

# Science Progression of Skills



## OUR VISION FOR TREWIRGIE INFANTS' SCHOOL

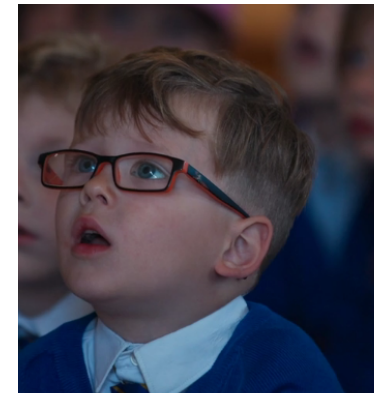
'We care, we help, we succeed'

### OUR MISSION:

- To inspire children to engage in learning, and be valued members of a caring, supportive, and successful school.
- For all our children to develop life-long learning skills; to be independent and creative thinkers and to be socially confident.
- To enable children to be successful through a curriculum that captures their interests, stimulates their ideas, encourages inquisitiveness and critical thinking and meets their needs.

*At Trewirgie Infants' & Nursery School, Science lessons are taught creatively and actively to enthuse and engage our children's interest in the world around them. It follows the National Curriculum aims and objectives but is delivered to suit the level and need of our locality, so every child has a rich experience of investigating, exploring, observing their environment and the science that is embedded into their daily lives from our basic human needs to survive to the modern medicines that save lives.*

*We listen to the questions our children have and equip them with the skills to follow their own lines of scientific enquiry themselves. This enables them to be independent, critical thinkers, weighing up evidence and develop their own opinions in a safe environment.*



## Curriculum statement

<b>INTENT</b> (curriculum design, coverage and appropriateness)	<b>IMPLEMENTATION</b> (curriculum delivery, teaching and assessment)	<b>IMPACT</b> (attainment and progress)
<p>At Trewirgie, we ensure all children develop an understanding of the world around them and encourage an investigative approach which can be applied across the curriculum. Lessons support scientific enquiry and the development of basic scientific language. Children develop independent learning behaviours through choice and challenge, becoming confident, curious and passionate learners. Every child progresses from EYFS to Year Two with a solid base to enter KS2. Children will access a range of scientific equipment and understand how it is used.</p>	<p>Where possible, our Science topics are linked to other cross curricular areas, but children are made aware when they are learning aspects of science and how it is in everything we do. As a school, teachers have access to CPD to improve their confidence and ability to teach science effectively especially using outdoor learning when possible. Children will be assessed at the beginning of each topic to see what they know and again at the end to assess what they have learnt. Progression and coverage are monitored closely to ensure continuation from EYFS to Year Two. Science Leader to ensure the quality of teaching throughout the school, using regular book looks and learning walks to check coverage and progression. Resources are checked to ensure they are suitable, appropriate and useful.</p>	<p>Children will become more inquisitive, have a greater understanding of the world around them and will have the vocabulary to begin to communicate this. They can apply reasoning, enquiry and communication skills to all aspects of their life. Our children will be equipped with the scientific knowledge to enable them to understand the uses of science today and how vital it is to the world's future development.</p>

## Science Working Scientifically

– these skills should be an integral part of all scientific teaching

### *National Curriculum aim:*

Children should be encouraged to be curious and ask questions about what they notice. They should be helped to develop their understanding of scientific ideas by using different types of scientific enquiry to answer their own questions, including observing changes over a period of time, noticing patterns, grouping and classifying things, carrying out simple comparative tests, and finding things out using secondary sources of information. They should begin to use simple scientific language to talk about what they have found out and communicate their ideas to a range of audiences in a variety of ways

EYFS	YEAR 1	YEAR 2
<p><b>C&amp;L - Speaking</b> 30-50 * I can retell a past event in order. * I can question why things happen and give an explanation. 40-60 * I can use talk to organise &amp; clarify my thinking.</p> <p><b>ELG</b> * I can use past, present and future forms correctly when talking about events that have happened. * I can develop my own explanations by connecting ideas and events.</p>	<p>* I can ask simple questions and recognise that they can be answered in different ways. * I can make careful observations using simple equipment. * I can carry out simple tests. * I can use my observations to identify and classify. * I can use my ideas to suggest answers to questions. * I can gather and record data to help in answering questions.</p>	<p>* I can ask simple questions and recognise that they can be answered in different ways. * I can make careful observations using simple equipment. * I can carry out simple tests. * I can use my observations to identify and classify. * I can use my ideas to suggest answers to questions. * I can gather and record data to help in answering questions. * I can say what I think might happen (linking to a fair test). * I can say whether my predictions were supported.</p>

