

Year 5 Week 9 Lesson 4

Can I interpret a line graph?

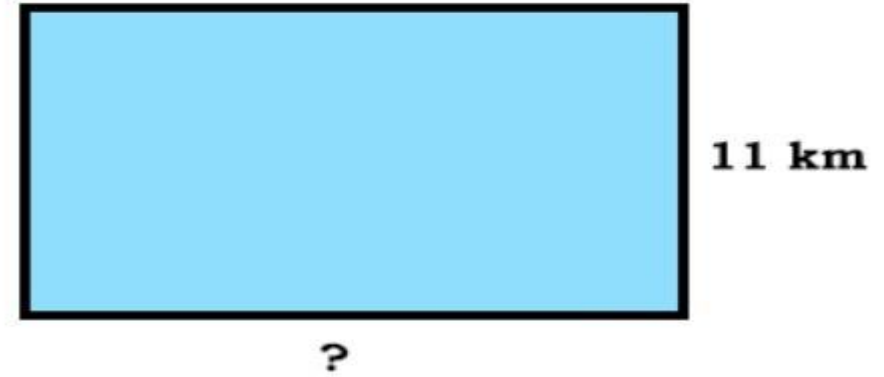
Fast Five

1. $\frac{3}{4} + \frac{2}{3} =$

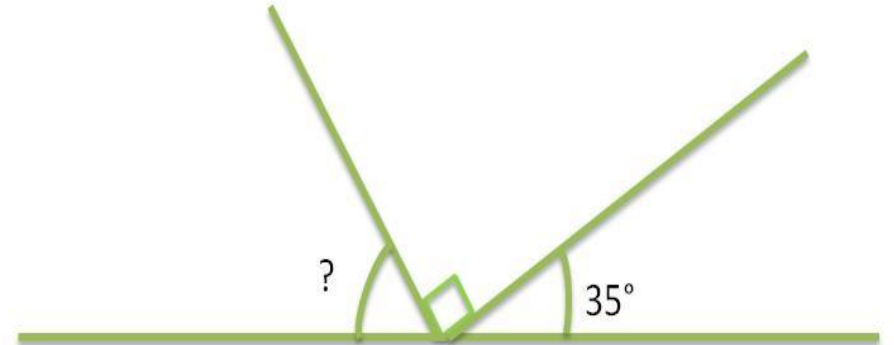
2. $54 \times 14 =$

4. What is the missing angle?

5. How many vertices has a cube got?



3. What is the length of the missing side if the area is 44km^2



Fast Five - Answers

