

BEng (Honours) Telecommunication and Electronic Engineering

UCAS code: H690

UCAS may change course codes - please check in your UCAS Handbook before applying. (top up)

Attendance

One year full-time

Admissions office

For more information or to check the progress of your application phone 0114 225 5555, fax 0114 255 2167, e-mail admissions@shu.ac.uk

International students see www.shu.ac.uk/international for more information

Fees

International students

Typically £9,720 a year

International students next year

Typically £10,080 a year

About this course

Most modern organisations are increasingly dependent on telecommunication and electronic technology. They use it to

- · obtain, store and analyse information
- control processing operations
- manage people, resources and finances

This top up award is suitable if you have an HND or foundation degree in electronic or telecommunication engineering and wish to develop your award to degree level.

You gain the specialist knowledge and professional and personal skills needed for a successful career in industry and commercial engineering enterprises. A project management module also develops your ability to plan, organise and manage resources.

The course develops your understanding of the scientific principles and mathematics underpinning telecommunication and electronic engineering. You also learn about analogue and digital electronics, digital signal processing and optical communications.

You investigate the principles of telecommunication systems design and the • methods • constraints • techniques • procedures involved in creating the products, systems and services that organisations use.

Associated careers

This course is vocational and produces telecommunication and electronic engineers who can develop careers in the many industries employing modern technology. You gain the specialised technical skills required by employers.

You may take up a career developing, commissioning and maintaining • telecommunication equipment • computer networks • control systems • microcomputer technology • software and information systems hardware.

Assessment

• examination • coursework • project report

Professional recognition

This course is accredited by the <u>Institution of Engineering and Technology</u>. This accreditation meets the academic requirements for you to register with the <u>Engineering Council</u> as an incorporated engineer after you graduate. You must also have completed the whole course with us.

Entry requirements

You normally need a BTEC Higher National Diploma or a Foundation Degree in Telecommunications with Electronic Engineering or equivalent.

Overseas students

India

• 12th standard from ICSE, CBSE or state boards in appropriate subjects with an overall percentage of at least 60 per cent, plus an English language score of at least IELTS 5.5 or TOEFL 197

China

• an appropriate foundation year and at least one year s study at a university in China or equivalent plus an English language score of at least IELTS 6.0 or TOEFL 213

Other countries

• please contact us for advice

Course content

Modules

• digital signal processing • optical fibre communications • electronic engineering 3 • optoelectronic and microelectronic system applications • mobile computing technology • project management • project

Digital signal processing

Defines the evolution of current and future mobile services covering various aspects of modulation, analogue and digital communications, design fundamentals and mobile applications.

Optical fibre communications

Enables you to understand and describe the operation and characteristics of the components used in optical data communications.

Electronic engineering 3

Gives you the skills to design, analyse and test electronic systems in a commercial and industrial environment.

Optoelectronic and microelectronic system applications

Provides you with an understanding of fibreoptics technology and its application in communication systems.

Mobile computing technology

Develops your critical understanding of mobile computing technologies, and your ability to make critical judgements of emerging technologies and services.

Project management

Develops the knowledge, skills and attitudes required by engineers working as part of a team on engineering projects. It also enables you to select and apply analytical techniques for planning, monitoring and controlling the time, cost and specifications of engineering projects.

Project

You apply and integrate knowledge gained to solve realistic engineering problems and present your solution in written and oral forms.

The University's terms and conditions apply to all offers of places to study at the University.