

Computing Curriculum Overview - Year 8

| | Unit | Details |
|------------|------------------------------|--|
| Autumn One | Media Vector Graphics | Introduces pupils to the fundamental principles and techniques of visual communication, fostering their creativity and developing their skills in digital design and image manipulation. |
| Autumn Two | Algorithms | Pupils explore algorithms through hands-on activities, problem-solving tasks, and coding exercises, enabling them to develop a solid foundation in computational thinking and logical reasoning. |
| Spring One | Cyber Security | As a Cyber First School cyber security is at the heart of our teaching, this unit explores social engineering as well as malicious software attacks and how to reduce and respond to risk. |
| Spring Two | Advanced Computing | Building upon previous studies computing 102 explores computers and how data is represented inside computers in greater depth, examining concepts such as compression. |
| Summer One | Experience AI | Throughout this unit, pupils will experience a variety of real-world AI applications and be made aware of the ever-increasing range of AI-related careers. As well as considering the social and ethical implications of AI developments, you and your pupils will have the opportunity to delve deeper and explore machine learning models and the engines that make them work. |
| Summer Two | Python PRIMM | In this unit pupils transition to text based programming using the PRIMM teaching style. Pupils create a series of programs exploring the procedural paradigm using concepts such as sequence, selection and iteration. |