

Inspire ★ Believe ★ Achieve

'Don't let anyone look down on you because you are young, but set an example for the believers in speech, in conduct, in love, in faith.' 1 Timothy 4:12

Mathematics Policy

Intent

At Yealand CE Primary School, we view mathematics as essential to everyday life, critical to science, technology and engineering, and necessary for financial literacy and most forms of employment. A high-quality mathematics education therefore provides a foundation for understanding the world, the ability to reason mathematically, and a sense of enjoyment and curiosity about the subject. The school's inclusive way of teaching maths in grounded in the belief that all pupils can achieve.

Using the programmes of study from the National Curriculum it is our aim to develop:

- A positive attitude towards mathematics as an interesting and attractive part of the curriculum.
- Competence and confidence in mathematical knowledge, concepts and skills.
- An ability to solve problems, to reason, to think logically and to work systematically and accurately.
- Initiative and ability to work both independently and in cooperation with others.
- An ability to communicate mathematics.
- An ability to use and apply mathematics across the curriculum and in real life.
- An understanding of mathematics through a process of enquiry and experiment.
- Personal qualities such as perseverance, independent thinking, cooperation and self-confidence through a sense of achievement and success.

Implementation

At Yealand CE Primary School, we are committed to providing a motivating, challenging and comprehensive maths curriculum that is accessible to all and links the use of mathematics across a range of subjects, adding meaning to the learning of maths. Our whole school approach to the teaching and learning of maths involves the following;

- Practical activities and mathematical games
- Problem solving tasks
- Individual, group and whole school discussions and activities
- Open and closed tasks
- A range of methods of calculating e.g. mental, pencil and paper/wipe board, practical and formal
- Working with iPads and computers as a mathematical tool.
- Cross curricular issues to extend and promote mathematics

At KS1 and KS2, teachers use the National Curriculum for Teaching Mathematics and the Lancashire Mathematics Programme to ensure that all parts of the National Curriculum Programme of Study are taught.

The National Curriculum for Mathematics (2014) describes in detail what pupils must learn in each year group. Combined with our Calculation Policy, this ensures continuity and high expectations for attainment in mathematics.

Our school scheme of work is a working document composed of ongoing plans produced on a week by week basis. Plans are developed from the National Curriculum for Mathematics and the Lancashire Mathematics Programme and take into consideration the needs of all our children. Yealand embraces the unique opportunity through the school class structure and staffing to personalise the curriculum to meet the needs of individual children, enabling pupils to maximise their potential in this core subject. Each class group is responsible for the mathematics in their class in consultation with the Mathematics Subject Leader. The approach to the teaching of mathematics within school is based on three key principles:

- 1. A daily Mathematics lesson (between 45 and 60 minutes) and weekly Mental Maths & times table sessions (KS2 only).
- 2. A clear focus on direct, instructional teaching and interactive oral work with the whole class and group.
- 3. An emphasis on mental calculation and place value.

Children in Little Owls (Nursery) and Robin Class (Reception) follow the Foundation Stage Curriculum for Mathematics, as they make progress towards and where appropriate beyond the Early Learning Goals.

Towards the end of reception teachers aim to draw the elements of a daily mathematics lesson together so that by the time they reach Year 1 children are familiar within a 45 minute lesson.

'Maths Mastery' teaching takes place across all year groups, supporting the National Curriculum, with no differentiation to new content. Sufficient time is spent on key concepts to ensure learning is well developed and deeply embedded before moving on. A concept is deemed mastered when learners can represent it in multiple ways, can communicate solutions using mathematical language and can independently apply the concept to new problems.

Impact

Yealand's successful approach to the teaching and learning of maths, results in a fun and engaging curriculum that embeds understanding and knowledge through hands on, practical activities. Introductions to concepts using concrete materials and practical activities supports learning through memorable activities and 'games' which children can recall at a later date, relating the learning to new situations. In lessons, teachers speak with children, who are encouraged to share their misconceptions and misunderstandings and become proficient in using appropriate vocabulary in doing so.

Assessment

As with all aspects of the curriculum, ongoing assessment takes place in Mathematics. This formative assessment is used to plan next steps and short tasks are set to assess pupil knowledge and understanding alongside application of skills. Termly assessments are recorded in the Dimensions tracker, the whole school assessment system, alongside cohort paper-based trackers, as year group entering, developing, secure and greater depth. Some children are working below their year group expectations and this is recorded accordingly.

Performance Indicators

Performance Indicators, which are the criteria for success of the school's mathematics policy at Yealand CE Primary School, are:

- Early Years Foundation Profile (Statutory Assessment)
- KS1 results (Statutory Assessment)
- KS2 results (Statutory Assessment)
- Dimensions data analysis (using end of term assessments)
- Pupil voice (enjoyment of maths and their ability to talk confidently about what they are doing)

Resources

Mathematical resources are stored in dedicated areas within each classroom. These areas are clearly labelled and easily accessible to all children in Reception and KS1, in the KS2 class resources are stored centrally for all year groups but there are Mathematical resource baskets that pupils can use during every lesson if they wish.

Monitoring and Evaluation

The mathematics subject leader works alongside all the teachers; monitoring and evaluating the quality and standards of mathematics throughout the school. Opportunities to review the scheme, policy and published materials are given on a regular basis during staff meetings.

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Review Date...annually or sooner

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