Year 6 – Statistics

In this unit, I will:
- Learn to calculate the mean of a set of data
- Use the mean to find missing data
- Read and interpret pie charts using fractions
- Read and interpret pie charts using percentages
- Interpret and create line graphs

How does this unit build on prior learning?
This unit builds on the skills children have gained in Year 5 interpreting and using line graphs. They learn what the mathematic mean is and how to calculate it and are introduced to pie charts.
Before they start this unit, it is expected that children:
• can plot and interpret simple line graphs
• are confident with dividing 2- and 3-digit numbers by a 1-digit number
• understand about angles of a circle
• can identify and calculate fractions of a circle
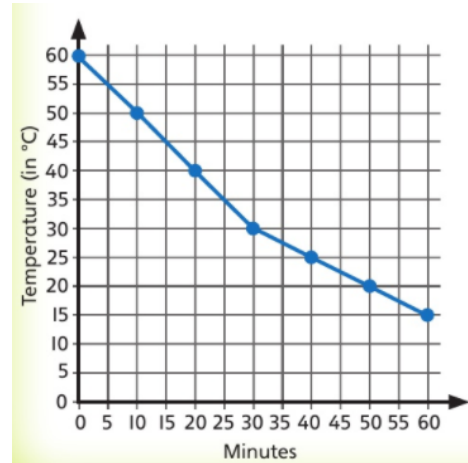• can do calculations with percentages.

National Curriculum Link - Year 6 Measurement
•Calculate and interpret the mean as an average.
•Interpret and construct pie charts and line graphs and use these to solve problems
•Use estimation to check answers to calculations and determine, in the context of a problem, an appropriate degree of accuracy.
•Solve problems involving the calculation of percentages (for example, of measures, and such as 15% of 360) and the use of percentages for comparison.
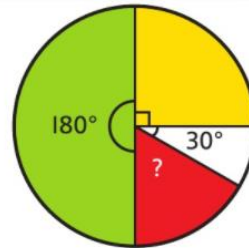•Solve comparison, sum and difference problems using information presented in a line graph
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To calculate the mean:
- **Find the total of ALL the values (including any zeroes)**
- **Count the number of values**
- **Divide the total by the number of values**

We will be interpreting line graphs.
Here is a line graph that shows the temperature of a hot chocolate drink that was left to cool.
What was the temperature of the hot chocolate after ten minutes?

We need to know that the angles around a point add up to 360°. Calculate the missing angle.

Key Vocabulary	
mean	Is the total of the numbers divided by the number of values there are.
average	It is the middle value in a set of numbers
pie chart	A type of graph which illustrates how different types of data fit into a whole.
segment	Each part of a pie chart is called a segment.
line graph	It is a graph which records data which changes over time (eg: temperature throughout the day).
bar chart	It shows the value of data and is represented by different bars.
percentage	It is a proportion of a whole and is shown as a part of 100.
fraction	Part of a whole number split up into equal parts.
data	Individual units of information collected for analysis

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