

XD05 Pro User Manual

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It has a unique appearance, many functions and big output power, which is not only portable, but the output power is comparable to that of desktops amplifier. It is suitable for high-end people who pursue to be both portable and desktop amplifier, and its size is easy to carry but has a strong output power can also drive your high-resistance headphones so good.

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Features

1. With two OLED screens, real-time display of product working information.
2. The USB receiving chip adopts XMOS's XU316, working in asynchronous transmission mode, supports up to PCM32 Bit/768 kHz, MOA and DSD512.
3. The DAC chip uses ESS' ES9039SPRO with better decoding performance, extremely low noise and higher resolution, which greatly improves the sense of sound.
4. Using dual active low-phase noise crystal oscillators, data shaping processing through FPGA achieves a unified clock and reduces jitter.
5. Bluetooth chip uses Qualcomm's QCC5125, supports Bluetooth 5.1, supports aptx, aptx_LL, aptx_HD, LDAC formats.
6. AES/Coaxial/optical supports up to PCM 24Bit/192kHz, DSD64 (DOP).
7. Built-in filter circuit and high-efficiency power conversion circuit, optimize the power supply des 7. Built-in filter circuit and high-efficiency power conversion circuit, optimize the power supply design through the LDO circuit, and separately supply power to the decoder chip, LPF, amplifier, XMOS, and digital receiver chip. 8、It is used digital volume adjustment chips to solve the problem of unbalanced left and right channels at low volume.

9. The amp circuit adopts the OP+BUF architecture, the output power reaches 2000mW, and the power is strong, which can easily promote many kinds of headphones.

10. The DAC chip module can be replaced by yourself, and experience the sound quality changes brought about by various top DAC chips.

11. The amplifier chips can be replaced by yourself, according to your listening preferences to choose different types amplifier chips.

With external power in and power selector, it can switch to the desktop mode with switch in the

room, which brings a more powerful and flexible listening experience.

13. With TURBO button, adjust the output power, better match many kinds of headphones with high, medium and low impedance.

14. The use of high-grade aluminum alloy exquisite processing, to ensure that each complex style of the surface is very meticulous and smooth, strong visual sense. **Parameters**

Unbalanced Output Parameters: Balanced Output Parameters: Output Power: 2000mW (32Ω, THD+N<1%) Output Power: 2000mW (32Ω, THD+N<1%) 930mW (300Ω, THD+N<1%) 240mW (300Ω, THD+N<1%)

Peak Voltage: 23.8Vp-p (TUBRO) Peak Voltage: 47.2Vp-p (TUBRO) Frequency Response: 20Hz~20KHz (±0.5dB) Frequency Response: 20Hz~60KHz (±0.5dB) Crosstalk: ≥72 dB Crosstalk: ≥105dB THD+N: 0.0007% THD+N: 0.0007%

Output Impedance: ≤0.4Ω

S/N: ≥120dB

BAL-LO Parameters:

Output level: 4.0V Output level: 2.0V THD+N: 0.0008% THD+N: 0.0005% S/N: ≥128dB S/N: ≥120dB

Weight: 0.78 (kg)

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XD05 Pro

It is AUX OUT(output analog signal) when DAC working, otherwise it is used as AUX IN.

It is BAL OUT(output analog signal) when DAC working, otherwise it is used as BAL IN.

BATT: work on batteries, EXTE: work with DC12V in, CHARGE: when charging is needed.

14) Input selection: Short press to select input source, long press to lock/unlock all the buttons.

18) DAC module window, see the following instructions for the steps to replace the DAC module. 19) AMP module window, see the following instructions for the steps to replace the AMP module.

1.DAC module specification: the replacement DAC module must be designed by our company, and we will not be responsible for the consequences of replacing any third-party designed DAC module.

b. Short press to Play/pause; double press to play next song, three press to play previous song.

a.As a charging, fast charging adaptor can be used (support 5V/9V/12V output). b. When used as an external power supply, connect the DC12V input.

Output Impedance: ≤0.2Ω

S/N: ≥120dB

AUX OUT Parameters:

Battery: 3.87V/13600mAh

Size: 18.5x9.5x3.3 (cm)

Parts and Controls

🚥 22.56MHz 🕌 (16) (15)

a.Built-in secondary screen to display volume

1) 6.35mm headphone out 4.4mm Balanced headphone out 3) Volume/selection knob:

b.Adjust the volume (0-99) c.In the menu windows, rotate to select

4) Optical/Coaxial in(3.5mm)

8) BALANCED IN/OUT:

9) Charging port(Type-C):

11) Pairing&play (bluetooth) button:

Replace the DAC Module

Replace the Amplifier Chips 1. The amplifier chips requirements: 1) dual channel;

6) cover back and lock the screw;

2) the maximum working voltage should be $\geq \pm 15V$; 3) should be come from regular company, if from unknown

1) turn off the power supply of this unit before operation:

3) remove the amplifier chips module screw and remove it;

5) install the amplifier module back, then lock the fixing screw;

2) use a hexagonal T6 screwdriver, remove the cover's screw, open and fix it;

chip has directions, make sure that the direction of the first foot corresponds to the socket

7) Turn on the power, if the display information is normal, it is successful; if displayed "PROTECT", it is necessary to re-check whether the amplifier chips is installed in reverse or not.

