

Flakefleet Primary School



Science Policy

Policy Aims

The Science aims at Flakefleet are to ensure that all pupils:
Develop scientific knowledge and understanding
Are provided opportunities to develop understanding through scientific enquiry
Are given opportunity to see the relevance of their scientific knowledge ie in real life situations.

It enables children to develop confidence, make predictions, observe phenomena and evaluate what they have found out.

The objectives of Science are for the children to:

be able to ask and answer scientific questions;

plan and carry out scientific investigations, with the correct use of equipment (including computers);

know about life processes;

know about materials, electricity, light, sound and natural forces;

know about the nature of the solar system, including the earth;

know how to evaluate evidence and to present conclusions both clearly and accurately.

Teaching and Learning

We use a variety of teaching and learning styles in our Science lessons within our creative curriculum teaching. Our principal aim is to develop children's knowledge, skills, and understanding. We do this through the creative curriculum in which children experience a mixture of whole-class, small group or independent activity. We encourage the children to ask, as well as answer, scientific questions to enhance their learning. They have the opportunity to experience a wide range of resources to support their work. We aim to stimulate a child's curiosity in finding out why things happen in the way that they do. Children learn to ask scientific questions and begin to appreciate the way in which science will affect the future on a personal, national and global level.

Curriculum Planning

Science is planned within the school's creative curriculum, and follows the National Curriculum 2015. All key skills are covered within each Phase (Y1-2, Y3-4, and Y5-6). Phase staff, supported by the subject leader ensure that the curriculum is split appropriately across year groups so all areas are covered.

Use of ICT

We utilise a range of ICT strategies and skills to enhance science teaching and learning. Data collection and handling skills are developed, as well as the ability to research appropriate information using the internet and other sources. Children have the opportunity to use a range of media as an integral aspect of their learning and to record their findings (see Computing Policy) when it is judged to be the optimum medium.

Foundation Stage

We teach Science in Foundation Stage as an integral part of the topic work covered during the year. We relate the Science element of the children's work to the objectives set out in the Early Year's Foundation Stage curriculum (EYFS) which underpin the curriculum planning for children aged three to five. Science makes a significant contribution to the EYFS objectives of developing a child's 'Understanding of the World'.

Cross Curricular

English

Science contributes significantly to the teaching of English in our school by actively promoting the skills of reading, writing, speaking and listening. Some of the texts that the children study in English are of a scientific nature. The children develop oral skills in science lessons through discussions, and presentations. They develop their writing skills through recording and interpreting their findings.

Mathematics

Science contributes to the teaching of mathematics in a number of ways. When the children use weights and measures they are learning to use and apply number. Through working on investigations they learn to estimate and predict. They develop experience of data handling. They develop accuracy in their observation and recording of events. Many of their answers and conclusions include numbers.

Geography

Science and Geography are linked through 'changing landscapes because of human impact'. Children explore how humans can sometimes pose dangers to living things.

SEND

We enable all pupils to have access to the full range of activities involved in learning Science. If progress falls significantly outside the expected range the child may have special educational needs. Our assessment process examines a range of factors – classroom organisation, teaching materials, teaching style and differentiation – so that we can take some additional or different action to enable the child to learn more effectively. This ensures that our teaching is matched to the child's needs. With more able children, teachers ensure that children have a challenge built into their work.

Assessment

We assess children's work in Science by making informal judgements as we observe them during Science lessons. On completion of a piece of work the teacher marks the work and comments as necessary. During the unit of work pupils are encouraged to self-assess their learning. At the end of a unit of work the teacher makes an informal summary judgement about the work of each pupil - whether they have yet to obtain, have met or have exceeded the unit objectives. We use this as a basis for assessing the progress of the child at the end of the year.

Resources

We have sufficient resources for Science teaching in the school. They are stored centrally outside the Nurture Room. Consumable items are restocked as necessary. Termly topic loan boxes are frequently used to add to non fiction science books used to enhance topics. Other resources for topics are stored electronically on the school network or within our Showbie platform.

If a year group requires specific resources, they should highlight these needs to the Subject Leaders. The library contains a supply of topic books which can be enhanced with Library loans.

Subject Development, Monitoring and Review

The Subject Leaders will maintain an overview of areas taught and standards attained, by:

Monitoring pupil work

Maintaining an overview of National Curriculum coverage

Identifying areas of learning that require development

Supporting colleagues in the teaching of Science, keeping staff informed about current developments in the subject and for providing a strategic lead and direction for the subject in the school

Reviewing and evaluating the annual Action Plan to identify future developments.

Staff Development

A number of external courses are available to staff in addition to school based training. The subject leaders will determine the developmental needs of the school in Science and will subsequently organise training sessions as required within the parameters of whole school development priorities.

Related documentation:

Learning and Teaching Policy

Assessment Policy

Special Educational Needs Policy

Planning Documentation