



Year: 4

Subject: Science

Title:
Sound

What key knowledge do I need to have before this unit?

- Sound is something that we hear
- We hear sound through our ears
- Sound is the noise that something makes

Key outcomes:

What I need to know by the end of this unit of work:

- 1) sounds are made when objects vibrate
- 2) sound reaches the ear and different parts of the ear allow us to hear sounds
- 3) the intensity, or loudness, of sound is measured in decibels
- 4) louder sounds have bigger vibrations and quieter sounds have smaller vibrations
- 5) pitch refers to how high or low a sound is
- 6) explore whether distance has an effect on the volume of a sound

Key knowledge:

We hear sounds because an object vibrates. These vibrations then travel through the air (or another medium) to our ears

Sounds can travel through air, but they can also travel through any material, including solids and liquids.

Key Vocabulary and Definitions:

- **vibration** – a quick back-and-forth movement
- **ear** – an organ in humans (and many other animals) that detects vibrations, allowing hearing
- **sound** – vibrations that travel through the air, or another medium, and are heard when they reach an ear
- **volume** – how loud or quiet a sound is
- **pitch** – how high or low a sound is
- **decibel (dB)** – a measure of the loudness of a sound
- **background noise** – any type of noise that is not the sound that you are listening to or measuring