Wednesday 3rd June – rapid reasoning
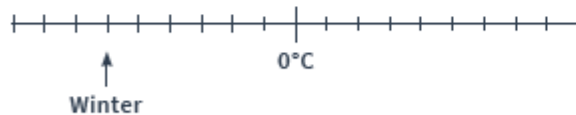
Q1 Match the decimal fractions to their fraction equivalents.

$\frac{1}{5}$ 0.3

$\frac{30}{100}$ 0.2

$\frac{1}{4}$ 0.6

$\frac{6}{10}$ 0.72

$\frac{72}{100}$ 0.25

2 marks

Q2 This temperature scale shows the average temperature in a city.

0°C

↑

Winter

a Look at the arrow. What is the average temperature in winter?

°C

The average temperature in summer is **23°C higher than winter.**

b What is the average temperature in summer?

°C

1 mark

Q3 Place these lengths in order, starting with the longest.

3.5m	310,000cm	340cm
320mm	30,000mm	3km

Longest
_____

_____

_____

_____

_____

_____

1 mark

Q1 At the start of May, there were 3,043 cans of fizzy orange in the shop. During May,

- 11,392 more cans of fizzy orange were delivered
- 13,832 cans of fizzy orange were sold.

How many cans of fizzy orange were left in the shop at the end of June?

| cans |

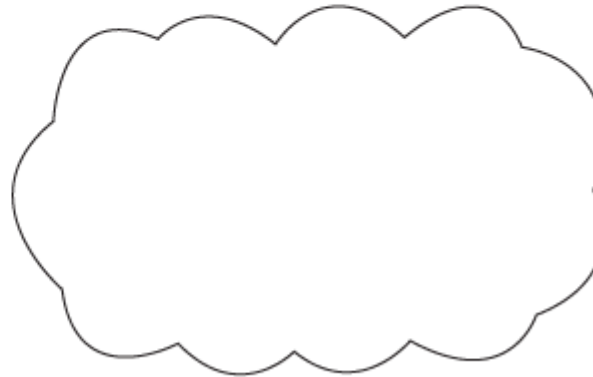**Q2** Evie eats $\frac{3}{4}$ of a 120g chocolate bar.

Josh eats 70% of a 120g chocolate bar.

Circle the name of the person that eats the most chocolate.
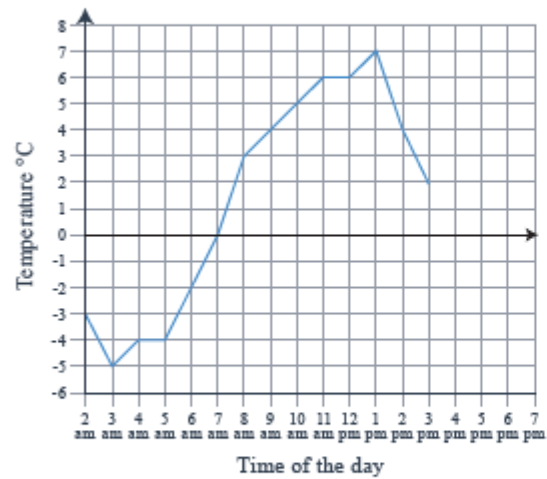
Evie   Josh

Explain how you know.

Q3 Tallulah records the temperature outside on a cold Saturday in Norwich.

She plots her readings on a line graph.

Time of the day

a What is the difference between the highest and lowest temperature?

[   ] °C

1 mark

b At what times was it 4°C?

_____

1 mark

c The temperature decreases by 4°C from 3pm to 6pm.

At what time(s) was it 4°C?

[   ] °C

1 mark

Q1 Match the decimal fractions to their fraction equivalents.

$\frac{35}{100}$　　　　　0.6

$\frac{22}{100}$　　　　　0.35

$\frac{3}{4}$　　　　　0.75

$\frac{3}{5}$　　　　　0.8

$\frac{80}{100}$　　　　　0.22

2 marks

Q2 Tallulah is thinking of a number.
She doubles it.
She adds 12.
She divides her answer by 4 and subtracts 3.
Her answer is 18.

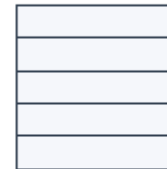What was the number that Tallulah started with?

2 marks

Q3 The area of this square is 100cm².

Area = 100cm²　　　Not to scale

The square is split into five identical rectangles.

Not to scale

What is the perimeter of one of the rectangles? Don't forget your units.

2 marks

Q1 Josh posts four large letters.

The postage costs the same for each letter.

He pays with a £20 note.

His change is £14.28.

What is the cost of posting one letter?

Don't forget to add units.

Q2 Here are some digit cards.

| 4 | 5 | 8 | 6 |

Write all four digit numbers above 6,500 that can be made using these digit cards.

_____

_____