



## CURRICULUM INTENT

At Benton Park School the Mathematics department has 5 key aims that structure the delivery of our curriculum:

### 01 MATHEMATICALLY FLUENT

Students are numerate and capable of applying this numeracy confidently in contexts outside of the classroom.

### 02 ENJOYMENT

Students have a love of the beauty and logic of mathematics and appreciate maths in a wider context.

### 03 ANALYTICALLY CRITICAL

Students can analyse and question material presented to them, they are able to have the mathematics available to question the world around them and apply this to solve problems

### 04 FACILITATING

Students are equipped with the mathematics they need to apply to other disciplines in academia be this geography, psychology, science or business.

### 05 DISCIPLINARY MATHEMATICS

Students are able to develop a deep understanding of mathematics and are provided with the strongest disciplinary knowledge to access the highest secondary school maths and beyond.

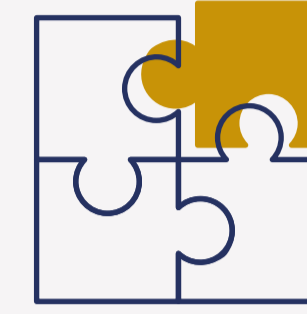
These aims help to create the climate for learning, opportunity and success within our curriculum.

## BENTON PARK SCHOOL VALUES

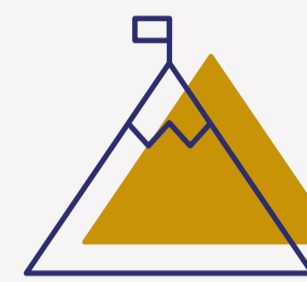
In Maths students develop:



- **Resilience** by problem solving and learning how to apply accurate formulas in context; by green penning assessment and work.



- **Collaboration** by working in pairs, groups and maths team games.



- **Endeavour** by finding a starting point to a problem and not being discouraged; by using goal free problems to find information.



- **Compassion** by listening to peers, learning from mistakes and understanding that failure is the first step to success.



- **Inspiration** by making links to careers and other areas of the curriculum; by realising that maths is everywhere; through celebrating other successes and ideas in the classroom.



### Matrices and Transformations

Introduction and Multiplication  
Matrices and Transformations

**AQA Level 2 Certificate  
in Further Maths**

### Trigonometry

Identities and Proof  
Solving problems and  
Exam questions

### Revision and Exam Preparation

**Exam  
Mid June**

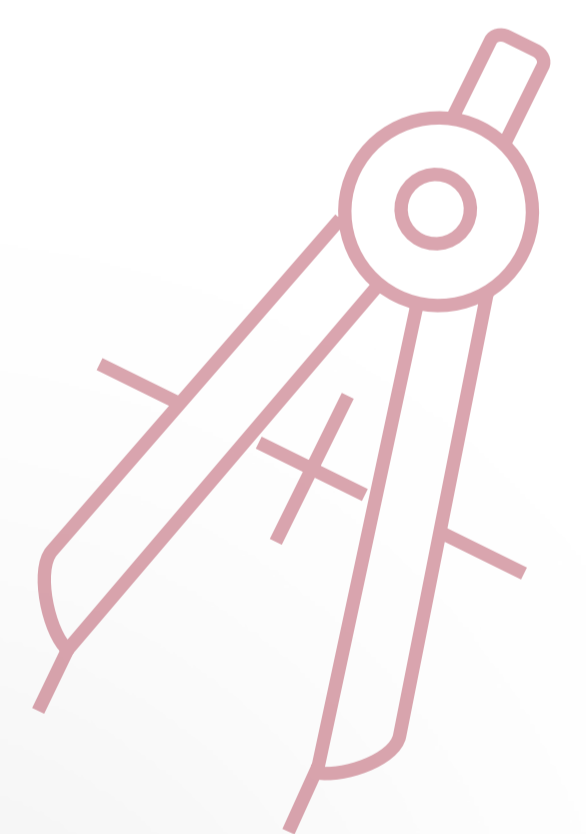
**YEAR 12  
A LEVEL MATHS**

### Trigonometry

Graphs and Exact Values  
and Basic Equations  
Identities and More  
Equations

### Differentiation

Stationary Points  
Solving problems and  
Exam questions



**TERM  
3**

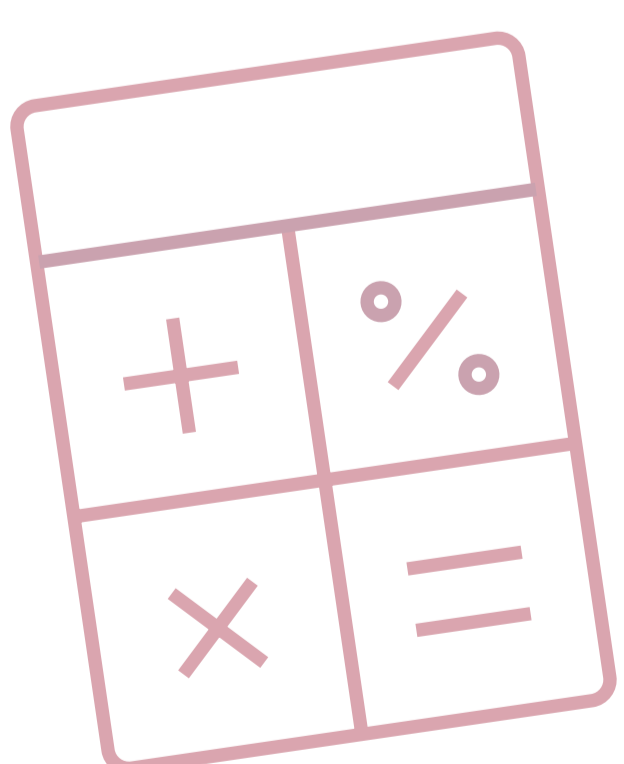
**TERM  
2**

### Algebra

Solving 3 Simultaneous Equations  
Factor Theorem and Algebraic Long Division  
Algebraic Fractions  
Functions  
Sequences  
Expanding Brackets Binomial  
Solving problems and Exam questions

### Differentiation

Introduction to  
Differentiation  
Tangent and  
Normal



**TERM  
1**

### Coordinate Geometry Straight Lines

Introduction to Coordinate Geometry  
Calculating the Length of a line  
Ratio and Coordinates  
Solving problems and Exam questions

### Coordinate Geometry Circles

Equation of a circle Centre (0,0)  
Equation of a circle Centre (a,b)  
Solving problems and Exam questions

**YEAR 11**