



ASSEMBLY on sound

Your class would probably prefer to write their own assembly with their own ideas and findings. The text of this assembly is included here to give you a starting point and a possible structure. After that, your children will have their own ideas!

Organisation and planning For this assembly the children were organised in friendship groups. The teacher orchestrated a whole-class brainstorming session on sound, and noted ideas on the board. These ideas were then assigned to groups for researching and script-writing. Most of the ideas were taken from the current half-term's science work. The teacher's role was to direct the brainstorming session, ensuring that a range of ideas was included and that the ideas were organised in an appropriate order. Finally, she checked the content for clarity and accuracy. In preparation for the assembly, the children took a tape recorder around the school and taped various sounds and people.

The assembly

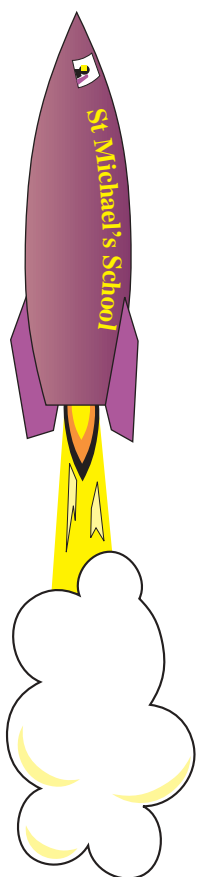
The class enters the hall and parades around between the rows of children in the audience, making a range of sounds, e.g. banging a tambourine, shouting, blowing a whistle, etc. They make their way to the front of the hall and become silent.

Group 1 Introduction

'Welcome to our assembly. You have just been listening to some of the sounds we can make. We hear sounds everywhere from the moment we are born. Only very deaf people do not hear sounds.'

Sound tells us what is happening around us. It can be used to send messages or to warn us of something.

Sound is measured in decibels.'



The children hold up POSTERS they have made illustrating two or three examples. These children chose:

- 20 dB is the measurement of whispering or birds singing
- 50 dB is shouting
- 80 dB is a road drill or a motor bike
- 140 dB is a rocket going to the moon

Group 2 Vibrations

'When something makes a noise it makes the air move. These movements are called vibrations. We did some experiments to try and see the vibrations.'

We used a tuning fork and table-tennis ball on a piece of cotton. You hit the tuning fork on the table and then touch it on the ball. The ball will bounce backwards and forwards. This shows that the ends of the tuning fork are shaking.'

The children demonstrate this.

Group 3 More vibrations

'We did another experiment with some little stones on a drum. If you tap the drum softly you can see the stones jump about as the drum vibrates.'

The children demonstrate this.

'Sound travels through the air in waves that move like this.'

Two children use rope to show the wave effect.

'If the waves are close together the sound is high.

If they are far apart the sound is low.

If the waves are deep the sound is loud.

If they are shallow the sound is soft.

The sound waves go into your ears, then you hear the sounds.'

Group 4 The Pea Pod poem

At this point a group of five act out the Pea Pod poem, by Eroll Crisp.

The Pea Pod

Five little peas in a pea pod pressed

One grew and two grew and so did all the rest.

They grew and grew and did not stop

Until one day the pod went POP!

The children are hidden behind a table turned on its side. Each is holding an inflated green balloon. As the children say *'One grew and two grew, etc.'* they show part of each balloon, one at a time. As the poem progresses to *'they grew and grew'* the children poke the whole balloons up above the table.

At the end of the poem, when they say *'until one day the pod went POP'*, the children burst their balloons with pins.



Group 5 The structure of the ear

'The ear is made up of three parts.'

The children hold up a large, coloured simple diagram of the ear.

'The outer ear is the flap of skin that helps collect the sounds. It is the part of the ear that you can see on the outside of your head.'

They show their ears.

'Sound travels down the ear canal to the ear drum.'

The children then hold up a hammer, an anvil and a stirrup. If you cannot get hold of the real thing pictures will do.

'Did you know that you have all these things inside your ear?'

They show each in turn.

'Sound makes the ear drum vibrate. Next to the ear drum are three tiny bones called the hammer, anvil and stirrup.'

