Maths A Level

Who is the course for?

The study of mathematical methods and models helps to develop logical and ordered thought and the techniques complement all combinations of A Level programmes. The Russell Group of universities lists mathematics as one of the most important facilitating subjects. Studying A Level mathematics opens doors. It is a very good currency throughout your working life. Employers and universities see mathematics as evidence of significant ability and real career potential.

What does the course involve?

During your first year you will study topics in pure mathematics that build upon your GCSE knowledge and provides the building blocks for all the other modules and branches of mathematics. Pure Mathematics topics include trigonometry, algebra, sequences, coordinate geometry and new concepts such as logarithms and differential calculus. You will also study some applied mathematics. In mechanics, you will look at topics such as kinematics, forces and Newton's laws, while in statistics you will learn about statistical distributions and hypothesis testing. During your second year, you will continue studying pure mathematics topics, which build upon the first year, covering higher-level trigonometry and calculus. You will also continue to extend your understanding of the applications of mathematics within the fields of mechanics and statistics.

Modules include:

All qualifications include the same content, covering three broad areas:

Pure Mathematics is the methods and techniques, which underpin the study of all other areas of mathematics. This includes proof, algebra, trigonometry, calculus, and vectors.

Mechanics is the mathematics used to study the physical world, modelling the motion of objects and the forces acting on them. This includes moments, where the turning effect of a force is considered.

Statistics involves statistical sampling, data presentation and probability, all of which follow on from topics met at GCSE, leading to the study of statistical distributions with special properties, such as the Binomial Distribution.

Assessment Methods

The course will be assessed through examinations.
The course takes two years for the full A-Level.

Progression Options

A Level Mathematics is highly valued by employers in a wide range of industries as evidence of your ability to solve problems and learn new skills. Many of our students go on to study courses, with a high mathematical content at University, such as engineering, finance, mathematics, computing and so on. Many students choose to apply for apprenticeships.

Awarding Body

Edexcel