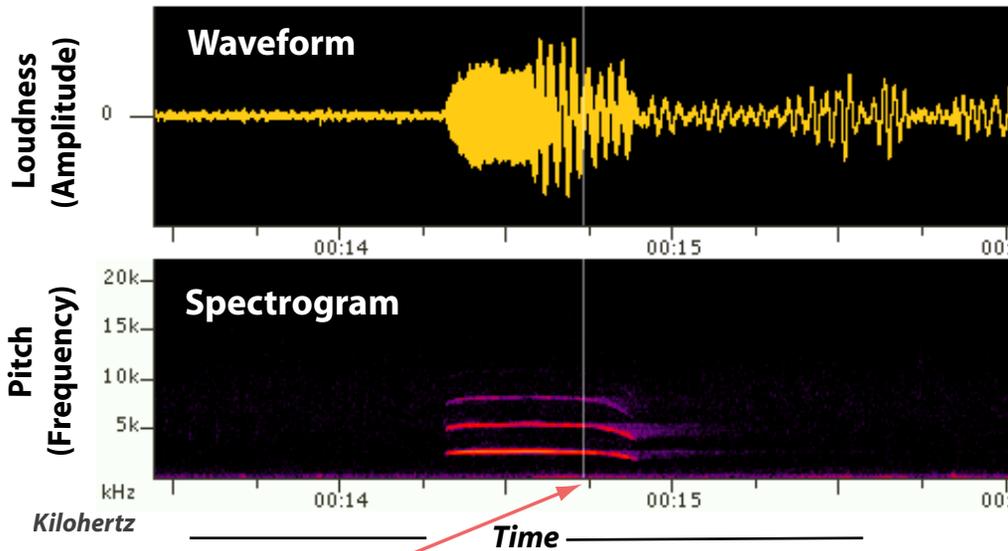


Download Raven Viewer:
<http://macaulaylibrary.org/raven-viewer>

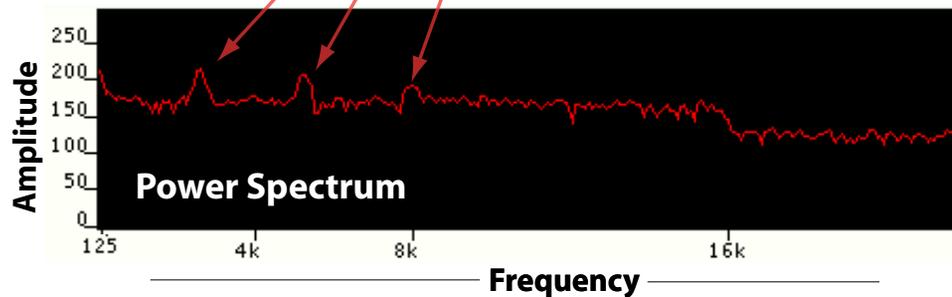
- **Audio**

Macaulay Library's Raven Viewer

Striped Owl - *Pseudoscops clamator*

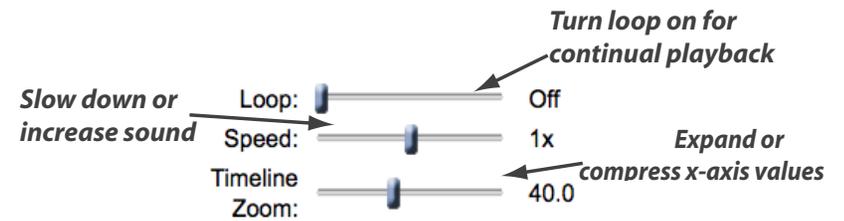


Notice: The most prominent frequencies in the sound at the indicated time are appear below 16,000 Hz where peaks exist at around 2.5k, 5k, and 8k Hz



