

Mathematics Department

Key Stage Three Overview

Purpose of study

Mathematics is a creative and highly inter-connected discipline that has been developed over centuries, providing the solution to some of history's most intriguing problems. It is essential to everyday life, critical to science, technology and engineering, and necessary for financial literacy and most forms of employment. A high-quality mathematics education therefore provides a foundation for understanding the world, the ability to reason mathematically, an appreciation of the beauty and power of mathematics, and a sense of enjoyment and curiosity about the subject.

Revision Resources:

www.mathsbot.com

www.mymaths.co.uk – booster packs

<https://www.bbc.com/education/subjects/zqhs34j>

www.transum.org

www.piximaths.co.uk

<https://corbettmaths.com/>

Recommended Revision Guides:

https://www.amazon.co.uk/Maths-Complete-Coursebook-Revision-Success/dp/1844197573/ref=sr_1_2?s=books&ie=UTF8&qid=1525101479&sr=1-2&keywords=letts+revision+guide+ks3+maths

https://www.amazon.co.uk/KS3-Maths-Workbook-answers-Higher/dp/1841460389/ref=sr_1_2?ie=UTF8&qid=1525101380&sr=8-2&keywords=cgp+revision+guide+ks3+maths

Key stage three pupils follow a programme of study tailored to their ability, covering the following main strands:

NUMBER
NUMBER AND PLACE VALUE
DESCRIBING, REPRESENTING AND ESTIMATING NUMBERS
COUNTING, COMPARING AND ROUNDING NUMBERS
NUMBER
CALCULATION
CALCULATING MENTALLY
CALCULATING USING WRITTEN METHODS
SOLVING PROBLEMS AND CHECKING ANSWERS
FRACTIONS
RECOGNISING AND COMPARING FRACTIONS
CALCULATING WITH FRACTIONS
INVESTIGATING DECIMALS
INVESTIGATING PERCENTAGES
EXPLORING EQUIVALENCY - FRACTIONS, DECIMALS AND PERCENTAGES
GEOMETRY
PROPERTIES OF SHAPES AND CONSTRUCTIONS
INVESTIGATING PROPERTIES OF SHAPES (2D) AND SOLIDS (3D)
VISUALISING AND CONSTRUCTING SHAPES AND SOLIDS
COMPARING AND CLASSIFYING SHAPES
INVESTIGATING ANGLES
GEOMETRY
MEASUREMENT, MENSURATION AND CALCULATION
DESCRIBING, MEASURING AND ESTIMATING WITH MEASURES
EXPLORING TIME AND MONEY
MEASURING AND CALCULATING SPACE
GEOMETRY
POSITION AND DIRECTION
MATHEMATICAL MOVEMENT
STATISTICS
PRESENTING AND MEASURING DATA
SOLVING PROBLEMS
RATIO AND PROPORTION
PROPORTIONAL REASONING
ALGEBRA
MANIPULATING
SOLVING EQUATIONS AND INEQUALITIES
USING FORMULAE
PATTERN SNIFFING
EXPLORING GRAPHS AND FUNCTIONS