

Aim High....Fly High!

Statement of Curriculum Intent - Maths

The Big Ideas / Key Concepts for Maths are:

Fluency Reasoning Problem solving

The overarching aim of the Maths curriculum at Duxford CofE Community Primary School is for our children to become fluent in the fundamentals of mathematics, including through varied and frequent practice with increasingly complex problems over time. Pupils will understand that Mathematics is an interconnected subject in which pupils need to be able to move fluently between representations of mathematical ideas. Children will develop the resilience in order to help them make rich connections across mathematical ideas to develop fluency, mathematical reasoning and competence in solving increasingly sophisticated problems. They should also apply their mathematical knowledge to science and other subjects across the curriculum.

Our aim is that children leave this school:

- Are confident in their ability to recall and derive key mathematical facts.
- Are competent and have had wide experience in all mathematical areas, including: place value, calculation, geometry, fractions, statistics and algebra.
- Are fluent and confident using a full range of mathematical terms.
- They are secure in their ability to discuss, probe and remedy their misconceptions.
- Are resilient and able to use their growth mindset to solve problems.
- Are able to self -regulate and work systematically to get from the start to an end result.
- Are able to work independently and collaboratively where such opportunities should arise.
- Are curious to ask mathematical questions.
- Make mathematical links across different mathematical areas and in real life.

The curriculum coverage ensures this by:

- Using a mastery approach.
- Ensuring small steps from concrete to abstract through 'Build it, Draw it, Say it, Write it.'
- Use of models and images to consolidate and support understanding.
- Discrete teaching of Mathematical vocabulary and stem sentences.
- Providing opportunity for mathematically rich discussions amongst peers.
- Interleaving to allow learners the opportunity to revisit, rehearse and build on prior learning.
- Making links to Maths both in the real world and within other topics.
- Providing open-ended, investigative activities and problems that have more than one possible answer to find.
- Allowing learners to appraise and modify their work.
- Using a range of tasks and activities such as 'odd one out', 'spot the mistake', 'examples and non-examples.'

Teaching should: ensure that there is a regular review of prior learning at the start of each lesson. Key vocabulary should be actively taught and definitions learned by children and these should be displayed in the classroom. Lessons should be planned so that children learn important information in a logical, small step sequence. Key mathematical skills and ideas should be interleaved between units. Teaching should encourage discussion; children should learn how to agree, disagree and justify their mathematical opinions. Practical, investigative activities should be provided and skills such as resilience, self-motivation and self-regulation should be actively taught. Feedback should be provided regularly with opportunities to discuss and remedy misconceptions. Progress should be monitored carefully and rapid intervention should be considered if it is felt required.

Progression through the subject: is planned to ensure that the content of the National Curriculum is taught in a logical, small-step way that builds on previous knowledge and skills.

Curriculum progression is as follows: See subject implementation map.

We ensure that this curriculum links with other areas of curriculum by providing experiences and opportunities that both support and develop knowledge, language and skill.