

Pico Audio Pack (Line-Out and Headphone Amp)







Make some noise with this high quality stereo I2S audio add-on board for your Raspberry Pi Pico, with amplified headphone AND unamplified line level outputs!

Pico Audio Pack uses its PCM5100A DAC to output up to 32-bit, 384KHz stereo audio along its 3.5mm line out connector, ready for plugging into an external amp or powered speakers.

If you're after something a little louder for your ears, it can also pump out amplified stereo audio from its 3.5mm headphone jack.

You could generate interesting noises with code on your Pico to output into a lo-fi synth, or hook your Pico up to another device and use it as a custom USB sound card.

Please note that Pico Audio Pack only currently works with the C/C++ Pico SDK!

*A Raspberry Pi Pico is not included

Your Pico will need to have male headers soldered to it (with the pins pointing downwards) to attach to our add-on boards.

Features

- PCM5100A stereo DAC
- PAM8908JER stereo headphone amp
- 3.5mm stereo headphone jack connector
- 3.5mm stereo line out jack connector
- Switch to adjust headphone amp gain (low / high)
- Pre-soldered female headers for attaching to Pico
- Compatible with Raspberry Pi Pico
- Fully assembled
- No soldering required (as long as your Pico has header pins attached).
- Dimensions: approx 53mm x 29mm x 11mm (L x W x H, including headers and audio jacks)
- Programmable with C/C++ (https://github.com/pimoroni/pimoroni-pico)

The labels on the underside of Pico Audio will show you which way round to plug it into your Pico - just match up the USB port with the markings on the board.

Pinout

Pico Audio Pack provides a high quality stereo DAC which uses **I2S_DATA**, **I2S_BCK**, and **I2S_LRCK** to receive audio data.

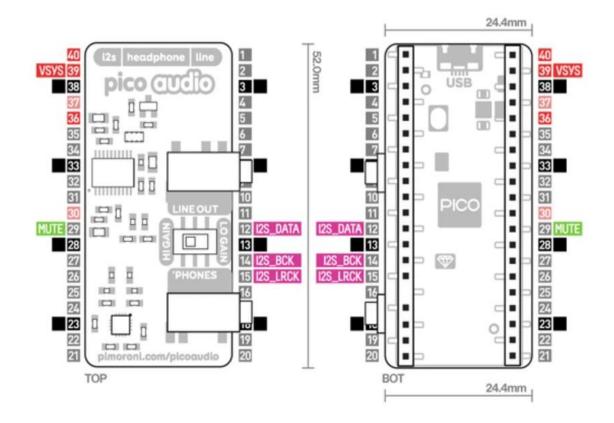
We also offer a **MUTE** pin which can be used to silence the output.

You can use Pico Audio Pack with the I2S audio examples provided by Raspberry Pi in their <u>experimental examples</u> (https://github.com/raspberrypi/pico-playground) usb_sound_card and sine_wave_i2s.

You'll need to **#define PICO_AUDIO_I2S_DATA_PIN** and **PICO_AUDIO_I2S_CLOCK_PIN_BASE** to 9 and 10 respectively to tell the examples which pins are being used for the audio data.

Pico Audio Pack

Pins and Dims



About Raspberry Pi Pico

Raspberry Pi Pico is a flexible, low cost microcontroller development board from the folks at Raspberry Pi, based on their very own chip - the RP2040. It's easily programmable over USB with C/C++ or MicroPython, and ideal for using in all sorts of physical computing projects, devices and inventions.

Description	Mftr Part No.	OKdo SKU	RS SKU	Allied SKU
Pico Audio Pack	PIM544	XXXXXXX	xxx-xxxx	XXXXXXXXX





