



Overview of Audio and Video Apps - Android

The number of Apps record stereo sound on Android phones using the SP15C USB-C Spatial Microphone. The Android connects to SP15C with a standard USB C to C cable. Older generation Androids use a microB connector, which requires an OTG Adapter Cable. You must use an OTG type cable. The charging cable that came with the phone will not work.

This manual describes each App's functions for making an original audio recording. Many of the Apps have additional signal processing functions (editing, equalization, dynamics) that are not addressed here. For details about these functions, please consult each App's Instruction Manual. We give you the URL for each developer's website where you can find additional information.

Each App is the creation of an individual developer. There are no industry standards for audio recording on mobile devices, so you'll find the User Interface (UI) as well as the signal processing varies widely between Apps. Some Apps will take over control of Sonic Presence's internal Digital Signal Processing (DSP) in unexpected ways. We'll try to point these out in the following descriptions of each App.

One Android function we find very handy is the "lock screen" button. It's the button on the top right edge of your phone also called the Power Button. When any of these Audio Apps are running, pressing "lock screen" will lock all controls and shut off the screen. The Audio App keeps running. Now you can put the phone in your pocket and not have to worry about accidentally hitting a wrong button. To exit "lock screen" mode, hit the "Home" button. That will return you to the Audio App screen.

The International standard for testing microphone output level is 94dB Sound Pressure Level (SPL), which is equal to a pressure of 1 Pascal. That is loud! When we do our final testing of the Sonic Presence Spatial Microphones however, we do it at an even higher level of 120 dB SPL. That is as loud as it gets at a heavily amplified Rock Concert. Our reason for this choice is to guarantee you will not have any distortion caused by the microphone. If there is distortion in your recording, it's probably because the App's Mic Volume is not set correctly.



The way you set the Mic Volume is by watching the colors displayed on the meter scale. You want to set the Volume so the meters show green most of the time, yellow some of the time, and red only once in a while when the sound reaches its peak loudness.



Recommended Audio Formats:

Quality	Ultra	High	CD	Good	Fair
Sampling	96kHz	48kHz	44.1kHz	44.1kHz	44.1kHz
Word Size	24bit	24bit	16bit	16bit	16bit
Format	PCM	PCM	PCM	AAC	MP3
Bit Rate	4,608kbps	2,304kbps	1,411kbps	320kbps	128kbps

App Comparison Table:

Android	Audio Recording Apps			Video Apps with Stereo Sound	
		USB Audio			
	Field Recorder	Recorder PRO	Motiv Audio	Motiv Video	Open Camera
Functionality	Advanced	Intermediate	Intermediate	Intermediate	Intermediate
SP15 Microphone					
Indicator	Y	Y	Y	Y	N
Meters					
Visibility	excellent	very good	very good	good	no meters
Calibrated	Y	Y	Y	N	N
Accuracy	excellent	good	good	ok	N
PPM	Y	Y	Y	Y	N
VU	N	N	N	N	N
Mic Volume Control	N	Y	Y	N	N
Sampling Frequencies					
96kHz	Y	Y	Y	N	N
48kHz	Y	Y	Y	Y	?
44.1kHz	Y	Y	Y	Y	?
Others	Y	Y	Y	N	N
Word Size in bits	16/24	16/24	16/24	16/24	16
Digital File Types					
WAV/PCM	Y	Y	Y	N	N
AAC	Y	N	N	Y	Y
MP3	Y	N	N	N	N
Time Display	Y	Very Large	Y	Y	Y
Waveform Display	Y	N	Y	N	N