

# Chemistry **Level 3: AS / A2**

AQA

### INTRODUCTION:

Chemistry is fundamental to our modern world. It touches all aspects of our lives, from food and health to materials, energy and the environment.

Understanding Chemistry not only helps us to answer the big question 'what is the world made of?', it is essential if we are to find solutions to many of the challenges facing our world.

With so many opportunities and diverse applications, it is a fascinating subject and A level Chemistry is the first step.

#### **ENTRY REQUIREMENTS / SUITABILITY:**

5 GCSEs at Grades A\* - C or 5 - 9. GCSE Chemistry grade 6 or Combined Science grade 6/6 or above. Grade 6 or above in Mathematics is also essential.

Students need excellent communication skills both verbally and written, an inquisitive mind and good mathematical skills. The course suits those with a passion for investigation, learning and exploring different phenomena in the fields

## **CONTENT:**

A Level Chemistry is a two year course covering aspects of physical, inorganic and organic chemistry.

Topics include:

Physical chemistry: atomic structure, bonding,

thermodynamics, kinetics and electrochemical cells

Inorganic chemistry: periodicity, Group 2, Group

7 and the Transition

Metals

Organic Chemistry: isomerism, carbonyls,

amines, polymers, bio chemistry, synthesis and

spectroscopy

#### **ASSESSMENT:**

At the end of year 13 through three written exam papers.

- Paper 1: 2 hours, 105 marks, 35%
- Paper 2: 2 hours, 105 marks, 35%
- Paper 3: 2 hours, 90 marks, 30%

**LEADS TO:** 

The opportunities are almost endless, but a Chemistry related degree could lead to career options including;

Analytical chemist Chemical engineer

**Biochemist** 

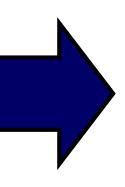
Pharmacist or pharmacologist

Medicine

Research scientist **Toxicologist** Accountant

Environmental protection &

monitoring Law Education



In addition, there is ongoing practical skills assessment over the course of years 12 and 13.