BerryBak™

User Manual

Bluetooth Decoder
BEA1

Bluetooth Decoder

One Product,
Multiple Audio Format

Bluetooth to S/PDIF (Optical/Coaxial) Converter
Supporting USB Codec Input
USB to S/PDIF (Optical/Coaxial) Converter
USB to Analog Converter

Experience the Ultimate Sound Quality with the Qualcomm QCC5171 Solution. Supporting LDAC, aptX-Lossless, aptX-HD, SBC, AAC, aptX, aptX-Adaptive, and more, it delivers a maximum transmission rate of 990kbps. With support for 24bit/96kHz sampling rate, the audio quality rivals that of a wired connection. Powered by the independent ESS9018 decoding chip, it offers a delicate and smooth sound experience with minimal distortion and exceptional resolution.

Supporting the Bluetooth LE Audio Standard

Plug-N-Play Terminals, Simplifying System Integration

32/80MHz dual processor, Optimised for Balanced Performance and Power Consumption

High-Performance Audio Combined with Low-Power Consumption

RCA Jacks for Audio Output, Easy for Connection

USB Type-C for DC5V Power Input and USB Decoding — UAC 2.0

Bluetooth LED for Better Understanding of Running Status

External Bluetooth Antenna for Long Distance Connection and Stable Audio Transmission

Bluetooth Class 2 Support

24bit/96kHz High Resolution Audio
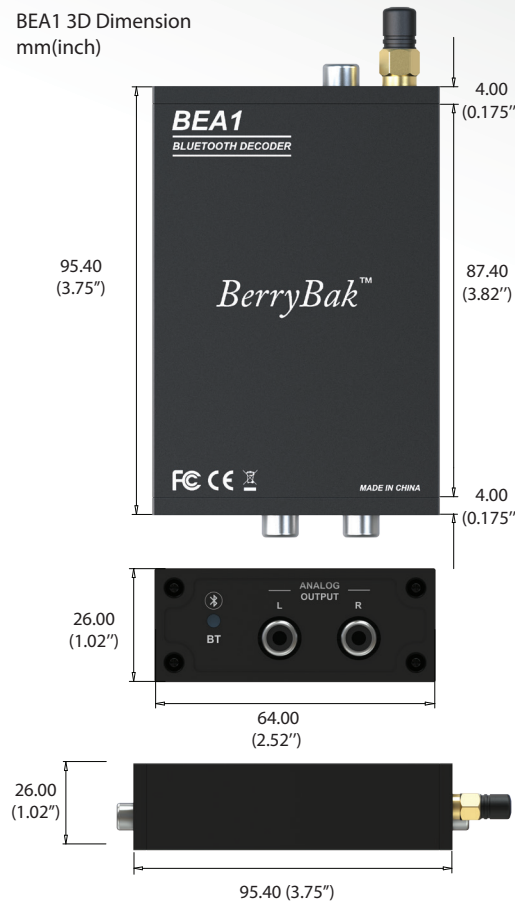
CD Lossless Audio Quality with Snapdragon Sound

FC CE RoHS

Visit the website below for additional information:
www.berrybak.com

Bluetooth Decoder
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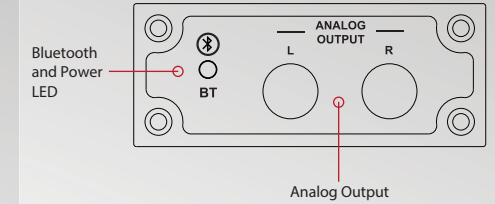## Technical Specifications

