

COMPUTER SCIENCE

Type of Qualification: GCSE (OCR)

How it is assessed: 80% Exam – Units 01 and 02
20% Controlled assessment – Unit 03

Course Overview:

In response to continuing calls from employers, government and industry, and demand from students, the College is again pleased to offer GCSE Computer Science (9-1).

Computer Science equips students with a solid foundation of programming and the course provides students with knowledge of the workings and processes performed by a computer, as distinct from the use of computer applications, which is covered in ICT.

- **Unit 01: Computer systems** – This unit introduces students to the Central Processing Unit (CPU), computer memory and storage, computer networks, system security and system software. Students will become familiar with the impact of Computer Science in a global context through the study of the ethical, legal, cultural and environmental concerns associated with Computer Science.
- **Unit 02: Computational thinking, algorithms and programming** – students will be introduced to algorithms, Computational thinking and programming. They will learn about programming techniques, how to produce robust programs, computational logic, translators and facilities of computing languages and data representation.
- **Unit 03: Programming project** – the project provides the opportunity for students to demonstrate their practical ability in Computational thinking skills. Students will create suitable algorithms and codes which will provide a solution to specific software problems outlined by the exam board.

Beyond Year 11:

GCSE Computer Science (9-1) will provide excellent preparation for further higher level study in Computer Science, programming, computing or allied fields such as Mathematics or Physics.