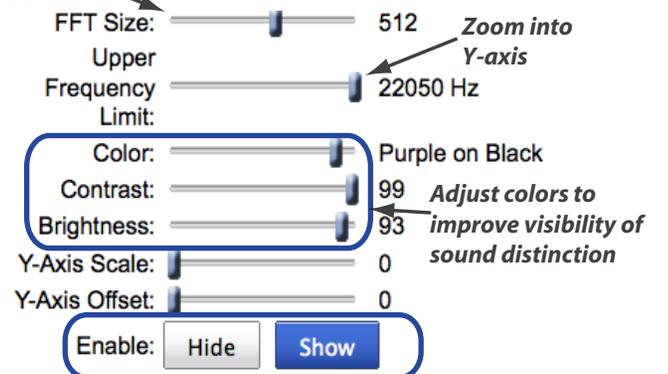
The **Power Spectrum** graph takes a snapshot of pitch frequency at the given moment of time and displays the amplitude of the frequency at that time.

Raven Viewer allows you to examine the unique characteristics of an individual bird call in ways more quantifiable than by ear. The **Waveform** graph allows for visual comparison of the amplitude. The **Spectrogram** displays the frequencies of the call over the time of the call using the various levels of brightness and contrast to help portray the pitch. The **Power Spectrum** portrays slices of information on sound frequency depicted by the Spectrogram. These types of sound information tools allow scientists or anyone else to investigate differences in bird sound among different species, sexes, ages, etc.



Spectrogram Tab

Changes the frequency vs. time resolution

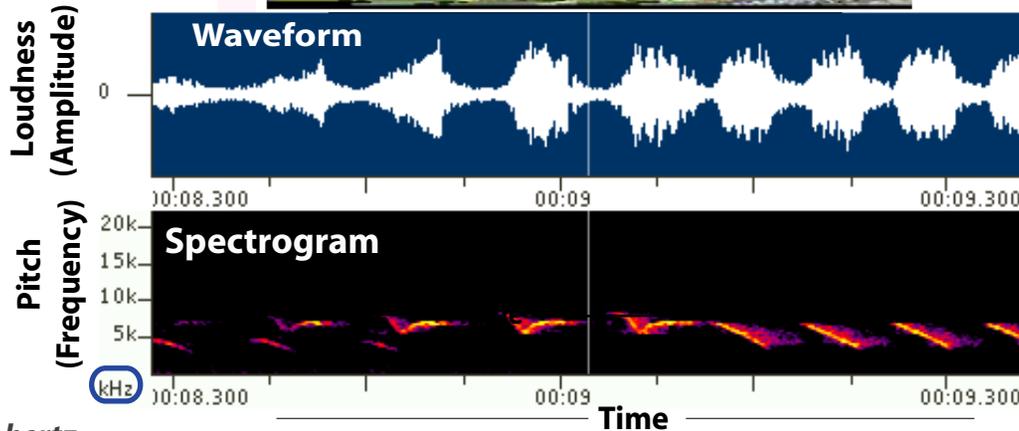


Hide or show the Waveform, Spectrogram, or Power Spectrum graph at any time.



At-a-glance guide to RavenViewer

- Video



Kilohertz
1000 Hertz (cycle/second)
=1 Kilohertz



Beginning Rewind Play Stop FastForward

Waveform **Spectrogram** PowerSpectrum Audio Video CatalogRecord Media Display

Click on Waveform to adjust Amplitude or color

(not shown) allows you to look even closer at the amplitude of the sound frequencies

Basic Controls

Slow down or increase sound

Loop: Turn loop on for continual playback

Speed: 0.25x

Timeline Zoom: 72 Expand or compress x-axis values

Mouse Time: 00:00:10.205

Hover mouse over graphs

Spectrogram Tab

Change frequency vs. time resolution

FFT Size: 512 Zoom into Y-axis

Upper Frequency Limit: 22050 Hz

Color: Purple on Black

Contrast: 100

Brightness: 30 Adjust colors to improve visibility of sound distinction

Y-Axis Scale: 0

Y-Axis Offset: 0

Enable:

Hide or show the Waveform, Spectrogram, or Power Spectrum graph at any time.