1. $\frac{17}{12}$ or $1\frac{5}{12}$

2. 756

3. 4km

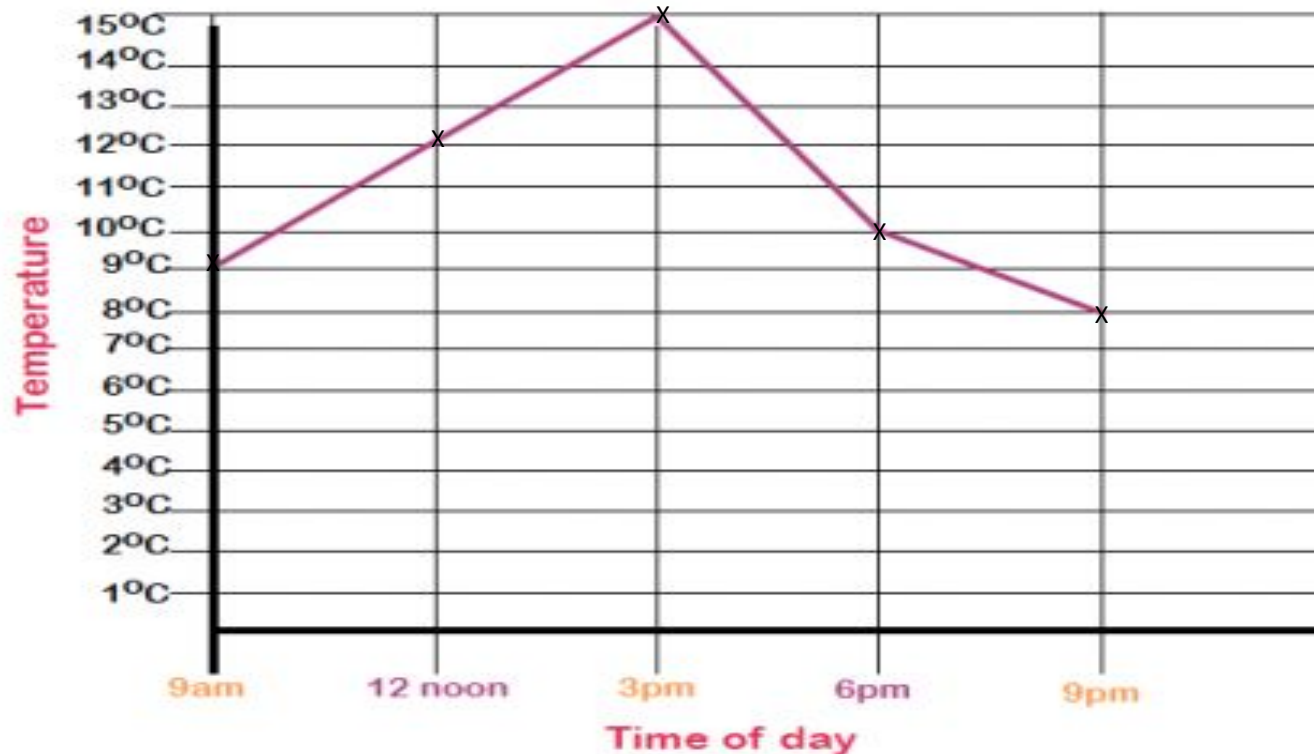
4. 55°

5. 8

Line graphs

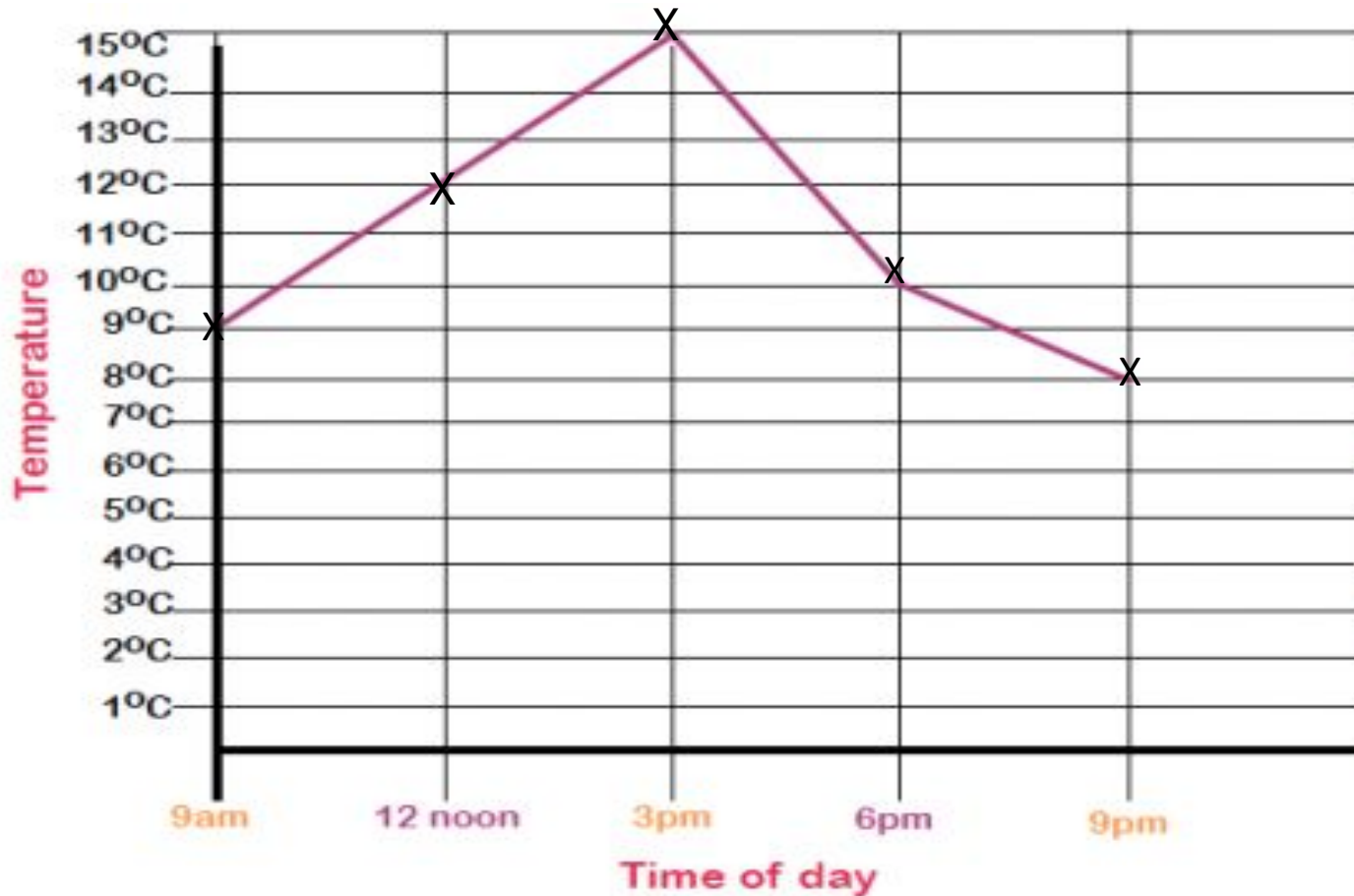
- Unlike bar graphs, which group data into categories, line graphs plot data over time (which is ongoing/continuous).

Temperature during 8th March 2019



Line graph – you plot the data from the table and record it on the graph.

