Ethos

- Challenge, engage and enjoy!
- Resilience: failure is not a bad thing!
- Being confident in problem solving.
- Be able and wanting to ask and learn!
- Why does it not work: inquisitive.
- Team work: vital in Cyber Sec / Programming.
- Be challenged: we work above GCSE level!

65% of students will have jobs in the future that don't yet exist

The GCSE: OCR J277

- Unit 1: Systems architecture (CPUs), Memory and storage, Computer networks and protocols, Cyber security, Systems software and Ethical, legal, cultural and environmental impacts of digital technology.
- Unit 2: Algorithms, Programming fundamentals, Producing robust programs, Boolean logic and Programming languages / IDEs.

Need to know

- There is a lot of theory to cover and this is what students sometimes do not realise.
- This involves writing and some low stakes testing after each section of the course.
- There is lots of content that is completely new to students.
- There is an element of Maths involved and the programming side is tough.
- More information can be found here: **OCR COMPUTER SCIENCE GCSE**


Data Mining
3D printing
Games design
Consultant
Big Data
Data Modelling
3D Modelling
Network Admin
Support
Ethical Hacking
Computing
Cloud Apps
Computer Forensics
Cloud Architect
Cyber Sec
Database Admin
Augmented Reality
SaaS
E Commerce
SQL
AI
Robotics

Unit 1: Computer systems

- Systems architecture, Memory and storage, Computer networks and protocols, Network security, Systems software and Ethical, legal, cultural and environmental impacts of digital technology.
- **Assessment: Written exam 1 hour 30 minutes. 80 Marks.**
- **50% of the GCSE**

Unit 2: Programming (+ lots more)

- Algorithms, Programming fundamentals, Producing robust programs, Boolean logic and Programming languages / IDEs.
- **Assessment: Written exam 1 hour 30 minutes. 80 Marks.**
- **50% of the GCSE**

Project

- All students have to undertake a programming project.
- This is completed in lesson time between Years 10 and 11.
- It supports students' knowledge / understanding in the exam.
- However, it does not count toward the final grade.

Future

- There are lots of different career opportunities including apprenticeships.
- University students have lots of different opportunities available after Uni.
- *UK: £63,000 to £83,000 Base Salary, plus 15% bonus*
- *I'm looking for software engineers like you to work on something truly globally impactful. You will be using your skills to work on one of many projects, from EV charging solutions to IOT systems, there's something for everyone.*

- *Source: (https://www.cwjobs.co.uk/job/software-engineer/total-recruitment-specialists-limited-trg-total-recruitment-group-job101568807) 20/12/2024*

Points to note

- It is a tough GCSE.
- You need to have an aspirational approach towards sitting this GCSE.
- You can do it with the right attitude.
- Be prepared to get things wrong, learn new things and be challenged.