



The GTS Mathematics Curriculum

Our intent

“Education is not the learning of facts, but the training of the mind to think.” — Albert Einstein

- To build on prior knowledge and provide the building blocks to be able to proceed to study mathematics at a higher level
- To develop fluency of procedural methods before developing skills in application, reasoning and problem solving.
- Provide pupils with rich knowledge, skills and deep conceptual understanding of mathematical concepts so that pupils can take advantage of the opportunities, responsibilities and experiences of later life.
- Ensure pupils are highly mathematically literate, numerate and mathematically creative.
- We strive to provide opportunities to interleave mathematical topics both in maths and other curriculum areas
- To inspire pupils to see the beauty of mathematics, to be confident mathematicians and recognise the opportunities it creates for them

We believe that every child can succeed in mathematics. Our approach is rooted in the principles of *teaching for mastery*, where depth of understanding is valued above speed. By giving pupils time to explore concepts, make connections, and reason with confidence, we build secure foundations that allow all learners to progress together. Mastery ensures that mathematics is not a race, but a journey of understanding — one where every child develops fluency, resilience, and a genuine enjoyment of the subject.

Curriculum Map

	Year 7	Year 8	Year 9	Year 10 F	Year 10 H	Year 11F	Year 11H
Autumn Term	Sequences Algebraic Notation Expressions and Equations Place value, ordering and rounding Four operations Averages and range Rounding and estimation	Ratio Proportion and scale Algebraic Manipulation Graphs and Co-ordinates Multiply and Divide fractions Symmetry and reflection	Properties of Number Using Percentages Area and Volume Equations, Inequalities and Formulae Fractions Rates Standard Form	Collect and represent data Angles review and bearings Types of number and sequences Percentages Ratio and Scale	Collect and represent data Trigonometry and Pythagoras Types of number and sequences Percentages Ratio and scale	Ratio and Proportion Simultaneous equations Area and Volume Similarity and Congruence Sequences Standard Form Work with Circles Set Notation and Venn Diagrams	Ratio and proportion Area and volume Similarity and congruence Sequences and proof Standard form Circle theorems Set notation and Venn diagrams Vectors
Spring Term	Graphing data Fractions decimals percentages Directed Number Fractions and percentages of amounts Perimeter and Area	Area Volume and Density Equations and Inequalities Percentages Indices Standard form Interpret and Represent Data	Maths and Money Straight line graphs Ratio and Proportion Constructions and congruence Similarity Algebraic representation	Algebraic manipulation Equations, inequalities and Formulae Quadratic Expressions and Equations Work with Fractions Non-Calculator methods	Algebraic manipulation Equations, inequalities and formulae Quadratic expressions and equations Probability Work with fractions Straight line graphs	MOCK EXAM 1 Functions and Graphs Equations and Formulae Rates Angles, Bearings and Trigonometry Constructions and Loci Transformations MOCK EXAM 2	MOCK EXAM 1 Functions and graphs Equations and formulae Rates Angles, bearings and trigonometry Constructions and Loci Transformations MOCK EXAM 2
Summer Term	Speed, distance time Properties of number Adding and subtracting fractions Angles and Polygons	Angles in lines and polygons Tables and Probability Circles Graphs and Chart Sequences	Pythagoras Non-linear Graphs Sets and Probability Transformations Simultaneous Equations Trigonometry	Straight line graphs Probability Perimeter, Area and Volume Factors, multiples and primes Vectors Pythagoras and Trigonometry	Rounding and estimation Perimeter, area and volume Non-linear graphs Angles Vectors Factors, powers and surds Simultaneous equations	Revision and Exams	Revision and Exams

Following each topics pupils will have a short assessment to check understanding.

The table above is a guide only, where pupils are set by ability the pace at which pupils progress through this content may differ.