

<b>Subject</b>	Computer Science
<b>Curriculum intent</b>	<p>Computing and Technology is a fundamental aspect of modern Britain and digital literacy is as important as being able to read and write. Our curriculum and courses help students develop these skills and prepare them for the next stage of their education and future careers.</p> <p>One thing that all of our staff have in common is a great love for our subjects. We want our students to experience the same enjoyment that we derive from technology and the world of business. We recognise that academic success is one of the criteria by which both students and staff are judged and we are committed to doing all we can to help our students reach their full potential.</p> <p>We aim to:</p> <ul style="list-style-type: none"> <li>● enable students to communicate more effectively in their work and use technology to aid them in doing this</li> <li>● enable students to build upon their own digital literacy so they are able to pick up any device or use any piece of software and feel confident in using it</li> <li>● enable students to know the online world and are able to safely navigate their way through the everyday uses of the internet whether that be for school or entertainment</li> <li>● develop an enjoyment and an understanding of IT, computer science and business that students will carry with them throughout their lives.</li> </ul>
<b>Key Stage 3</b>	<p>Students will build on their Key Stage 2 computing and IT skills. There are elements of our curriculum that concentrate on traditional IT skills (how to use a computer, when best to use a computer and what for) and we also look at elements of computer science (How does a computer work? How can I make it work?).</p> <p><b>Year 7</b></p> <ul style="list-style-type: none"> <li>● Digital Communication</li> <li>● How a computer works</li> <li>● Computational Thinking</li> </ul> <p><b>Year 8</b></p> <ul style="list-style-type: none"> <li>● Data Representation</li> <li>● Programming</li> <li>● Networking</li> </ul> <p><b>Year 9</b></p> <ul style="list-style-type: none"> <li>● It's not rocket science, its Computer Science</li> <li>● Developing Digital Games</li> <li>● Google IT Skills</li> </ul>
<b>Key Stage 4</b>	At Key Stage 4 we offer a Computer Science GCSE and a Cambridge National

in Creative iMedia

## **Computer Science GCSE**

A two year GCSE course centred around the development of programming skills and understanding technical computing methodology.

### **Paper 1: Computational thinking and problem solving**

#### **What is assessed?**

Computational thinking, problem solving, code tracing and applied computing as well as theoretical knowledge of computer science.

#### **How it's assessed?**

- Written exam set in practically based scenarios: 1 hour 30 minutes
- 80 marks
- 50% of GCSE

#### **Question styles**

A mix of multiple choice, short answer and longer answer questions assessing a student's practical problem solving and computational thinking skills.

### **Paper 2: Written assessment**

#### **What is assessed?**

Theoretical knowledge about how a computer works including internal and external components as well as networking and use of data.

#### **How it's assessed?**

- Written exam set in practically based scenarios: 1 hour 30 minutes
- 80 marks
- 50% of GCSE

#### **Question styles**

A mix of multiple choice, short answer and longer answer questions assessing a student's practical problem solving and computational thinking skills.

## **Creative iMedia**

Creative iMedia equips students with the wide range of knowledge and skills needed to work in the creative digital media sector. They start at pre-production and develop their skills through practical assignments as they create final multimedia products.

### **Paper R081 : 33%**

On completion of this unit, learners will understand the purpose and uses of a range of pre production techniques. They will be able to plan pre-production of a creative digital media product to a client brief, and will understand how to review pre-production

documents

**Coursework: 3 Units (33% per unit)**

**R082: Creating digital graphics**

The aim of this unit is for learners to understand the basics of digital graphics editing for the creative and digital media sector. They will learn where and why digital graphics are used and what techniques are involved in their creation. This unit will develop learners' understanding of the client brief, time frames, deadlines and preparation techniques as part of the planning and creation process.

**R084: Storytelling with a comic strip**

This unit will enable learners to understand the basics of comic strip creation. It will enable them to interpret a client brief, use planning and preparation techniques and to create their own comic strip using digital techniques

**R088: Creating a digital sound sequence**

This unit will enable them to understand where digital sound sequences are used in the media industry such as radio, film, web applications or computer gaming. The learner will also learn how these technologies are developed to reach an identified target audience.