## RECORDING FINDINGS

*All children will have the opportunity to record their science knowledge and understanding in a variety of ways that are suitable to the needs of the individual child.*

*These can be*

- *Using ICT - cameras, speech recording devices, iMovie and similar apps*
- *Drawing & labelling*
- *Scribing by an adult or within a group*
- *Whole class recording using a given format (particularly during experiments and investigations)*
- *Child choice*

	EYFS	YEAR 1	YEAR 2
Autumn		<p><b><u>Everyday Materials</u></b></p> <p>Identify and name a variety of everyday materials, including wood, plastic, glass, metal, water, and rock, describing their properties in order to group them.</p>	<p><b><u>Uses of Everyday Materials</u></b></p> <p>Identify and compare the suitability of a variety of everyday materials, including wood, metal, plastic, glass, brick, rock, paper and cardboard for different uses. Explore how the shapes of solid objects made from some materials can be changed by squashing, bending, twisting and stretching. Discuss inventors linked to materials, for example John McAdam</p>
Spring		<p><b><u>Seasonal changes</u></b></p> <p>Observe changes across the 4 seasons and describe weather associated with the seasons and how day length varies.</p> <p><b><u>Plants</u></b></p> <p>Identify and name a variety of common wild and garden plants, including deciduous and evergreen trees. Describe the basic structure of a variety of common flowering plants, including trees.</p>	<p><b><u>Plants</u></b></p> <p>Observe and describe how seeds and bulbs grow into mature plants. Find out and describe how plants need water, light and a suitable temperature to grow and stay healthy.</p> <p><b><u>Living things &amp; their habitats</u></b></p> <p>Explore and compare the differences between things that are living, dead, and things that have never been alive.</p> <p>Identify that most living things live in habitats and Microhabitats- describe how different habitats provide for the basic needs of different kinds of animals and plants, and how they depend on each other in a food chain.</p>
Summer		<p><b><u>Animals &amp; Humans</u></b></p> <p>Identify and name animals including, fish, amphibians, reptiles, birds and mammals. Identify them into carnivores, herbivores and omnivores. Name, draw and label the basic parts of the human body and say which part of the body is associated with each sense.</p>	<p><b><u>Animals &amp; Humans</u></b></p> <p>Identify that animals and humans, have offspring which grow into adults, looking at life cycles. Find out about and describe the basic needs of animals, and humans, for survival (water, food and air) Describe the importance for humans of exercise, eating the right amounts of different types of food, and hygiene.</p>

## Science

*National Curriculum aim:*

- *To enable pupils to experience and observe phenomena, looking more closely at the natural and humanly-constructed world around them.*

EYFS

YEAR 1

YEAR 2

### PLANTS

ELG \* I can make observations of plants and explain why some things occur.  
\* I can talk about changes.

\* I can identify and name a variety of common wild and garden plants found in Cornwall, including deciduous and evergreen trees.  
\* I can identify and describe the basic structure of a variety of common flowering plants, including trees.

\* I can observe and describe how seeds and bulbs grow into mature plants.  
\* I can find out and describe how plants need water, light and a suitable temperature to grow and stay healthy.

**Intent:** Children will experience planting seeds and caring for plants inside and outside the classroom. They begin to use language to describe plants and identify/name familiar ones. They will begin to talk about how plants change over time and suggest reasons for this.

**Implementation:** Links to developing our outdoor spaces, improving our inside provision, caring for plants in our outdoor areas, regular outdoor learning sessions, visits to the local area as part of our Explorers topic - looking at plants seen on the way.

**Future Learning:** Year 1 - Identifying a variety of common plants in our school and local environment as well as an opportunity to label the basic structure of common flowering plants (and trees)

**Lesson 1 - What do we know about plants? Can we find any plants growing around school?**

**Builds on:** EYFS - will experience planting seeds and caring for plants inside and outside the classroom. They begin to use language to describe plants and identify/name familiar ones. They will begin to talk about how plants change over time and suggest reasons for this.

