Grange Park School

Learning for Life - Personalised Pathways for All

Continue your lifelong love of learning and personal development

Stay at Grange Park. Repeat if grade 4 not achieved.

Stay at Grange Park. Try GCSE Statistics or alternative qualification if grade 4 Maths achieved.

Move onto college. Continue to grade 4 outcome

SIT GCSE MATHS

REPRESENTIATIONS

Probability
Constructions
Representing data

GEOMETRIC REASONING

Angle rules
Shapes
Similarity
Area and volume
Right angled triangles

ALGEBRAIC REASONING

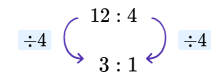
Equations and inequalities
Straight line graphs
Quadratic and other graphs
Sequences

NUMERICAL REASONING

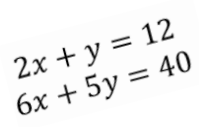
Number sense
Accuracy
Calculating
Fractions and percentages

PROPORTIONAL REASONING

Ratio and rates
Direct proportion
Averages
Fractions



KS5



SIT GCSE MATHS

REVISION

After school revision
Lunchtime revision
Easter holidays revision
May half term revision

COMMUNICATION

Transforming and constructing
Listing and describing
Show that questions

REASONING

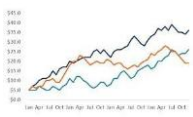
Multiplicative reasoning
Geometric reasoning
Algebraic reasoning

ALGEBRA

Expanding and factorizing
Changing the subject
Functions

GRAPHS

Gradients and lines
Non-linear graphs
Using graphs



YEAR 11

SIT GCSE STATISTICS

USING NUMBER

Types of number and sequences
Indices and roots
Manipulating expressions

DELVING INTO DATA

Collecting, representing and interpreting data
Non calculator methods

PROPORTIONS & PROPORTIONAL CHANGE

Ratios and fractions
Percentages and interest
probability

GEOMETRY

Angles and bearings
Working with circles
Vectors

DEVELOPING ALGEBRA

Representing solutions of equations and inequalities
Simultaneous equations

SIMILARITY

Congruence, similarity and enlargement
Trigonometry

YEAR 10

REPRESENTATIONS

Probability
Begin working on GCSE Statistics: Data handling cycle

REASONING WITH PROPORTION

Enlargement and Similarity
Solving ration and proportion problems

REASONING WITH GEOMETRY

Deduction skills
Rotation and translation
Pythagoras' theorem

REASONING WITH NUMBER

Numbers
Percentages
Money

CONSTRUCTING IN 2D AND 3D

Three dimensional shapes
Constructions and congruency

REASONING WITH ALGEBRA

Straight line graphs
Forming and solving equations
Testing conjectures

YEAR 9

REASONING WITH DATA

The data handling cycle
Measures of location

DEVELOPING GEOMETRY

Angles in parallel lines and polygons
Area of trapezia and circles
Line symmetry and reflection

DEVELOPING NUMBER

Fractions and Percentages
Standard index form
Number sense

ALGEBRAIC TECHNIQUES

Brackets, equations and inequalities
Sequences
Indices

REPRESENT-ATIONS

Working in the Cartesian plane
Representing data
Tables and probability

PROPORTIONAL REASONING

Ratio and scale
Multiplicative change
Multiplying and dividing fractions

YEAR 8

REASONING WITH NUMBER

Developing number sense
Sets and probabilities
Prime numbers and proof
HCF and LCM

LINES AND ANGLES

Constructing, measuring and using geometric notation
Developing geometric reasoning
Use protractors

DIRECTED NUMBER

Operations and Equations with directed number
Addition and subtraction of fractions

APPLICATIONS OF NUMBER

Solve problems with addition and subtraction
Solve problems with multiplication and division
Fractions and percentages of amounts

PLACE VALUE AND PROPORTION

Place value
Order integers
Order decimals
Standard form
Fraction, decimals and percentages
Use pie charts

ALGEBRAIC THINKING

Sequences
Understand and use algebraic notation
Equality and equivalence
Solve linear equations

YEAR 7

THEMED PROJECT

SIT SATS EXAMS

SHAPE

Angles in triangles
Vertically opposite angles
Circles
Nets of 3D Shapes

AREA, PERIMETER AND VOLUME

Area and perimeter
Area of triangles and parallelogram
Volume of cuboids

FRACTIONS, DECIMALS AND PERCENTAGES

Percentages of amounts
Equivalent fractions, decimals and percentages
Order fractions, decimals and percentages

RATIO

Scale drawings
Similar shapes
Ratio language

ALGEBRA

Function machines
Expressions
Substitution
Form Equations

FRACTIONS

Compare and order fractions
Add and subtract fractions
Multiple and divide fractions
Fractions of an amount

THE FOUR OPERATIONS

BIDMAS
Prime numbers to 100
Solve problems with arithmetic

PLACE VALUE

Work with numbers up to 10,000,000
Negative numbers

YEAR 6

CONVERTING UNITS

Convert between unit types
Work with volume

SHAPE

Use degrees
Measure angles
Draw angles
Angles at a point
Angles on straight line
Polygons

STATISTICS

Line graphs
Two way tables
Use timetables

FRACTIONS, DECIMALS & PERCENTAGES

Convert fractions
Add and subtract fractions
Order and compare decimals
Equivalent fractions, decimals and percentages

THE FOUR OPERATIONS

Addition
Subtraction
Multiplication
Division
Multiples
Factors
Square Numbers
Prime Numbers

PLACE VALUE

Work with numbers to 1,000,000

YEAR 5

Baseline assessment on admission

Develop the skills to engage in Math's in real world situations

Understand where we use Math's in every day situations

Develop a lifelong love of learning

welcome

MATHS LEARNING JOURNEY – GRANGE PARK SCHOOL