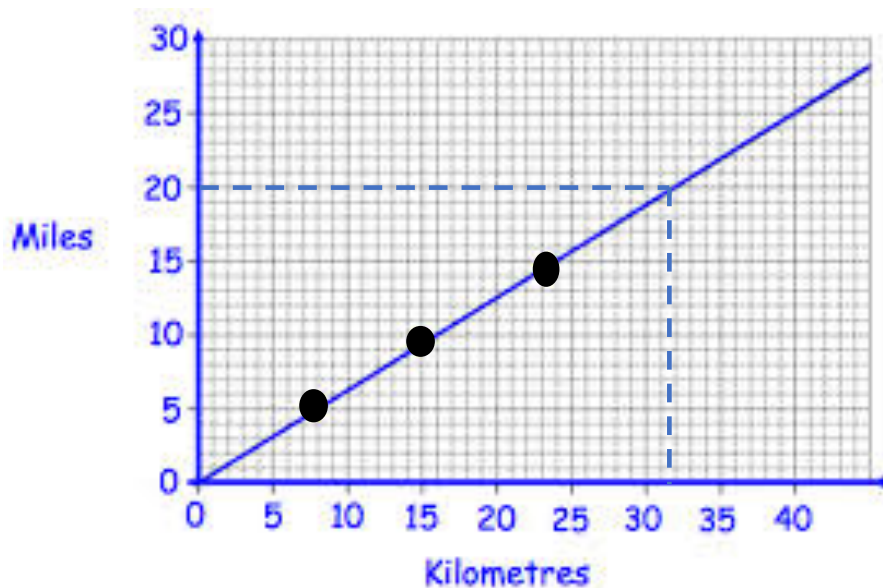


SHQ: How do I construct a line graph?

We have already established that line graphs are usually use to represent data that shows how a variable changes over time or they can be used to covert between one unit and another.

Line graphs are very useful to show how to convert between different measurements (for example metric and imperial – centimetres and inches) or to convert between different currencies (for example £ and euros)

Below is an example of a conversion chart which would help if you wanted to convert between miles and kilometres:



On each axis (x and y axis) will be one of each of the two units that you are converting between.

Is it important to have some data to draw your line. Ideally, three piece of data for converting between the two units that you can plot on your graph.

Here, we knew that 5 miles was 8 km, 10 miles was 16 km and 15 miles was 24 km. We plotted these three points on the graph, then draw the line through them. It is now possible to use the graph to work out other conversions.

Drawing lines (as shown by the dotted lines in the above example converting 20km into miles) is helpful.

Using the information above have a go at the Power Maths problems on the resource sheet for **worksheet 10**. If you want a challenge, try **Question 4**.

When you have completed the questions you are going to try, look back over your work and try the 'reflect' question at the end. The answers for all the questions can be found in the Week 9 Maths Answers resource