**Intent:** To recognise and name a range of plants and trees in and around our local area.

**Implementation:** Explore the school grounds to discover and discuss plants that thrive there. Use ICT to photograph what is seen and label observational drawings.

**Future learning:** Y2 - Adaption of plants to suit their habitats.

**Lesson 2 - Can we identify plants that are special to Cornwall?**

**Builds on:** Previous Yr1 lesson on plants.

**Intent:** To recognise and identify plants specific to Cornwall.

**Lesson 1 - What do plants need to grow and survive?**

**Builds on:** EYFS and Y1 - Children have experience of planting seeds, caring for plants and identifying a range of common plants and trees in the local area. They will also describe the different parts of a flowering plant.

**Intent:** To describe what plants need to grow.

**Implementation:** Recapping on previous knowledge about plants and what they need to grow and survive. What a plant needs to thrive and what might happen if these conditions change. This can include how plants thrive in different parts of the world. Plant bean and set up experiment to show different conditions (water, no water, light, no light, etc)

<https://www.bbc.co.uk/teach/class-clips-video/science-ks1-ks2-ivys-plant-workshop-what-do-plants-need-to-survive/zkw2qwx>

**Implementation:** Field trip to 'The Great Flat Lode'; children use their Cornish plant identification key to find local species.

**Future Learning:** Y2 - Adaption of plants to suit their habitats.

**Lesson 3 - What are the 6 main parts of a plant?**

**Builds on:** Previous Yr1 lesson on plants.

**Intent:** To identify and describe the different parts of familiar flowering plants using scientific language (stem, trunk, branch, leaf, root, bud, petal, bulb, seed).

**Implementation:** Teacher to model dissecting a flowering plant under the visualiser; children to follow and dissect their own flowering plant - naming 6 main parts of the flower. (<https://www.science-sparks.com/dissecting-flowers-and-more-plant-experiments/> to support)

\*Link to T4W Jack & Beanstalk by growing seeds and observing changes over time.

**Future Learning:** Y2 - Describe the process of seeds growing into mature plants and find out what plants need in order to thrive.

**Future learning:** Lesson 2 - growing a bean plant.

**Lesson 2 - Who likes gardening?**

**Builds on:** Previous Yr2 lesson on plants.

**Intent:** To set up seed/bean experiment and To observe and describe how seeds and bulbs grow over time.

**Implementation:** Children plant a bean and start a bean diary, describing how it looks and changes on a weekly basis. Teacher to create 'control' beans to show how they change if light, water or heat are limited linked to the 7 things needed for healthy growth and survival.

**Future learning:** Weekly observations to growth and record changes in bean plant.

**Weekly - What's happened to your bean plant?**

**Builds on:** Previous Yr2 lesson on plants.

**Intent:** To investigate what a plant needs to thrive and what happens if these conditions change. To observe and describe how seeds and bulbs grow over time.

**Implementation:** Children to monitor the growth of their bean plant and record in their bean diary. Compare and contrast with 'control' beans.

**Future learning:** KS2 -How water is transported in plants-Food dye experiment.

## LIVING THINGS & THEIR HABITATS

### YEAR 2

- \* I can explore and compare the differences between things that are living, dead, and things that have never been alive.
- \* I can identify that most living things live in habitats to which they are suited and describe how different habitats provide for the basic needs of different kinds of animals and plants, and how they depend on each other.
- \* I can identify and name a variety of plants and animals in their habitats, including microhabitats.
- \* I can describe how animals obtain their food from plants and other animals, using the idea of a simple food chain, and identify and name different sources of food.

#### Lesson 1 - How can we classify something as alive? What do all living things do?

**Builds on:** EYFS & Yr 1 will learn about plants and animals that live in different countries - linked to the Geography curriculum. They will identify and name a range of plants and animal species.

**Intent:** To explore & compare things that are alive, dead or never been alive.

**Implementation:** Discuss MRS NERG and characteristics of living things. Explore the outdoor learning area to find things that they can classify into living, dead and never been alive. Discuss and record findings using photos and sorting into Venn diagrams.

