

# Year 9 Maths KAT Revision Guide

## How to access independent learning?

The screenshot shows the Sparx Maths interface. On the left sidebar, there are four options: Compulsory (star icon), XP Boost (lightning bolt icon), Target (crown icon), and Independent Learning (lightbulb icon). The Independent Learning option is highlighted with a black box. The main area shows a 'Hey!' notification for 'Introducing Sparx Maths' with a progress indicator of 0/1 and a 'Not started' status.

## Search For Topics

This is where you enter your topic code.

## Your Curriculum

- If the topic code starts with M select KS3
- If the topic code starts with U select GCSE

## Independent Learning

The screenshot shows the 'Independent Learning' search interface. It has two tabs: 'Find topics' (active) and 'My activity'. Below the tabs are three input fields: 'Search for topics:' (text input), 'Your curriculum:' (dropdown menu), and 'Default level:' (dropdown menu). The 'Search for topics:' field is highlighted with a purple box, 'Your curriculum:' with a green box, and 'Default level:' with a red box. Below these fields is a 'Select a topic:' section with six blue buttons: 'Number' (calculator icon), 'Algebra' (math symbol  $x^2$ ), 'Ratio and Proportion' (3:2 icon), 'Geometry' (triangle icon), 'Probability' (dice icon), and 'Statistics' (bar chart icon).

## Difficulty Level

This should be set automatically but if no questions are available at your level you may need to change this to a higher or lower setting.

**Codes**

Green – Key knowledge from Year 9

Black – Knowledge required to be confident

Purple – Knowledge to ensure you excel

Unit	Small Step	Sparx Code
<b>Straight line graphs</b>	Using Cartesian coordinates	U789
	Straight lines from a table of values	U741
	Calculating gradient	U848
	Identifying points on a line	U933
	Interpreting the equation of a line	U669
	Using straight line graphs in real life	U638
<b>Forming and Solving Equations</b>	Solving one and two step equations	U755
	Solving an inequality with brackets	U759
	Forming equations from worded problem	U599
	Solving inequalities with negatives	U759
	Change the subject of an equation	U556
<b>Testing Conjectures</b>	Identifying prime numbers	U236
	Identifying factors and multiples	U211
	Testing conjectures with algebra	U201
	Percentages of an amount	U554
	Expanding single and double brackets	U646
	Continuing linear sequences	U498
	Generalising to create algebraic expressions	U613
<b>Three-dimensional Shapes</b>	Naming three-dimensional shapes	U719
	Drawing the net of a cube	U761
	Find the volume of a cuboid	U786
	Drawing elevation and plan views	U743
	Calculating the volume of a prism	U174
	Calculating the volume of a cylinder	U915
	Calculating the volume of spheres	U617
<b>Constructions and Congruency</b>	Classifying angles	U447
	Using scale	U257
	Identifying congruent shapes	U790
	Constructing an equilateral triangle	U187
	Constructing loci	U820
	Constructing angle bisectors	U787
	Construct perpendicular lines	U245
	Identify congruent triangles	U866