

INTENT

At Marwood School, all adults and children believe that we learn maths better when we are curious, resourceful, resilient and collaborative.

Our aim is to equip all pupils with the skills, confidence and motivation to become fluent in the fundamentals of mathematics. To give all children opportunities to deepen their understanding of mathematics through solving a range of real-life problems and reason mathematically through justification and proof. Children are encouraged to see the mathematics that surrounds them every day and enjoy developing vital life skills in this subject.

We follow the Jurassic Maths Hub and their underlying principles for the teaching of mathematics and therefore at Marwood you will see:

- All children working on the same focus with different support provided to enable all children to access the mathematics
- Children behaving as mathematicians as part of a mathematics community, including:
 - Making decisions both independently and collaboratively
 - Working flexibly to answer questions, reflecting on the efficiency of their chosen methods
 - Making conjectures and generalisations, applying and testing them
 - Having a go, willing to share even when unsure and understanding that this is when learning is taking place
 - Being comfortable with not getting everything 'right', embracing struggle
 - Talking mathematics:
 - Articulating their thinking
 - Taking responsibility for asking questions of others to clarify understanding
 - Agreeing and disagreeing and justifying their thinking
 - Responding in full sentences with the intention that everyone understands them
 - Exploring the mathematics guided by the teacher
 - Working and learning collaboratively
- The use of subject-specific vocabulary by all adults and children in the school from EYFS onwards
- The use of questioning to develop understanding, reasoning and to build back our mathematics community.

We also follow the views of John Holt, adapted by the NCETM and believe that children really understand a mathematical concept, idea or technique if they can:

- Describe it in their own words;
- Represent it in a variety of ways (e.g. using concrete materials, pictures and symbols)
- Explain it to someone else;
- Make up their own examples (and non-examples) of it;
- See mathematical connections between it and other facts or ideas;
- Recognise it in new situations and contexts;
- Make use of it in various ways, including in new situations

* *Adapted from NCETM adapted from John Holt 'How Children Fail' 1964

The intention of teaching for mastery is to give all children access to equitable classrooms; classrooms where they can all participate and be influential, and classrooms where they are encouraged and supported to develop a deep connected and sustained understanding of the mathematics being explored.

(Jurassic Maths Hub Teaching for Mastery Statement)

IMPLEMENTATION

At Marwood school you will see:

- Hamilton Trust being used as a tool to ensure progression between year groups and coverage of all objectives.
- Planning being adapted to suit the needs of the children and to align with our mathematical intent.
- Reasoning and problem solving activities planned to enhance Hamilton Trust planning, including tasks from NRich, NCETM and White Rose.
- Use of worked examples to ensure children attend to the specific concept or representation we want them to discover or understand.
- Use of reviews to assess, strengthen and embed prior understanding and connect it to content of the lesson.

Children who are in need of extra support, beyond high quality first teach, will be supported via one of the following interventions / groups:

- Pre-teach groups where children are taught helpful starting points for the next lesson before the lesson begins. This is additional to maths lessons.
- Pick – me – up groups – where a child has struggled in the lesson and require 1:1 or small group work the same day to resolve any misconceptions before they embed. Ensures children are caught up and ready for the next lesson.
- Counting 2 calculating intervention
- Small group intervention on a specific need based on analysis of assessments.

LEADERSHIP, ASSESSMENT AND FEEDBACK

The maths leader has a clear role and overall responsibility for the progress of all children in maths throughout school. Key data is analysed and regular feedback is provided, to inform on progress and future actions.

- Assessment informs next steps in teaching and learning for each individual child to ensure challenge alongside a 'keep up, no catch up' culture.
- Feedback is given on children's learning in line with our feedback policy. Formative assessment within every lesson helps teachers to identify the children who need more support to achieve the intended outcome and who are ready for greater stretch and challenge through planned questioning or additional activities.
- In order to support teacher judgments, children may be assessed using current and reliable tests in line with the national curriculum for maths. Gap analysis of any tests that the children complete is undertaken and fed into future planning.
- Summative assessments are completed at the end of the academic year and reported to parents in the end of year report.

IMPACT

- Children at Marwood School achieve well in maths. 2021 KS2 end of year data: WT:18% ARE: 59% GD: 24% (ARE and GD: 83%)
- We have a community of enthusiastic mathematicians who are proud to show their skills.
- Children demonstrate a quick recall of facts and procedures. This includes the recollection of the times table.
- Children show confidence in believing that they will achieve.
- Children can move between different contexts and representations of maths.
- Children recognise relationships and make connections in maths lessons.
- Children show a high level of pride in the presentation.

EYFS

Our EYFS mathematics provision is important to us with it being a specific area. Adjustments have been made to incorporate the changes of the 2021 Framework.

Children are taught using a variety of mathematical resources to expose the structure of the mathematics as a starting point. Children build on these images and enter year 1 with a secure foundation of skills.

Our maths lead is: Rosie Polak