

Linton Primary School - Maths Policy

Basic principles

1. Learning is a change to long-term memory.
2. We believe in a teaching for mastery approach assuming that everyone can learn and enjoy mathematics.
3. Teachers continually develop their specialist knowledge for teaching mathematics, working collaboratively to refine and improve their teaching.

Curriculum intent model

1. Mathematical learning behaviours are developed such that pupils focus and engage fully as learners who reason and seek to make connections.
2. Lesson design links to prior learning to ensure all can access the new learning and identifies carefully sequenced steps in progression to build secure understanding.
3. Examples, representations and models are carefully selected to expose the structure of mathematical concepts and emphasise connections, enabling pupils to develop a deep knowledge of mathematics.
4. Procedural fluency and conceptual understanding are developed in tandem because each supports the development of the other.
5. It is recognised that practice is a vital part of learning, but the practice must be designed to both reinforce pupils' procedural fluency and develop their conceptual understanding.
6. Pupils are taught through whole-class interactive teaching, enabling all to master the concepts necessary for the next part of the curriculum sequence.
7. In a typical lesson, the teacher leads back and forth interaction, including questioning, short tasks, explanation, demonstration, and discussion, enabling pupils to think, reason and apply their knowledge to solve problems.
8. Use of precise mathematical language enables all pupils to communicate their reasoning and thinking effectively.
9. If a pupil fails to grasp a concept or procedure, this is identified quickly, and gaps in understanding are addressed systematically to prevent them falling behind.
10. Significant time is spent developing deep understanding of the key ideas that are needed to underpin future learning.
11. Key number facts are learnt to automaticity, and other key mathematical facts are learned deeply and practised regularly, to avoid cognitive overload in working memory and enable pupils to focus on new learning.

Implementation

1. Our curriculum design is based on evidence from cognitive science:
 - Learning is most effective with spaced repetition.
 - Retrieval of previously learned content is frequent and regular, which increases both storage and retrieval strength.
2. Assessment and progress is recorded at the end of each half term on itrack.
3. Teachers plan sequences of lessons using a range of resources including NCETM, Maths No Problem and White Rose.
4. Mixed age classes, are organised in 1 of 3 ways:
 - Split teaching within the classroom shared between teacher and TA
 - Classes reorganised in maths lessons for single age teaching
 - Whole class teaching planning sequences of lessons that go across 2 year groups.
5. Early Years plan and teach lessons following and using resources from NCETM Mastering Number. Year 1 and 2 teach 15 minute Mastering Number lessons in addition to their main maths lessons.

Impact

1. Assessment and progress is recorded at the end of each half term on itrack and reported to SLT and governors.
2. We run moderation meetings for all year groups, where we invite teachers from local schools to attend which allows us to share good practise, agree expectations and level children's work (on track/not ontrack)
3. Planning and work are regularly monitored to check children are using appropriate models, images and representations.
4. We use lesson observations to see if the pedagogical style matches our expectations.