

# Statistics

Edexcel

## What will I gain from studying this subject?

The world is awash with data. It is estimated that  $2.5 \times 10^{18}$  bytes of data are created every day.

Economies increasingly are data dependent and use data-intensive technologies: government, finance, manufacturing, health, education, media, banking, retail, science, sports, and other sectors all increasing generate and use data.

The ability to make sense of data is an essential skill for working life and full citizenship in a modern society

GCSE Statistics develops key transferable skills which students take into their other studies and their wider lives.

The aims and objectives of this qualification are to enable students to develop statistical fluency and understanding through:

- the use of statistical techniques in a variety of authentic investigations, using real-world data in contexts such as, but not limited to, populations, climate, sales etc.
- identifying trends through carrying out appropriate calculations and data visualisation techniques
- the application of statistical techniques across the curriculum, in subjects such as the sciences, social sciences, computing, geography, business and economics, and outside the classroom in the world in general
- critically evaluating data, calculations and evaluations that would be commonly encountered in their studies and in everyday life
- understanding how technology has enabled the collection, visualisation and analysis of large quantities of data to inform decision-making processes in public, commercial and academic sectors, including how technology can be used to generate diagrams and visualisations to represent data
- understand ways that data can be organised, processed and presented, including statistical measures to compare data, understanding the advantages of using technology to automate processing
- applying appropriate mathematical and statistical formulae, and building on prior knowledge.

## How will my work be assessed?

At the end of year 11 you will sit the Edexcel GCSE examination at Higher or Foundation tier. Each tier is examined by two one and a half hour written papers, both of which cover the entire syllabus content and also allow for the use of a calculator. Both papers are marked out of 80 and contribute 50% to the final examination result.

The two tiers of entry allow all candidates to show what they know, understand and can do. Foundation tier students can achieve a good GCSE Pass of grade 5. The Higher tier paper is designed for students expected to achieve grades 7, 8 or 9 (the old A\*/A).