Computing

Year 11

William Hulme's Grammar School
The best in everyone™
Part of United Learning

Overview	The core of computing is computer science, in which pupils are taught the principles of information and computation, how digital systems work and how to put this knowledge to use through programming. The study of how computers work, how they communicate globally, and why Computational Thinking helps us solve problems. In Computer Science we create algorithms and code programs to achieve remarkable goals. It's the choice of the logically minded, the creative problem-solver, the analytical thinker. Computer Scientists enjoy Maths, languages and puzzles and solve the world's problems with technology. As the fourth Science and a prestigious E-Bacc subject, Computer Science opens doors to the most exciting careers and further studies such as Cybersecurity, Bioinformatics, Natural Language Processing, Artificial Intelligence and Robotics.

Autumn Term	**Unit 1:** 1.4 Security & 1.5 System Software **Unit 2:** 2.2 Programming Techniques & 2.4 Boolean Logic	**Assessment** ■ Mini tests covering short term recall. ■ Synoptic tests covering multiple units and longer-term recall. ■ **Digital Platforms:** Seneca, Issac Computer Science and Smart Revise. ■ Programming study runs throughout the course, using Python for practical elements.

Spring Term	**Unit 1:** 1.6 Ethical, Legal, Cultural and environment. 1.5 System Software **Unit 2:** 2.5 Programming Language	**Assessment** ■ Mini tests covering short term recall. ■ Synoptic tests covering multiple units and longer-term recall. ■ **Digital Platforms:** Seneca, Issac Computer Science and Smart Revise. ■ Programming study runs throughout the course, using Python for practical elements.

Summer Term	**Unit 1 & Unit 2** GCSE consolidation and exam preparation	**Assessment** ■ Mini tests covering short term recall. ■ **Digital Platforms:** Seneca Learning, Issac Computer Science and Smart Revise. **Final Exams** ■ Paper 1: 1h30mins, 50% of end of year grade. ■ Paper 2: 1h30mins, 50% of end of year grade.

Useful Resources for Supporting Your Child at Home:	Homework:
Seneca-Interactive revision **CnD-** Interactive online lessons **SmartRevise-** Online practice exam questions bank **W3schools-** Programming practice bbc Bitesize- Free online revision and assessments **Online Programming-** Issac Computer Science Quizlet- Online exam question bank & flashcards Textbook-CGP CS Revision Guide & Workbook	Digital Platforms**:** Seneca, Smart Revise **YouTube**-Craig and Dave online videos **Online Programming-** Issac Computer Science