**Year 7: Our curriculum intent is to:**
Ensure that all pupils:
can understand and apply the fundamental principles and concepts of computer science, including abstraction, logic, algorithms and data representation
can analyse problems in computational terms, and have repeated practical experience of writing computer programs in order to solve such problems
can evaluate and apply information technology, including new or unfamiliar technologies, analytically to solve problems
are responsible, competent, confident and creative users of information and communication technology.
We place the utmost importance on safeguarding and promoting the welfare of our students through our comprehensive and progressive e-safety focus.

| Term | Autumn Term 1 | Autumn Term 2 | Spring Term 1 | Spring Term 2 | Summer 1 | Summer 2 |
|---|---|---|---|---|---|---|
| Topic | Collaborating online respectfully<br>*Learn about the safe use of content and contact online.* | Programming (Scratch)<br>*Design and apply programming constructs, in order to solve a real world problem (ie the sequence in which a driverless car would respond to variables)* | Computer Systems<br>*Understand the hardware and software components that make up computer systems.* | Networks<br>*Learn what a computer network is and the different structures.* | Advertising/ Blogging<br>*Students create a blog post about a real-world cause that they would like to gain support for.* | App Development (Blippit)<br>*Design and Develop an App for a given criteria and then evaluate its success.* |
| Subject Specific Skills | Analysis, critical thinking and making informed decisions. | Problem solving, sequencing. | Evaluate and apply information technology. | Examine new or unfamiliar technologies. | Develop software formatting skills and explore legal issues. | Develop an app by building on programming concepts. |
| Previous Links | National Curriculum link to KS3 and reference to previous skills from KS2 are available to demonstrate how the Computing Curriculum, strengthens students prior learning and develops these skills further.<br>Useful Website Resource to develop student's problem solving skills: https://code.org/ | | | | | |
| Cross-curricular Skills | HD /English– Critical Thinking, ID Bias, Fictional content | Maths/DT- Problem Solving, Logical Thinking, Sequencing | DT- Logical Thinking Abstraction, Decomposition<br>Science- Analogue and Digital Sound | Maths – Logic, Number Bases, Powers, Unit Conversion | HD/English – Presenting an Argument. Use of Emotive Language<br>Art- Imagery | Maths – Sequencing<br>DT- Innovation, Plan, Design and Evaluate. |

Post 16 and beyond: The structure and content of our curriculum leads into the KS4 and KS5 examined content which includes a greater focus on data modelling, collaborating online and the use of networks. In the Computing Faculty, we provide students with essential skills and knowledge to prepare them for the next step in their lives. This could be further education undertaking courses such as the effective use of IT in business, training, or work in the field of Digital Technology, IT Consultancy or future technologies. We provide a broad and accessible curriculum with engaging, knowledge-rich subject content which will prepare students for their digital life.