Data storage of audio files from SongMeter 2+ (ARU)

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After an ARU/remote broadcast sampling event, transfer raw recordings from the SD cards to duplicate 2+ TB external hard drives for backup and analysis.

The recordings generated by a SongMeter SM2+ include the start time of the recording using the naming convention PREFIX_C_YYYYMMDD_hhmmss.wav, where PREFIX is the programmed location prefix, and C is the channel (0 - left; 1 - right) for stereo recordings. If using the Black Rail SongMeter 2+ (ARU) programming SOP, the location prefix follows a <ARU ID>-<established point ID> naming convention. Additionally, the SongMeter will record continuously but create two recordings, one per channel, every 2 hours.

For example, consider the first two audio files generated during an ARU survey at point CDR4H with SongMeter IM06, with the recording session beginning at 10:00 PM (22:00:00) on 15 April 2019. The programmed location prefix would be IM06-CDR4H. The first 2 hour long files would thus have names similar to IM06-CDR4H_0_20190415_220000.wav for the left channel and IM06-CDR4H_1_20190415_220000.wav for the right channel. Subsequent files would be named similarly but with different time stamps.

Raw recording transfer, organization, and storage

- 1. Access the raw audio (.wav) recordings on the SD card(s) in the SongMeter. The SongMeter creates files under a directory called Data.
- 2. Select the approximately 60 96 .wav files in the Data directory and move them to the YYYY_ARU_files directory on both external hard drives, where YYYY is the current year.
 - a. A single 2 hour recording using the Black Rail SongMeter 2+ (ARU) programming SOP settings should be approximately 315 MB. Note there will be two 2-hour files for each time stamp, one for each microphone channel.
- 3. Record pertinent recording end date and file number information for each channel in the ARU deployment data sheet.
- 4. After confirming the files were copied successfully to both external hard drives, the contents of the SD card may be deleted. The SD card can now be used for another deployment.