**Future Learning:** Yr 2 - Habitats, food chains and adaptation.

#### Lesson 2 - Where do you live?

**Intent:** To understand that a habitat is a home.

**Implementation:** Discuss new vocab and what a habitat provides for animals and plants. Identify that most living things live in habitats, which are suited to them and how different habitats provide for the basic needs of different kinds of animals and plants, and how they depend on each other. Children to practically link different animals/plants to habitats in carousel activity and mind map in groups how each animals needs are met by the environment but also adaptation.

**Future Learning:** Links to Yr2-Food chains

#### Lesson 3 - Where do you live?

**Intent:** To identify a Micro-habitat.

**Implementation:** Discuss the difference between habitat and micro-habitat. What is a micro-habitat? Investigate forest school **microhabitats** and their inhabitants and understand why they live there. Understand that different habitats provide for the basic needs of different kinds of living things. Understand that there are a varied amount of **microhabitats** with different features and conditions. Children create shoe box micro habitat for home learning.

<https://www.youtube.com/watch?v=5mXEsvrJUnU>

**Future Learning:** Links to Yr2-Food chains & adaption

#### **Lesson 4 - What is your favourite food?**

**Builds on:** Yr 2 lessons 1&2

**Intent:** To understand a food chain and its purpose.

**Implementation:** Talk about food chains and role play the interdependence between creatures in a chain, considering what part each plays in its survival. Explore the school grounds, looking for examples of food chains. Learn about water-based food chains and reconstruct them in tanks of water. Interpret the transfer of energy in a food chain through a dance, using masks and torches. <https://www.hamilton-trust.org.uk/science/year-12-science/food-chains/>

**Future Learning:** Links to Yr2-Food chains



## ANIMALS & HUMANS

EYFS	YEAR 1	YEAR 2
<p>ELG * I can think about similarities and differences in relation to living things.</p> <p>* I can make observations of animals and explain why some things occur.</p> <p>* I can talk about changes.</p>	<p>* I can identify and name a variety of common animals including fish, amphibians, reptiles, birds and mammals.</p> <p>* I can identify and name a variety of common animals that are carnivores, herbivores and omnivores.</p> <p>* I can describe and compare the structure of a variety of common animals (fish, amphibians, reptiles, birds and mammals, including pets).</p> <p>* I can identify, name, draw and label the basic parts of the human body and say which part of the body is associated with each sense.</p>	<p>* I can recognise that animals, including humans, have offspring which grow into adults.</p> <p>* I can find out about and describe the basic needs of animals, including humans, for survival (water, food and air).</p> <p>* I can describe the importance for humans of exercise, eating the right amounts of different types of food, and hygiene.</p>
<p><b>Intent:</b> Children will look at living things that live in and around our school grounds. They will investigate living things that live in other parts of the world. They will compare the living things they see in a variety of ways. They will talk about changes that occur in animals and humans linking this to first-hand experience.</p> <p><b>Implementation:</b> Linked to Outdoor Learning and PE sessions as well as linked to Geography when looking at animals that live in the Arctic. Link to Oceans topic. Visits to our local area to explore animals and insects that live there. Thinking of ways that we can encourage animals and insects to visit our outdoor areas - plants, feeding ideas, dens/homes.</p> <p><b>Future Learning:</b> Year 1 - broadening their knowledge of common animals, identifying and naming them as well as grouping them. They</p>	<p><b>AT Lesson 1 - Can you name all your body parts?</b></p> <p><b>Builds on:</b> EYFS - will investigate living things locally and globally, identifying similarities and differences as well as changes in both animals and humans.</p> <p><b>Intent:</b> To identify, name, draw and label parts of the human body</p> <p><b>Implementation:</b> Draw around children on giant paper/ with chalk in the playground and work together to label body parts.</p> <p><b>Future Learning:</b> Future Yr1 lessons on what makes humans special and senses. Links to PSHE - RSE and PE "Brilliant Balancing" lesson, "How can our bodies improve?" Y2 - learning about life cycles as well as what animals and humans need in order to survive. Explore the impact exercise, eating different food types and hygiene has on the human body.</p> <p><b>AT Lesson 2 - How are our bodies special?</b></p> <p><b>Builds on:</b> Previous Yr1 lesson and EYFS experiences.</p> <p><b>Intent:</b> To recognise similarities and differences in</p>	<p><b>Lesson 1 - What is growing up?</b></p> <p><b>Builds on:</b> EYFS and Year 1 investigate living things both locally and globally, naming and identifying them. Year 1 will look at the differing structures of these animals. They will name, draw and label parts of the human body.</p> <p><b>Intent:</b> To understand what is a life cycle.</p> <p><b>Implementation:</b> Identify and name animals that live locally and globally and think about their life cycle, What do they start off as and change into -noticing that offspring grow into adults. Looking at tadpoles and frogs, seeds to trees, eggs to adults etc. Create a life cycle poster to show the stages.</p> <p><b>Future Learning:</b> Link with growing plants, Habitats and Adaptation learning within Yr2 and then KS2.</p> <p><b>Lesson 2 - What do animals and humans need to survive?</b></p> <p><b>Builds on:</b> Previous lesson</p>

