The ICT and Computing Curriculum

The growth of computer power has brought miraculous breakthroughs in hardware and software, which have in turn changed global behaviour and culture. Computer science is responsible for smartphones, tablets, the internet and networked communications, even social media. We live in a society that consumes content – whether that be news, information, entertainment, or communication – through screens. We are truly living in a digital age, driven by computer science.

Within the ICT department we believe a good knowledge of ICT and computer science equips young people with the skills and abilities to engage positively with the digital and global world. Through studying ICT/computing pupils learn the transferrable skills of problem solving, creative thinking, digital presentation analytical skills and planning. The experiences gained by applying these learning skills enable pupils to progress into the next stages of study and life, and enhance the preparation for future employment.

KS3

Within the ICT/computing curriculum we facilitate and promote both pupil's curiosity and independence across all key stages. At KS3 our multi-faceted programme of study provides a relevant, challenging and enjoyable curriculum in ICT and computing for all pupils. We start the year with learning skills that will enable our pupils to access the curriculum across the whole school and be able to access learning from home. This includes access to the school network drives, MS Teams, School email, Next Cloud, Remote Desktop, Wifi. We then give pupils a 'flavour' of what to expect if they take computer science or creative iMedia as a subject. This provides pupils with the knowledge to make an informed choice.

KS4

At Key stage 4 we offer courses in creative iMedia and computer science. Creative iMedia is a subject for those interested in a career within the media industry. The course develops student knowledge, understanding and practical skills in relation to real life situations. For example, developing visual identities for clients, planning and creating original digital graphics and planning and creating and reviewing original digital media products.

In computer science pupils become familiar with large parts of the course but also develop a deeper and more complex understanding of the content being taught. Students learn algorithms, coding in Python, data representation, networks, computer system and relational databases. Pupils also learn about cyber security and the impacts of digital technology on society. GCSE computer science is the perfect foundation for A level computer science

KS5

At KS5 computer science a level the ideal platform for going on to a multitude of university places and apprenticeships. Whether it may be maths, engineering, science or cyber security the computer science field gives students access to one of the fastest growing and highest paying career paths in the world. It gives students transferrable skills, global opportunities, high earnings, creativity and a chance to make the world a better place.

A variety of clubs are run by the department, with particular emphasis on opportunities in coding.