Mathematics Policy

This policy will be reviewed every 2 years.

Reviewed and agreed by:

Subject Lead:…….

Headteacher:……..

Date:

Next review: Summer 2023

MATHEMATICS POLICY

Values and aims:

At Ditcheat Primary School we aim to provide high-quality mathematical learning that will provide our pupils with a foundation for understanding the world around them, heighten their curiosity and reasoning of number and mathematical concepts, and give them an appreciation and enjoyment of maths.
Our goal is to

- Provide high-quality teaching of mathematical concepts
- Enable pupils to acquire and develop mathematical language, skills, knowledge and understanding within their individual capabilities
- Present mathematics as an enjoyable and interesting activity, involving enquiry and experimentation
- Develop pupils who are fluent and 'master' all areas of mathematics.
- Equip pupils with strategies to enable them to apply mathematics to real and unfamiliar situations within and beyond the classroom
- Nurture a pupils' love for the subject
- Build confidence and a positive attitude towards maths
- Provide opportunities for pupils to make an active contribution to their own learning by developing the skills of independence and enquiry
- Provide opportunities for pupils to think about maths creatively, logically and methodically
- Ensure pupils leave Ditcheat Primary School with the skills, knowledge and understanding needed in daily life

Teaching and Learning

- A dedicated daily mathematics lesson is planned in each class, which is taught for up to 60 minutes. In the Early Years Foundation Stage (EYFS), there will be opportunities for mathematical activities daily.
- Mental Arithmetic sessions also take place daily in each class for up to 15 minutes. This takes place at a separate time from the regular mathematics lesson.
- The teaching programme is based on 'key questions' and is planned thoroughly to ensure high expectations and progression. Teachers plan and deliver lessons to suit the individual learning styles of pupils within a class.
- Teachers adapt the learning to suit the needs of **all** pupils to ensure that pupils access work at the age related expectation.
- Opportunities are provided across the curriculum to develop and apply mathematical skills e.g. measuring and collecting data in Science and using properties of shape and pattern in art.
- Teachers use, and expect pupils to use, correct mathematical notation and vocabulary.
- Calculators are used when appropriate.
- Homework is often used to consolidate pupil's learning from maths lessons, as well as pupils using Times Table Rock Stars at home regularly.
- Pupils develop their understanding of a maths topic by developing their **fluency**, **reasoning** and **problem solving** skills.

- Pupils develop a range of strategies when solving a calculation or problem. This could include using **concrete** resources, **pictorially** or using **abstract** methods.
- Teachers develop mathematical concepts using concrete resources, pictorially, and utilising abstract written strategies.
- **Bar models** are used across school to develop pupils' understanding of calculations and problems.

Curriculum and Planning

Teachers use many resources to plan and deliver maths lessons. Planning is based on the National Curriculum programme of study for Mathematics (2014).
Additional planning materials are also used to direct the planning in a mastery approach:
White Rose Maths Hub resources
NCETM
I see reasoning and I see problem solving (by Gareth Metcalf)
Nrich
All pupils are taught at the expected standard for their age, with the opportunity to achieve 'greater depth'. For pupils with SEN, work is adjusted and personalised to ensure they are able to access the learning in the lesson. Pupils in EYFS are given opportunities to explore mathematical concepts, according to the Early Learning Goals.

Target Assessment and Recording

Teachers mark pupils' work daily, in line with the Marking Policy, to inform and adapt their planning. Based on the marking, teachers use their professional judgement to identify pupils for addition intervention or pre-teaching time which is given daily. See the Marking Policy for further information.
Formative assessment are used across the school termly (taken from the White Rose Maths Hub termly assessments) to ascertain attainment of pupils. Mathematics SATs are taken at the end of Key Stage 1 (Year 2) and the end of Key Stage 2 (Year 6).
Pupils in EYFS are assessed against the Early Learning Goals.
Parents are informed of their children's progress through termly reports or at parents' evenings in the autumn and spring terms.
Mental arithmetic assessments are carried out regularly throughout the whole of Key Stage 1 and Key Stage 2 to improve pupils' mental agility.

Mathematics and pupils with Special Educational Needs and Disabilities
(see also SEND Policy)

We believe that **all** children have the right to access all areas of the National Curriculum. To this end we use a number of techniques and support to enable all children to achieve. We aim to identify those children who experience difficulties with Maths and differentiate activities appropriately. Teaching assistants are used to support those children identified as having particular difficulties.

We also monitor those children who demonstrate a high mathematical ability. They may be given activities that extend and enrich their learning and at times may work with older children if appropriate.

Monitoring, Evaluation and Review

The effectiveness of this policy will be monitored through

1. Learning walks
2. Work sampling
3. Talking to pupils
4. Lesson observations
5. Tracking of progress and the evaluation of KS1 and KS2 assessments
6. Discussions with the named governor
7. Training, evaluation and review through staff meetings

This policy will be reviewed by the Maths Subject Leader with input from the staff and governors of Ditcheat Primary School.