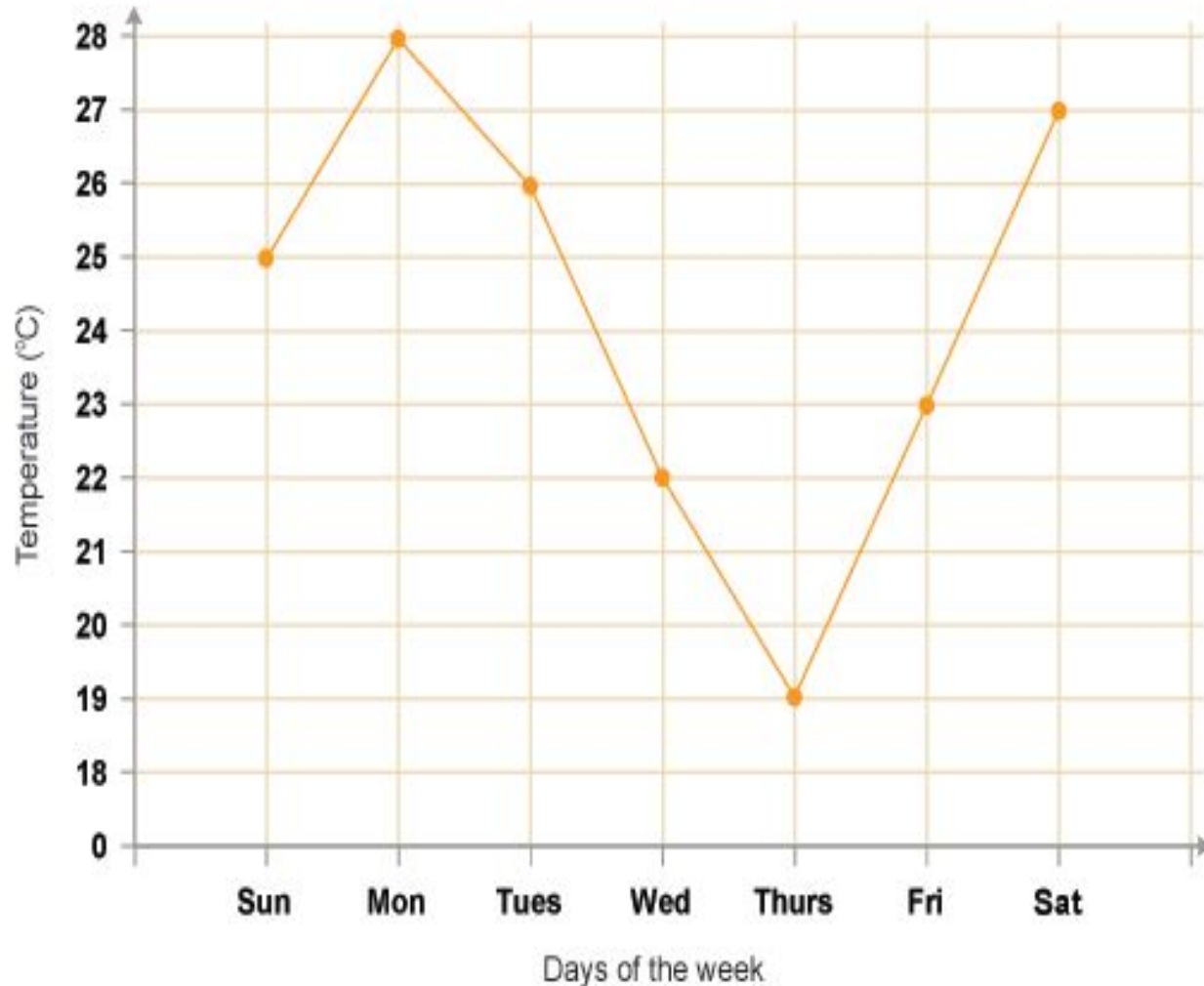
Temperature during 8th March 2019



Time of day	Temperature °C
9am	9
12 noon	12
3pm	15
6pm	10
9pm	8

Questions

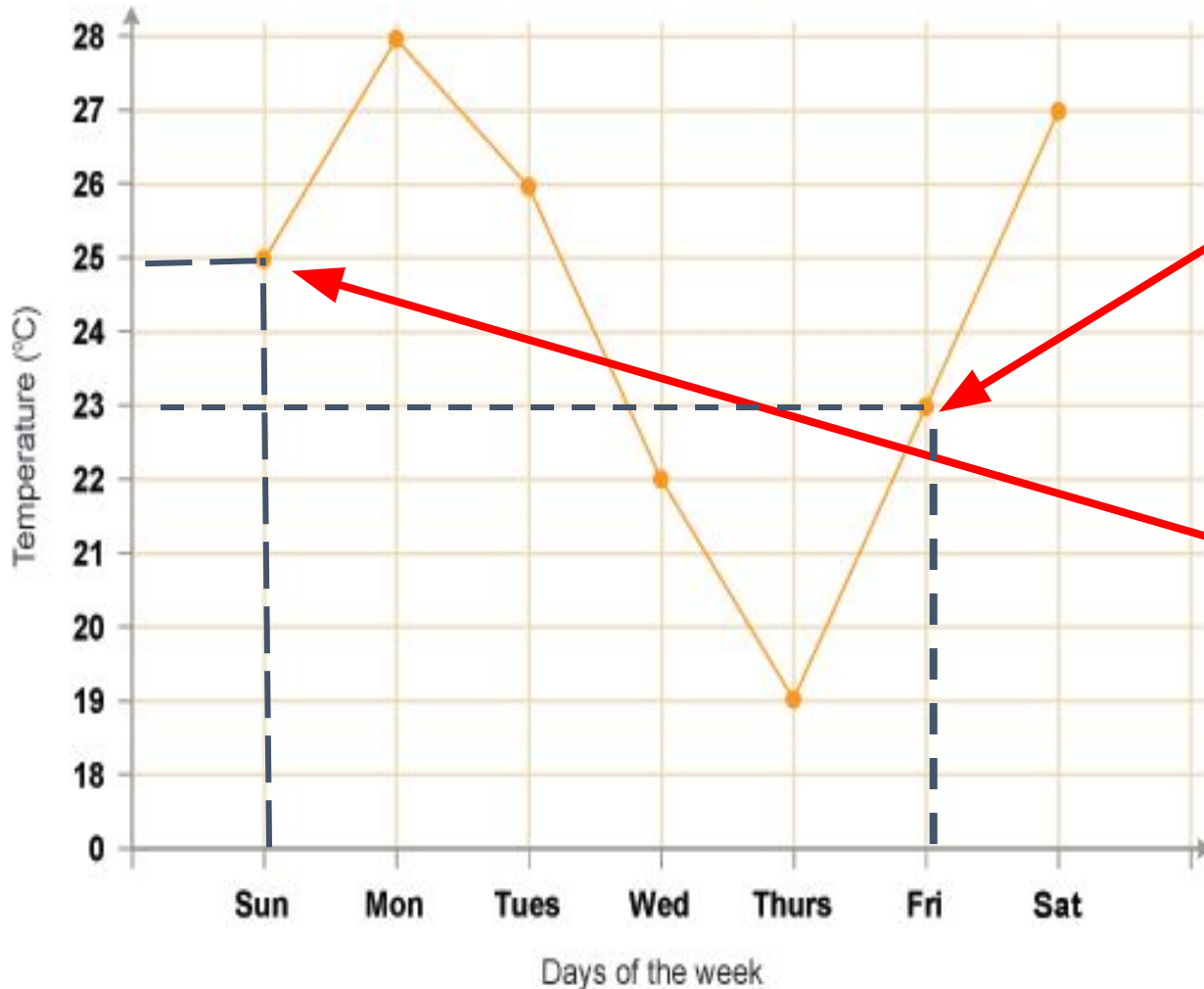
Temperature last week in Spain



1. What was the temperature on Friday?
2. What was the temperature on Sunday?
3. When was it over 25°C?
4. How much hotter was it on Saturday than Wednesday?

