Physics with a Year Abroad

University of Edinburgh

Venues

King's Buildings Campus

Content

This degree programme covers all aspects of physics, from the very basics to the current frontiers of knowledge. The early years of the programme are broad-based, providing a robust foundation for advanced physics and mathematics courses. In Year 4, you will have the opportunity to complete an innovative research project at a partner institution overseas.

Year 1
You will study compulsory courses in physics and mathematics. Physics 1A is innovative in its use of technology and offers an interactive learning experience. Physics 1B introduces you to the fundamentals of quantum physics.

You will study Mathematics for Physics 1 and 2 which include mathematical and problem solving skills in the context of algebra and calculus, with increasing emphasis on physical applications.

You will be able to choose two further subjects from other academic areas.

Year 2
You will study modern physics and physics of fields and matter. Supporting mathematics courses will cover algebra, calculus, dynamics and vector calculus and you will be introduced to practical physics, including programming, data analysis and experimental techniques.

Students entering the programme in Year 2 will take additional introductory courses in classical physics and mathematics.

You will have the freedom to choose one or two courses from other academic areas.

Year 3
You will study thermodynamics, statistical mechanics, electromagnetism, optics and quantum mechanics.

You are offered a supporting mathematics course covering Fourier analysis, probability and statistics, a computing course on numerical algorithms, an introductory course to research methods, and a course on experimental laboratory.

Year 4
You will undertake a year abroad in a partner institution and complete an extended research project.

Year 5
You will study relativity, nuclear and particle physics. Condensed matter physics, and quantum and statistical

physics will also be included. Students undertake a research project and will be able to choose a number of advanced level courses from a wide range available.

Start Date

September

Qualification

Degree

Study Method

Full time

Award Title

MPhys

UCAS Code

W2S4

Course Length

5 years

Faculty

College of Science and Engineering

Department

Physics and Astronomy

Entry Requirements

2026 entry requirements

Standard entry:
4 Highers at AAAA (by end of S5 preferred) including Maths and Physics plus English at National 5. Advanced Higher Maths is recommended.

Direct entry to year 2 is possible with 3 Advanced Highers at AAA including Maths and Physics.

Widening access entry:
4 Highers at AABB (by end of S6) including Maths at A and Physics plus English at National 5. Advanced Higher Maths is recommended. Highers at BBB must be achieved in one sitting.

SCQF Level

11

Progression Routes

«ProgressionRoutes»

Combination Courses

«htmlCombinationCourse» «htmlCombinationUCASCode»

Address

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Website

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