

OBJECTIVE	MILESTONE INDICATORS	BASIC ACTIVITIES	ADVANCED ACTIVITIES	DEEP ACTIVITIES	RESOURCES
<p>Session 1</p> <p>To explore children's existing ideas about how sound is made and how it travels, asking relevant questions.</p>	<p>To observe and name a variety of sources of sound, noticing that we hear with our ears.</p>	<p>To make a list of sources of sound that are quiet and loud.</p>	<p>To explain how the sound is made when hitting a chime bar and how that sound enters our ears.</p>	<p>To prioritise the sounds listed in the basic activity from loudest to quietest.</p>	<p>DWBs+Pens Science books Chime bars x4 Sound effects CD</p>
<p>Session 2</p> <p>To understand that sound travels out in all directions.</p> <p>To record ideas in annotated drawings.</p>	<p>To ask relevant questions.</p> <p>To report on findings from enquiries, including oral and written explanations, displays or presentations of results and conclusions.</p>	<p>To describe how sound travels with an annotated drawing.</p>	<p>To summarise the water/pipette experiment and how you could change its outcomes to achieve different effects.</p>	<p>To imagine you are on a boat and you can see the wake. Does the wake go on forever? Why/Why not?</p>	<p>Chime bar Slinky springs x4 Video Containers Pipettes Science books</p>
<p>Session 3</p> <p>To recognise that sound is the result of vibrations.</p> <p>To recognise that pitch and sound can affect a vibration.</p>	<p>To identify how sounds are made, associating some of them with something vibrating.</p> <p>To recognise that vibrations from sounds travel through a medium to the ear.</p>	<p>To describe in books how vibrations are caused in each of the five activities set up as bases.</p>	<p>To modify the way in which you conduct each experiment; make observations and compare with previous results.</p>	<p>To decide which experiment produced the greatest vibrations and which produced the least and justify your answers.</p>	<p>Video. Science books Containers x6 Cling film, Rice Ping pong balls, String Tuning forks x4 Cymbal, Soft beater Wire coat hangers</p>

<p>Session 4</p> <p>Does sound have the same intensity the further away you go from the source?</p>	<p>To set up simple, practical enquiries and comparative and fair tests.</p> <p>To record findings using simple scientific language, drawings, labelled diagrams, bar charts and tables.</p>	<p>To describe how sounds become fainter the further away you are from its source.</p>	<p>To identify which instrument can be heard the furthest away from a partner with detailed measurements.</p>	<p>To imagine you are in space. <i>Can sound be heard in space?</i> Why or why not?</p>	<p>Blindfold</p> <p>Metre sticks</p> <p>Musical instruments</p> <p>Science books</p> <p>DWBs+Pens</p>
<p>Session 5</p> <p>To understand that sound can travel through solids.</p>	<p>To ask relevant questions.</p> <p>To report on findings from enquiries, including oral and written explanations, displays or presentations of results and conclusions.</p>	<p>To follow instructions to create a string telephone.</p>	<p>To observe the effects of speaking into cups and predict and test what will happen with longer lengths of string.</p>	<p>To determine the furthest effective distance that can be achieved for clear communication using a variety of resources.</p>	<p>Powerpoint</p> <p>IWB</p> <p>Video</p> <p>Different cups</p> <p>Different strings</p> <p>Selotape</p> <p>DWBs+Pens</p> <p>Science books</p>
<p>Session 6</p> <p>To recognise high and low pitch.</p> <p>To understand that volume is linked to the strength of vibrations.</p>	<p>To ask relevant questions.</p> <p>To use results to draw simple conclusions and suggest improvements, new questions and predictions for</p>	<p>To describe the differences between volume and pitch.</p>	<p>To modify the amounts of water in bottles to create a melody when hit with a wooden spoon.</p>	<p>To discuss how and why differently filled bottles produce different sounds when the bottle is the same in each case.</p>	<p>Sound level meter</p> <p>Video</p> <p>20 glass bottles</p> <p>Big tubs to hold water</p> <p>5 wooden spoons</p> <p>Science books</p>

To create a performance.	setting up further tests.				
Session 7 To understand that greater vibrations produce greater sounds. To design a poster illustrating their learning over the half-term.	To gather, record, classify and present data in a variety of ways.	To use this term's knowledge of sound to create a poster of their learning.	To make small observations under each bit commenting on the learning they took from that activity.	To recommend the best method for learning about sound and justify their answer.	Air cannon with targets A3 paper

Prompts for when planning activities

Basic- Name, describe, follow instructions or methods, complete tasks, recall information, ask basic questions, use, match, report, measure, list, illustrate, label, recognise, tell, repeat, arrange, define, memorise.

Advanced- Apply skills to solve problems, explain methods, classify, infer, categorise, identify patterns, organise, modify, predict, interpret, summarise, make observations, estimate, compare.

Deep- Solve non-routine problems, appraise, explain concepts, hypothesise, investigate, cite evidence, design, create, prove.