



**Reach for the Stars**

**Policy Document: Science Policy  
2021**

**Subject Leader/Monitor: Mrs Tomkinson      Governor Link:  
Curriculum Committee**

**The Intent of our Science Curriculum:**

Science stimulates and excites children's curiosity about phenomena and events in the world around them. As science links direct practical experience with ideas, it can engage children at many levels. Scientific method is about developing and evaluating explanations through experimental evidence and modelling. This is a spur to critical and creative thought. Our programme for Science will therefore enable children to SHINE (Succeed, Be Happy, Independent, Nurtured and Empowered) and to build the knowledge, skills and attitudes to overcome barriers the children might face through questioning aspirations and expanding thinking beyond the locality.

**Aims**

**In accordance with the aims of Cheswardine Primary and Nursery School we aim:**

- To enable the children to acquire, progressively, scientific skills, concepts and attitudes and the ability to apply these in a practical way.
- To develop enquiring and questioning minds with a scientific approach to investigation and problem solving; leading to children thinking and behaving scientifically.
- That children develop an understanding of and interest for all living things, physical processes and materials and their properties.
- That children develop an understanding of the importance of the conservation of the natural environment together with an understanding of the ecological balance and interdependence of life.
- That children understand and use appropriate scientific vocabulary.

- That children recognise hazards and risks to themselves and others in their scientific enquiry.

### **Skills we aim to develop in science:**

- The ability to hypothesise and make reasoned predications.
- The ability to devise, set-up and perform fair tests, understanding why they are fair.
- The ability to make accurate observations and measurements.
- The ability record observations and to select the most appropriate way to do this; pictorial, diagram, graph, charts etc.
- The ability to draw conclusions.
- The ability to research using a variety of information sources to help scientific enquiry.
- The ability to communicate findings to others.

### **Guidelines for teachers**

- The school uses the National Curriculum objectives for science repeating some subjects to build on and develop key scientific ideas. This is adapted to suit the needs of the class and children's own ideas and link it to the topic being covered.
- Across the units of work the medium term plan will include opportunities for a range of enquiries. Fair test enquiries will follow the task board planning method uniformly throughout the school.
- We believe that the best way to learn science is through first-hand active experiences and so the majority of our science teaching will involve children in active enquiry, increasingly of their own design and scientific exploration.
- Opportunities will be given for children to develop and use appropriate scientific language. Teachers will highlight appropriate scientific vocabulary.
- Knowledge organisers will be used to highlight key vocabulary, key concepts, required units of measurement, useful equipment and prompts for investigations.
- Children will be encouraged to self-evaluate and self-assess.
- Opportunities will be planned for an appropriate use of computing.

- It is a condition of service to plan safe activities for science. We teach safety points and encourage children to design and perform safe enquiries.
- All children are entitled to a science curriculum. Teachers plan and differentiate activities to meet the learning needs of all children.
- Teachers are sensitive to the spiritual and moral opportunities science can present and use these appropriately.
- The importance of forming effective questions is recognised and as well as asking challenging questions, teachers will also encourage children to ask their own questions.
- Children will be made aware that most of our scientific knowledge exists by hypothesising and enquiry.

### **Time allocation**

Key Stage 1: 1.5-2 hrs per week and KS2: 2 hrs per week. (In KS1 Forest School sessions may mean more time is spent on Science in some terms than others)

### **Assessment**

- Children's progress in scientific skills will be tracked using the teachers' planning notes and evaluations
- Progress and attainment will be reported to parents in annual reports and at parent consultations.
- Marking will be in line with school's marking and assessment policy.
- At the end of each key stage children are assessed according to statutory requirements.
- Teachers assess to inform planning and future work.
- Subject knowledge retention will be assessed as subjects end and are re-visited in future years.

### **The role of the Science Subject Leader**

- Lead the school's approach to science.
- Advise colleagues where and when appropriate.
- Inform staff of recent pedagogical developments in science.
- Develop a subject leader file that focuses on policy, action planning, schemes of work, progression of substantive and disciplinary knowledge and skills,

knowledge organisers, and model examples of year group practice.

- Monitor Science across the school through observations, book trawls and discussions.
- Lead developments in science in line with school improvement plan and own action plan.

**Subject Leader: Rebecca Tomkinson**

**Reviewed and amended October 2021**

**Next review March 2023**