**Why study Physics?**

In an increasingly competitive world, where good university places and the best jobs are keenly sought after, Physics provides the sort of academic rigour that is highly valued by admissions tutors and employers alike. The Year 12 course provides an introduction to Physics and its uses, preparing the way for further study and focusing on the wide-ranging career opportunities that Physics offers to students with the vision and commitment to succeed.

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**What should I study with Physics?**

Physics naturally goes well with other Science subjects, though its problem solving focus is a benefit to many subjects. A good proportion of candidates study Maths; a choice that - though not essential - would certainly aid understanding in their Physics topics.

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**What do I study on the course?**

We follow the OCR A Physics course which includes the following modules:

**Year 12 course**

**Module 1: Development of practical skills in physics**

**Module 2: Foundations of physics**
- Quantities and units
- Resolving vectors

**Module 3: Forces and motion**
- Forces and Motion, including moments, momentum and projectile motion
- Work, energy and power
- Materials

**Module 4: Electrons, waves and photons**
- Electricity and circuit analysis
- Waves
- Quantum physics
Year 13 course
Module 1: Development of practical skills in physics
Module 5: Newtonian world and astrophysics
  • Thermal physics
  • Circular motion
  • Simple harmonic motion
  • Astrophysics
Module 6: Particles and medical physics
  • Capacitors
  • Electric and magnetic fields
  • Nuclear and particle physics
  • Medical imaging

What can you do with the qualification?
The more salient question is what can’t you do with the qualification. For sheer diversity, it is difficult to think of another subject that opens quite so many doors. An A-Level in Physics shows your prospective university that you are willing to sign up to a conceptually difficult course; that you are not afraid of a challenge, and that you have confidence in your own abilities.

Careers using Physics
Employers today actively seek out people who can prove their ability to think logically, understand complex ideas and apply them to the real world. If you want a career in Science, the Media, Education, Business or a host of other fields, Physics can help give you the edge.

Some physicists tackle the application of physical ideas to industrial and engineering problems. Physics graduates also find employment in Medicine, Computing and Finance.

Typical sectors where physicists are found include:
  • Environmental Science
  • Design and production
  • Telecommunications
  • Medical Physics
  • Astronomy and Astrophysics
  • Meteorology
  • Education
  • Law

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