

Computer Science GCSE

Why study Computing?

The United Kingdom has been responsible for many of the key developments in the history of Computer Science and it is seen as an industry in which the country can compete globally.

'Digital Britain' is a phrase used to talk about the growing importance of Computer Science skills. The computer game industry is bigger than both the music and film industries in the UK. Coding or jobs requiring coding are one of the UKs fastest growing areas with a high level of employability.

Computer Science is also considered to be a challenging subject that prepares you for work, sixth form and university.

What you will learn?

At the end of this course you will understand the components of computer systems, what they are and what they do. You will learn how to program and will develop programming techniques in order to create a number of different applications and programs. You will learn how to design and use complex software to create projects. The most important aspect of Computer Science is problem solving, an essential skill for life. You will learn skills that will play a key part of any career path you take.

Will I be good at Computer Science?

The sort of student that takes Computer Science is likely to be good at Maths, Music & Languages, enjoy solving problems and be creative. Computer Science is a subject which helps develop your problem solving ability and logical thinking.

Is it different from ICT?

Very different. Computer Science looks at how the computer works and how you can create programs to real world problems. It is a more technical subject that offers an in-depth look into a fascinating and important subject of software development.

ASSESSMENT

Exam Board – OCR Syllabus – GCSE Computer Science Assessment - 2 x exam

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Course Content

Unit 1 & Unit 2 - Computer Systems and Programming

How you will be assessed - Examination

What you will learn

All about modern computers, programming techniques, the internet and networks. You will be able to explain how computers work and will understand how they can be connected to a network in order to share files and information. You will leave the course with a really good understanding of basic computer systems, including how they are put together.

Component 01 – Computer Systems: The first component is focused on computer systems covering the physical elements of computer science and the associated theory.

Component 02 – Computational Thinking, Algorithms and Programming: This component is focused on the core theory of computer science and the application of computer science principles.



What you will learn

You will complete a series of challenges involving learning programming skills in different languages. You will learn a number of different ways to solve problems using programming techniques to create algorithms and will be able to confidently create your own solutions. You will have experienced creating a Computer Science solution to solve a problem using your own creative ability and will be able to focus on areas that will be of most use to you and match your own interests.



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