When the ear drum moves it makes these little bones vibrate. The vibration goes through to the inner ear.'

The inner ear looks like a snail shell. It sends messages to the brain so that the brain can recognise the sounds we have heard.'

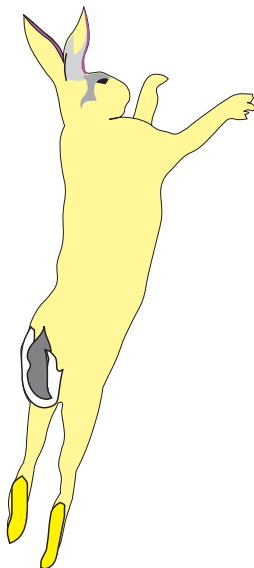


Group 6 Animal ears

The children hold up posters of different animal ears they have drawn.

'Animals have different shaped ears. Elephants have big ears. Mice have small ears. Some animals turn their ears to catch the sounds they want to hear. Rabbits have long ears so they can listen carefully to keep themselves safe from foxes, dogs or people. Hares have long ears like rabbits. Dogs have long ears or pointy ears. Foxes have pointed ears.'

At this point children read out poems about ears, hearing and sounds written by the children.



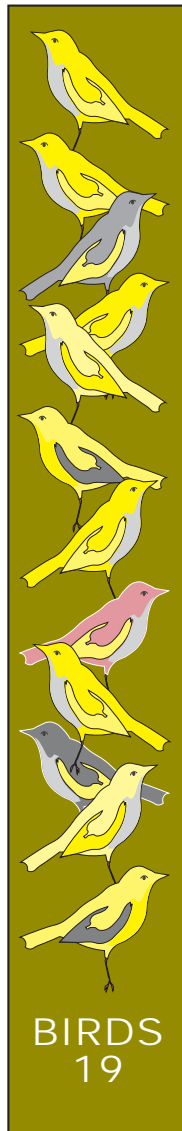
Group 7 Talking

'When you are a baby you talk but you only make sounds. When you get a bit older you start to say things like 'gaga'. When you are about three you start to say proper words.'

When you talk you use your voice box, which has two vocal chords like strings. These vibrate to make the sounds that you need to say words.'

At this point the children read a poem on sound they have found in an anthology, or on the Internet, for example *'I speak, I say, I talk'*, by Arnold Shapiro.

As they say the poem other group members illustrate the relevant parts with their own pictures.



Group 8 Sound survey

'We did a class survey on the sounds we liked most and the sounds we hated most.'

'This is a bar chart of our favourite sounds. They are ...'

The children hold up the bar chart and list the sounds they like.

'The sound we liked most was birds singing. Nineteen people voted for that. Is there anyone else in the hall who likes birds singing?'

'This is a bar chart of the sounds we do not like. They are ...'

The children hold up the bar chart and list the sounds they dislike.

'The sound we hated most was snoring. Twenty-two people voted for that. Is there anyone else in the hall who hates snoring?'

'See if you like some of these sounds we have been making in our classroom.'

The children hold up and name each instrument, and the sound it makes, and then hold up a flash card with their description of the sound produced.

Instrument

Flash card word

guitar	ping
violin	screech
recorder	toot
trumpet	toot
drum	bong
keyboard	plink-plonk

Group 9 Sound travelling through gas and solids

'You have been able to enjoy all those lovely sounds because the sound waves travel through the air to your ears. Air is a gas so we know that sound can travel through gas.'

'We did an experiment to show that sound travels better through solid things like the table. You might like to try it later.'

'First you scratch the table gently with your fingernail and listen carefully. The sound is very quiet.'

'Next you put your ear onto the table and scratch again. You must be careful to scratch exactly the same way to make it a fair test. This time the sound travels through the wooden table to your ear. You can hear the scratching sound clearly. The sound is much louder.'

Sounds around school

'We have made a tape recording of some of the sounds around the school.'

After each sound is played the audience is invited to guess what, or who, made the sound.

The assembly finishes with a prayer and a moment of quiet reflection.