



## Long Term Overview for Science

	Term 1	Term 2	Term 3	Term 4	Term 5	Term 6
<b>Year R</b>	ELG: Explore the natural world around them, making observations and drawing pictures of animals and plants. ELG: Understand some important processes and changes in the natural world around them, including seasons and changing states of matter. ELG: Know some similarities and differences between the natural world around them and contrasting environments, drawing on their experiences and what has been read in class. Asking simple questions and recognising that they can be answered in different ways					
<b>Year 1</b>	The Four Seasons & Animals including Humans (Human Body)	Everyday Materials	The Four Seasons & Everyday Materials Investigation	Animals Including Humans: Animal & Characteristics	The Four Seasons & Animals including Humans: Animals (Grouping)	Plants
<b>Year 2</b>	Living things and their habitat	Living things and their habitat	Uses of Everyday Materials	Animals Including Humans	Plants	Plants
<b>Year 3</b>	Rocks, Fossils and Soils	Animals Including Humans: Moving and Growing	Forces and Magnets	Forces and Magnets	Helping Plants Grow	Light and Shadow
<b>Year 4</b>	States of matter	Sound	Electricity	Teeth and digestion	Food Chains	All Living things: Habitats
<b>Year 5</b>	Properties of Materials	Reversible & Irreversible changes	Forces	Forces and Machines	Earth & Space	Animals Including Humans: Life Cycles
<b>Year 6</b>	How we see things (light)	Animals including humans (circulation)	Animals including humans (healthy lifestyles)	Electricity	Living Things: Classification	Evolution and inheritance

## Meeting our Vision and Values

**Vision:** At Platt C of E Primary School, we want children to develop an understanding of the world around us and an enjoyment of scientific enquiries. We endeavour to encourage our children to be inquisitive learners who can recognise that having a better understanding of the world we live in can support them to grow as individuals. The beginnings lie in the Foundation stage where children experience a broad range of teacher-led and child-initiated investigations where they are encouraged to ask questions about why things happen and why things work. As children go through the school their knowledge, skills and appreciation for practical, explorative and investigative learning is developed. Their understanding of how the world works around them grows and like the parable of the mustard seed, science gives children a way to develop unique gifts in this area and grow as potential scientists.

**Values:**

<b>Care</b> (compassion, friendship)	<b>Learn</b> (wisdom, koinonia)	<b>Forgive</b> (forgiveness, hope)
Science offers our children the opportunity to work collaboratively whilst also developing their ability to work independently. Friendship and compassion are encouraged as children work together to investigate and explore scientific enquiries.	The acquisition of key scientific knowledge is an integral part of our science lessons. Children learn through varied systematic investigations leading to them being equipped for life to ask and answer scientific and spiritual questions about the world around them.	Through science, children develop their understanding of forgiveness during investigations. They learn to forgive themselves for mistakes made in their learning. Science allows children to feel hopeful by deepening their understanding of the world around them.

### Intent

The intent of the Science curriculum at Platt Church of England Primary School is to provide the foundations which allow children to understand the world around them. We help children to see how science has changed the world and our lives. We encourage children to recognise the importance of science in every aspect of daily life. As one of the core subjects, we give the teaching of science the prominence it requires. Pupils are taught the knowledge, processes and uses of science through the power of explanation and investigation. The aim of science within the school is to develop curiosity and excitement about the world we live in. We will ensure that the Working Scientifically skills are built-on and developed throughout children's time at Platt so they can apply their knowledge of science when using equipment and explaining concepts confidently. These skills are vital to children's development as learners and to have a wider appreciation in their general lives outside and beyond school.

### Implementation

At Platt Church of England Primary School, we provide a progressive curriculum which develops the way in which children work and think scientifically. Where possible science is linked to other subjects across the curriculum and taught discretely. This builds scientific skills through questions and investigations. Science lessons at Platt Church of England Primary School give children the opportunity to:

- use high quality resources and equipment which allow all children to access the curriculum
- build on their natural curiosity of the world around them
- use scientific methods of investigation including observing, measuring, recording, predicting, interpreting, explaining and evaluating
- make links between science, other subjects and the world they experience
- use teamwork, effective communication and independence to build knowledge and understanding through activity, experiments and discussion
- experience moments of wonder which inspire children to think more deeply about science.

We are using schemes of work provided by The Education People, which covers the objectives of the National Curriculum. This uses a hands-on approach to scientific learning and teaches children to use and develop effective methods of scientific enquiry. Our teaching and learning support our curriculum by ensuring that lessons build on prior learning and provide opportunities for guided and independent practice.

We assess children's understanding through formative assessment approaches and use short summative assessments at the end of units of work. This then supports the teacher giving an overall teacher judgement three times a year on our tracking system, Insight. All children can access the curriculum through a varied teaching and learning approach including group work, independent work, recording learning using writing, diagrams, charts and tables as well as opportunity for discussions.

Regular events, such as Science Week and working with local secondary schools allow pupils to come off timetable to provide broader provision and the acquisition and application of knowledge and skills.

### Impact

The successful approach at Platt Church of England Primary School results in a fun engaging, high-quality science education that provides children with the foundations and knowledge for understating the world. At Platt Church of England Primary School, our children develop the scientific knowledge, skills and understanding which they apply to their daily lives, local environment, and the world in which they live and beyond. Children develop their ability to enquire, analyse and investigate alongside building a wider range of scientific vocabulary. Through this curriculum, pupils at Platt Church of England Primary School have the tools and knowledge to create high aspirations for their future study, careers and adult life.