



Science

Intent

At Aqueduct Primary School, in conjunction with the aims of the National Curriculum, our Science teaching offers opportunities for children to:

Develop scientific knowledge and conceptual understanding through the specific disciplines of Biology, Chemistry and Physics.

Develop understanding of the nature, processes and methods of Science through different types of enquiries that help them to answer scientific questions about the world around them.

Be equipped with the scientific knowledge required to understand the uses and implications of Science, today and for the future.

Develop the essential scientific enquiry skills to deepen their scientific knowledge.

Use a range of methods to communicate their scientific information and present it in a systematic, scientific manner, including I.C.T., diagrams, graphs and charts.

Develop a respect for the materials and equipment they handle with regard to their own, and other children's safety.

Develop an enthusiasm and enjoyment of scientific learning and discovery.

Develop understanding of the importance of Science in the world and highlight scientific achievements.

The National Curriculum will provide a structure and skill development for the science curriculum being taught throughout the school, which is now linked, where possible to the theme focus to provide a creative scheme of work, which reflects a balanced programme of study.

At Aqueduct, children have regular Science lessons throughout Key Stage 1 and 2, using programmes of study and a variety of resources. In Early years, Science is taught through the children learning about the world around them in their learning through child initiated learning and structured play. Additional opportunities to explore Science are provided through educational visits, visitors to the school and using the local environment. There is also a Science club run throughout the year to provide opportunities beyond the school day.

We endeavour to ensure that the Science curriculum we provide will give children the confidence and motivation to continue to further develop their skills into the next stage of their education and life experiences.



What is important to us...

Please see our Science Vision, (below) created by pupils, staff, parent & Governors.

Implementation

Teachers create a positive attitude to science learning within their classrooms and reinforce an expectation that all children are capable of achieving high standards in science. Our whole school approach to the teaching and learning is founded upon our Science Vision, which were developed with pupils, staff, parents and governors.

Through implementing and embedding these principles from an early stage, we provide our pupils with improved opportunities to partake in a more exciting, challenging and hands on scientific experience, which encourages curiosity and fosters learning.

We provide ample opportunities for children to ask their own questions and be given opportunities to use their scientific skills and research to discover the answers. Teachers use precise questioning and make judgments against the criteria of the National Curriculum, in order to formatively assess theoretical knowledge and skills,

We build upon the learning and skill development of the previous years and as the children's knowledge and understanding increases, they become more proficient and confident expressing their thoughts and discoveries, as they develop into more independent scientists. Children are encouraged to work scientifically through targeted enquiry-led investigations at least once every term.

Teachers use progression skills documents, which can be accessed by all children at their individualised level of need. All children are provided with the opportunity to apply their learning, both in school via events such as Science Week, and on educational trips linked to the curriculum.

Impact

- Children and staff enjoy and are enthusiastic about science in our school
- There is a clear progression of skills across each year group
- Children are ready for their next steps in science learning as they move through the school and prepare for secondary school
- Science books show a range of topics being covered, linked directly to the national curriculum
- Children are becoming increasingly independent and challenging their understanding
- Children have the opportunity to take part in a whole school Science Challenge annually in British Science Week to encourage scientists of the future
- Termly assessment are embedded into teaching to capture all children's progress
- The school will secure a Primary Science Quality Mark by June 2021