

## Curriculum overview – ICT & Computing department

### Intent

Prepare pupils to understand common technologies whilst also considering the impact these developments may have and using them responsibly & safely.

Embed logical thinking and understanding of how technologies operate underneath the user interface.

### KS3 overview

Year 7 – Network/PC basic skills, E-Safety and Office skills, Introduction to Programming Using Scratch, Video Games Business Design, Spreadsheet Skills & Web Awareness.

Year 8 – iDEA Award Course, Python Programming, Photoshop Skills, Data Representation, Spreadsheet Skills & Music Festival Project.

### KS4 overview

Y9 CS – Preparation skills for the GCSE including algorithms, programming skills, database design & introduction to GCSE paper 1 content.

Y10 CS – The rest of paper 1 content including hardware, networking, system security, system software & ethical considerations. Programming skills recapped and developed further during the summer term to prepare for NEA.

Y11 CS – NEA (20 hours) at the start of the term. Complete all paper 2 content including algorithms, logic, robust programming & data representation.

Y9 iMedia – Preparation skills for the GCSE including photography, storytelling, web design, game concepts and digital video/image creation.

Y10 iMedia – Two units of the course are completed (typically R082 Digital Graphics and R085 Multipage websites).

Y11 iMedia – The last two units are completed (typically R081 Pre-Production exam & R090 Photography).

### Stretch and challenge

Stretch and challenge is evident across our curriculum in both key stages. Programming and data representation topics really stretch pupils (with a near endless scope for challenging pupils). All lessons are prepared with extension work available. Some GCSE content is dropped down to KS3 such as binary conversions meaning pupils are well prepared for some GCSE content.

### **Enrichment opportunities**

We have previously ran a Kodu club for Y7. We run a KS4 catch up opportunity for pupils during Wednesday lunch time.

All pupils are encouraged to continue their iDEA Award during lunch times (including KS4 pupils).