

## Science

### - Properties and Changes of Materials:

#### National Curriculum Links:

Pupils should be taught to:

- compare and group together everyday materials on the basis of their properties, including their hardness, solubility, transparency, conductivity (electrical and thermal), and response to magnets
- know that some materials will dissolve in liquid to form a solution, and describe how to recover a substance from a solution.
- use knowledge of solids, liquids and gases to decide how mixtures might be separated, including through filtering, sieving and evaporating.
- give reasons, based on evidence from comparative and fair tests, for the particular uses of everyday materials, including metals, wood and plastic
- demonstrate that dissolving, mixing and changes of state are reversible changes
- explain that some changes result in the formation of new materials, and that this kind of change is not usually reversible, including changes associated with burning and the action of acid on bicarbonate of soda.

#### Learning Outcomes:

Children will be able to:

- Explain that some materials will dissolve in liquid to form a solution, and describe how to recover a substance from a solution.
- Explain some changes of state including that dissolving and mixing processes can be reversed through filtering, sieving and evaporating.
- Explain that some changes form new materials, and that these changes are not usually reversible.
- Explain that some changes, caused by heating or cooling form new materials, and that these changes are often not reversible.
- Explain that changes caused by burning form new materials, and that these changes are not reversible.
- To compare and group together everyday materials on the basis of their properties.
- To give reasons based on evidence from comparative and fair tests for the particular uses of everyday materials.



## Music

### - Dancing in the Street (Sycamore)

### - You've Got a Friend (Larch & Rowan)



#### National Curriculum Links:

Pupils should be taught to:

- Play and perform in solo and ensemble contexts, using their voices and playing musical instruments with increasing accuracy, fluency, control and expression.
- Improvise and compose music for a range of purposes using the inter-related dimensions of music
- Listen with attention to detail and recall sounds with increasing aural memory.
- Use and understand staff and other musical notations.
- Appreciate and understand a wide range of high-quality live and recorded music drawn from different traditions and from great composers and musicians.
- Develop an understanding of the history of music.

## Extreme Earth



## Topic-based English

### - Explanations

### - Fantasy Stories (Dear Greenpeace / Tales from Outer Suburbia)

### - Picture Books (Flood)

#### National Curriculum Links:

Pupils should be taught to:

- Continuing to read and discuss an increasingly wide range of genres.
- Develop positive attitudes to reading and understanding of what they read by increasing their familiarity with a range of books and text types.
- Discuss the words that capture the readers interest.
- Explain and discuss their understanding of what they have read.
- Retrieve and record information from fiction and non-fiction books.
- Identify the audience for and purpose of a piece of writing.
- Plan, draft, write, evaluate and edit their written work.
- Read aloud their own writing, using appropriate intonation and controlling the tone and volume so that the meaning is clear.
- Increase the legibility, consistency and quality of their handwriting.
- Proof read for spelling and punctuation errors

## Art

### - The Great Wave by Hokusai

#### National Curriculum Links:

Pupils should be taught to:

- create sketch books to record their observations and use them to review and revisit ideas
- improve their mastery of art and design techniques, including drawing, painting and sculpture with a range of materials
- give examples of great artists, architects and designers in history

#### Learning Outcomes:

Children will be able to:

- Understand how key events and individuals in design have helped shape the world.
- Investigate woodblock printing and understand how it is used to create an image
- Evaluate their ideas against their own criteria and consider their peers views to improve their work.

## Computing

### - Lemonade Stand (Excel)

#### National Curriculum Links:

Pupils should be taught to:

- use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content
- select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information.
- use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact.

#### Learning Outcomes:

Children will be able to:

- Investigate Excel and why it is used.
- Create Columns, headings and formulas.
- Play simulation games to gather data to insert into cells
- Use Excel to create a line / bar graph to show profit/loss

## PSHE

### - Living in the Wider World:

National Curriculum Links (PSHE Association):

Pupils should be taught about:

Rights and responsibilities: rules and laws; the precedence of human rights over other laws, consequences of anti-social behaviours; rights, responsibilities and duties; resolving difference, making decisions and choices; the range of religious and ethnic identities in the UK; how the media present information

Taking care of the environment: responsibilities towards and how people contribute to communities and the environment; the lives of people living in other places; how the earth's resources are allocated; resolving differences

Money matters: finance; earning money and deductions

## Geography



### - Natural Disasters

P4C - What is a natural disaster?

- What kind of problems do children face after a natural disaster?

National Curriculum Links:

Pupils should be taught to:

- identify the position and significance of latitude, longitude, Equator, Northern Hemisphere, Southern Hemisphere, the Tropics of Cancer and Capricorn, Arctic and Antarctic Circle, the Prime/Greenwich Meridian and time zones (including day and night)
- describe and understand key aspects of physical geography, including: climate zones, biomes and vegetation belts, rivers, mountains, volcanoes and earthquakes, and the water cycle
- describe and understand key aspects of human geography, including: types of settlement and land use, economic activity including trade links, and the distribution of natural resources including energy, food, minerals and water.

Learning Outcomes: Children will be able to:

- Talk about the Earth's climate and areas of extreme temperature
- Explain the water cycle and the distribution of water across the world.
- Talk about extreme weather conditions across the world.

## Religious Education

### - Sikhism: Beliefs and lifestyles

P4C: How far would a Sikh go for their religion?

What is the best way for a Sikh to show commitment to God?

