

Past paper GCSE questions are linked throughout the Y10 curriculum, in the form of progress checks at the end of each topic.

The identified key concepts are taught for depth both at **procedural knowledge** level but more importantly the **application** of these key skills

Weekly homework is set on Sparx Maths. The tasks set on homework are sequenced to allow students to cover content previously covered in class.

Mathematics Curriculum Map Y10 H

Summative assessments, based on the content covered as well as areas of previous weakness are sat once per half term.

STATISTICS AND PROBABILITY:

Vector geometry, enlargements, combined transformations, averages from grouped frequency tables including the median, cumulative frequency and box plots, histograms, conditional probability with tree diagrams

FURTHER ALGEBRA

Rearranging harder formulae, applications of $y = mx + c$, completing the square, quadratic formula, solving quadratic inequalities, estimating the gradient of a curve using a tangent, estimating the area under a curve, graph transformations, quadratic simultaneous equations, algebraic proof

Term 3

SHAPE SPACE & MEASURE

Problems involving circles/part of circles, equation of circle, volume of 3D shapes including spheres and frustums, surface area of 3D shapes, circle theorems, applications of Pythagoras and trigonometry including the sine and cosine rule

Term 2

RATIO AND PROPORTION

Direct and inverse proportion, solving problems which involve ratios within ratios, linking algebra with ratio, further problems involving similarity

ALGEBRA

Expanding brackets, factorising quadratics, nth term of quadratic sequences, inequalities graphically, composite and inverse functions, iteration, simplifying surds, calculations with surds, simplifying and adding/subtracting algebraic fractions

NUMBER

Calculations with mixed numbers, capture-recapture, recurring decimals exponential growth and decay, using prime factorisation to find HCF and LCM, calculations with bounds.

Retrieval work every lesson is based on areas of weakness from previous assessments/progress checks as well as recently covered topics

Term 1

At the end of each topic, students will complete a progress check that will inform future short term and medium term planning.