# **COMPUTER SCIENCE**

WHY STUDY COMPUTER SCIENCE

#### MORE THAN EDUCATIONAL EXCELLENCE

We will help you to develop and share your individual gifts and talents, learn from others and reach your full potential, preparing you for a successful future, wherever it may take you.

We have a maximum class size of 12 to ensure you receive the individual attention you need to excel in Computer Science.

### WHAT TYPE OF CAREER CAN I GO INTO?

The number of jobs in Computer Science has risen exponentially in the last two decades and the IT industry is one of the highest paying sectors.

The subject can also provide a fantastic base to build other careers upon outside of the sector.

Whether you want to develop the latest graphics software, design a future iPhone or pursue a career in an area such as law, medicine, or bio-engineering, Computer Science can provide you with crucial building blocks for a successful career.

#### **COURSE ENRICHMENT**

- Trips including problem-solving days and lectures. Previous trips have included:
  - San Francisco and Silicon Valley
  - Facebook
  - Oxford University
- ✓ Visiting speakers

Each pupil is issued with a **personal laptop**, which is loaded with the software required for their A level.





## WHAT WILL I LEARN?

Computers are now integrated into every part of our lives from travelling, to communicating with friends, to the television programmes we watch. It is almost impossible to imagine a world without computers in the 21st century and a working understanding of the technology behind these great machines is a key skill to have as we continue to evolve.

Computer Science students learn to think logically to solve complex, challenging problems. Requiring and developing capabilities in solving multidimensional problems, Computer Science will provide you with rewarding possibilities and chances to use your imagination.

Google wasn't built in a day by one man; it was a team effort that took time. By working on a project in a team, you develop strengths in leadership and build new friendships.

Computer Science enables you to make a real and positive difference in the world. It drives the Sciences forward, providing the innovation needed to create essential new vaccines, monitor and alert seismic activity and create safer modes of transport. It touches almost every industry in the world, including business, entertainment and education.

As the subject offers both theoretical and practical approaches to learning, many universities and employers see it as a sign of academic well-roundedness.

And whether a future career in Computer Science is for you or not, the skills in logical thinking and problem- solving that you will learn on this course will always provide you with a competitive advantage over your peers.

### WHAT DO I NEED?

- An appetite for problem-solving
- A willingness to persist intellectual stamina
- The ability to think independently
- ✓ 6 in GCSE Mathematics

# WHAT WILL I STUDY?

# LEVEL COMPUTER SCIENCE

Unit 1 Computer Systems

Unit 2 Programming and Algorithms

Unit 3 Programming Project

#### WHAT SUPPORT WILL I RECEIVE?

- Drop-in clinics are offered on Thursdays and Fridays in the department and are available to all
- Online resources you will have your own online user account with access to video clips, interactive resources, past papers, extra exercises, online tutorials and more
- Textbooks written specifically for each course by practising teachers.





Scan the QR code for more information on the subject

### www.stonyhurst.ac.uk

