Mathematics Learning Journey

YEAR 11

Paper 3 Calculator

Exam Preparation And Revision

Paper 2 Calculator

Exam Preparation And Revision

Paper 1 Non Calculator

Exam Preparation And Revision

Consolidation

Y11 PPE 2

Units and Proportionality
- Compound Units And Measures
- Direct And Inverse Proportion (Including Equations For Higher)
- Growth And Decay Problems

Sequence rules
- Term To Term Rules
- Position To Term (Nth Term) Rules
- Special Sequences
- Iteration
- Quadratic Sequences (Higher)

Probability 3
- Venn Diagrams And Set Notation
- Tree Diagrams

Y11 PPE 1

Non-Linear Graphs
- Quadratic Graphs
- Cubic And Reciprocal And Graphs
- Exponential Graphs (Higher)
- Trigonometric Graphs (Higher)
- Kinematic Graphs (Higher)

Trigonometry and 3D Pythagoras
- Basic Trigonometry
- Advance trigonometry (Higher)
- 3D Pythagoras (Higher)
- Vectors

Y10 PPE 2

Handling Data 4
- Frequency Polygons
- Cumulative Frequency
- Box Plots
- Scatter Graphs
- Time Series

Working in 3D
- Properties Of 3D Shapes
- Volume And Surface Area Of A Prism
- Volumes And Surface Areas Of Cones And Spheres (Higher)

Linear Graphs
- Plotting Linear Graphs
- Equations Of Linear Functions
- Parallel And Perpendicular Lines (Higher)
- Graphical Inequalities

Factors and Powers
- Factors And Multiples
- Prime Factors
- HCF And LCM
- Indices (And Surds For Higher)
- Standard Form

Ratio and Proportion 2
- Sharing In A Ratio
- 3-way Ratios
- Direct And Inverse Proportion
- Percentage Change

Circles and Constructions
- Area And Circumference
- Arcs And Sectors
- Construction And Loci Problems
- Circle Theorems (Higher)

Graphs 2
- Substitution
- Table Of Values
- Plotting Linear Graphs
- Plotting Quadratic Graphs
- Equations Of Linear Graphs

Shape 2
- Area And Perimeter
- Surface Area And Volume Of 3D Shapes
- Nets

Circles
- Parts Of A Circle
- Circumference Of A Circle
- Area Of A Circle

Formulae
- Substitution
- Solve Linear Equations
- Rearranging Formulae

Probability 1
- Listing Outcomes
- Probability Of An Event
- Venn Diagrams

Equations and Inequalities
- Solving Linear Equations
- Forming And Solving Linear Inequalities
- Inequalities And Number Lines
- Solving Linear Inequalities

Algebra 2
- Collecting Like Terms
- Expanding Brackets
- Factorising

Ratio and proportion
- Simplifying Ratios
- Sharing In A Ratio
- Proportion Problems
- Maps And Scales

Angles 2
- Basic Angle Facts
- Angles And Parallel Lines
- Angles In Polygons

Pie Charts and Scatter Graphs
- Drawing Pie Charts
- Interpreting Pie Charts
- Drawing And Interpreting Scatter Graphs

Percentages and Fractions
- Fractions Of Amounts
- Percentage And Fractional Equivalence
- Percentages Of Amounts

End Of Year Assessment

Handling Data 1
- Questionnaires And Collecting Data
- Simple Charts And Diagrams

Shape 1
- Area And Perimeter Of 2D Shapes
- Compound Shapes
- Volume Of 3D Shapes

Averages
- Mean
- Median
- Mode
- Range

YEAR 8

Transformations
- Symmetry
- Rotations
- Reflections
- Translations

Graphs 1
- Coordinates
- Plotting Graphs

Sequences
- Drawing Patterns
- Finding Terms
- Describing Rules

Ratio
- Writing
- Simplifying
- Sharing

Angles 1
- Measuring And Drawing
- Classifying
- Angles In Triangles
- Basic Angle Facts

Probability
- In Words
- As Fractions

Decimals
- Four Operations
- Rounding And Estimation

Fractions
- Comparing And Ordering
- Four Operations

Algebra 1
- Expressions
- Substitution
- Equations

Properties of Number
- Factors
- Multiples
- Primes

Negative Numbers
- Ordering
- Using The Four Operations

Baseline Assessments

Number Calculations and BIDMAS
- Addition And Subtraction
- Multiplication And Division
- Order Of Operations

YEAR 7

Induction Days

PRIMARY SCHOOL

Y5 Open Evening

Handling Data 3
- Sampling
- Charts And Diagrams (Including Pie Charts)
- Averages And Grouped Data Including Comparisons

Functions
- Substitution
- Solving Linear Equations
- Function Notation

Probability 2
- Probability Of An Event
- Relative Frequency
- Probability For More Than One Event

Pythagoras' Theorem
- Finding The Hypotenuse
- Finding The Shorter Sides Of A Right Angled Triangle
- Problems In Context

End Of Year Assessment

Measures and Accuracy
- Estimation And Approximation
- Error Intervals
- Calculations With Bounds (Higher)
- Compound Units and measures

Equations and Inequalities
- Linear Equations
- Quadratic Equations
- Simultaneous Equations
- Inequalities inc. Quadratic (Higher)

Y10 PPE 1

YEAR 10

Fractions, Decimals & Percentages
- Ordering Fractions
- Ordering FDP
- Calculating With Fractions And Mixed Numbers
- Percentage Problems Including Compound And Reverse Percentages

Working in 2D
- Area And Perimeter
- Coordinate Problems
- Transformations
- Enlargements
- Congruency
- Similarity

End Of Year Assessment

Constructions
- Drawing Angles
- Construct Triangles
- Perpendicular Bisectors
- Angle Bisectors

Real Life graphs
- Speed, Distance, Time
- Distance Time Graphs
- Conversion Graphs

Handling Data 2
- Record Data
- Mean
- Median
- Mode
- Range
- Averages From Tables

Transformations
- Reflections, Rotations And Translations
- Enlargements
- Combined Transformations
- Describing Transformations
- Invariant Points

Angles and Polygons
- Angles And Parallel Lines
- Properties Of Shapes
- Interior And Exterior Angles
- Bearings And Scale Diagrams

Expressions
- Algebraic Notation
- Identities
- Collecting Like Terms With Indices
- Expanding Double Brackets
- Factorising Quadratics

Calculations
- Four Operations With Decimals
- Negative Numbers
- Rounding To Significant Figures