



What will Year 7 students learn and how many lessons will they have each week?

Students will learn how to use their technology safely and effectively (tablet / smartphone / laptop or desktop).

They will be taught the basics of how computers work, including a very simple model of computer processing. Programming a simple task will be later in the year. Students will have two Computer Science lessons a week.

What will Year 7 students need to bring with them to lessons?

Students will need to remember their username and password for the school computers to access their class. Their password is as much a part of their school equipment as a ruler or a pencil.

Will Year 7 students have homework in this subject? How much?

Students will have homework about once every three weeks, usually for 30-45minutes.

How can I support my child at home with their learning in this subject?

Access to a computer at home will be very helpful. Practice programming at home would also be very useful, so downloading and installing Python 3 onto your home computer would enable this. Students often find that 'playing' with python, following online tutorials (YouTube and others) helps them learn and boosts their excitement.

What opportunities are there for further study and careers in this subject?

With both Computer Science and IT students will be able to develop through GCSE qualifications and onwards to an A-Level in Computer Science. Academically further study at University of possible including the opportunity to learn how to be a white-hat hacker. Learning the skills to solve problems is widely recognised as a highly valuable skill in the world of work. Systems analysts, programmers and designers are in demand!

What programming languages will you teach?

We teach a range of programming languages starting mostly in Year 8 with Python. Python is used widely in industry and many well-known websites are built using this language including Twitter. Older students are encouraged to learn other languages such as: Visual Basic, C#, C++ and PHP.

The GCSE and A-Level curriculums we follow requires students to be aware of a range of languages including SQL HTML and JavaScript.

What is the difference between Computer Science and ICT?

ICT or Information Communications Technology teaches students how to use the technology (hardware and software) that is available to them. Computer Science teaches the students not just these things, but also how they work, how to design and develop their own solutions to problems. Without a good knowledge and understanding of Computer Science the development of apps becomes impossible.

Why do you teach both Information Technologies and Computer Science?

Information Technologies is a vocational course. It teaches students practical skills which will be valuable to them after they move on from school such as how to develop projects; evaluate the consequences of the choices they make; it helps them to think like a project manager and to plan effectively considering alternative approaches. Computer Science is designed for those who want to take their understanding of the Computer further, who find the way computers help people, in so many ways, fascinating and want to be a part of that. Computer Science helps students understand how to write programs and develop new solutions.