Key vocabulary:

- **Range** – Difference between the highest and lowest value.
- **Axis** – A fixed reference line for measurement on graphs.
- Interpret – explain the meaning of
- **Line graph** – A type of chart that displays information as a series of data points
- **Pie Chart** – A type of graph in which a circle is divided in to sectors that each represent the proportion of the whole
- **Bar Chart** – A diagram that displays information as lines or rectangles.
- **Frequency** – the rate some occurs in a given sample.

- **Perimeter** – The continuous line forming the boundary of a closed shape
- **Area** – The measurement of a surface
- **Compound** – Made up of several parts
- **cm²** - A unit of area equal to a square 1 cm long on each side.
- **Regular** – Arranged in a constant pattern
- **Irregular** – Not arranged in a constant pattern.

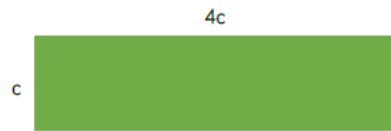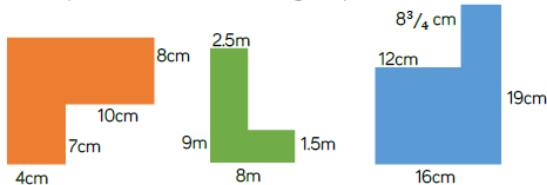## Curriculum Objectives

Statistics

- Read and interpret line graphs
- Draw line graphs
- Use line graphs to solve problems
- Read and interpret tables
- Two way tables
- Timetables

Area and Perimeter

- Measure perimeter
- Calculate perimeter
- Find unknown lengths
- Area of rectangles
- Area of compound shapes
- Estimate and approximate area

Examples

Find the perimeter of the following shapes.

8cm
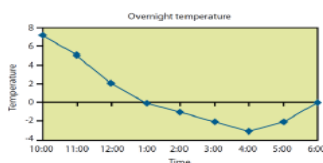10cm
7cm
4cm

2.5m
9m
8m
1.5m

8³/₄ cm
12cm
19cm
16cm

4c
c

The value of c is 14m. What is the total perimeter of the shape?

Each orange square has an area of 24cm². Calculate the total orange area. Calculate the blue area. Calculate the green area. What is the total area of the whole shape?

Use the line graph to answer the following questions.

Overnight temperature

What was the highest/lowest temperature? What time did they occur?
What is the difference between the highest and lowest temperature?
How long did the temperature stay at freezing point or less?

Answer the questions using information from the tables.

City	Leeds	Wakefield	Bradford	Liverpool	Coventry
Population	720,000	316,000	467,000	440,000	305,000

- What is the difference between the highest and lowest population?
- Which two cities have a combined population of 621,000?

Please refer to the school Calculation Policy on the Maths page via the school website