MATHEMATICS

The Curriculum

Mathematics is a core curriculum subject taken by all pupils in Years 7 to 11. It is important as an essential qualification for further study, as the provider of skills necessary in many other subjects and for its own intrinsic interest. All students have 7 periods (over 3 hours per week) of Maths every fortnight.

We aim to encourage pupils' confidence in their knowledge of Mathematics and their ability to apply it. Pupils are particularly encouraged to develop facility in arithmetic and in basic algebraic processes. Pupils will develop their skills through exercises, discussions and investigations. The work covered follows the general line of the National Curriculum but is not bound by it. We aim during the first two years to provide a sound basis for success at IGCSE in Years 9, 10 and 11.

Pupils are put into sets in Year 7 to ensure that all abilities can be both challenged and supported. There are generally five or six sets; set sizes vary but average around 22 with those needing more support being taught in groups of the order of 12 to 15 pupils.

Assessment & Homework

Informal assessment takes place through the marking of exercises and class tests. Formal examinations take place in October, January and at the end of the year. Pupils are expected to make progress at different speeds and sets may be reviewed at any time based on formal or informal assessment and staff recommendation.

Homework is set regularly. It may be a traditional exercise, some learning of formulae and methods or some aspect of investigation work. It may also be completed online through the school's VLE or Dr Frost Maths.

2025 Results

iGCSE Maths:

93% - Grades 9-4

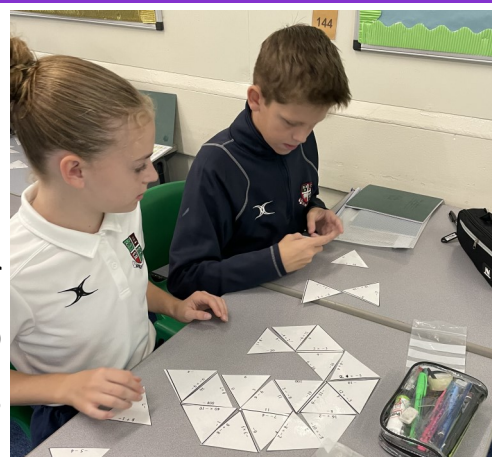**GCSE Further Maths:**

80% - Grades 9-4

Enrichment

Mathematics learning doesn't just happen in the classroom and we are always looking for more opportunities to enrich the learning of our students, including involvement in competitions, challenges and public lectures. We take a full part in the UK Mathematics Trust's various Maths challenges and also the team challenges. High performing Year 11 students are also entered for the Level 2 Certificate in Further Maths as an extension option. A maths puzzle club is available and students are encouraged to enter various cyber challenges. These encourage problem-solving through code-breaking and playing strategy games. There is a chess club and support clinics after school, both provided by the maths department.

Problem Solving

Problem-solving is an important part of maths and pupils are encouraged to develop strategies to deal with unfamiliar tasks.

Puzzles are regularly used in lessons and for homework as it is important for pupils to learn to persevere to achieve a solution as well as discuss and reflect on their methods.


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                S
            S   H   S
        S   H   T   H   S
    S   H   T   A   T   H   S
S   H   T   A   M   A   T   H   S
    S   H   T   A   T   H   S
        S   H   T   H   S
            S   H   S
                S
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Moving from letter to letter, in how many ways can you spell MATHS?

How do you know when you've found them all?

Sudoku Challenge:

	2		8	1		7	4	
7					3	1		
	9				2	8		5
		9		4			8	7
4			2		8			3
1	6			3		2		
3		2	7				6	
		5	6					8
	7	6		5	1		9	

To solve a Sudoku puzzle every digit from 1 to 9 must appear in each of the nine vertical columns, 9 horizontal rows and in each of the nine boxes.