Learning Outcomes:

Children will:

- Know the right words to describe some of the ways Sikhs show their religion is important to them.
- Explain why not all Sikhs practise their religion in the same way.
- Make links between how Sikhs practise their religion and the beliefs that underpin this.
- Use a wide range of religious vocabulary when suggesting reasons for the differences in the ways Sikhs choose to commit to and express their religion.
- Describe some of the ways that Sikhs choose to show commitment to God.
- Describe how different practices enable Sikhs to show their commitment to God and understand that some of these will be more significant to some Sikhs than others.

## Physical Education



### - Gymnastics Coaching and Swimming

### - Yoga and Athletics

National Curriculum Links:

Pupils should be taught to:

- use running, jumping, throwing and catching in isolation and in combination
- play competitive games and apply basic principles suitable for attacking and defending
- develop flexibility, strength, technique, control and balance
- compare their performances with previous ones and demonstrate improvement to achieve their personal best
- swim competently, confidently and proficiently over a distance of at least 25 metres
- use a range of strokes effectively

*(Geography Continued...)*

- Talk about earthquakes and what causes them.
- Talk about tsunamis and how they are caused.
- Talk about volcanoes and how they are formed.

Educational Visit: Dynamic Earth / Edinburgh Castle

## Foreign Languages

### - French: Weather Conditions, Seasons and Reports

National Curriculum Links:

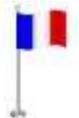
Pupils should be taught to:

- Listen attentively to spoken language and show understanding by joining in and responding
- Explore the patterns and sounds of language through songs and rhymes
- Engage in conversations and speak in sentence, using familiar vocabulary, phrases and basic language structures
- Present ideas and information orally to a range of audiences
- Develop accurate pronunciation and intonation so that others understand when they are reading aloud or using familiar words and phrases
- Present ideas and information orally to a range of audiences

Learning Outcomes:

Children will be able to:

- State the name of different weather conditions
- Describe different weather conditions both orally and in writing
- State the name of different seasons
- Describe the weather conditions associated with each season both orally and in writing
- Present information in the form of a weekly, class weather report



## Outdoor Learning Opportunities:

Science- Investigate changes of state in natural materials and determine if the changes can be reversed.

Foreign Languages:

- Writing, reporting and filming weather reports

Geography:

- Use of outdoor area to explore the movements of tectonic plates and how these can cause earthquakes.

## Maths

National Curriculum Links: (White Rose)

Year 5 – Decimals, Properties of Shapes & Angles, Position & Direction and Converting Units

Pupils should be taught to:

- Solve problems involving number up to three decimal places. Multiply and divide whole numbers and those involving decimals by 10, 100 and 1000. Use all four operations to solve problems involving measure [ for example, length, mass, volume, money] using decimal notation, including scaling.
- Identify 3D shapes, including cubes and other cuboids, from 2D representations.
- Use the properties of rectangles to deduce related facts and find missing lengths and angles.
- Distinguish between regular and irregular polygons based on reasoning about equal sides and angles.
- Know angles are measured in degrees: estimate and compare acute, obtuse and reflex angles.
- Draw given angles, and measure them in degrees
- Identify: angles at a point and one whole turn (total 360o), angles at a point on a straight line and  $\frac{1}{2}$  a turn (total 180o) other multiples of 90.
- Identify, describe and represent the position of a shape following a reflection or translation, using the appropriate language, and know that the shape has not changed.
- Convert between different units of metric measure [for example, km and m; cm and m; cm and mm; g and kg; l and ml]
- Understand and use approximate equivalences between metric units and common imperial units such as inches, pounds and pints.
- Solve problems involving converting between units of time.
- Estimate volume [for example using 1cm<sup>3</sup> blocks to build cuboids (including cubes)] and capacity [for example, using water]
- Use all four operations to solve problems involving measure.

## Maths

National Curriculum Links: (White Rose)

Year 6 – Ratio, Properties of Shapes and Statistics

Pupils should be taught to:

- Solve problems involving the relative sizes of two quantities where missing values can be found by using integer multiplication and division facts.
- Solve problems involving similar shapes where the scale factor is known or can be found.
- Solve problems involving unequal sharing and grouping using knowledge of fractions and multiples.
- Draw 2-D shapes using given dimensions and angles.
- Compare and classify geometric shapes based on their properties and sizes and find unknown angles in any triangles, quadrilaterals and regular polygons.
- Recognise angles where they meet at a point, are on a straight line, or are vertically opposite, and find missing angles.
- Illustrate and name parts of circles, including radius, diameter and circumference
- and know that the diameter is twice the radius.
- Interpret and construct pie charts and line graphs and use these to solve problems.
- Calculate the mean as an average.

## Parliament and Democracy

Learning Outcomes:

Children will:

- Know that MPs work in the House of Commons and Peers work in the House of Lords.
- Be able to describe differences between MPs and Peers, including the fact that MPs are elected.
- Understand that the UK is a democratic country.
- Investigate how MPs campaign before an election.
- Understand what representing means.
- Know that MPs are elected at a general election to represent a geographical area.
- Take part in a democratic election by either running or supporting a candidate.



## Mastering Maths

Politics and Democracy: Read and interpret statistic about General elections.

Geography: Read and interpret Richter scales.

Science: Create, read and interpret data from experiments.

## Mastering English

Geography:

Explanation text: Write a natural disasters survival guide.

Newspaper report: Research, write and present a newspaper report based on a Natural disaster.

Science:

Writing to inform and persuade: Write and present a proposal for a scientific experiment.