

# 30W CLASS D MINI AMPLIFIER WITH HEADPHONE OUTPUT

Model: DTA30HP User Manual



Thank you for purchasing the Dayton Audio DTA30HP Class D Mini Amplifier. This amplifier features the Texas Instruments TPA3116D2 known for its stereo efficiency and performance. The TPA3116D2 is fully protected against faults with built-in thermal and short-circuit protection. The miniature size of the DTA30HP makes it an ideal choice for small areas with limited space or for those looking for a cleaner audio environment. The DTA30HP is remarkably affordable, yet still delivers crisp, vibrant sound comparable to much larger amplifiers. The highly efficient audio amplification provides an amazing soundstage and presence combined with enhanced clarity and sound quality, all at an amazingly low price. Built-in to your DTA30HP is a Texas Instruments based headphone amplifier using the advanced TPA6110A2 Stereo Headphone Audio Amplifier. The TPA6110A2 is capable of delivering 150mW of continuous RMS power per channel into  $16\Omega$  loads. THD+N when driving a  $16\Omega$  load from 5 V is 0.03% at 1kHz, and less than 1% across the audio band of 20Hz to 20kHz.

# Please read this guide carefully before using this product.

# **SAFETY INSTRUCTIONS:**

- To prevent fire or electrical hazard do not disassemble this product.
- Do not expose the unit to water or moisture.
- · Do not place liquid on or close to unit.
- · Do not place unit on or near an open flame or heat source.
- · Keep product free from dust and debris.
- Place unit on a stable and level platform.
- Do not place heavy items on top of unit.
- Do not use excessive force when pushing the unit buttons.
- Do not attempt to pull the power cord when removing it from power outlet.
- · Do not use damaged or defective power cables.
- Unplug the power cable if the unit is not in use.
- Clean with a damp cloth only.

## PACKAGE CONTENTS

- · DTA30HP 30W Digital Class D Amplifier
- 12VDC @ 2A Power Supply
- Owners Manual

# **OPERATION**

Please read the following instructions prior to powering on and connecting your amplifier to speakers. Should you have any questions at any time during the installation of your amplifier please contact your place of purchase or visit the daytonaudio.com website.

#### FRONT PANEL

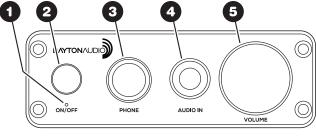
#### 1. Power LED

Indicates the unit is receiving power and is fully operational.

## 2. Power On/Off Button

Press the power switch IN to power the unit ON. Press the power switch

again (OUT) to power the unit OFF.



# 3. Headphone Jack

The DTA30HP doubles as a headphone amplifier that will drive any headphone easily. The  $\frac{1}{4}$ " stereo jack allows connection of standard home and studio style headphones. An adapter can be purchased separately that will allow 3.5 mm personal style headphones to be used. When headphones are plugged into the headphone jack the speaker outputs are disabled.

# 4. 3.5 mm Audio Input

The unit features a convenient front mounted 3.5 mm stereo input for quick connection of iPods, MP3 players, and other portable audio devices. A 6" 3.5 mm coiled cable that stretches to 12" is included. When a device is plugged into the 3.5 mm audio input the rear mounted RCA input jacks are disabled. This allows you to permanently connect a device to the rear RCA audio inputs and switch to a portable device by plugging into the front 3.5 mm input.

#### 5. Volume Control Knob

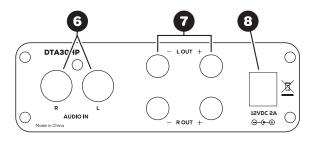
This knob controls the volume level of the amplifier.

NOTE: Prior to powering your amplifier on, please turn the volume control knob all the way to the LEFT. Powering your amplifier on at higher volume may damage your speakers.

#### REAR PANEL

## 6. RCA-Type Audio Inputs

RCA-type line level input for permanent connection of larger devices such as CD players, PCs, and DVD Players. When a device is plugged into the front 3.5 mm input, the RCA input jacks are disabled.



# 7. Speaker Outputs

The speaker output connections utilize high current binding posts that will accept standard banana plug connectors (sold separately). The connectors are color coded for easy polarity identification. If you do not have banana plugs available, the binding posts can be unscrewed and wire can be inserted into the posts and will accept 12AWG to 20AWG wire speaker wire.

## 8. Power Connection

The DTA30HP operates on 12VDC and should be provided with at least 2A. A world compatible (100-240V) 12VDC 2A power supply included with your amplifier is supplied with a USA style cord. Note: If an inappropriate power supply is used and the unit is damaged the warranty will be voided.

### SPECIFICATIONS:

# Class D Stereo Amplifier - TPA3116D2

Power Output: ......15 watts RMS x 2 into 4  $\Omega$  and

Vcc = 12VDC

Total Harmonic Distortion: .....<0.1% @ 1W per channel

Minimum Speaker Impedance: ....4 ohm

Signal-to-Noise Ratio: ......96 dB, A weighted Input Impedance: ......10k ohms (minimum)

Input Sensitivity: ......470 mV

Frequency Response: ......20-20,000 Hz (+/-0.3dB)

# Headphone Stereo Amplifier - TPA6110A2

Output Power: ......150mW
Output Impedance: .....16Ω

## **Power**

Electrical Requirement: ......12VDC @ 2A center pin positive

Dimensions: 1.28 H (Faceplate Height) x 3.82" W x

5.16" D (Knob to RCA)

Weight: ......1.0 lbs

# 5-Year Limited Warranty

See daytonaudio.com for details



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