNECTION DIAGRAM





8. SPECIFICATIONS

Input Port 1×Coaxial

Output Port 1×L/R (2×RCA)

Power Supply 5V/1A DC (US/EU standards,

CE/FCC/UL certified)

Output Level 2Vrms ± 10%

THD+N <0.007%

Frequency Response ±1 dB

SNR >100 dB **Crosstalk** <-119 dB

Dimensions 55 mm (W)×75.5 mm (D)×22.5 mm (H)/

Jacks Excluded

55 mm (W)×86 mm (D)×22.5 mm (H)/

Jacks Included

Weight 42 g
Chassis Material Plastic
Silkscreen Color White

Operating Temperature $0 \, ^{\circ}\text{C} \sim 40 \, ^{\circ}\text{C}/32 \, ^{\circ}\text{F} \sim 104 \, ^{\circ}\text{F}$ Storage Temperature $-20 \, ^{\circ}\text{C} \sim 60 \, ^{\circ}\text{C}/-4 \, ^{\circ}\text{F} \sim 140 \, ^{\circ}\text{F}$

Relative Humidity 20~90% RH (non-condensing)

Power Consumption 1.7 W

Audio Specifications:

| OUT | Output Level | T.H.D+N (A-Weight) | Frequency Response | SNR | Crosstalk |
|------------|--------------|-----------------------|-----------------------|----------|-----------|
| Coaxial | 2)/rpas±1007 | <0.0197 | ⊥1 dD | > 100 dp | <-115 dB |
| 0dBFS/1kHz | 2Vrms±10% | <0.01% | ±1 dB | - 100 GB | ~-113 UB |



Input Audio to Output Audio Chart:

| AUDIO INPUT | INPUT FORMAT | AUDIO L/R OUTPUT |
|-------------|---------------|------------------|
| COAXIAL | LPCM 2CH | Analog 2CH |
| | Dolby Digital | Decoding Lt/Rt |
| | DTS | Decoding Lo/Ro |

9. ACRONYMS

| ACRONYM | COMPLETE TERM |
|---------|--|
| DAC | Digital to Analog Converter |
| RCA | Audio Connector (Radio Corporation of America) |
| SNR | Signal-to-noise Ratio |
| THD | Total Harmonic Distortion |
| USB | Universal Serial Bus |