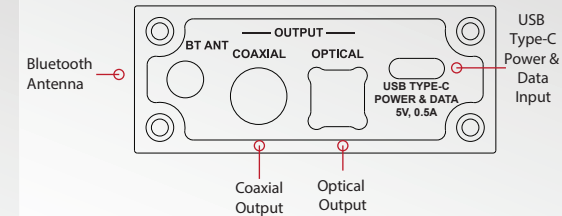| Technical Specifications	
Brand	Berrybak
External Power	USB Type-C (5V, 0.5A)
Input Interface	Bluetooth 5.3 & UAC 2.0
Output Interface	RCA (Output Level 2V RMS); Optical Fibre / Coaxial (48kHZ or 96kHz related to Audio Encoder)
Power Consumption	0.48W — (Bluetooth connected, output start at -8dB) (Bluetooth disconnected)
Bluetooth Specification	LDAC, aptX-Lossless, aptX-HD, SBC, AAC, aptX, aptX-Adaptive
Size	64.0 x 95.4 x 26.0mm (Not included the antenna and RCA connectors)
Weight	191g (Including the antenna)

BEA1 3D Dimension mm(inch)

4.00 (0.175")
95.40 (3.75")
87.40 (3.82")
4.00 (0.175")
26.00 (1.02")
64.00 (2.52")
26.00 (1.02")
95.40 (3.75")

BEA1 BLUETOOTH DECODER
BerryBak™
MADE IN CHINA

Description Devices Components on Front View and Rear View of The Panel

Front View

Bluetooth and Power LED

Analog Output

Rear View

Bluetooth Antenna

Coaxial Output

Optical Output

USB Type-C Power & Data Input

Setup

1. For Analog Output:
Connect the RCA Cable into the Analog Output connector on BEA1, then connect the other end into the Analog Input connector on your amplifier.

RCA Cables

2. For Digital Output:
Connect RCA Cable into the Coaxial Output connector on BEA1, then connect the other end into the Coaxial Input connector on your amplifier.
OR
Connect Optical Cable into the Optical Output connector on BEA1, then connect the other end into the Optical Input connector on your amplifier.

USB Type-C Cable
Optical Cable
RCA Cable

3. For Power Input
Connect USB Type-C Cable to the Type-C Power Input on BEA1 which is connected to a power source.

Functionality Descriptions

Bluetooth and Power LED
LED Light Indicator:
Light Blue Blinking: Powered on.
Light Blue Steadily: Paired.

Analog Output
Allows to connect BEA1 to audio devices that have analog inputs.

USB Type-C Power Input

To turn the BEA1 on, connect the USB Type-C power input with Type-C cable that connected to a power source.

Bluetooth Antenna

1. Enables BEA1 to send and receive wireless Bluetooth signal.
2. Helps in establishing a stable and reliable connection.

Coaxial Output

1. Provide digital audio signal in a coaxial format.
2. Allows user to connect BEA1 to devices that support coaxial input such as soundbars, or AV receivers.

Optical Output

1. Also known as TOSLINK or SPDIF, which act as digital audio signal in an optical format.
2. Uses a fiber optic cable to transmit audio signal, enabling user to connect BEA1 to devices that have an optical input, such as home theatre systems, soundbars, or TVs.

NOTES:

Please consult our customer support or visit our website for any further assistance, troubleshooting or updates.
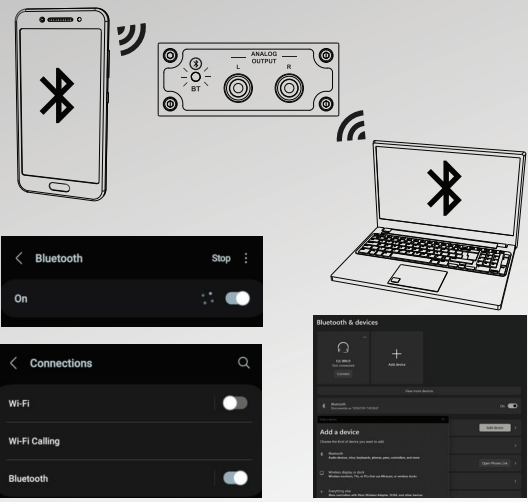
How to connect through Bluetooth

