THE EARLS
HIGH SCHOOL
EXCELLENCE | CARE | PARTNERSHIP

KS4 Curriculum overview: COMPUTER SCIENCE

Year 10 Curriculum Map

Autumn Term	Spring Term	Summer Term
Programming skills Recap of basic Python coding • Inputs and outputs • Variables • Selection • Iteration • The use of data types Basic string manipulation File handling (Text and CSV files) • Open • Read • Write • close Algorithms • sorting and searching • Flow charts • Pseudo code Theory Algorithms • sorting and searching • Flow charts • Pseudo code Data representation • Units	Programming skills Use of sub programs • functions • procedures Arrays/Lists • one dimensional • two dimensional Theory Data representation • Images • Sound • Compression Computational Logic Translators and facilities of Languages Systems Architecture	Programming skills The use of SQL to search for data Project practice papers Theory Memory Storage Wired and wireless networks

• Numbers • characters	

Year 11 Curriculum Map

Autumn Term	Spring Term	Summer Term
Programming skills Recap on: • Functions and procedures • Selection • Iteration • File handling • String Handling Programming project (After October half term) Theory Network topologies, protocols and layers System Security System Software	Programming skills Programming project Theory Ethical legal, cultural and environmental concerns Producing robust programs	**Revision**