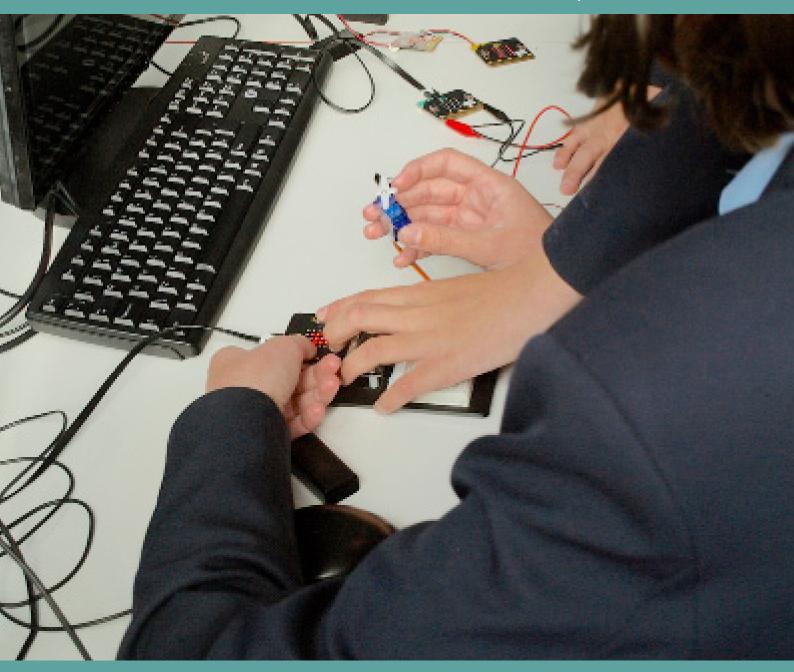


**Kindness Respect Determination** 



Welcome to Computing



## **General Overview**

The Computing Department links many areas of the school and is a dynamic and cutting edge team. We support the use of IT in other subjects by teaching digital literacy as well as developing skills for computing and design work in technology. We strive to give students the opportunity to work together on small projects to develop their software and hardware skills. Students will also be given the skills to use the internet and technology safely through their E-safety lessons.

### Aims

To promote an interest in all things digital; including programming, electronics, design and manufacture, digital literacy and to ensure students are able to access technology safely.

## Our Curriculum

In year's 7 to 9 all students will have a minimum of 1 hour a week studying a scheme of work which includes 6 week blocks of integrated project based learning a variety of applications.

The Learning journey for Year 7-9 curriculum introduces a broad range of skills in programming alongside digital literacy. The new Microbit introduces a new level of computing and gives students the opportunity to understand coding in an inspiring way. The bit-bot takes the Microbit and brings the code to life as a robotic challenge.

Students have cross curricular lessons which support the STEM. In Computing we deliver Solidworks skills which support 3D printing and projects in Technology subjects.

E-Safety is an important part of our responsibility and we promote safe use of the internet and social media through lessons and online platforms.

# **Trips & Activities**

STEM is our unique focus as a school. Our STEM club operates every Thursday and allows students access to a range of projects including the electric car, which takes part in various races run by the Green-Power charity. We are also involved in "Race for the line" and delivery of the national Microbit programming initiative. Students also develop their 3D printing skills through Technology and the STEM club students have access to complete their own projects.

We are promoting the STEM subjects through cross curricular projects like the rocket-car and the Engineering of flight, which is funded by the Royal Society of Engineering.

### **GCSE**

Depending on which course is most appropriate for the students we deliver two distinct routes.

OCR Computing J277
 And additionally provide a Business Studies course

NCFE Award in Enterprise

Computer Science GCSE is a key subject for STEM and students go on to A-Levels and Level 3 courses in Computer Science, Engineering, apprenticeships and employment such as digital security and cryptography. We have many ex Alumni who have entered careers which have started with our courses. Assessment consists of 2 written papers at the end of the 2 year course

The BTEC Tech Award in Enterprise is a Level 2 BTEC Business Studies course covering basic business principles and follows the BTEC suite of qualifications. This course prepares students for the business world and covers such elements as marketing, branding and business finance. Students go on to A-Levels and Level 3 courses in business enterprise and business apprenticeships.

Assessment is by coursework element and a written exam.

**Our Sponsors** 



























### Staff

Dene Ellis BA (Hons)- Extended Leadership & ICT STEM co-ordinator Mark Carter BEng (Hons)- Extended leadership & ICT/ Business,

STEAM

Dene Ellis BA (Hons)- Extended Leadership & ICT STEM co-ordinator

Marilyn Perry - Teacher of Science & Assistant STEM Co-ordinator