



This activity is made possible through a partnership between ASU-Mountain Home's Teacher Education program and Friends of the North Fork & White Rivers.

## Sound Waves on the Trail

**Grade Level:** 3-5

**Subject:** Physical Science

**Standard:** 4-PS4-1 Develop a model of waves to describe patterns in terms of amplitude and wavelength and that waves can cause objects to move.

1. While on the trail you will come in contact with a variety of sounds. These sounds will vary in sound wavelength and intensity.
2. This video will give you Information on the differences in sounds: [What Is Sound?](#)
3. This link will take you to a spreadsheet where you can document the sounds you heard and see what other hikers have found: [Seen on the Trail](#)
4. While walking you may come across the metal butterfly rest area. This will allow you to experiment with sound. Using the drumstick, hit the smaller wing. Then after taking note of the sound it produces, hit the larger wing and compare. Discuss the frequency of the waves of energy traveling through the differing wings, if you have someone with you.



a. Test your knowledge! This [link](#) will take you to a quiz to test your sound wave knowledge!