What is the qualification?

OCR GCSE Computer Science

What will I learn in Computer Science?

This course will give you a real, in-depth understanding of how computer technology works, how computers store

and communicate information, how to keep computer systems safe, and how computers are used in different contexts.

You will also have a chance to improve your computer programming, analytical thinking and problem solving skills, as

well as learn how to follow a project development life cycle.

What is the course overview for Computer Science?

Systems architecture, memory & storage Cyber security & systems software

Network topologies, protocols and layers Ethical, legal, cultural and environmental concerns

Algorithms & programming techniques Computational logic

Data representation Translators and facilities of programming languages

How will I be assessed in Computer Science?

Computer Systems: Written Paper (50% )

Computational thinking, algorithms & programming: Written Paper (50%)

Programming Project: 20 hours guided learning (non-assessed)

What skills will I develop in Computer Science?

Understand and apply the fundamental principles and concepts of Computer Science, including abstraction,

decomposition, logic, algorithms, and data representation

Analyse problems in computational terms through practical experience of solving problems, including

designing, writing and debugging programs

Think creatively, innovatively, analytically, logically and critically

Understand the components that make up digital systems and digitial communications

Understand the impacts of digital technology on the individual and on wider society

Apply mathematical skills relevant to Computer Science.

Why should I study Computer Science?

As the role and importance of computer technology in modern society continues to grow, having a good understanding

of how computer technology and digital systems work and how we can harness them to become more productive, is

becoming increasingly relevant. It’s impossible to predict what the world will look like twenty years from now but one

thing that’s certain is that computer technology will be playing an even bigger part in our lives than it does today.

Which career pathways will Computer Science lead to?

Computer Science is no longer just a career choice, it is a career enabler. A good understanding of Computer Science

is becoming increasingly important to jobs across a range of sectors, especially in science, technology, engineering, and

research. Additionally, the computing industry itself continues to grow and mature, with heavy demand in an ever

increasing number of areas including; software development, web design, multimedia programming, technical

authoring, network engineering, databases administration, IT consulting and cyber security.

Who should I contact for more details about Computer Science?

Mr R Jarvis or Mr C Field email: RJarvis@stjohns.excalibur.org.uk or CField@stjohns.excalibur.org.uk