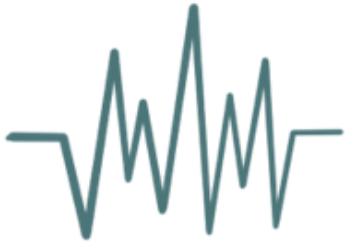
Year 4 - Term 1 Science What is sound?

Curriculum Key Question: Where are we going?

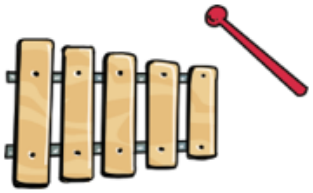
Working Scientifically Skills	**asking relevant questions** and using different types of **scientific enquiries** to answer them;	setting up **simple practical enquiries**, **comparative** and **fair tests**;	making **systematic** and **careful observations** and, where appropriate, taking accurate **measurements** using **standard units**, using a range of **equipment**, including **thermometers** and **data loggers**;	**gathering**, **recording**, **classifying** and **presenting data** in a variety of ways to help in answering questions;	**recording findings** using simple **scientific language**, **drawings**, **labelled diagrams**, **keys**, **bar charts**, and **tables**;	**reporting** on findings from enquiries, including **oral** and **written explanations**, **displays** or **presentations** of results and conclusions;	using results to **draw** simple **conclusions**, make **predictions** for new values, **suggest improvements** and raise further **questions**;	identifying **differences**, **similarities** or **changes** related to simple scientific ideas and processes;	using straightforward **scientific evidence** to answer questions or to support their findings.

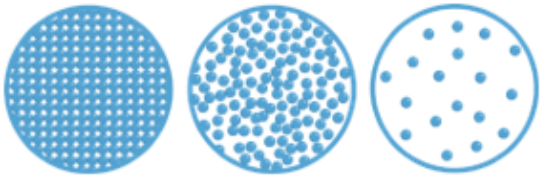
Sounds are made when objects vibrate. The **vibration** makes the air around vibrate, and the air vibrations enter your **ear.** You hear the **vibrations** as **sounds.** You cannot always see the vibrations, but if something is making a **sound,** a part of it is vibrating. The **vibrations** travel in all directions and they don't travel in **straight lines.**



Sounds can be **high** or **low.** We call this the pitch. The pitch of a sound is how high or low the **sound** is. A high sound has a high pitch and a low sound has a low pitch. The pitch of a sound is due to how many times the object **vibrates** each second. The higher the number of vibrations the higher the **pitch.**

We can change the **pitch** of the **sound** we make on different **instruments.**





solid	liquid	gas

The vibrations caused by the sound can travel through the air **(gas)** but can also travel through **liquids and solids.**

Key Vocabulary

ear – the organ used to hear

noise – a sound – usually unwanted or unpleasant

pinnae – the outside flaps of the ear which help 'catch' the vibrations

pitch – how high or low a sound is

sound – vibrations that travel through the air and other mediums and can be heard

vibration – very quick movements

volume – how loud or quiet a sound is