

Working Scientifically: Assessment and Progression of Enquiry Skills

EYFS	Key Stage 1	KS1 NC WS reference	The pupil can			
- show curiosity about objects, events and people (Playing & Exploring) - questions why things happen (Speaking: 30-50 months)	explore the world around them and raise their own simple questions	• asking simple questions and recognising that they can be answered in different ways	<p><b>The pupil can, using appropriate scientific language from the national curriculum</b></p> <ul style="list-style-type: none"> <li>• ask their own questions about what they notice</li> <li>• use different types of scientific enquiry to gather and record data, using simple equipment where appropriate, to answer questions including:                             <ul style="list-style-type: none"> <li>- observing changes over time,</li> <li>- noticing patterns,</li> <li>- grouping and classifying things,</li> <li>- carrying out simple comparative tests</li> <li>- finding things out using secondary sources of information</li> </ul> </li> <li>• communicate their ideas, what they do and what they find out in a variety of ways.</li> </ul>	Planning	PLAN	
-engage in open-ended activity (Playing & Exploring)	experience different types of science enquiries, including practical activities					
-take a risk, engage in new experiences and learn by trial and error (Playing & Exploring)	begin to recognise different ways in which they might answer scientific questions	• performing simple tests		<p><b>Observing / obtaining evidence/ recording evidence</b></p>	DO	
-find ways to solve problems / find new ways to do things / test their ideas (Creating & Thinking Critically)	carry out simple tests					
-develop ideas of grouping, sequences, cause and effect (Creating & Thinking Critically) -know about similarities and differences in relation to places, objects, materials and living things (ELG: The World)	use simple features to compare objects, materials and living things and, with help, decide how to sort and group them (identifying and classifying)	• identifying and classifying				
-comments and asks questions about aspects of their familiar world such as the place where they live or the natural world (The World: 30-50 months)	ask people questions and use simple secondary sources to find answers					
-closely observes what animals, people and vehicles do (The World 8-20 months) -use senses to explore the world around them (Playing & Exploring)	observe closely using simple equipment with help, observe changes over time	• observing closely, using simple equipment				
-choose the resources they need for their chosen activities (ELG: Self Confidence & Self Awareness) -handle equipment and tools effectively (ELG: Moving & Handling)	use simple measurements and equipment (e.g. hand lenses, egg timers) to gather data					
-make links and notice patterns in their experience (Creating & Thinking Critically)	with guidance, they should begin to notice patterns and relationships	• gathering and recording data to help in answering questions				
-create simple representations of events, people and objects (Being Imaginative: 40-60+ months)	record simple data					
-develop their own narratives and explanations by connecting ideas or events (ELG: Speaking) -builds up vocabulary that reflects the breadth of their experience (Understanding: 30-50 months)	with help, they should record and communicate their findings in a range of ways and begin to use simple scientific language					
-answer how and why questions about their experiences (ELG: Understanding) -make observations of animals and plants and explain why some things occur, and talk about changes (ELG: The World)	use their observations and ideas to suggest answers to questions talk about what they have found out and how they found it out	• using their observations and ideas to suggest answers to questions	Concluding			

Y1 curriculum statements	Y2 curriculum statements	The pupil can:-
<ul style="list-style-type: none"> <li>identify, name, draw and label the basic parts of the human body and say which part of the body is associated with each sense.</li> </ul>	<ul style="list-style-type: none"> <li>describe the importance for humans of exercise, eating the right amounts of different types of food and hygiene.</li> </ul>	<ul style="list-style-type: none"> <li><b>name and locate parts of the human body, including those related to the senses (Y1), and describe the importance of exercise, balanced diet and hygiene for humans. (Y2)</b></li> </ul>
	<ul style="list-style-type: none"> <li>find out about and describe the basic needs of animals, including humans, for survival (water, food and air)</li> <li>notice that animals, including humans, have offspring which grow into adults</li> </ul>	<ul style="list-style-type: none"> <li><b>describe the basic needs of animals for survival and the main changes as young animals, including humans, grow into adults. (Y2)</b></li> </ul>
<ul style="list-style-type: none"> <li>identify and describe the basic structure of a variety of common flowering plants, including trees.</li> </ul>	<ul style="list-style-type: none"> <li>find out and describe how plants need water, light and a suitable temperature to grow and stay healthy.</li> <li>observe and describe how seeds and bulbs grow into mature plants</li> </ul>	<ul style="list-style-type: none"> <li><b>describe the basic needs of plants for survival and the impact of changing these and the main changes as seeds and bulbs grow into mature plants. (Y2)</b></li> </ul>
	<ul style="list-style-type: none"> <li>explore and compare the differences between things that are living, dead, and things that have never been alive.</li> </ul>	<ul style="list-style-type: none"> <li><b>identify whether things are alive, dead or have never lived (Y2)</b></li> </ul>
<ul style="list-style-type: none"> <li>describe and compare the structure of a variety of common animals (fish, amphibians, reptiles, birds and mammals, including pets)</li> </ul>		<ul style="list-style-type: none"> <li><b>describe and compare the observable features of animals from a range of groups (Y1)</b></li> </ul>
<ul style="list-style-type: none"> <li>identify and name a variety of common animals that are carnivores, herbivores and omnivores</li> </ul>	<ul style="list-style-type: none"> <li>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.</li> </ul>	<ul style="list-style-type: none"> <li><b>group animals according to what they eat (Y1), describe how animals get their food from other animals and/or from plants, and use simple food chains to describe these relationships (Y2)</b></li> </ul>
<ul style="list-style-type: none"> <li>observe changes across the four seasons</li> <li>observe and describe weather associated with the seasons and how day length varies</li> </ul>		<ul style="list-style-type: none"> <li><b>describe seasonal changes (Y1)</b></li> </ul>

Y1 curriculum statements	Y2 curriculum statements	The pupil can:-
<ul style="list-style-type: none"> <li>• identify and name a variety of common wild and garden plants, including deciduous and evergreen trees</li> <li>• identify and name a variety of common animals including fish, amphibians, reptiles, birds and mammals</li> </ul>	<ul style="list-style-type: none"> <li>• 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</li> <li>• identify and name a variety of plants and animals in their habitats, including micro-habitats</li> </ul>	<ul style="list-style-type: none"> <li>• <b>name different plants and animals and describe how they are suited to different habitats (Y2)</b></li> </ul>
<ul style="list-style-type: none"> <li>• distinguish between an object and the material from which it is made</li> <li>• identify and name a variety of everyday materials, including wood, plastic, glass, metal, water, and rock</li> <li>• describe the simple physical properties of a variety of everyday materials</li> <li>• compare and group together a variety of everyday materials on the basis of their simple physical properties</li> </ul>	<ul style="list-style-type: none"> <li>• identify and compare the suitability of a variety of everyday materials, including wood, metal, plastic, glass, brick, rock, paper and cardboard for particular uses.</li> </ul>	<ul style="list-style-type: none"> <li>• <b>distinguish objects from materials, describe their properties, identify and group everyday materials (Y1), and compare their suitability for different uses. (Y2)</b></li> </ul>