



ReSpeaker Mic Array v2.0

SKU 107990053

Product Details

The ReSpeaker Mic Array v2.0 is a hardware-based solution for creating or adding voice-interface to your projects. The board is a far-field microphone array device capable of detecting voices up to 5m away even with the presence of background noise. The onboard hardware-enabled algorithms are powered by the XMOS XVF-3000.

Several improvements have been made since the original ReSpeaker Mic Array v1.0. The first thing you may notice is the reduction of microphones. With the improved performance of the XMOS XVF-3000, including the improved full duplex AEC, we've been able to deliver increased performance with fewer microphones, and thus a lower cost.

Pick Up Voices From Far Away

- Far-field voice capture enables you to capture and understand requests from up to 5m away

Focus On The Right Voice

- DoA allows the device to know the direction of a source
- BF allows the device to focus only on sounds that come from the target direction
- Ignore background noise and chatter through NS

Improved Voice Audio Quality

- Reduces environmental voice echo with de-reverberation
- Remove current audio output with AEC

When it comes to development we believe you should have as many options as possible. The ReSpeaker Mic Array v2.0 is able to work with most modern Linux, macOS, and Windows systems.

Technical Specifications

- XVF-3000 from XMOS
- 4 High Performance Digital Microphones
- Supports Far-field Voice Capture
- Speech Algorithms On-Chip
- 12 Programmable RGB LED Indicators
- Microphones: MEMS MSM261D4030H1CPM
- Sensitivity: -26 dBFS (Omnidirectional)
- Acoustic Overload Point: 120 dB SPL
- SNR: 63 dB
- Power Supply: 5V DC from Micro USB or Expansion Header
- Dimensions: 70mm (Diameter)
- 3.5mm Audio Jack Output Socket

Applications

- USB Voice Capture
- Smart Speaker
- Intelligent Voice Assistant Systems
- Voice Recorders
- Voice Conferencing System
- Meeting Communicating Equipment
- Voice Interacting Robot
- Car Voice Assistant
- Other Voice Interface Scenarios
- **Technical details**

Dimensions	70mm x70mm x13.3mm
Weight	G.W 70g
Battery	Excluded