

Mathematics Policy

Mission statement

To follow in Jesus' footsteps, caring for each other when we work, play and pray.

What is Numeracy?

Numeracy is a proficiency, which involves confidence and competence with numbers and measures. It requires an understanding of the number system, a repertoire of computational skills and an inclination and ability to solve number problems in a variety of contexts. Numeracy also demands a practical understanding of the way in which information is gathered by counting and measuring and is presented in graphs, diagrams, charts and tables. (Primary Numeracy Strategy)

Aims and Objectives

Mathematics teaches us how to make sense of the world around us through developing a child's ability to calculate, to reason and to solve problems. It enables children to understand and appreciate relationships and pattern in both number and space in their everyday lives.

We aim:

- to promote enjoyment and enthusiasm for learning through practical activity, exploration and discussion.
- to promote confidence and competence with numbers and the number system.
- to develop the ability to solve problems through decision-making and reasoning.
- to develop a practical understanding of the way information is gathered and presented.
- to explore features of shape and space, and develop measuring skills in a range of contexts.

Teaching and Learning Style

At St. Joseph's School we use a variety of teaching and learning styles in mathematics lessons as recommended by the Primary Numeracy Strategy. Our principal aim is to develop children's knowledge, skills and understanding in mathematics. This is completed usually through a daily, three part lesson that has a high proportion of whole-class or group teaching. The children have the opportunity to use a variety of resources such as number lines, number squares, digit cards and small apparatus to support their learning or ICT which can enhance the modelling of ideas.

In all classes there are children of differing mathematical ability. We recognise this fact and provide suitable opportunities and materials which are matched to the ability of the children. Wherever possible adult support is given to the children to ensure they achieve their potential.

Mathematics Curriculum Planning

Mathematics is a core subject in the National Curriculum, and we use the Revised Primary Numeracy Strategy as the basis for implementing the statutory requirements of the programme of study for mathematics.

Planning for Mathematics is carried out in three phases (long-term, medium-term and short-term).

Long Term – The Revised Numeracy Strategy gives an outline of what objectives we are expected to teach in the long term for each year group.

Medium Term – This planning is completed by the coordinator and specifies which objectives are to be taught in which term for each year groups. Every objective is covered at least once by the end of the year, with the majority being covered each term to consolidate skills.

Short Term – This planning is carried out weekly by the class teacher. These plans include an objective for the mental oral starter and the main teaching activity. It also indicates differentiated tasks, resources and homework. These plans are available in the classroom or the individual planning file for that year group.

Foundation Year

We teach Mathematics in our Foundation Year by relating specifically to the objectives set out in the Early Learning Goals, which underpin the curriculum planning for the children aged 3 to 5. The children are given ample opportunities to develop their understanding of number, measurement, pattern, shape and space through the varied activities that allow them to enjoy, explore, practise and talk confidently about mathematics.

Cross Curricular Links

Mathematics is taught mainly as a separate subject but every effort is made to link maths with other areas of the curriculum. We try and identify the mathematical possibilities across the curriculum at the planning stage. We also draw children's attention to the links between maths and other curricular work so that children see that maths is not an isolated subject.

Teaching Mathematics to Children with Special Needs

Wherever possible we aim to fully include SEN pupils in the daily mathematics lesson so that they benefit from the emphasis on oral and mental work and by listening and participating with other children in demonstrating and explaining their methods.

Where necessary teachers will, in consultation with the SENCO, draw up an Individual Educational Plan for a child. If a child's needs are particularly severe they will work on an individualised programme written in consultation with the appropriate staff.

When planning teachers will try to address the child's needs through simplified or modified tasks or the use of support staff.

Organisation

In K.S.1 mathematics lessons are held on a daily basis and last for approximately 45 minutes. The children are taught in mixed ability classes. When children start in Reception the organisation is more flexible.

In K.S. 2 the daily maths lessons last for approximately one hour. Children in K.S. 2 are grouped according to ability for all maths lessons. There are three ability groups across each year group.

Homework

Children in both Key Stages are given Mathematics homework each week. As a school we follow a Mental Maths Scheme and the children complete one page each week.

Assessment and Recording

We assess children's work in mathematics from three aspects (long-term, short-term and medium-term). We make short term assessments which we use to help us adjust our daily plans. These short term assessments are closely matched to the teaching objectives.

We make long-term assessments towards the end of each term and we use these to assess progress against school and national targets. These enable us to set targets for the next term and make a summary of each child's progress. Progress is discussed with the parents at Parents Evening or through the end of school year report. Information is also passed on to the next teacher so that they can plan for the new school year. We make long-term assessments with the help of end-of-year tests and teacher assessments. We use the national tests for Year 2 and Year 6 plus the optional tests for Years 3, 4 and 5 and assessments built into the current scheme particularly in Year 1.

As a school we are beginning to introduce the APP materials inline with LEA guidelines.

Resources

There is a range of resources to support the teaching of Mathematics available across the school. All classrooms have individual resources to suit the age group and there is a central bank of resources in the Unit. Individual software is also available within each of the classrooms.

Monitoring and Review

Monitoring of the standards of children's work and of the quality of teaching in mathematics is the responsibility of the head teacher / SMT and the mathematics subject leader. The work of the mathematics subject leader incorporates supporting colleagues, being informed about current developments in the subject and providing a strategic lead and direction for the subject within the school.

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