

DURANTS SCHOOL – POLICY DOCUMENT

MATHEMATICS

Reviewed & updated: May 2021 (John Ryan) Next review date: May 2024

Introduction

This policy aims to provide information about how the area of Mathematics is delivered at Durants School. It is aimed at all staff within the school, support workers and Governors at Durants School. It is also available to parents and any other interested parties. As one of the six areas of learning in the Foundation stage Curriculum, and one of the core subjects in the National Curriculum, Mathematics has a key role in providing a broad and balanced curriculum for the pupils at Durants School.

Principles

- Mathematics is seen as important in teaching children to make sense of the world around them by developing as far as possible an ability to calculate, to reason and to solve problems. It also has an important role to play in helping children to understand and appreciate relationships and patterns in number and space in their everyday life.
- All students should be involved in regular, planned mathematical experiences and activities as part of their weekly timetable. The activities should be relevant to the pupil and meet individual needs. Account should be taken of age appropriateness and developmental stages, so that each student can be enabled to reach his/her potential.
- Pupils will be provided with the opportunities to maintain, reinforce, consolidate and generalise previous learning, as well as introducing new knowledge, skills and understanding. Some pupils, at first, may access mathematical concepts through personal exploration using a sensory approach/practical activities before moving onto more abstract concepts
- Mathematics should be seen as an entitlement of all pupils at Durants School, and as a key element in equipping pupils with skills for an independent adult life.
- To maximise pupils learning, Mathematics should be delivered in a variety of ways including conventional lessons, structured play activities, cross curricular topics, leisure provision, life skills activities and community experiences. Each method will be relevant for different pupils at different times, and this should be reflected in planning.

Procedures

Lower and Middle Departments – The children in these departments are of KS3-KS4 age. Due to the nature of our children they are mainly working below the expected level for their age so it is imperative that we correctly adapt the Maths curriculum to suit their individual needs. To achieve

DURANTS SCHOOL – MATHEMATICS POLICY

this Durants has created its own programme of study for Mathematics, in order to set suitable learning challenges for our pupils, to respond to our pupils' diverse learning needs and to include all learners by overcoming potential barriers to learning and assessment. The programme of study ensures continuity, progression and full subject coverage, providing the basis for developing our Schemes of Work.

To support this the children will be covering objectives set out within the Early Years Foundation Curriculum, and Key Stage 1,2, 3 and 4 of the National Curriculum. The Middle department students will be using the AQA Entry Level units (1,2 or 3) to achieve these outcomes and if successful, pupils will gain an Entry Level qualification.

One of our key learning aids to help support pupil's understanding of Number and Algebra is Numicon. All Teacher's and Teaching Assistants will be trained in the use Numicon as a tool to support our children's learning and understanding of number.

Upper Department- The upper department focuses on developing Maths skills to use in everyday life e.g. Use of money when out in the community. For this the children will follow the AQA Unit Award Scheme which is differentiated to suit the individual pupils need, as well as providing those who are successful with a qualification. Each class teacher will select the units at the start of the year and monitor pupil progress throughout.

ARP- The ARP at Winchmore follow the National curriculum at Key stage 2, 3 and 4 through the Entry Level scheme of work. At the end of each level pupils will partake in an exam matched to the level of their ability, so they can gain the appropriate qualification. All key mathematical concepts will be taught through a scaffold approach, (taking into account the pupils' individual need) to ensure their reach their full potential.

Students that are meeting age related expectations can also access GCSE Mathematics taught by subject specialists as part of the Winchmore School mainstream classes.

Areas to be covered include:

Foundation Stage: Number, Shape, Space and Measures

National Curriculum: Number and Algebra, Shape Space and Measure, Data Handling, with Using and Applying running through the key areas, Entry Level Maths (levels 1, 2 and 3).

Post16: AQA Unit Awards which focus on Number, Money skills, Numeracy in Everyday Life and Using and applying.

DURANTS SCHOOL – MATHEMATICS POLICY

Recording and assessment.

Planning, recording, record keeping, assessment and reporting are crucial in ensuring that pupils receive continuity throughout their school lives. Progress is monitored by using I CAN Statements and CASPA. This enables pupil progress to be tracked throughout each academic year, highlighting each individual's strengths and areas that need developing. Termly progress meetings between teaching staff and SLT allows for further discussion around individual progress in all areas of Maths, as well as highlighting any whole school trends in regards to pupil performance . All assessments should inform future planning to allow children to continually develop their understanding of mathematical concepts.

The following documents are also used to enable departments to work collaboratively and ensure pupils follow an agreed programme:

- Durants School Mathematics Policy
- Durants School Maths Programme of Study
- Durants School Maths Scheme of Work
- Early Years Foundation Stage
- National Curriculum
- AQA Entry Level Mathematics and AQA Unit Award Scheme Maths Units.
- Numicon
- Pathways to Independence

All Mathematics teaching and learning will be assessed in line with the assessment and tracking systems.

Different types of assessment will be required for specific purposes and will include:

- Self-assessment (where applicable)
- Summative assessment (based on this curriculum and the use of National Curriculum P-Level descriptors and I Can statements).
- Assessment for Learning

Assessment will be demonstrated by teachers through the use of

- The Durants school Marking and Feedback Policy
- Moderation
- Progress Meetings
- I Can Statements
- Photographic/ Video evidence
- Next Steps

DURANTS SCHOOL – MATHEMATICS POLICY

This data will be monitored by the Senior Leadership Team and Assessment Co-ordinator on a termly basis.

At the end of each National Curriculum Key Stage, an assessment of each pupil's level within the National Curriculum will be recorded and this information will be passed to parents. Parents are also informed about their child's I CAN level annually at the annual review and end of year report.

Good Practice

- Mathematics practice should be consistent across the school.
- There should be a minimum of two Maths lessons taught each week, one number and one topic
- Pupils should build on their skills, knowledge and understanding of mathematics, and develop an awareness of the importance of maths in their everyday lives. Therefore activities should involve both first hand exploration and practical tasks. These activities should be planned for outdoors and other learning environments and should reinforce mathematical ideas, concepts and skills. In this way pupils will be given the opportunity to generalise and transfer their skills.
- As well as discrete maths lessons, pupils should be given the opportunity to encounter the use of mathematical skills at other times in the school day and in other subject areas.
- It is school policy to ensure that equal opportunities are provided for each pupil to enable them access to learning and teaching styles which respond to their individuality.
- The teaching of mathematics will be monitored on a regular basis by curriculum coordinators and Senior Management and support will be provided as required.