Sampling Rate

Rotate the volume button to select DAC Filter, Screen Off, Brightness, Channel Balance, Spectrum, Sleep Time, Restore Factory Settings. Press the INPUT key to enter the next setting interface:

- Battery

DAC Filtere

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4) remove the amplifier chips from the module and insert the new chips. Note that the amplifier

12) Turbo button increase output power:

15) Power button: Long press to turn it on or off.

a. long press for 3 seconds to force into pairing state.

13) Menu button: Long press to enter or exit the menu windows

17) Microphone: When Bluetooth input, can be used for voice calls.

Short press to select ECO (small), NORMAL (medium), TURBO (large)

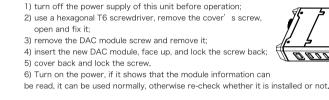
10) Power selection:

5) AES in 6) USB audio in 7) AUX IN/OUT:

(11) (12)

Applicable OS: windows, Linux, Mac OS, IOS, Android system

Battery Life: USB IN ≥11H | SPDIF IN≥11H | AUX IN≥20H (ECO Mode) Charging Time: \leq 6 hours (fast charging) | \leq 15 hours (slow charging 5V/2A)



2.Replacement steps:

company, we will not be responsible for the consequences. 2.Replacement steps:

Monitor information

Menu Setting

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Format -

FILTER

OFF 155

4 Channel Balance

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5 Display setting

any operation.

7 Restore Factory Settings

ON

How to use

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facilitate carrying.

music, and enjoy it.

maximum.

122.56MHz 129.56MHz 129.56MHz Input-USB IN DAC Module

Long press 2 seconds the MENU button to enter the menu window

PCM FIR2 Rotate the volume button to select the DAC filter, confirm and press the menu key to exit or automatically exit after 5 seconds without any operation. Screen Off Time

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automatically exit after 5 seconds without any operation.

automatically exit after 5 seconds without any operation.

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2M

1 is the main screen, 2 is the secondary screen, press the INPUT key to select 1 or 2 screen, then rotate the volume button to select the setting time, confirm and press the menu key to exit or

is the main screen, 2 is the secondary screen, press the INPUT key to select 1 or 2 screen, then rotate the volume button to select the brightness value, confirm and press the menu key to exit or

Press the INPUT key to select the L or R channel, and then rotate the volume button to adjust the increase or attenuation value to compensate for the left and right deviation of the headset. After confirmation, press the menu key to exit automatically after 5 seconds without any operation.

PCM FIR7

PCM FIR1

Select the main screen to display the sampling rate or spectrum, and rotate the volume button to select 6 、Sleep Time

30M

2H

Rotate the volume button to select the shutdown time, it will be automatically shut down when the time is up, confirm and press the menu key to exit or exit automatically after 5 seconds without

Rotate the volume button to select the YES, pressing the input key, this unit will be returned to the factory setting value. * Note: factory default value: input is Bluetooth, volume is 20, filter is FIR1, screen brightness is 5. screen off time is OFF, channel balance is 0, display setting is sampling rate, timing shutdown is OFF.

*Note: The XD05 Pro only supports dual or balanced channel headphone, does not support the mono headphone or with remote control function or microphone function.

Adjust the volume to your comfort value, and start enjoying music.
 Set the TURBO according to your headphone, you can also set up DAC filter according to

According to your needs, you can stick it tightly with the machine with magic stickers to

Pressing INPUT to the screen display USB IN, use the USB cable to connect to an Apple/windows/Linux system computer, connect headphone, playing music on computer and

2. Pressing INPUT to the screen display USB IN, use the USB OTG cable to connect to USB $\,$ audio out of an IOS/ Android phone, pad or HiFi player, connect headphone, then playing

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Pressing INPUT to the screen display AES, use AES cable to connect with player or CD which

5. Pressing INPUT to the screen display AUX, use audio cable to connect with player or DAC's

Pressing INPUT to the screen display Balance, use audio cable to connect with player or

DAC's which with BAL output, playing music, connect headphone and enjoy it.

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enjoy it. (Need to set this unit as an audio output device on the computer)

For the first time the unit connect with the computer would be taking some time.

OFF 15M

RESTORE FACTORY SETTING

Connect audio device with this unit. For details, see "Connecting to the Audio Device Turn the power switch to right to turn on the unit.

