Fact file:



UCAS Code: G401
3 Years Full-time
4 Years Sandwich

Area of Department: Computing

Former students now work for: British Gas/British Telecom/IBM/ Orange/British Airways

Programme content includes:
Programming/Software
Engineering/Databases/Artificial
Intelligence/Internet and Client
Server Applications

BSc (Hons) Computer Science

Department of Computing, Engineering and Technology



BSc (Hons) Computer Science

Tel: +44 (0) 191 515 2758 or email: cet-courseenqs@sunderland.ac.uk



Is this the right course for me?

Before...

- BSc (Hons) Computer Science is a course containing a mixture of technical and theoretical subjects for those who enjoy practical development and want to understand the theory behind computer systems.
- You do not have to be a computing wizard or have extensive previous computing
 experience to take this course. You just need to have an enquiring mind and want
 to know why as well as how computer systems work.

During...

- The course is an interesting and challenging one and focuses on developing your skills in the technical aspects of designing systems and developing software, whilst gaining a deeper understanding of the theory behind them.
- The course will equip you with experience of both the practical and scientific
 aspects of computer systems, helping you to develop skills in problem-solving
 and decision-making, important for success in business, technical and scientific
 environments.

After...

- This course includes a mixture of practical experience and theoretical knowledge, which will give you the skills necessary to pursue a career in a wide range of commercial and industrial organisations.
- If you are interested in a research or academic career then the theoretical aspects
 of this course will prepare you for postgraduate research programmes such as
 MPhil or PhD.

What do you need to know?

The main themes of this programme are:

- Software Engineering and Programming
- Information Systems
- Artificial Intelligence
- Applied (Professional) Skills Development

Hoping to design and build the computer systems of the future?

In BSc (Hons) Computer Science you will find out where computing is going in the future and develop the skills necessary to design and create modern software systems, using the most up-to-date and exciting methodologies and languages.

Looking for a course that combines theory with practice?

This course will give you a range of experience across the broad field of computing, covering both practical development and the theoretical underpinning that goes behind successful computer systems.

What will you study?

Year 1

- Fundamentals of Computing
 - · Software Development and Theory
 - Programming
 - Web Applications
 - · Database Systems
 - Computer Systems (Operating Systems, Networks and Computer Architectures)
 - Mini-project
- Systems Administration

Year 2

- Software Engineering Enterprise and Innovation Project
- Information Systems
- Software Development

Year 3

Core Modules:

- Computing Project
- Artificial Intelligence
- Concurrent and Distributed Systems

Optional Modules:

User Experience Design / Advanced Databases / 3D Games Programming / Project Management / Software Enterprise

This programme is 3 years full-time with the option of a placement year after completion of year 2.



Excellent career opportunities

- Throughout the BSc (Hons)
 Computer Science course there is an emphasis on professional and ethical issues and a focus on the entrepreneurial opportunities of software development.
- Graduates from the BSc (Hons)
 Computer Science programme
 have the skills necessary to
 pursue a career in a wide range of
 commercial, industrial and research
 organisations.
- The course is closely aligned to the needs of Sunderland Software City with opportunities for graduates to develop innovative ideas through the software hatchery and incubators provided through Software City.
- The department has links with Microsoft, IBM, SAP, Yahoo, CISCO and SUN Microsystems. These links ensure the course is relevant to today's industry and also enables you to become a graduate with the skills and knowledge employers want and need.

