



COMPUTER SCIENCE

Exam Board: OCR

Specification: [Click here for more information](#)

COURSE SUMMARY

Computer Science is a subject that blends practical problem solving with the theoretical knowledge that underpins technology and systems that make up the real world. It enables you to understand complex computational principles, explore and apply logical processes and create your own unique programs using creativity, reasoning and ingenuity. The skills developed in Computer Science will not only put you in good stead for a future in computing, but will provide you with skills which can be applied throughout your life.

WHY STUDY COMPUTING?

"If you enjoy problem solving, like making your own programs and are interested in how things work, this is your subject. Especially enjoyable is coding. The benefit of this subject is that it leads to good job prospects." *Christian*

WHAT HAPPENS IN LESSONS?

"Discussions cover a wide variety of interesting topics and in class the course theory is enriched through practical applications. A couple of hours every week are spent making programs." *Lily*

"When I leave school I hope to get a Masters degree in Computer Science and work as a systems analyst. I have studied Computing, Mathematics, Further Mathematics and Physics." *Christian*

COURSE ASSESSMENT

This is a linear course. This means that students opting for an A Level in this subject will be committing to a two-year course, with all units examined at the end of Year 13.

MIGHT LEAD TO...

Computer Science is an extremely useful A Level, leading into a wide variety of computer-based disciplines. It combines well with maths and sciences and can lead on to a wide variety of careers and courses in Computing fields including networking, applications, games design and systems analysis, plus technologically rich subjects such as engineering or science. The course is equally suitable for students wishing to go straight into



work or an advanced apprenticeship in which computing is an essential part of the work or training undertaken.

ADVICE ON ENTRY

This is a very challenging but exciting course. Students need to be prepared to put in a lot of their own time to master programming and the difficult theory work. Students will not have needed to study Computing or IT at GCSE, but it would be greatly beneficial. Students taking Maths, Further Maths and Physics A Levels have been at an advantage when studying Computer Science.

READING AROUND THE SUBJECT

- [Project Euler](#)
- [Computerphile](#)
- [TechRadar](#)
- [BBC News - Technology](#)
- [Stack Overflow](#)
- Hello World: How to be Human in the Age of the Machine by Hannah Fry