



vibrations



The movement of particles back and forth

wave



vibrating forms of energy that are made of molecules and look like waves.

Outer Ear



The part of the ear you can see.

Middle ear



an air-filled cavity that contains the stirrup, hammer and anvil

inner ear



The inner ear has the cochlea.

pitch



how high or low the sound is

amplitude



The volume of a sound. How quiet or loud a sound is.

insulate



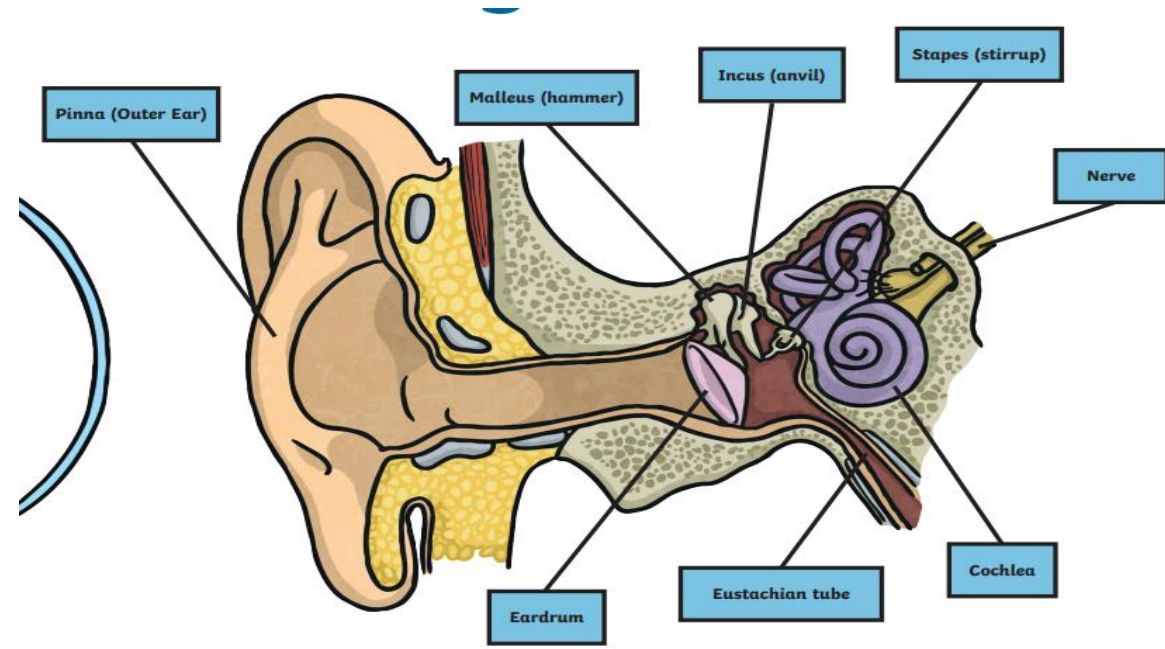
A barrier to stop sound

When objects **vibrate**, a sound is made. The vibration makes the air around the object vibrate and the air vibrations enter your ear. These are called **sound waves**. If an object is making a sound part of it is vibrating, even if you cannot see the vibrations.

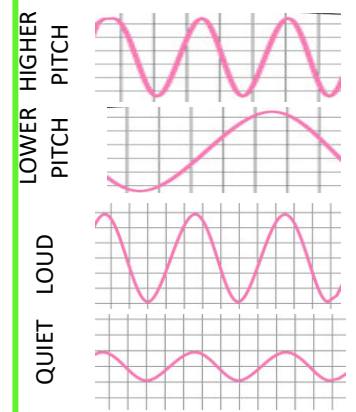


Sound waves travel through a medium (e.g. air, water, glass, stone and brick).

The sound waves travel to the ear and make the ear-drum vibrate. Messages are sent to the brain which recognises the vibrations as sound.



The pitch of a sound is how high or low it is. A squeak of a mouse has a high pitch. The roar of a lion has a low pitch. A high pitch sound is made because it has a high frequency. The sound source vibrates many times a second



The volume of a sound is how loud or quite it is. Quieter sounds have a smaller amplitude and less energy (smaller vibrations) and louder sounds have a bigger amplitude and more energy. The closer we are to a sound source the louder it will be.