

St. Pius Xth R.C.V.A. Primary School

SCIENCE POLICY

Original Document – 1991
Revised – P.J. Naughton 1995
Revised - M.P. Cudden 1999
Revised - J.M. Quigley 2002
Revised - S. Saunders 2004
Revised – S. Gibson 2014

1. Aims

The aims for science are 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.

2. Objectives

We aim to:

- Stimulate and excite pupils' curiosity about changes and events in the world
- Satisfy this curiosity with knowledge
- Engage pupils as learners at many levels through linking ideas with practical experience
- Help pupils to learn to question and discuss scientific issues that may affect their own lives
- Help pupils develop, model and evaluate explanations through scientific methods of collecting evidence using critical and creative thought
- Show pupils how major scientific ideas contribute to technological change and how this impacts on improving the quality of our everyday lives
- Help pupils recognise the cultural significance of science and trace its development

3. Organisation & Planning

This is arranged by Year Group and delivered by the class teacher. Planning is based upon the National Curriculum 2014.

Working Scientifically					
Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
<ul style="list-style-type: none">• Plants• Animals, including humans• Everyday Materials• Seasonal Changes	<ul style="list-style-type: none">• Living things and their habitats• Plants• Animals, including humans• Uses of Everyday Materials	<ul style="list-style-type: none">• Plants• Animals, including humans• Living things and their habitats• Rocks• Lights• Forces and Magnets	<ul style="list-style-type: none">• Animals, including humans• Living things and their habitats• Electricity• States of Matter• Sound	<ul style="list-style-type: none">• Living things and their habitats• Animals, including humans• Properties and changes of materials• Earth and Space• Forces	<ul style="list-style-type: none">• Living things and their habitats• Animals, including humans• Evolution and inheritance• Light• Electricity

4. Progression

We will use the National Curriculum 2014 to provide a base for expectations.

The teacher will need to ensure continuity and progression through well-considered experiences in which pupils can learn and explore. We will also use the guidance given by Durham County Council within the '**National Curriculum 2014 Progression Guidance**'.

5. Resources

We have a range of resources stored within school. We also have access to a range of resources from the Durham Learning Resources Centre (DLR).

6. Equal Opportunities

All children regardless of their race, sex, religion or ability will be given equal opportunities to develop their knowledge, skills and understanding of geography.

The curriculum is suitably differentiated to suit the needs of all children, including those with special needs. All necessary adaptations will be made to enable all children to access the curriculum.

7. Assessment, Recording and Reporting

Assessment will be an integral part of teaching and learning.

How we assess

Our judgements will be based on evidence which we will gather from the following areas:

1. Observing pupils at work e.g. making an electrical circuit.
2. Questioning pupils about their work e.g. awareness of danger associated with electricity.
3. Making judgements based on work produced by children e.g. development of recording skills.
4. From activities linked to working scientifically.

8. Health and Safety

We will ensure that:

1. All children are trained in the correct use of tools, e.g. scissors, C.D.T. equipment.
2. Children will be taught how to handle glass safely – placing it in a safe location, not running while handling equipment which might break.
3. All activities requiring any form of heat, e.g. working with nightlights will be closely supervised as will electric kettles and hotplates.
4. All aspects of electrical safety will be studied via topics appropriate to AT1.

5. The care of living things will form an important part of science. All animals/plants will be treated with respect and proper planning for their care during holiday periods taken into account.
6. A knowledge of those plants which may present a danger to children must be established, e.g. poisonous plant or are likely to exacerbate hay fever, asthma, etc.
7. A particular mention of children's well being in the study of 'Animals including humans' is made. Danger via water, germs, medicines, plastic bags, inhaling vapours needs to be firmly taught.
8. The physical fitness of each child must be considered while undertaking certain activities e.g. child with heart murmur.
9. Particular care should be taken when children work outdoors. They will be well supervised and follow basic hygiene requirements following work in handling living organisms, e.g. soil, animals.
10. The danger of looking directly at the sun is imperative to safety and the potential hazards of using magnifiers with the sun noted.
11. Take care when disposing of moulds, using a sealed plastic bag and following County guidelines.

9. Monitoring and Review

This will largely take place Termly by scrutiny of topic books and through teachers' planning.