



WESTONBIRT  
— SCHOOL —

# MATHEMATICS AND FURTHER MATHEMATICS A-LEVEL

**Exam Board** - EDEXCEL

## **What can I expect from this subject?**

By studying A-Level Mathematics, you will:

- Learn to apply rules and concepts to solve practical problems;
- Analyse situations and learn to discern efficient strategies for finding effective solutions;
- Use calculators and technology to manipulate and interpret large data sets.

The subject is rigorous, but it is also rewarding on many levels. The content is largely pure maths based (Trigonometry, Algebra, Calculus), but there are also compulsory Statistics as well as Mechanics modules. The course is examined by the completion of three papers at the end of Year 13.

## **What can I do to prepare for this course?**

Being fluent and confident in the higher end GCSE Algebra and Numbers is key. Know how to manipulate and rationalise surds and work with the index laws. Be confident in using the quadratic formula, factorising, completing the square and sketching graphs. Keep practising over the summer and use the Westonbirt summer transition pack to prepare. All candidates will be expected to have a Casio FXCG50 graphical calculator. These can be ordered through the school – usually at a discounted price.

## **What will my next steps be?**

Mathematics is a highly regarded subject and will be valued by any future employer or further educator. Typical career paths include engineering, finance, business, pure maths and actuarial sciences, medicine, natural sciences as well as IT. Of course, there is also the option to teach this essential subject.