South Nottinghamshire Academy

Physics

Why Physics?

A-Level Physics is a stimulating and thought-provoking subject which attempts to explain how the Universe came to be, and what laws govern it. It can explain a whole range of phenomena, from the planets that orbit our earth, to subatomic particles that bombard our atmosphere. As a race, we have used our knowledge of Physics to allow doctors to explore the human body in incredible detail.

What can I expect?

The course involves the study of particle, wave and mechanical physics, giving both a theoretical understanding of the world we live in as well as a practical understanding of forces and machinery. It provides an excellent foundation of knowledge required to study and type of Physics at university and leads seamlessly from the ideas studied at GCSE. A Level Physics lessons are diverse in their delivery and combine the study of theory with practical laboratory work.

How will I be assessed?

The course is linear and involves a set number of required practical tasks which students will be expected to apply their knowledge and understanding from in their exams. Assessment is through three terminal examinations which are 1 hour 30 minutes long (for the first 2 papers) and 2 hours long (for the final paper)

What do I need?

Grade 6-6 in Combined Science, or a grade 6 in Physics and a 6 in higher tier Mathematics. An enquiring mind, an interest in science and strong problem solving, mathematical, communication and organisational skills are highly desirable. A Level Mathematics is not a requirement; however, it does complement the Physics course, and previous students have found the combination of Maths and Physics invaluable.

What about the future?

Physics is an essential qualification for a large number of careers, e.g biophysics, engineering, pharmacology, architecture, technological development and many more. Physics can open up a vast number of prospects within or outside the area of science. Potential employers value the skills that are developed during the study of this subject, which can lead to a number of practical vocations such as plumbing or becoming an electrician. It can be used as an entry qualification for a wider variety of courses at higher education and indicates that an individual has very strong academic ability.