4. Play music with the connected audio device.

Connecting to the Audio Device

SPECTRUM 🚟

3. Pressing INPUT to the screen display COAXIAL/OPTICAL, use Coaxial/Optical cable to connect with player or CD which with Coaxial /Optical audio output, playing music, connect headphone and enjoy it.

*Note: When you connect the phone for the first time, please set the volume of the phone to

with AES audio output, playing music, connect headphone and enjoy it.

which with BAL output, playing music, connect headphone and enjoy it.

7. Pressing INPUT to the screen display Bluetooth, connect Bluetooth to phone or computer, playing music, connect headphone and enjoy it. 48KHz))**)**

1, When this unit is connected to the computer, the driver is required to be installed.(No need if

2, you can downloaded the Driver from the official website, link: (https://www.xduoo.net/firmware

3, When using the device to play a high resolution audio files on the computer, we recommend

-download/), choose XDUOO USB Drive, guiding is inside the package.

1. Set the Power Selector switch to the CHARGE position before charging.

2. Charger specifications: mobile phone fast charger, or an adapter with output 5V/2A

3. The red light flashes when slow charging, the green light flashes when fast charging, and will

5.Disconnect the power supply in time after being fully charged to avoid overcharging the

6.35 to 3.5 Converter 3.5mm audio cable 4.4mm audio cable AES cable

Install USB Driver

your system is MAC.)

Charging the Unit

(or more current).

battery for a long time.

always on when fully charged. 4.About 6-15 Hours for a full cl

using Jriver or Foobar2000 player.

Type-C USB extension cable Type-C to Type-C USB cable

Iron box (contains two amplifier chips) USB A转Type-C Converter Rubber Foot

→A USB AC adaptor that is not recommended is being used.

Wedsite: www.xduoo.con Service Tel: +86-0755-29799189 E-mail: service@xduoo.com

The battery is fully charged.

Troubleshooting nearest xDuoo dealer or consult us. Can't be turn on →Charge the battery of the unit.

If you run into any problems using this unit, use the following checklist and read the Troubleshooting.If you run into any problems using this unit, use the following checklist and read the product support information on user's manual. Should any problem persist, consult your

No sound →Check that the unit and the audio device are connected correctly. →Check that the connected device is turn on. →Turn up the volume of connected device or the unit. correct.

6.If you planning not to use it for long time, charge it every half year to avoid excessive battery discharge. Package List XD05 Pro device 1 set XDUOO Nameplate 1pcs 1pcs 1pcs 1pcs 1pcs

1pcs

1pcs 10pcs T6 Screwdriver 1pcs User Manua 1 sheet Warranty Card 1sheet

→When battery life reduces to half, the battery is approaching the end of its service life. Consult your nearest xDuoo dealer for replacement. Can't be charge ightarrowThe power selector did not switch to the CHARGE gear.

→Please check whether this unit is setting correct input. When connected to a computer, there is no sound or sound is not played back properly, check the device setting of you computer are Our products can enjoy 12-month free warranty services from the date of the sale, if the warranty period is expired, our company will charge parts cost depend on the product fault

Warranty Information conditions. Accessories are not covered under warranty. xDuoo Technology Co.,LTD

ADD:Room F1510,MingYueHuaDu Building, GongHe Industrial Road, XiXiangTown, Bao'an District,ShenZhen,China

关于我们 更多产品信息请关注官方网站 For more product information, please visit our Http://www.xduoo.com 或扫描二维码直接进入官方 Or scan us directly to enter the offical website Introduction XD05 Pro is a portable high-fidelity DAC & balanced headphone amplifier, which integrates USB

XD05 Pro is a portable high-fidelity DAC & balanced headphone amplifier, which integrates USB, coaxial, optical, AES, Bluetooth decoding and amplifier, USB supports up to PCM 32Bit/768kHz, MQA and DSD512; coaxial, optical, AES supports up to 24 Bit/192kHz and DSD64; Bluetooth supports aptx, aptx_HD, LDAC and other high-definition formats, so that make wireless audio become HIFI. DAC chip adopts ESS's latest ES9039SPRO chip, a And it is designed to be modular, and it can replace other DAC modules designed by our company, such as AKM's AK4499EX module, ROHM's BD34301 module, which are now the top DAC chips, let you enjoy the sound quality changes brought about by various top DAC chips. The amp circuit adopts the OP+BUF architecture, the output power reaches 2000mW, and the power is strong, which can easily drive many kinds of headphones. The amplifier chips also can be replaced by yourself, according to your listening preferences to choose different types amplifier chips. In order to better match many kinds of headphones, it has TURBO button, adjust the output power, better match many kinds of headphones with high, medium and low impedance. At the same time, it can connect DC12V in and has power selector, you can switch to the desktop mode with switch in the room, which brings a more powerful and flexible listening experience. It has a unique appearance, many functions and big output power, which is not only portable, but the