Answers

Temperature recorded in Spain last week



1. What was the temperature on Friday?

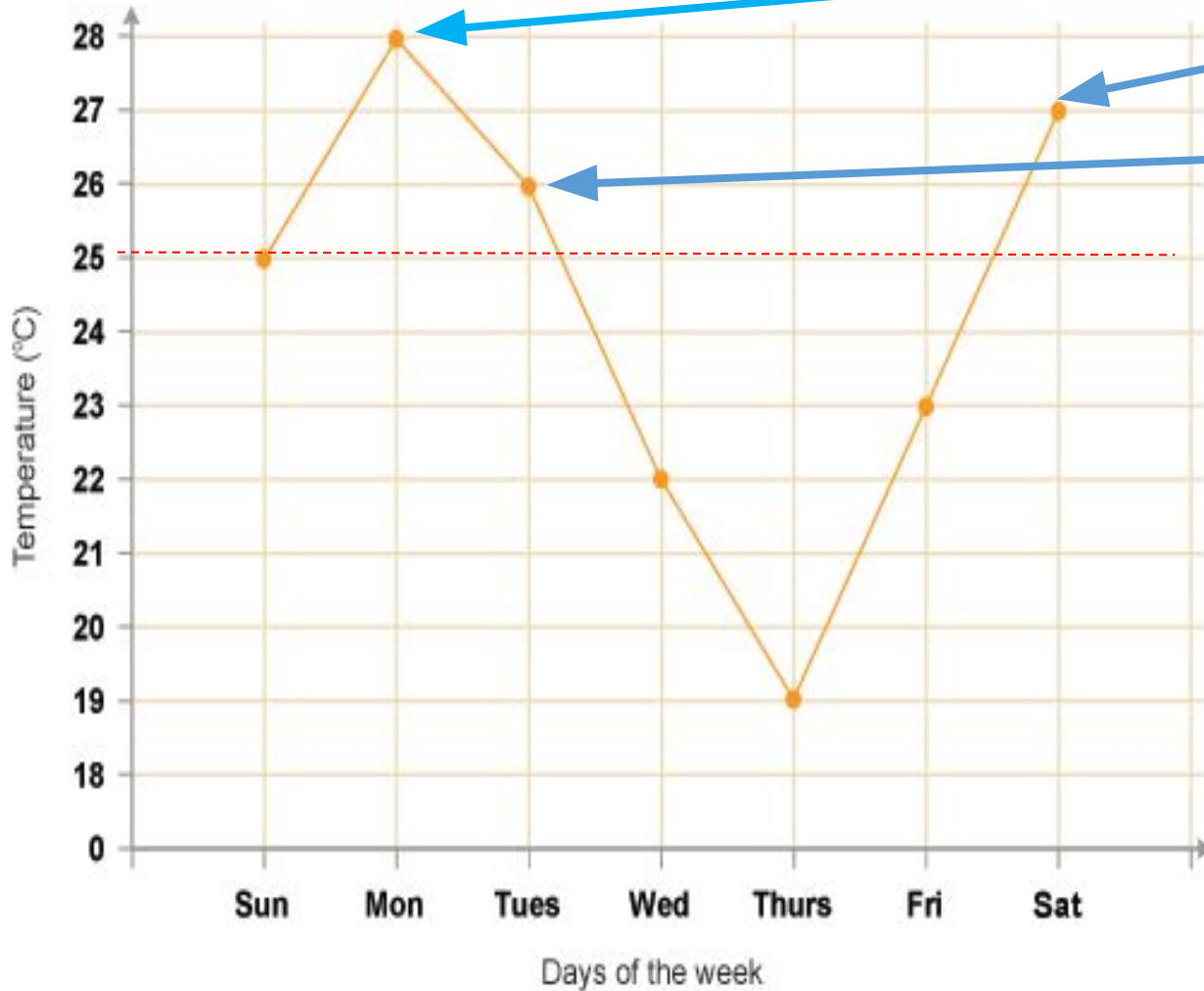
23°C

2. What was the temperature on Sunday?

25°C

Answers

Temperature recorded in Spain last week

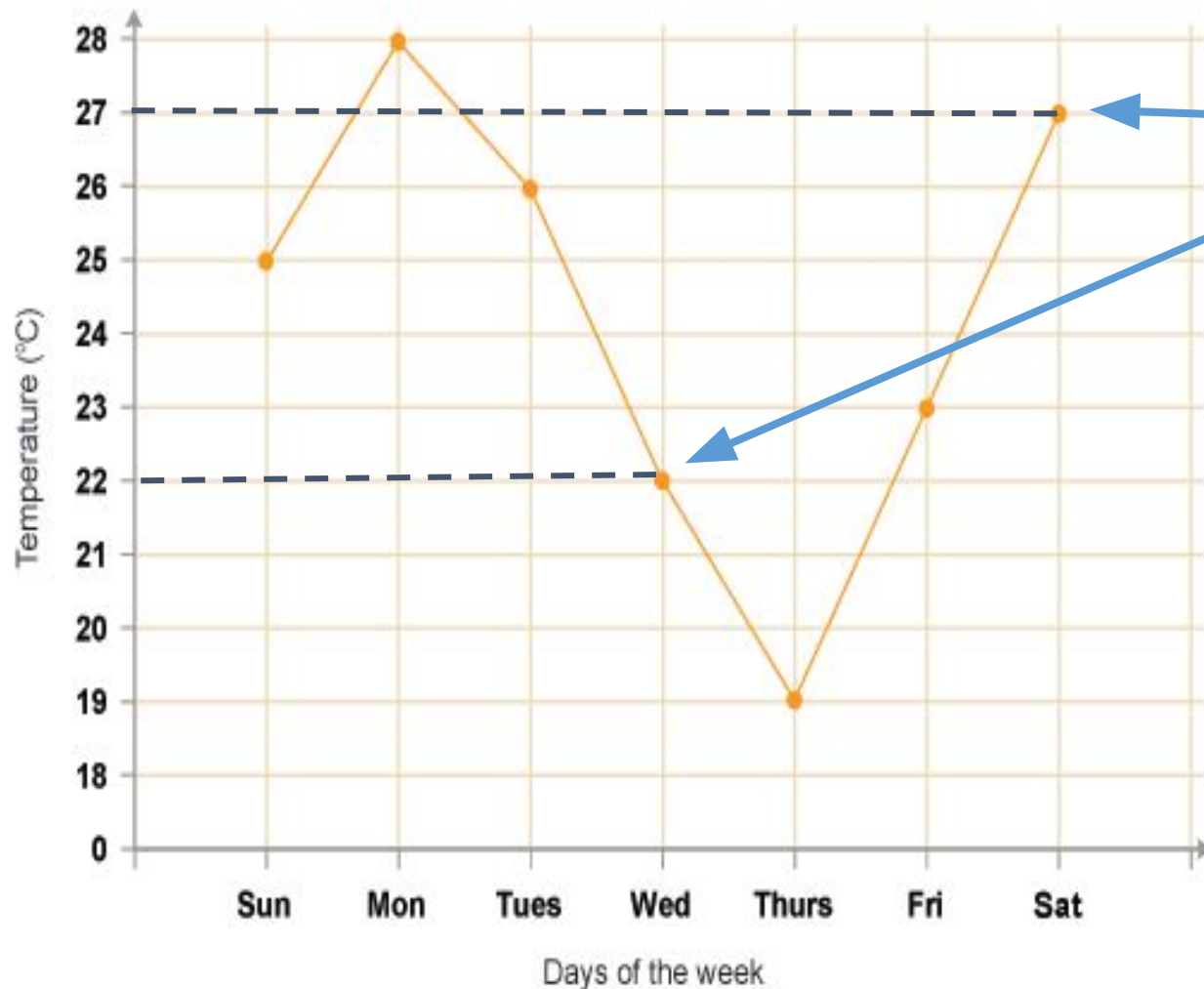


3. When was it over 25°C?

Monday, Tuesday and Saturday

Answers

Temperature recorded in Spain last week



4. How much hotter was it on Saturday than Wednesday?

Step one

Saturday was 27°C

Wednesday 22°C

Step two

Saturday – Wednesday

$$27^{\circ}\text{C} - 22^{\circ}\text{C} = 5^{\circ}\text{C}$$

Line graphs can be used to make estimates when the data was not recorded for that time.

Estimate the temperature at 07:30.