will have an opportunity to label parts of the human body and identify the sense linked to these body parts.

individuals. To recognise the five senses and say which part of the body is associated with each sense.

**Implementation:** Sensitively discuss and identify similarities and differences within the group. Try out different body balances and actions to reinforce. Play different senses games (Kim's game, Feely bag, smelly tins, blindfold tasting, name the instrument - what sense are we using for each game? What body part do we use for this? Go on a senses hunt!

**Future Learning:** Links to PSHE - RSE and PE. Y2 - learning about life cycles as well as what animals and humans need in order to survive. Explore the impact exercise, eating different food types and hygiene has on the human body.

#### **SpT Lesson 1 - How many different animal species can you name?**

**Builds on:** Previous Yr1 lessons and EYFS experiences.

**Intent:** To identify and name a variety of animals both locally and globally, including different animal types.

**Implementation:** Links with trip to Newquay Zoo! How many different animal species can children identify and name?

**Future Learning:** Subsequent lesson on grouping animals. Y2 - learning about life cycles as well as what animals and humans need in order to survive.

#### **SpT Lesson 2 - Which animal category?**

**Builds on:** Previous Yr1 lesson.

**Intent:** To identify and name a variety of animals both locally and globally, including different animal types. To identify different animal groups and categories. To explore the structure of these animals, using scientific vocabulary to compare and describe.

**Intent:** To

**Implementation:** Discuss & show Maslow's hierarchy of needs. Understanding the basic survival needs of both animals and humans and describe why these are important. Link to pshe, who takes care of us and helps us with those needs? Do our needs change as we grow? Children to create own diamond 9 of sorting needs in groups.

**Future Learning:** Link with Habitats and Adaptation learning within Yr2 and then KS2.

#### **Lesson 3 - What does healthy look like?**

**Builds on:** Previous lesson

**Intent:** To understand the importance of healthy choices.

**Implementation:** Introduce concept of being healthy or unhealthy-link to lifestyle choices. What we eat, how we play or explore, how we communicate, are we social? What are the effects of those choices on us? Healthy me poster, what healthy changes can we make for ourselves?

**Future Learning:** Link with Habitats and Adaptation learning within Yr2 and then KS2.

#### **Lesson 4 - Are you ready to go?**

**Builds on:** Previous lesson

**Intent:** To understand the effects of exercise and healthy eating .

**Implementation:** Investigate the effects of exercise on the human body and the importance of energy for fuel . Physical activity to explore strength, stamina and pulse rate. Keep a exercise diary to observe change in ourselves over a period

**Implementation:** Introduce children to 5 main animal groups (mammals, birds, fish, amphibians, reptiles). Discuss and sort animals into correct groups. Include carnivore, herbivore, and omnivore.

**Future Learning:** Future lessons on ocean animals. Y2 - learning about life cycles as well as what animals and humans need in order to survive.

**ST Lesson 1 - Ocean or not?**

**Builds on:** Previous Yr1 lesson.

**Intent:** To identify and name a variety of animals both locally and globally, including different animal types. To identify different animal groups and categories.

**Implementation:** Look at different examples of animals from each category and identify those that live in the ocean.

**Future Learning:** Future lesson on ocean animals. Y2 - learning about life cycles as well as what animals and humans need in order to survive.

**ST Lesson 2 - What's the same? What's different?**

**Builds on:** Previous Yr1 lesson.

**Intent:** To identify and name a variety of animals both locally and globally, including different animal types.

**Implementation:** Children to examine ocean animals from different animal groups and identify key features (gills, fins, fur, scaly skin, backbone...).