To PC

1. The LED blinks when BEA1 is powered on.
2. Enables the Bluetooth setting in your PC.
3. Click on the option that says 'Add Bluetooth or other devices.'
4. Select the 'Bluetooth' option and begin to search for 'BerryBak BEA1' to begin pairing.
5. The blue LED will light up when pairing is succesful.
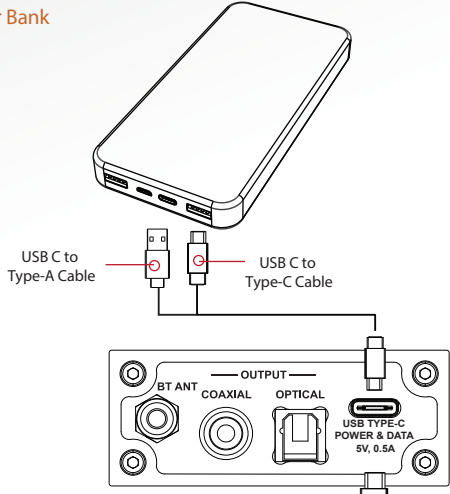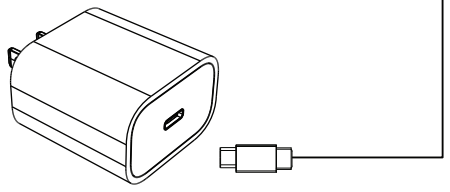
To iOS/Android

1. The LED blinks when BEA1 is powered on.
2. Open the settings app on iOS or Android device.
3. Navigate to the 'Connections' option in Android or 'Bluetooth' in iOS device.
4. Enable the 'Bluetooth' option and begin to search for 'BerryBak BEA1' to begin pairing.
5. The blue LED will light up when pairing is succesful.
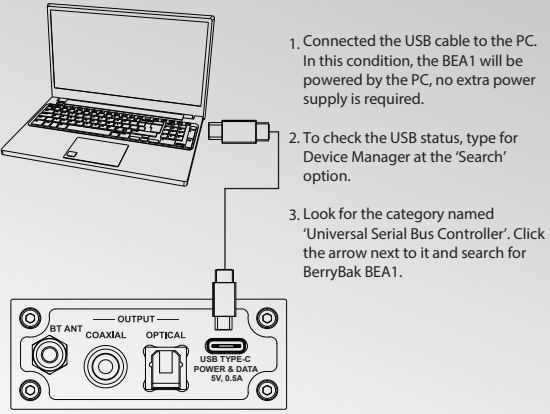

USB Type-C Connector Usage Instructions

Power Bank

USB C to Type-A Cable

USB C to Type-C Cable

Power Adapter

USB Decoding

1. Connected the USB cable to the PC. In this condition, the BEA1 will be powered by the PC, no extra power supply is required.

2. To check the USB status, type for Device Manager at the 'Search' option.

3. Look for the category named 'Universal Serial Bus Controller'. Click the arrow next to it and search for BerryBak BEA1.

Accessories

1. Bluetooth antenna 1pcs
2. Optical cable (only for S/PDIF Enabled version)................... 1pcs

Troubleshooting

Issue	Possible Solutions
The BEA1 work normally under Bluetooth mode, but it cannot work as USB codec and it's not able to establish data connection with your PC.	1. Make sure that the USB cable used is equipped with Data Communication function. Under this circumstances, turn around the USB 2. Type-C connect 180° and try again.
The BEA1 cannot be recognised as USB codec after connect to your PC.	1. Power Off/On again.
Music playback is interrupted intermittenly, and the connection is unstable.	1. Please check the Bluetooth antenna to ensure it is tightened securely. 2. Check if the BEA1 is within the recommended range of your devices. 3. Maintaining a distance of around 33ft(10m) is generally recommended. 4. Move closer to the Bluetooth unit if you experience sound distortion or interruptions. Additionally, inspect the area around the 5. Bluetooth unit for any substances that may be blocking the Bluetooth signal. Clear away any obstructions to improve the connection quality.
Noise occurs when switching between LDAC and AaptX modes.	1. This issue may arise when using certain external SPDIF decoders that do not support SRC (Sample Rate Conversion) functionality. We recommend trying a different SPDIF decoder too see if the problem persists.
Intermittent music playback interruptions in LDAC mode.	1. If you prefer the high audio quality of LDAC with a 990kbps bit, ensure that the BEA1 is positioned close to your device. This proximity helps maintain a stable connection and minimise.