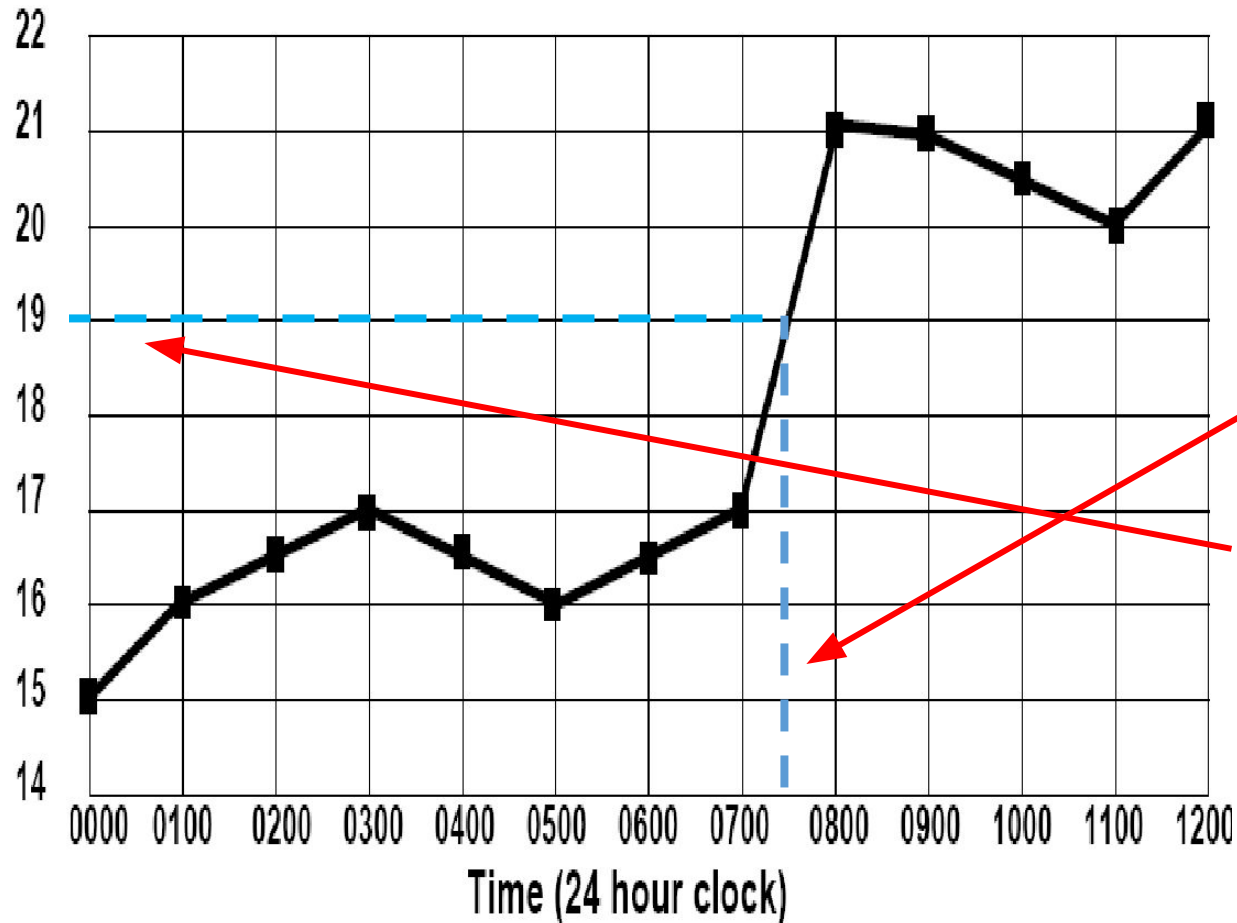
We have recorded data for 07:00 and 08:00.

We can use the line between these two points to make an **estimation**.

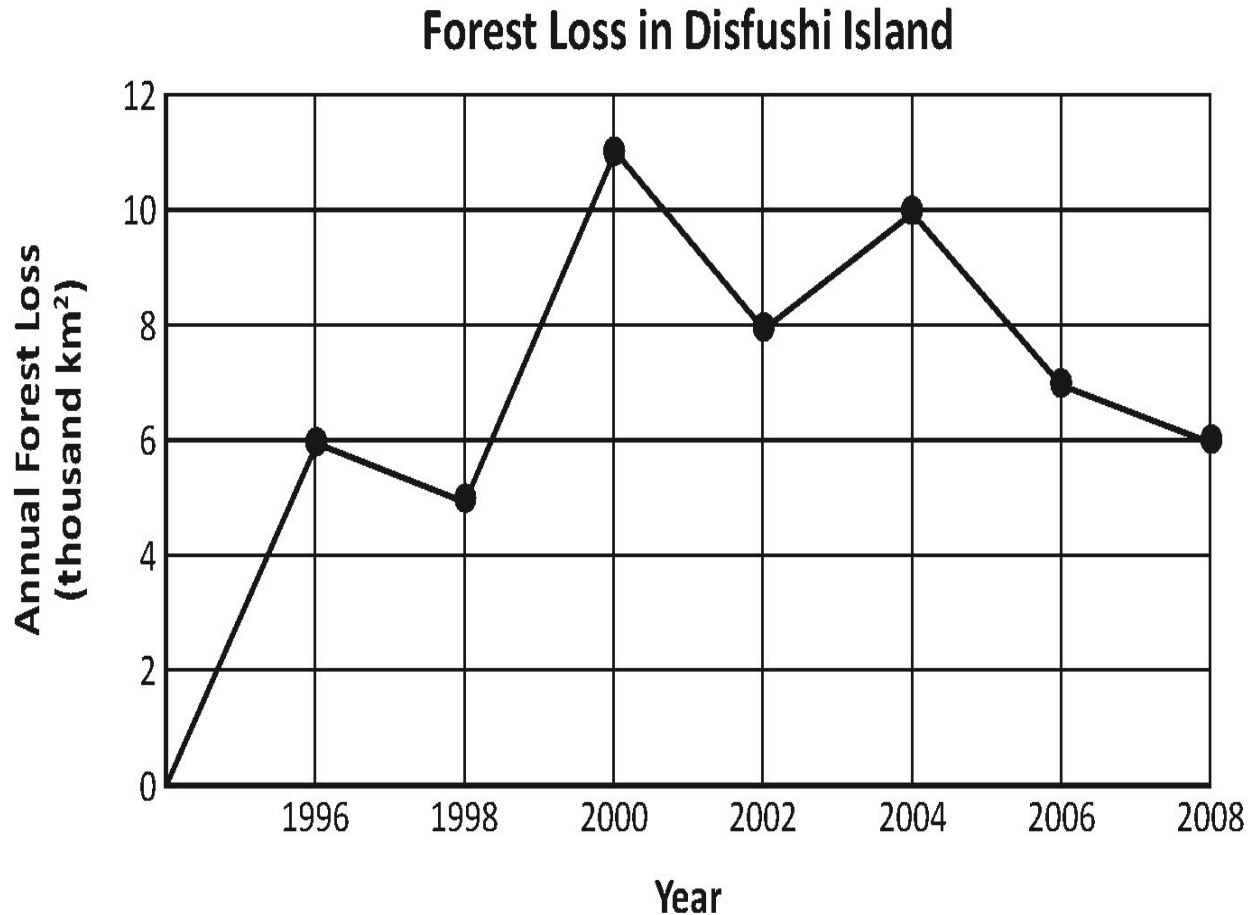
Here we can draw an imaginary line upwards from 07:30 until we reach the plotted line. We read horizontally to get a temperature of 19°C.

