St. George's Catholic Primary School
'Achieve, Believe, Care.'

Science Policy

Science has changed our lives and is vital to the world's future prosperity. Pupils should be encouraged to recognise the power of rational explanation and develop a sense of excitement and curiosity about natural phenomena.
(Science National Curriculum, 2015).

1. MISSION STATEMENT

St George's Catholic Primary School is a faith community founded on Gospel values, in which a love for learning and life are promoted.

Through a safe and caring environment, all members of the school community are given opportunities to use and display their talents, whilst following in the footsteps of Christ.

2. AIMS:

The aims are 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 science enquiries that help them to answer scientific questions about the world around them
- Ensure pupils are equipped with the scientific knowledge required to understand the uses and implications of science, today and for the future.
- Develop positive attitudes in the children towards Science through our teaching

3. OBJECTIVES:

The children will:

Conduct practical investigations, which capitalise on their own interests from which they can derive valid and well thought out conclusions

Co-operate with other children and teacher in decision making, investigating and communicating results

Be given the opportunity to develop this knowledge and understanding of all the Programmes of study:

1] Working Scientifically
2] Life Processes and Living Things
3] Materials and Their Properties
4] Physical Processes

To help us achieve these aims the follows the programmes of study for science are set out year-by-year for key stages 1 and 2. The relevant programme of study is taught by the end of the key stage.

1. **Working Scientifically:** 'Working scientifically' specifies the understanding of the nature, processes and methods of science. It is not taught as a separate strand. The key features of scientific enquiry allow pupils to learn to use a variety of approaches to answer relevant scientific questions. These types of scientific enquiry include: observing over time; pattern seeking; identifying, classifying and grouping; comparative and fair testing (controlled investigations); and researching using secondary sources. Pupils also seek answers to questions through collecting, analysing and presenting data. '

2. **Life and Living Processes** covers the biology of plants and animals, classification and ecology.

2. **Materials and their Properties** introduces the children to a broad study of materials, rocks, minerals and soils: types of materials and their uses, chemical reactions and the theories that explain the properties of materials

4. **Physical Processes** involves a study of electricity and magnetism, light and sound and on forces. Reference is also made to the study of the solar system.

4. Differentiation / Cross-Curricular Links:

Differentiation is how the content, teaching methods, resources and learning activities are varied to cater for the diversity of experience of the children. It encourages success, not failure. For the less able the activity is broken down and for the more able it is extended.

Whenever possible and suitable Science will be linked with other areas of the curriculum, particularly lending itself well to Maths, English, Design & Technology and Computing.

5. Assessment

Assessment opportunities will be planned so that children are assessed in a regular and continuous basis. Assessments will be made using formal and informal methods, involving written work, discussion work with teacher and peers and observation. The evidence gathered assesses the child's achievement in relation to the programmes of study, whilst Science in the EYFS will be assessed against the Early Learning Goal, *'Understanding the World'*.

Pupil's attainment and progress is tracked across the school, using Insight, an on-line assessment tool. This allows ongoing tracking of each pupil's progress in Science across the school. Children will also be teacher assessed at the end of Key Stage 2, in accordance with the Teacher Assessment Frameworks, stating whether pupils are at expected standard.

6. Equal Opportunity

All children will be given the same opportunity to receive a broad, balanced curriculum regardless of race and gender.

7. Safety

Children should be made aware of the dangers when using certain scientific equipment. The Association for Science Education (ASE) publication "Be Safe" should be consulted if in any doubt.

8. Review

This policy will be reviewed every three years or as required by changes in legislation.