



ENGLEFIELD CE PRIMARY SCHOOL

POLICY FOR MATHEMATICS DRAFT

Sowing the seeds for a flourishing future

The following policy reflects our values and philosophy in relation to the provision and teaching of mathematics. At Englefield CE Primary School it is our aim to provide a high quality mathematics education, essential for everyday life to enable all children to grow and flourish mathematically.

Aims and purposes of Mathematics

Children are encouraged, nurtured and provided with the means to learn that mathematics is a foundation for understanding the world. Mathematics gives children the ability to reason mathematically, a sense of enjoyment and curiosity and helps them to appreciate the beauty and power of the subject.

Through our provision we nurture and nourish children as mathematicians who:

- are fluent in the fundamentals of mathematics;
- develop conceptual understanding;
- recall and apply knowledge rapidly and accurately in a range of contexts;
- reason mathematically following a line of enquiry;
- develop an argument, justification or proof using mathematical language;
- apply knowledge and solve problems - routine and non-routine with increasing sophistication;
- persevere when seeking solutions.

Achieving and Maintaining High Standards

Staff at Englefield understand the factors that lead to high standards in mathematics, and have developed a common approach to teaching mathematics throughout the school.

Mathematics in Englefield is:

- active and fun;
- taught by staff who have deep subject knowledge and are enthusiastic about the subject;
- personalised in resourcing and in delivery to classes, group and individuals;
- embedded in the topics and projects of our creative curriculum.
- a safe subject in which to develop confidence, take risks, make choices and apply mathematics learning;
- a subject where all children grow and flourish and which is inspiring and supportive of both those individuals who need consolidation with reasonable adjustments and those who require further breadth and application;
- taught by the Class Teacher, supported by a team of Teaching Assistants, to ensure whole class and guided maths is highly effective and nurturing;
- consolidated at home with families using a wide range of learning resources (on and off screen) which ensure fun and creativity.

Mathematics teaching across our school demonstrates the following key aspects:

- Programmes of Study in the National Curriculum in England KS1 and KS2, The Statutory Framework for the early years foundation stage (EYFS) and White Rose Maths (EYFS - Y6) are followed and referred to in planning;

- teachers are mindful of the balance in topics taught and ensure there is breadth of coverage during a school year, with a particular emphasis on place value and calculation, using the White Rose Long Term Maths Plans for guidance;
- calculation methods are taught in line with the school Calculation Policy;
- concrete materials are used to ensure mastery of mathematical concepts. Children move from concrete, pictorial to abstract when ready regardless of age or year group;
- problem solving and reasoning are an integral part of mathematics teaching and learning everyday;
- the majority of children grow and flourish as Mathematicians to achieve and maintain age-related expectations (ARE) or exceed them;
- movement through the programme of study is broadly at the same pace for all children with teachers deciding when to progress. This should be based on the children's mastery of the concepts and their readiness to progress to the next stage;
- those children who master concepts rapidly should be challenged through being offered rich and sophisticated questions and activities before acceleration through content;
- those children who are not sufficiently fluent in earlier concepts should consolidate their understanding through varied effective practise (rather than more lessons) before moving on to ensure they grow and flourish as mathematicians relative to personal starting points;
- extra-curricular maths clubs are offered to those pupils who require additional support, particularly in KS2;
- specific praise and next steps marking/feedback promotes reflection on learning and enables children to practise and extend their learning;
- self and peer assessment is used regularly to inform teacher assessment and subsequent planning is adjusted to reflect this.

Planning

The long-term planning (based on White Rose Maths) gives details of the topics covered during each term. These topics cover the requirements of the National Curriculum and the Statutory Framework for the EYFS. Each topic is supported by a White Rose Maths Scheme of Work which includes timescales and objectives (small steps). White Rose Maths provides resources which support the teaching of the topic: videos, teaching slides, true or false activities, written work, problem solving, reasoning and flashback questions.

Whilst teaching is based on this Long and Medium Term Plan, the mathematics lessons taught daily make effective use of the wealth of different teaching styles, formats and resources (manipulative based, paper based and computer based). Staff recognise that it is necessary to use a variety of resources, teaching styles and methods to ensure all children grow and flourish mathematically. Teachers select appropriate activities for the lesson. These activities may involve use of the White Rose Workbooks or White Rose questions for written work.

Organisation of Mathematics Lessons

In the Early Years Foundation Stage, mathematics is underpinned by the characteristics of effective learning. Child-initiated learning opportunities are cross-curricular and children experience a wide range of open-ended problems and resources, both indoors and out. Mathematics is also taught as a discrete subject through child-led themes. Adult-led lessons are short with the opportunity for children to then go and explore what they have learnt through playing with resources which have been carefully planned to enhance the learning. This continues in Year 1 and 2, with longer adult-led lessons, group activities and independent learning opportunities. In Key Stage 2 mathematics is taught daily for 60 minutes. In addition, all opportunities to make links within the mathematics curriculum and wider curriculum and times to practise mathematical fluency are exploited.

Assessment, Recording and Reporting

Assessment in mathematics is viewed as part of the planning, teaching and assessment cycle. Learning objectives (WALT) and success criteria are shared with the children. They are then provided with opportunities for self/peer-assessment and given time to practise and improve. Marking and feedback needs to nurture

progress and must be positive, specific and developmental. Children are provided with next steps to practise, consolidate or extend their learning at least weekly. Teachers monitor the acquisition of skills, knowledge and understanding through appropriate teacher intervention, the learning as recorded in maths books, observations, discussions and guided mathematics with groups and individuals and end of topic assessments. Teachers assess children regularly against a selection of statements for their year group as specified in the Statutory Framework for the EYFS and the National Curriculum. A summative assessment is carried out annually and the results are reported to parents in a child's Annual School Report in the Summer Term. In addition to this, parents are also informed about their child's current progress and attainment during the year at Parent Teacher Meetings.

Equal Opportunities

This Mathematics Policy firmly supports the equal opportunities philosophies of our school. All children will have access to the mathematics curriculum and be nourished and nurtured as mathematicians.

Special Educational Needs and Disabilities

To enable all children to be nurtured and nourished as they develop as mathematicians, reasonable adaptations will be made to the curriculum, to equipment and to resources. This allows access to mathematics for children with SEND, including provision for children who are working well above the expected level for their year group.

Curriculum Leadership

The role will include:

- inspiring an exciting and creative approach to Mathematics teaching in line with the new National Curriculum thereby enabling the subject to grow;
- nurturing and encouraging effective mathematics teaching through advice, guidance, CPD and resources;
- reviewing the Mathematics Policy and supporting documents and monitoring its implementation;
- regularly evaluating the mathematics Scheme of Work (White Rose) and amending as necessary;
- the management, maintenance and storage of resources;
- organising pupils' participation in mathematics workshops and events;
- effectively managing the mathematics budget;
- reporting to parents, governors and others when appropriate.

Management of Policy

School: This policy is implemented and managed by the Headteacher and all school teaching staff.

Governing Body: The Governing Body (led by the Development Committee) will monitor, review and update this policy.

Review: This policy will be reviewed in accordance with the agreed cycle of review or whenever there is a need to comply with new legislation or codes of practice, new initiatives, changes in the curriculum, developments in technology or changes to the physical environment of the school.

Approved: Spring 2024

Next Review: Spring 2026