This is an estimation, it wasn't recorded so we can't say that it was exactly this temperature.

Temperature recorded during the day



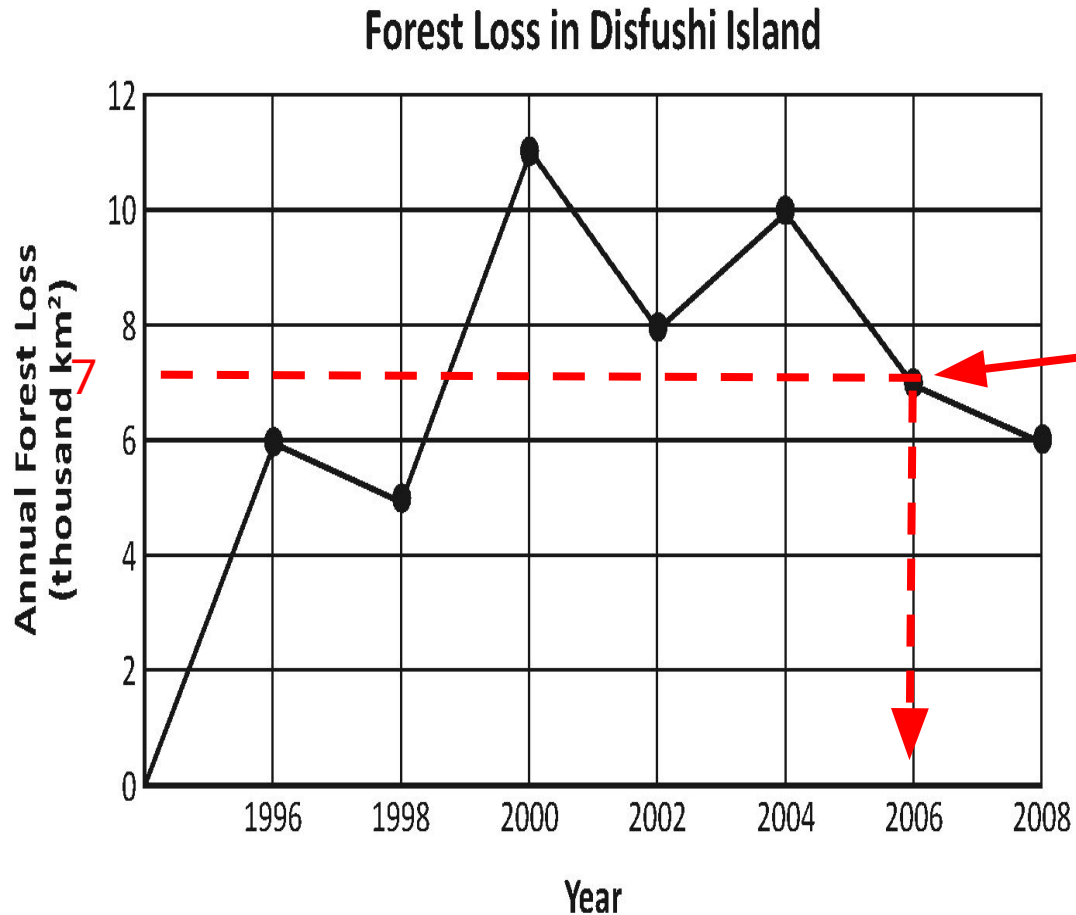
Have a go at this one...



This graph shows the amount of forest lost between 1994 and 2008, in Disfushi Island.

1. In which year was 7000km² lost?
2. What was the difference between the forest lost in 2002 and 2004?
3. Estimate the amount of forest lost in 1999.