**Future Learning:** Link with Habitats and Adaptation learning within Yr2 and then KS2.

of time. Talk about food as energy and that energy fuels our body for . Which foods are better for us and help us to maintain energy for longer. Create a healthy plate for an athlete and someone who works in an office.

**Future Learning:** Link with Habitats and Adaptation learning within Yr2 and then KS2.

## EVERYDAY MATERIALS

EYFS	YEAR 1	YEAR 2
<p>ELG * I can think about similarities and differences in relation to materials and objects.</p> <p>* I can look closely at patterns and change.</p>	<p>* I can distinguish between an object and the material from which it's made.</p> <p>* I can identify and name a variety of everyday materials, including wood, plastic, glass, metal, water, rock.</p> <p>* I can describe simple physical properties of a variety of everyday materials.</p> <p>* I can compare and group together a variety of everyday materials based on their physical properties.</p>	<p>* I can identify and compare the suitability of a variety of everyday materials, including wood, metal, plastic, glass, brick, rock, paper and cardboard for particular uses.</p> <p>* I can find out how the shapes of solid objects made from some materials can be changed by squashing, bending, twisting and stretching.</p>
<p><b>Intent:</b> The children will explore a range of materials on offer within the provision and investigate the suitability of these for different purposes, comparing them and assessing how successful they would be. They will look at what happens to change some of these materials.</p> <p><b>Implementation:</b> Explore materials linked to T4W texts - Goldilocks - porridge - which materials would be used as a spoon? How does the porridge change as it is cooked? Floating and sinking experiments linked to Mr Gumpy's Outing T4W text - how can we make a boat that floats and holds all the animals?</p> <p><b>Future Learning:</b> Year 1 will investigate materials and group them according to their physical properties. They will be able to describe these and explain why a certain material is better suited to an object.</p>	<p><b>Lesson 1 - Can you describe and name the different materials used to make each object?</b></p> <p><b>Builds on:</b> EYFS will explore materials used with their settings and investigate how suitable some would be for particular uses.</p> <p><b>Intent:</b> To identify the material used in a variety of familiar objects. To begin to describe the properties of these materials to others.</p> <p><b>Implementation:</b> Feely Bag - children to describe what they can feel and try and name the material that has been used.</p> <p><b>Future Learning:</b> Subsequent lesson investigating physical properties and grouping materials.</p> <p><b>Lesson 2 - Can you describe the properties of each material? How can we sort these materials?</b></p> <p><b>Builds on:</b> Previous Yr1 lesson and EYFS experiences.</p> <p><b>Intent:</b> To investigate the properties of these everyday materials and describe these properties to others. To group materials in different ways by considering their simple physical properties.</p>	<p style="text-align: center;"><u>USES OF EVERYDAY MATERIALS</u></p> <p><b>Lesson 1 - What are these materials used for? Why?</b></p> <p><b>Builds on:</b> EYFS and Year 1 will explore how every day materials are used and the simple properties of these. They will identify and name a range of these materials. They will explore the suitability of these materials to overcome an everyday problem and group materials according to their properties.</p> <p><b>Intent:</b> To identify and compare the suitability of everyday materials for purpose.</p> <p><b>Implementation:</b> Children presented with a range of everyday materials - discuss and group according to their uses. Consider properties that make each material suitable. Consider the properties of a range of familiar materials and think about the uses these materials have in our lives.</p> <p><b>Future Learning:</b> Subsequent lessons making a trap/cage for the Witch (Hansel &amp; Gretel) and a house of sweets.</p> <p><b>Lesson 2 - Can you design and make a cage for</b></p>

**Implementation:** Children to use magnifying glasses, simple tools and water to investigate and describe the physical properties of wood, plastic, glass, metal, water, rock, fabric. Children to find different ways to sort the materials based on these properties. Share and discuss.

**Future Learning:** Subsequent lesson and in Year 2 will be able to describe and explain the uses and properties of every day materials and talk about how a material can change and how we can make it change. They will also consider why not every material can be changed in the same way.

**Lesson 3 - What material would make the best roof for the Pigs' house?**

**Builds on:** Previous Yr1 lesson and EYFS experiences.

**Intent:** To investigate the properties of these everyday materials and describe these properties to others.

**Implementation:** Children can investigate the suitability of materials linked to the Three Pigs T4W text. They can explore the suitability of different materials to make a roof to keep the bad wolf out (using a hairdryer to be the wolf huffing and puffing).

