

Computer Science

A Level



What will I learn?

- The study of Computer Science at A level will enable you to learn about the design organisation and development of computer systems;
- You will learn a good deal of technical background knowledge to support your study of computer systems;
- The course is designed to encourage you to develop your problem solving skills and examine your solutions not only from an academic, but also an ethical or social point of view;
- You will need to put the theory of designing computer systems into practice to produce projects for your coursework units
- You will need to learn a programming language to complete your project. Most students use Python or Lua.

How will I learn?

Students who study Computer Science will learn using a range of online resources to complement the course. We will start our coding from day 1 and students will be expected to be keen and self motivated to develop their programming skills. Lessons will follow a similar pattern to GCSE where the line between practical and theory is often blurred, with both being developed at the same time. There will be more of a risk taking nature where new software and technologies will be explored rather than just taught.

How will I be assessed?

80% of the qualification is assessed at the end of Year 13 through two external examinations.
20% of the qualification is assessed through a programming project where students will develop a problem and then design and create a program to solve the problem they have identified.

FAQs.

Who is this course for?

This course is for students who have enjoyed GCSE Computer Science and wish to follow a career in Cyber Related fields.

Do I need to have studied Computer Science before?

It is more important that you have experience of computer programming using Python than have completed the GCSE.

Do I need to be good at Maths?

A good understanding of maths will help you in your Computer Science course.

Exam Board

OCR

Skills Gained

Problem solving
Using and programming software packages
Systems analysis
Designing computer systems
Managing information
programming and software development skills

Careers

Programming
Systems analysis
Software engineer
Game development
Database engineer
Hardware and software research
Technical support
Network engineer
Forensic computing
Information security analyst