Answers

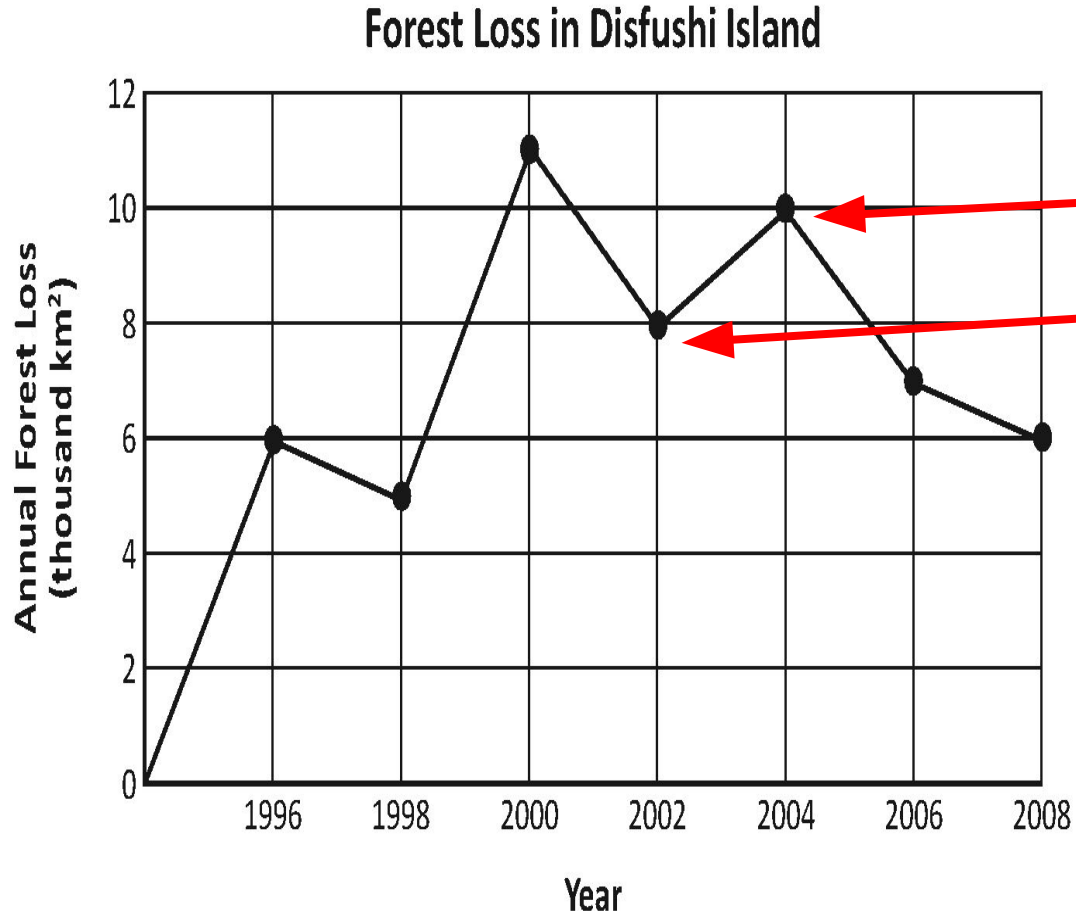


1. In which year was 7000km² lost?

2006

7000 is halfway between 6000 and 8000.

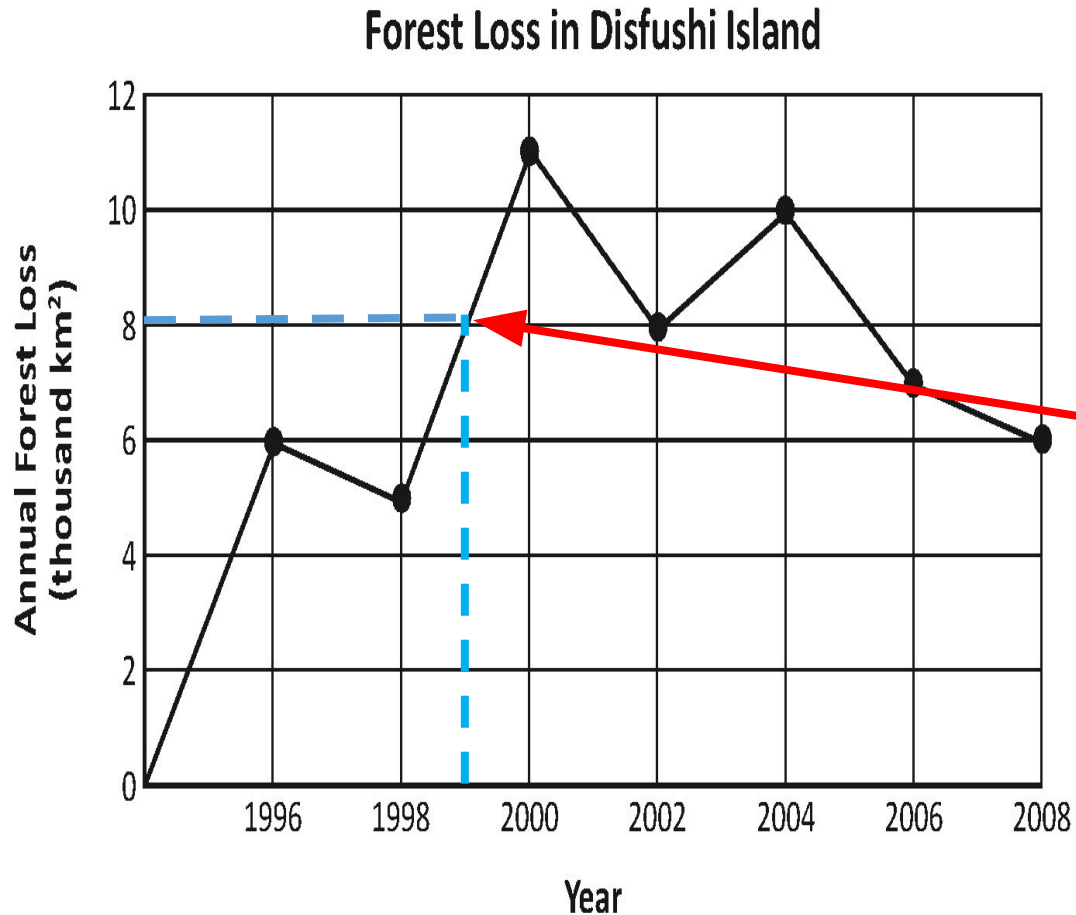
Answers



2. What was the difference between the forest lost in 2002 and 2004?
 $10000\text{km}^2 - 8000\text{km}^2 =$
 2000km^2

Answers

3. Estimate the amount of forest lost in 1999.



8000km²

Remember that this is only an estimation based on using the halfway between the 1998 and 2000 values. As no data was collected in 1999, we can not be sure that this is accurate.