

NORTH WEST LONDON JEWISH DAY SCHOOL

MATHS POLICY

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Rationale:

We aim to develop a positive attitude to mathematics so that all pupils can learn to use mathematics with confidence, understanding and enjoyment. We believe that mathematics is a relevant and important part of everyday life and provides us with a means for understanding, communicating, and organising information and providing the tools for solving problems.

Aims and objectives:

The mathematical aims of our school are:

- To promote enjoyment, confidence and enthusiasm for learning mathematics
- To give children a wide variety of mathematical experiences
- To promote children's competence with understanding in the concepts and skills in the 7 areas of Maths (Number & Place Value, Addition & Subtraction, Multiplication & Division, Fractions, Measurement, Properties of Shape, Position and Direction) as required by the National Curriculum
- To implement a problem solving approach to mathematics, being able to utilise the skills learnt in different situations.
- To enable children to become independent learners
- To develop in each child the correct usage of mathematical vocabulary
- To give all children equal access to mathematics regardless of race, culture, gender or any special need
- To monitor and support the progress and development of mathematics teaching and learning within the NWLJDS community.

Time Allocation:

Maths is taught daily from Years 1-6 with all lessons having a duration of 45 minutes. Maths Homework is also given once a week in Years 2-6.

Planning/Schemes of Work:

In the Early Years Foundation Stage, mathematics is integrated into the topic work and the different areas of the classroom setting. Mathematics is one of the four specific areas in the Early Years Foundation Stage Curriculum and children work through Developmental Matters, which underpin the curriculum planning for children aged between 0-5 years old. It is hoped that children will have achieved the Early Learning Goals by the end of Reception. All children are given ample opportunity to develop their understanding of number, measurement, pattern, and shape and space through varied activities that allow them to enjoy, explore, practise and talk confidently about mathematics.

For Years 1 - 6, long term planning is taken from the revised 2014 National Curriculum and covers the full range of the mathematics that is relevant for each year group. In addition to this, a Maths Mastery approach is used to ensure that children develop a deep understanding of the concepts taught within the curriculum.

Short term planning is done on a weekly basis. These outline the adults and pupil's roles in the lesson.

Teaching and Learning:

A variety of teaching styles are used, which include, whole class, group and individual, depending on the content and aims of the mathematical activity. Teachers use a variety of visual, auditory and kinaesthetic means to deliver their lessons.

Lessons follow the structure of an arithmetic recap to consolidate understanding of previously taught topics and a HOT (Higher Order Thinking) starter, which aims to sharpen and develop mental and oral skills. This is followed by the main teaching activity where the teacher introduces or continues with a topic and pupils carry out activities in groups, pairs or individually. The lesson finishes with a plenary where the teacher draws the class together to reflect on what has been learnt, summarising key points and ideas and going over any difficulties/misconceptions.

This is not a mechanistic recipe. Teachers use their professional judgement to determine activities, timing and organisation of each part of the lesson to suit the objectives being taught.

Interventions are in place throughout the school for pupils, as and when they are deemed necessary by the teacher, in accordance with the child's progress and attainment.

Homework gives the opportunity to reinforce and secure the concepts and skills learnt in the lesson.

The calculation methods taught for addition, subtraction, multiplication and division have been renewed based on the revised 2014 National Curriculum. Please see the updated Calculations Policy.

Pupils recording:

Children record their work:

- To secure the concepts and skills learnt through recording and practice
- To provide a means of assessment for learning for the staff, which in turn provides the necessary platform for the best planning to further the education of the children
- To provide summative assessment to evaluate the attainment and progress of the pupil
- To help clarify the pupil's own thinking
- To help them to realise the relevance of mathematical activities to everyday life
- To provide evidence of their work in mathematics
- Recording/evidence may take the form of photographs, drawings, models, discussions as well as writing.

Targets

Children are expected to achieve the key learning objectives for their year group whilst progressing at the best possible pace for their own development. Targets are given to parents at each Parent's Evening and are renewed termly.

Staff regularly monitor these targets to see that children are consistently progressing and are never 'coasting'. There are also termly Pupil Progress meetings to discuss the progress and needs of individual children with the Headteacher and Deputy Headteacher. These meetings are also supported by the ECM team.

Assessment

Formative assessment carried out by the class teacher is used to inform future planning. It involves identifying children's progress against teaching objectives, determining what children have already achieved and moving them on to the next stage of learning.

Planning should clearly reflect individual children who should be focussed upon.

In December, April and June, there are summative testing to enable the school to track the progress of each child. The assessments for the children in Years 2 and 6 are the statutory SAT's and Years 1, 3, 4 and 5 sit termly assessments to track pupil progress and inform future targets and planning. In June, Year 4 pupils sit the statutory 'Multiplication Tables Check' online.

Differentiation

In Maths, children are given tasks appropriate to their individual needs. Children may be given:

- Different tasks or tasks which have been simplified or extended or modified to help them access the particular part of the curriculum
- Different resources to help them
- Differing levels of support by the teacher or other adult
- Open-ended tasks which will allow for a range of different outcomes

Equal Opportunities

All children cover the content made statutory by the programme of study within the revised National Curriculum, but may do so at different stages as judged appropriate according to termly Pupil Progress meetings. It is expected that all children will meet the national standard for Maths at the end of KS2 with a high percentage obtaining the "higher level" (commonly referred to as Greater-Depth). They are given opportunities to become independent learners and to improve their confidence. Children access the curriculum at the appropriate level, thus ensuring progression. The learning is broken down into manageable steps. Children are made aware of their own successes and how they can move to next steps through Staff feedback given orally and through written marking.

Children who are assessed as having special educational needs in Mathematics are given individual targets, which form part of the pupil's IEP. These targets are discussed and reviewed with parents and the child on a termly basis.

Cross-curricular links

As in everyday life, Maths is not seen in isolation and, wherever possible and relevant, links are made with other curriculum areas through whole school activities such as Maths Days and 'challenge' opportunities to help apply concepts taught in distinct lessons to real life contexts.