Further Mathematics	
Teacher in charge of subject	Mrs a Sutch
Type of qualification	A level
Exam board and subject code	Edexcel 9FMO
Entry requirements	
Specific subject requirement	Grade 7 GCSE Mathematics
Course details	

Further Mathematics provides a great opportunity for enthusiastic mathematicians to broaden and deepen their subject knowledge. The course is an opportunity to study some new and interesting areas of Maths that you will not have encountered at GCSE. Further Maths counts as a separate subject to Maths.

All students study the same core mathematical content for Further Mathematics, which makes up 50% of the content for A level. Topic areas studied include complex numbers, which allow the solution of a range of equations that would otherwise have no solutions, through the introduction of 'imaginary' numbers, and matrices which consist of grids of numbers that can be used to represent transformations and are used to solve simultaneous equations amongst many other uses. Other areas of pure mathematics are covered such as polar co-ordinates, differential equations and hyperbolic functions. Each of these builds on earlier topics and encourages the development of a wider understanding of the ways in which mathematical topics are interconnected.

There is some choice over the remaining content of each course which might include further study of pure mathematics, statistics, mechanics or other areas of mathematics.

Further Maths is sometimes taken as a 4th A level.

Assessment

There are four one and a half hour papers.

- Papers 1 and 2 are Pure Mathematics (Core) each paper is worth 25%.
- Papers 3 and 4 are the optional papers in either Pure, Statistics, Mechanics or Decision Maths and each paper is worth 25%.

A calculator is allowed for all four papers and there is no coursework element.

Career options

If you plan to apply for a STEM (Science, Technology, Engineering and Mathematics) degree you should consider taking Further Mathematics. Several of the more traditional Universities have Further Maths as a requirement to gain access to a Maths, or Maths-based degree. Further Mathematics is also a fantastic qualification for those students who love mathematics and want to devote more time to studying wider aspects of the subject.