

# Yr11: ASK Yourself!

**Subject: Maths**  
**Unit: Higher**

	Launching 1-2	Developing 3-4	Progressing 5-6	Mastering 7-9
<b>S</b> kills				
	I need to be able to use the skills of TENSILE in maths.	I use TENSILE skills sometimes in maths.	I can use each of the TENSILE skills confidently.	I can expertly use TENSILE and see how each skill helps me learn.
<b>K</b> nowledge				
<b>Vectors</b>	I can confidently use vector notation to describe a direction and magnitude.	I can confidently add and subtract vectors to find a resultant vector.	I can confidently find a resultant vector involving a combination of scalars and vectors.	I can confidently proof vectors are parallel or co-linear.
<b>Iteration</b>	I can confidently show a solution must lie between two values.	I can confidently use an iteration formula to find a solution.	I can confidently produce an iteration formula and find a solution.	I can confidently solve problems in context using iteration method.
<b>Algebra in .....</b>	I can confidently use algebra in fraction problems.	I can confidently use algebra in probability problems.	I can confidently use algebra in sequence problems.	I can confidently use algebra in shape problems.
<b>Sine and Cosine Rule</b>	I can confidently find the area of a triangle using trigonometry.	I can confidently find missing angles or lengths using the Sine or Cosine rule.	I can confidently find possible multiple angle solutions using the Sine or Cosine rule.	I can confidently use a combination of trigonometric rules to solve problems.
<b>Equation of a Circle</b>	I can confidently identify the equation of a circle.	I can identify the centre of a circle and its radius from its equation.	I can find the equation of a tangent of a circle.	I can solve simultaneous equation problems involving circles.
<b>Pre-Calculus</b>	I can confidently draw tangents on a curve	I can confidently use a tangent to represent the instantaneous rate of change.	I can confidently estimate the gradient of a curve by using a tangent.	I can confidently estimate the area underneath a curve and reflect upon this in context.
<b>Graph Transformations</b>	I can confidently apply a single graph transformation.	I can confidently apply multiple graph transformations.	I can confidently recognise the effects of a graph transformation from its equation.	I can confidently state the inputs and outputs of a function.

**Proof**

I can confidently represent a written problem in algebraic form.

I can confidently complete an algebraic proof.

I can confidently prove shapes are similar or congruent.

I can confidently perform geometric proofs including circle theorems.