**Future Learning:** Year 2 will be able to describe and explain the uses and properties of every day materials and talk about how a material can change and how we can make it change. They will also consider why not every material can be changed in the same way.

**the witch to use? (DT link)**

**Builds on:** Previous Yr2 lesson and Yr1 experiences, also DT.

**Intent:** To investigate and test the properties of a range of familiar materials. To explore how the shape of familiar objects can be changed and think about why not every material can be changed in the same way.

**Implementation:** Children can explore and investigate the suitability of materials when making a trap/cage for the witch (linked to the T4W text Hansel and Gretel).

**Future Learning:** Subsequent lesson making a house of sweets.

KS2 Materials - Changes of state.

**Lesson 3 - Which sweets make the best house?**

**Builds on:** Previous Yr2 lesson and Yr1 experiences, also DT.

**Intent:** To explore how the shape of familiar objects can be changed and think about why not every material can be changed in the same way.

**Implementation:** Children explore making a house using sweets, investigating which sweets give the most stable shape and explain why.

**Future Learning:** KS2 Materials - Changes of state.

## SEASONAL CHANGES

### EYFS

### YEAR 1

40-60 \* I can look closely at similarities, differences, patterns and change.

\* I can observe changes across the four seasons.  
\* I can observe and describe weather associated with the seasons and how day length varies.

**Intent:** Children will look closely at the similarities and differences in the weather daily. They will identify patterns and changes within the weather observed and describe these. Children will look at changes in weather daily and will notice similarities and differences and compare the weather in different seasons, linked to their own immediate environment. They will also make links when finding out about life in other countries, linked to the Geography curriculum.

**Implementation:** Opportunities will be provided to enable children to talk about the weather each day as part of a daily routine. Time will be given to talk about clothing we may need to wear due to seasonal changes or changes in the weather. There are opportunities to record the weather as part of our daily routine, with children taking ownership of this. Using maps, weather forecasts and video clips we can show the children what the climate and the weather is like in different parts of the world. Allow children to draw on their own personal experiences of places they have visited in this country and abroad.

**Future Learning:** Year 1 will look closely at seasonal changes, designing and making apparatus to monitor rainfall and observe wind direction when considering the weather daily.

#### Lesson 1 - What are seasons?

**Builds on:** In the EYFS children will look at changes in weather daily and will notice similarities and differences and compare the weather in different seasons, linked to their own immediate environment. They will also make links when finding out about life in other countries, linked to the Geography curriculum.

**Intent:** To recognise and name the four seasons. To know that there are differences in weather across the four seasons.

**Implementation:** Use BBC clip <https://www.bbc.co.uk/teach/class-clips-video/science-ks1-ks2-wonders-of-nature-the-changing-seasons/zh4rkmn> as a prompt to explore and discuss the changing seasons.

**Future Learning:** Year 2 Links with Geography and looking at different climates - hot & cold countries. KS2 Links with seasonal change with regard to living things and hibernation.

#### Lesson 2 - How can we monitor and record changes in the weather?

**Builds on:** Previous Yr1 lesson and EYFS experiences.

**Intent:** To observe and describe weather associated with the seasons. To observe changes across the four seasons. To observe and describe how day length varies across the four seasons.

**Implementation:** Children will create resources that will enable them to monitor rainfall and observe wind direction. They will discuss what changes they might see during each season and link it to their own experience.

**Future Learning:** Subsequent daily monitoring of the weather and discussions about changes and patterns observed.

**Daily - What's the weather like today? How much rainfall? What is the wind direction?**

**Builds on:** Previous Yr1 lesson and EYFS experiences.

**Intent:** To observe and describe weather associated with the seasons. To observe changes across the four seasons. To observe and describe how day length varies across the four seasons.

**Implementation:** Children will spend time looking at the weather daily and noticing changes during different seasons of the year. They will use their created resources that will enable them to monitor rainfall and observe wind direction. They will discuss what changes they might see during each season and link it to their own experience.

**Future Learning:** Year 2 Links with Geography and looking at different climates - hot & cold countries. KS2 Links with seasonal change with regard to living things and hibernation.