



Year 8 - Term - Kemnal Keys



Unit 13: Pythagoras Theorem and Straight Line Graphs	Unit 14: Data and Scatter Graphs	Unit 15: Transformations
<ul style="list-style-type: none"> In a right-angled triangle the longest side is called the hypotenuse. When finding the hypotenuse, use $c^2 = a^2 + b^2$ c = hypotenuse, a and b = shorter sides. 	<ul style="list-style-type: none"> A Scatter Graph plots two sets of data on the same graph. The shape of the graph shows if there is a relationship or correlation between them. A positive correlation has a rising trend from left to right. A negative correlation has a falling trend from left to right. 	<ul style="list-style-type: none"> You reflect shapes in a mirror line. All points on the image are the same distance from the mirror line as the points on the object, but on the opposite side. Lines of reflection (or mirror lines) on coordinate grids can be described by their equations.
<ul style="list-style-type: none"> When finding the shorter side, rearrange the formula and use $a^2 = c^2 - b^2$ 	<ul style="list-style-type: none"> A line of best fit shows the relationship between two sets of data. Draw a line of best fit so that there are the same number of crosses on each side of the line. 	<ul style="list-style-type: none"> A shape has reflected if one half folds exactly on top of the other half. The line on which this fold happens, is called a line of symmetry or mirror line.
<ul style="list-style-type: none"> Coordinates are written as (x, y). The midpoint of a line segment is the point exactly in the middle. 	<ul style="list-style-type: none"> A stem and leaf diagram shows numerical data split into a 'stem' and 'leaves'. The key shows you how to read the values. Data needs to be ordered from smallest to largest in a stem and leaf diagram. 	<ul style="list-style-type: none"> When enlarging a shape, you multiply all its side lengths by the same number. The number you multiply by is called the scale factor.
<ul style="list-style-type: none"> To find the midpoint of a line segment, use the formula $(\frac{x_1+x_2}{2}; \frac{y_1+y_2}{2})$. 	<ul style="list-style-type: none"> Averages such as Range, Median, Mean and Mode can also be found using a stem and leaf diagram. 	<ul style="list-style-type: none"> To describe a translation, you need to give the movement left or right, followed by the movement up or down. A translation does not change the size or shape of an object.