



Science Policy V3 - Reviewed Nov 25

Introduction

At King Edwin Primary School, we are committed to providing a high-quality science education that is in line with the National Curriculum. Our science policy outlines our aims, principles, and a sequence for delivering an engaging, broad and balanced science curriculum. We strive to foster curiosity, critical thinking, and a deep understanding of scientific concepts among our KingEdWINNERS, preparing them to become scientifically literate individuals.

Aims

- To develop a love for science: We aim to inspire a passion for science, nurturing students' natural curiosity about the world and fostering an enjoyment of scientific exploration.
- To develop scientific knowledge and understanding: We aim to ensure that all students acquire a broad and deep understanding of key scientific concepts, theories, and principles. This includes knowledge of the three main areas of science: biology, chemistry, and physics.
- To develop scientific skills: We aim to equip students with the necessary scientific skills, such as critical thinking, problem-solving, investigative skills, and effective communication of scientific ideas and findings.
- To promote scientific inquiry: We aim to encourage students to ask questions, make predictions, plan, collect data, and find conclusions. We allow students to explore and investigate the natural world.
- To develop scientific literacy: We aim to ensure that students develop the necessary scientific literacy to understand and evaluate scientific information. We emphasise the relevance of science to contemporary local and global concerns as part of an increasingly scientific and technological society.

Principles

Curriculum Design and Sequencing

Our KEPS science curriculum is designed to provide a coherent progression of knowledge and skills, building upon prior learning and ensuring continuity and progression throughout the EYFS into each Key Stage. We align our curriculum with the Development Matters 2021 and National Curriculum, covering the statutory content and providing opportunities for deepening understanding.

Practical approach

We believe in the importance of practical and hands-on learning experiences in science. We provide opportunities for students to engage in experiments, investigations, and scientific observations to develop their skills and deepen their understanding.

Cross-curricular Links

We seek opportunities to make links between science and other subjects within our KEPS Curriculum where applicable, connecting scientific concepts to real-life contexts. We aim to enhance students cultural capital by exploring how science influences others and how it is influenced by history, art or society. This includes highlighting the contributions made by scientists from diverse cultural backgrounds, examining the impact of scientific discoveries on global development. We encourage pupils to appreciate the role of science in every day life.

Inclusion

We recognise the diverse needs and abilities of our students and strive to provide a science curriculum that is accessible to all. We scaffold our teaching and learning approaches to support and challenge students appropriately, ensuring that every student can make progress.

Assessment and Feedback

We use a range of formative and summative assessment strategies in line with our Feedback and Marking policy to monitor students' progress and inform our teaching. This includes end of unit assessment questions, this assessment data is recorded on EAZMAG half termly and analysed. Feedback is provided to students to support their learning and promote their understanding of scientific concepts.

Procedures

Curriculum Delivery

Science lessons are delivered by well-informed and enthusiastic teachers who implement our planned curriculum, ensuring coverage of the National Curriculum objectives. Teachers use a variety of teaching strategies, including direct instruction, practical activities, discussions, and group work to engage students and enhance their learning experiences.

Resources and Support

We provide appropriate resources, scientific equipment and technology, to support the delivery of the science curriculum. We encourage teachers to seek professional development opportunities to enhance their subject knowledge and pedagogy, including

through STEM courses and webinars.

Monitoring and Evaluation

The progress and impact of our science curriculum are regularly monitored and evaluated by subject leaders and senior leaders. This includes classroom observations, book looks, moderation and sharing good practice, pupil voice, and analysis of assessment data. Feedback and recommendations for improvement are shared with staff to enhance the quality of science teaching and learning.

Health and Safety

We ensure that all science activities comply with health and safety regulations and guidelines

. Appropriate precautions are taken to maintain a safe and secure learning environment.

Enrichment opportunities

We actively seek opportunities to enhance the science curriculum through external organisations. We organise educational visits, workshops, after school clubs and guest speaker sessions to provide students with real-world connections and enrich their scientific learning experiences.

SEN

We provide additional support for students with special educational needs or disabilities, ensuring that they have equal access to the science curriculum. Relevant staff ensure the specific needs of these students and an individual basis.

Review and Evaluation

Our science policy is presented with staff, subject leaders, parents, and governors, to ensure its effectiveness in meeting the needs of our students. We reflect on best practices, current research, and feedback to make any necessary adjustments or improvements to our science curriculum and policies.

By implementing this science policy, we aim to provide a stimulating and inclusive science education that equips our students with the knowledge, skills, and scientific literacy they need to thrive in an ever-changing world. We are committed to fostering a lifelong love for science, nurturing future scientists, and promoting a deeper understanding of the natural world.