

Bellfield Primary School



Science Policy

Date Issued: **January 2022**
Ratified by Governing Body:
Review Date: **January 2024**

Introduction

At Bellfield Primary School we believe that a child's science education should harness their natural curiosity and sense of wonder at the world around them. Science teaching and learning should encourage children to question, explore and make decisions. It should help them appreciate nature, technology and the quest for explanations. We promote the links that science has within the wider curriculum to prepare the children for everyday life and future careers.

This policy is to be read in conjunction with the Science Long Term Plan, which outlines each unit of work for all year groups.

Objectives

The national curriculum for science aims to ensure that all pupils:

- 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 science enquiries that help them to answer scientific questions about the world around them
- Are equipped with the scientific knowledge required to understand the uses and implications of science, today and for the future

The national curriculum states that a high-quality science education provides the foundations for understanding the world through the specific disciplines of biology, chemistry and physics. Science has changed our lives and is vital to the world's future prosperity, and all pupils should be taught essential aspects of the knowledge, methods, processes and uses of science. Through building up a body of key foundational knowledge and concepts, pupils should be encouraged to recognise the power of rational explanation and develop a sense of excitement and curiosity about natural phenomena. They should be encouraged to understand how science can be used to explain what is occurring, predict how things will behave, and analyse causes.

Teaching and Learning

In order to provide pupils with the highest standard of a scientific education, at Bellfield we ensure the children are working scientifically within lessons. Children will be seen:

- researching, using secondary sources;
- carrying out comparative and fair tests;
- identifying and classifying a specific subject;
- observing changes over time;
- Recognising patterns and seeking them out.

All children within the school will develop their skills to: predict using evidence from prior knowledge; collect, present and analyse data; conclude their findings and make links across the unit.

The Foundation Stage

Children show their inquisitive minds as soon as they start in Nursery. Our children's science journey starts when they join the school, learning about the world around them and exploring through play. Teachers carefully plan activities and opportunities that enable children to develop skills in questioning, predicting and observing. The skills that our children develop in EYFS underpin their scientific skills as they move through the school.

Differentiation and Access

It is individual teacher's responsibility to ensure that children in their class can access the knowledge, skills and vocabulary at an appropriate level for them. Where children have difficulty in accessing the content of the science curriculum, adaptations are made. This may include, but is not limited to, changing the activity, additional adult support and using a range of resources. Where teachers identify significant gaps in the ability of a child (or children) in accessing the science curriculum, they will liaise with the SENDCo to look at ways of addressing this.

Assessment

Assessment is a vital tool in the teaching of Science, designed to monitor children's progress and measure attainment. It is used to inform future planning by staff throughout the school.

Assessment opportunities are built into the planning of lessons and a range of other methods are used as appropriate. Standards are checked both in school and through Trust-wide moderation.

See also Assessment Policy and Marking and Feedback policy.

Monitoring and Review

Monitoring of the standards of children's work and the quality of teaching is the responsibility of the science subject leader and Senior Leadership Team (SLT). The work of the subject leader also involves supporting colleagues in the teaching of science, being informed about current developments in the subject and providing a strategic lead and direction for the subject in the school. The subject leader evaluates strengths and weaknesses in the subject and prepares an annual action plan indicating areas for further improvement.

The Role of the Subject Leader

Key roles of the Science Leader:

- To review and revise the Policy.
- To encourage colleagues to teach effectively, providing good examples of teaching, planning, displays and use of resources.
- To monitor children's work through classroom observation, and monitor medium-term planning to ensure coverage of the curriculum.
- To be responsible for preparing the action plan for Science which forms part of the annual School Improvement Plan.
- To keep up to date with developments in Science education and disseminate information to colleagues as appropriate.
- To take responsibility for the purchase of class based and centralised resources.
- To provide in-service training as appropriate.

Reviewer: Science Subject Leader