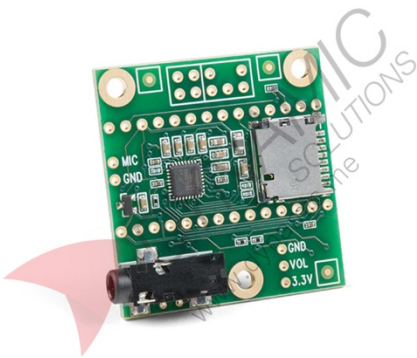


Audio Adapter Board Rev D2 SGT5000 for Teensy 4



Features:

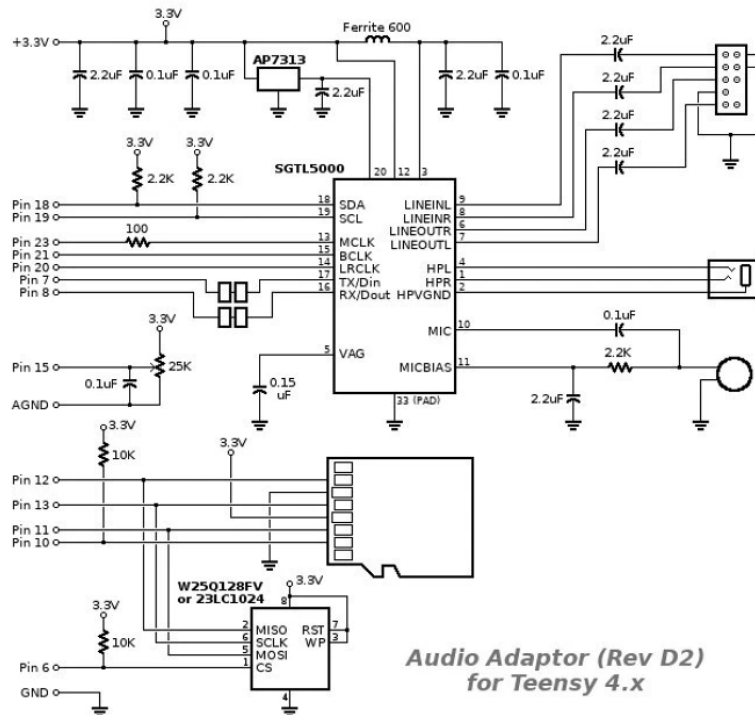
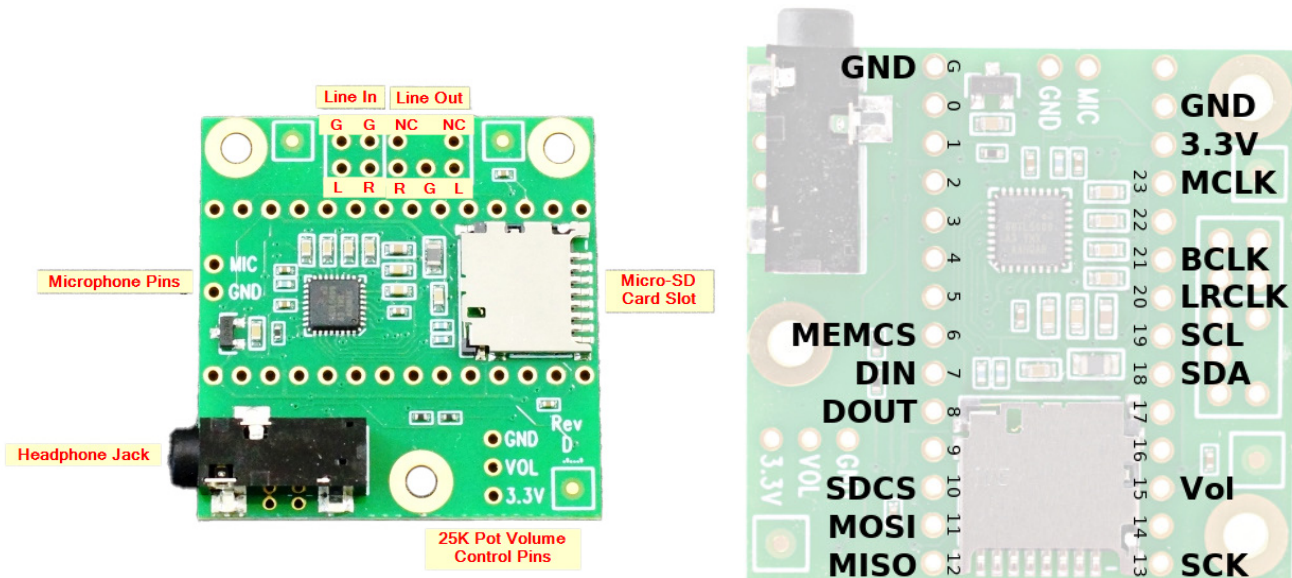
The Audio Adapter Shield SGT5000 Rev D2 is designed by PJRC for Teensy 4.0 and 4.1 microcontrollers. It integrates the SGT5000 stereo codec with built-in headphone amplifier to provide CD-quality 16-bit 44.1kHz audio input and output. Supporting uncompressed WAV/RAW playback, 4-channel mixing, and the Teensy Audio Library, it enables real-time synthesis, effects, and FFT analysis. Onboard peripherals include a 3.5mm headphone jack, Micro-SD card slot, and optional spaces for flash memory or a potentiometer-based volume control. Its pin mapping aligns seamlessly with Teensy 4.x boards, making it an essential accessory for advanced audio development and DSP projects.

Specifications	
Codec IC	SGTL5000 Stereo Codec with Headphone Amp
Sample Rate	44.1 kHz
Bit Depth	16-bit
Audio Channels	Stereo input and output
Audio Jack	3.5mm headphone output
Mixer	4-channel software mixer
Storage	Micro-SD card slot
Optional Components	25k potentiometer (volume), flash memory chip
Connectivity	2x 14x1 headers (not included)
Compatibility	Teensy 4.0, Teensy 4.1
Usage	Audio processing, effects, synthesizers, and playback systems

Pinouts:

Pin Name	Type	Description
MCLK (23)	Audio	Audio Master Clock, 11.29 MHz
BCLK (21)	Audio	Audio Bit Clock, 1.41 or 2.82 MHz
LRCLK (20)	Audio	Audio Left/Right Clock, 44.1 kHz
DIN (7)	Audio Output	Audio Data from Teensy to Audio Shield
DOU (8)	Audio Input	Audio Data from Audio Shield to Teensy
SCL (19)	Control (I2C)	I2C Control Clock
SDA (18)	Control (I2C)	I2C Control Data
SCK (13)	Data (SPI)	Data Storage Clock for SD/MEM
MISO (12)	Data (SPI)	Data from SD/MEM to Teensy

MOSI (11)	Data (SPI)	Data from Teensy to SD/MEM
SDCS (10)	Chip Select	SPI Chip Select for SD Card
MEMCS (6)	Chip Select	SPI Chip Select for Memory Chip
Vol (15/A1)	Analog Input	Volume potentiometer control (optional)



Product Pictures:

