**1.** Nov/2023/Paper_0444/23/No.1
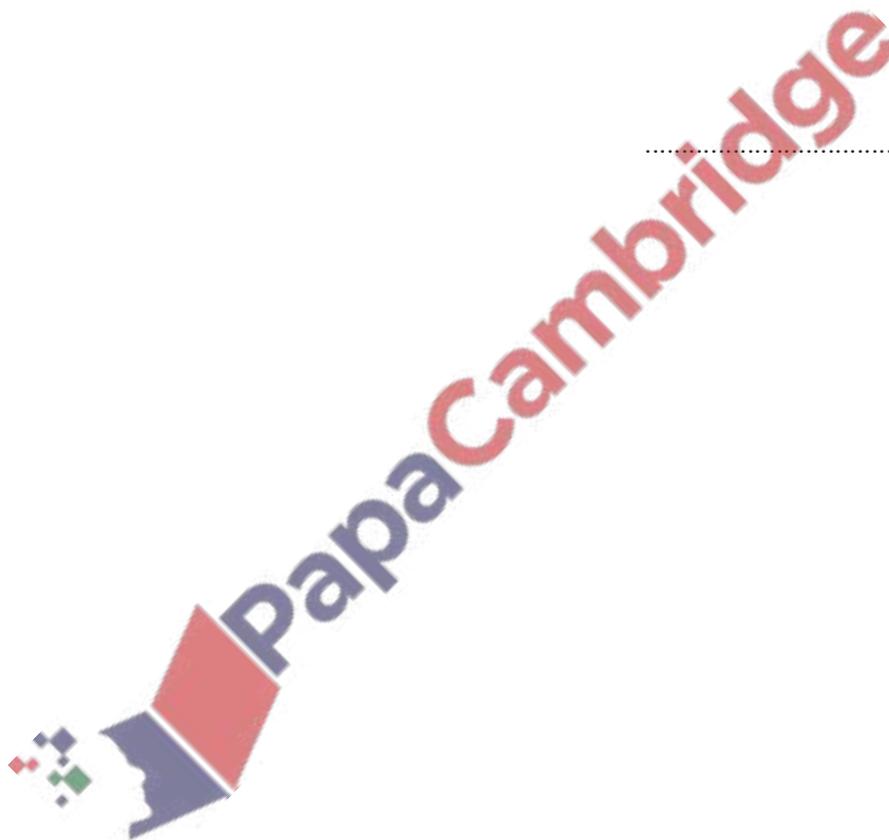
Tara goes on a journey by train.
The train leaves at 06 48.
The journey takes 12 hours and 35 minutes.

Find the time when Tara arrives.

.............................................. [1]

| 61 | 63 | 64 | 66 | 68 | 69 |

From this list, write down

**(a)** a square number

................................................... [1]

**(b)** a prime number.

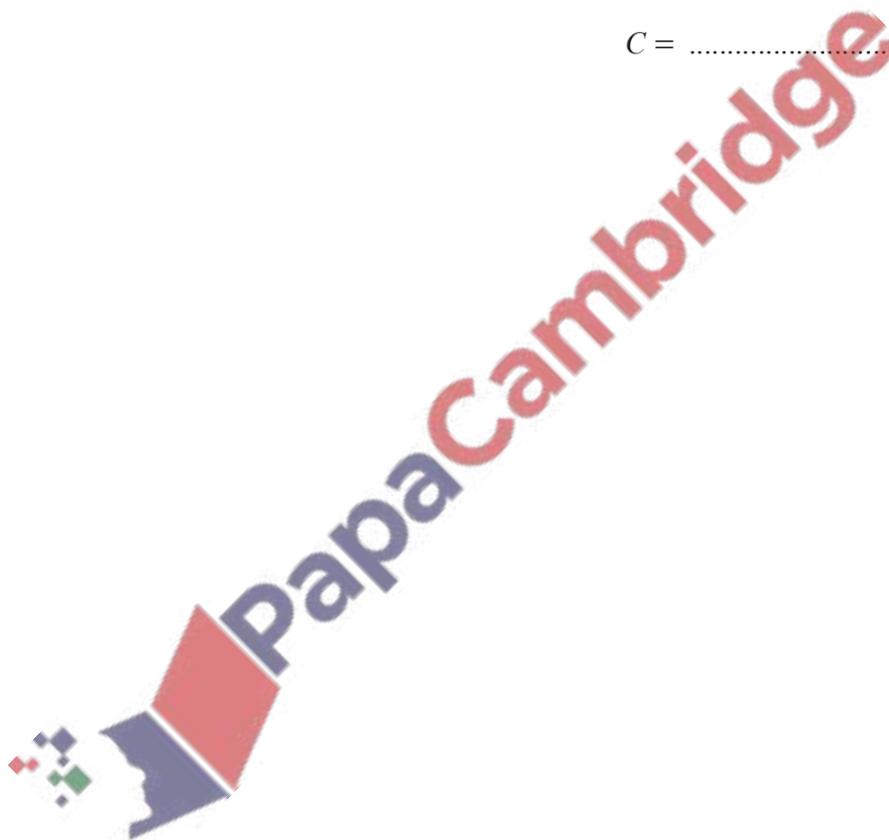................................................... [1]
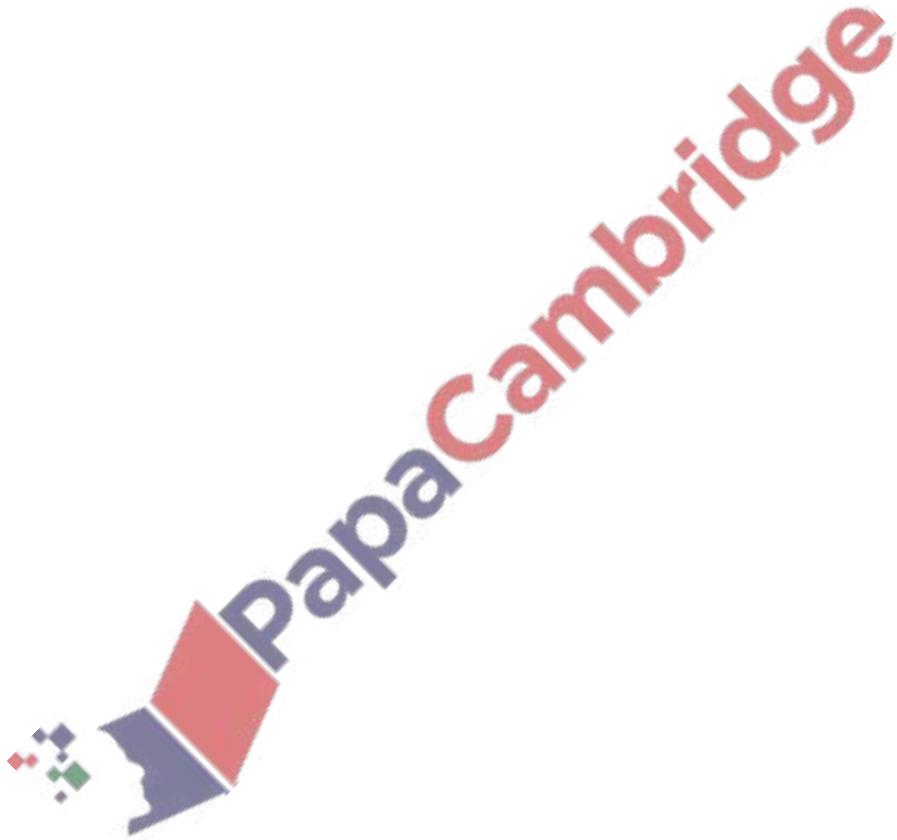
**3.**

A builder charges a fixed amount of $40 plus $25 per hour.

**(a)** Find the number of hours the builder works when the total charge is $165.

.......................................... hours  [1]

**(b)** Write down a formula for the total charge, $C, when the builder works for $h$ hours.

$C =$ .......................................... [1]

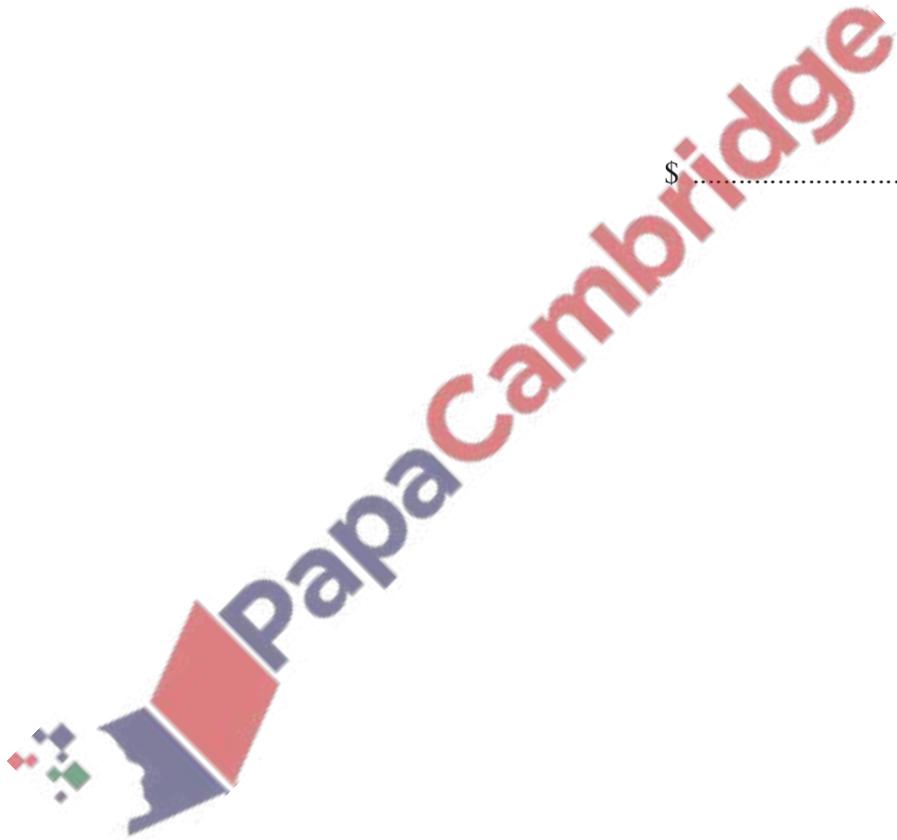**4.**

Shubhu invests $750 in a savings account for 5 years.
The account pays simple interest at a rate of 2% per year.

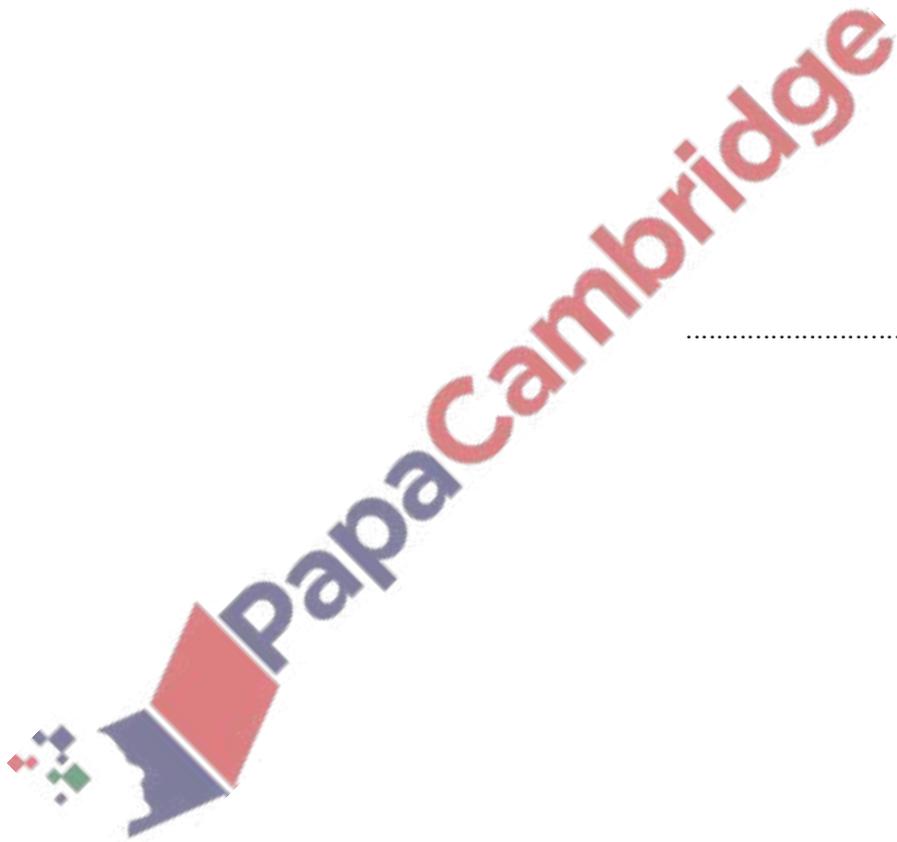Work out the total interest she earns during the 5 years.

$ ................................................. [2]

**5.**

Work out $1\frac{5}{6} \div \frac{11}{15}$.

Give your answer as a mixed number in its simplest form.

.................................................. [3]

**6.** <span style="color:red">Nov/2023/Paper_0444/23/No.9</span>

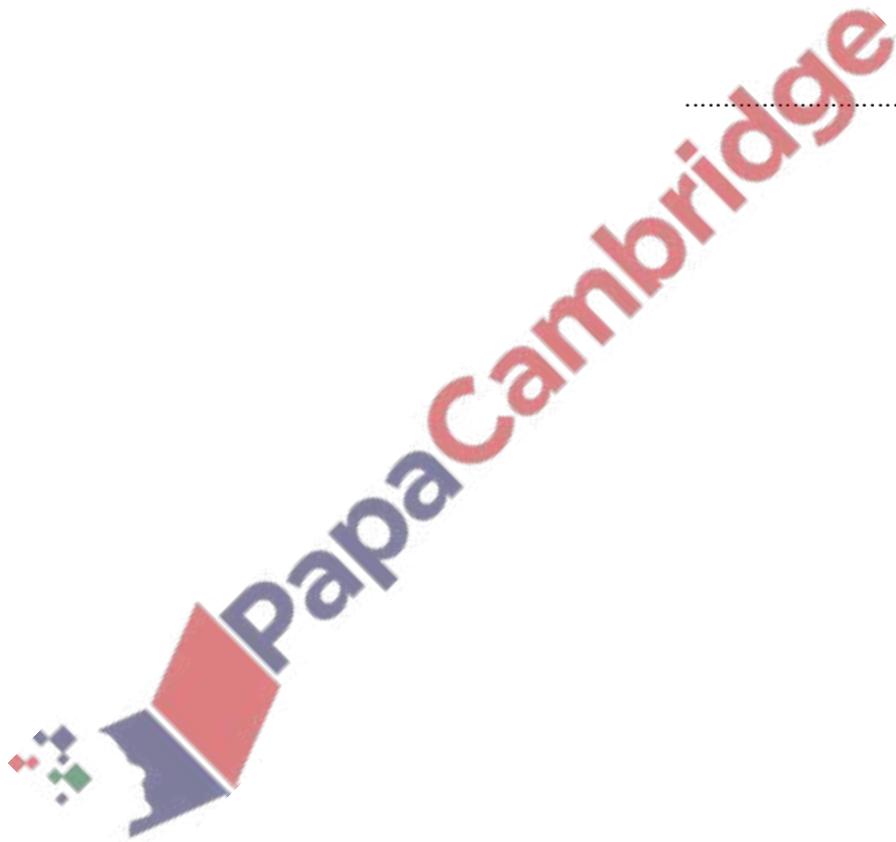Find the greatest common factor (GCF) of 48 and 80.

.................................................... [2]
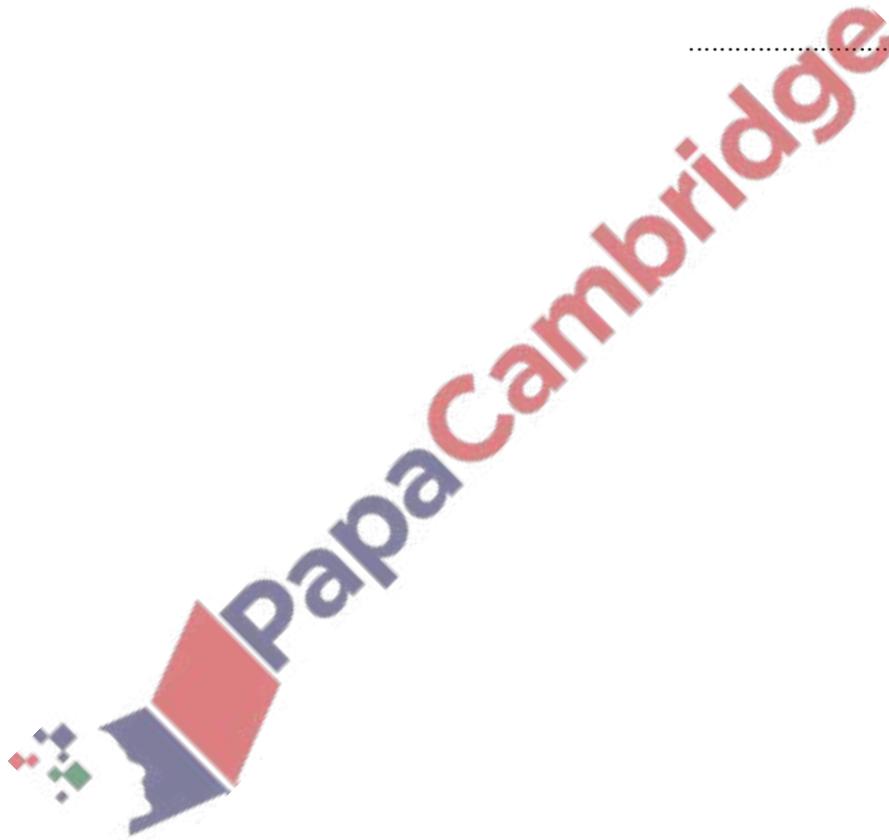
Oliver sent 40% more messages in June than in May.
He sent 280 messages in June.

Find how many more messages he sent in June than in May.

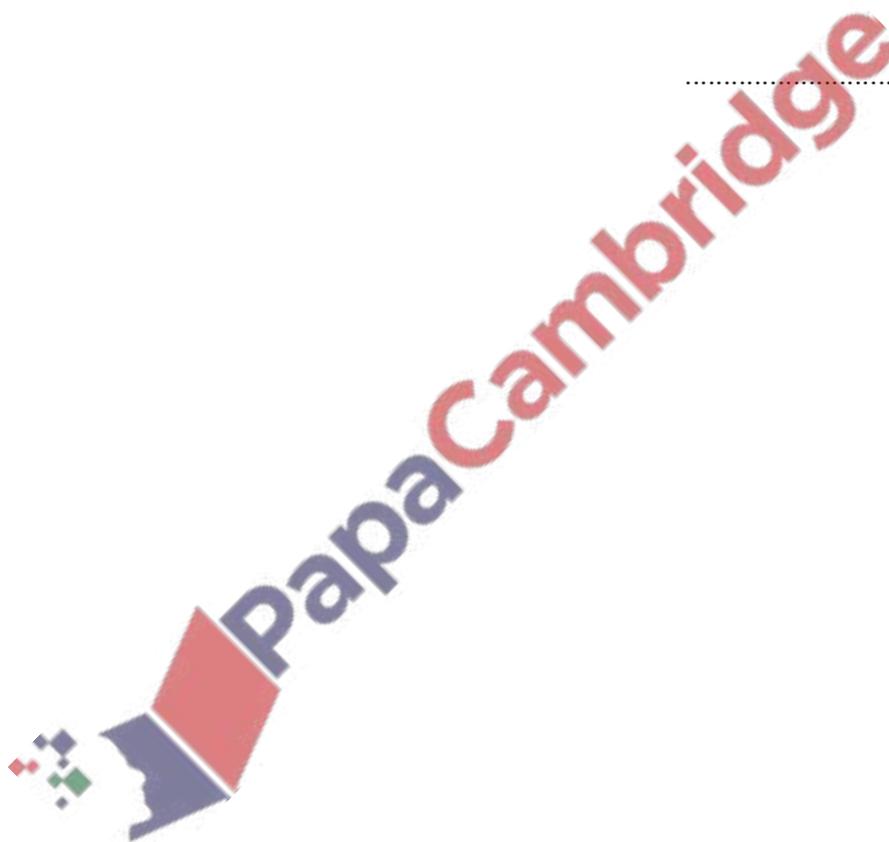...................................................... [3]

**8.**

$F$ varies as the product of $m$ and $a$.

Work out the percentage change in $F$ when $m$ is increased by 20% and $a$ is decreased by 10%.

..................................................... % [3]

**(a)** $\sqrt{300} + \sqrt{k} = 13\sqrt{3}$

Find the value of $k$.

$k = $ .................................................. [2]

**(b)** $\left(\sqrt{7} + \sqrt{3}\right)^2 = a + 2\sqrt{b}$

Find the value of $a$ and the value of $b$.

$a = $ ..................................................

$b = $ .................................................. [2]
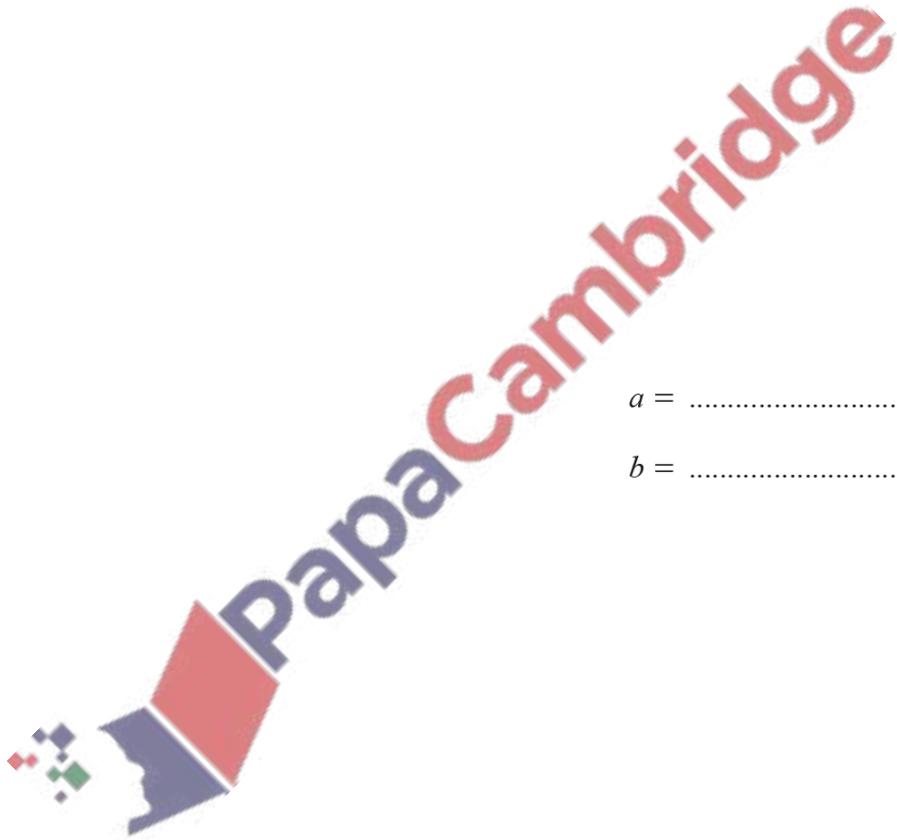
**(a)** Evaluate $64^{\frac{5}{6}}$.

.................................................. [1]

**(b)** Solve the equation $2 + \sqrt[3]{y} = 7$.

$y =$ .................................................. [2]
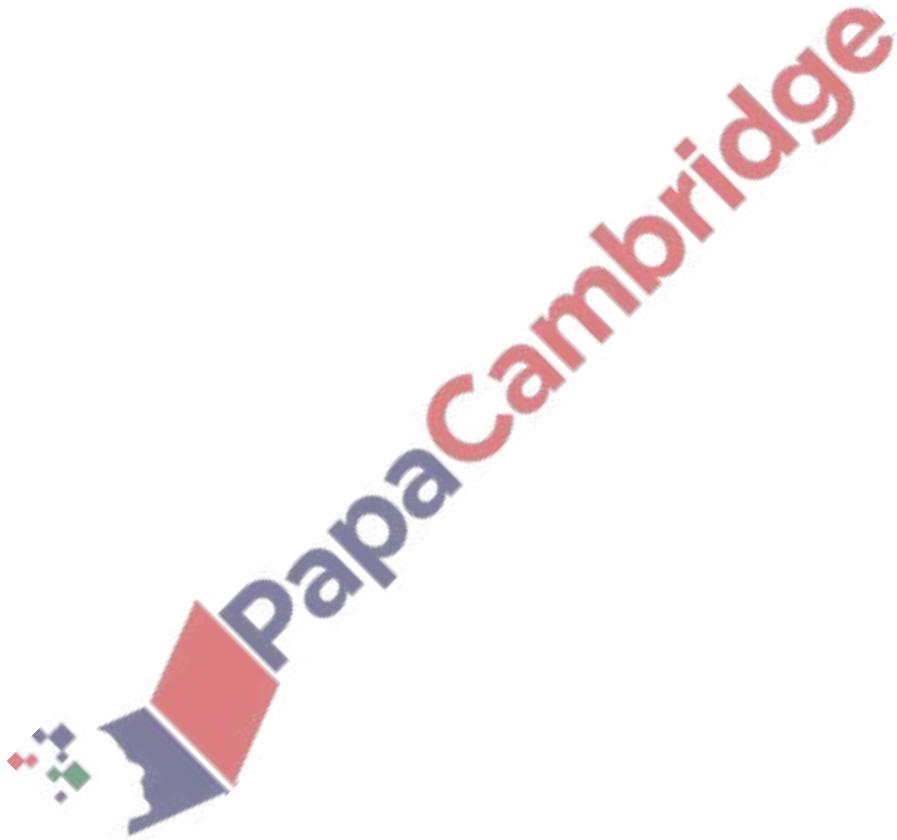
The table shows the amount received when exchanging **$100** in some countries.

| Country | Amount received for $100 |
|---|---|
| Wales | 77.05 pounds |
| India | 7437.05 rupees |
| China | 671.20 yuan |
| Spain | 85.35 euros |

**(a)** Brad changes $250 to Indian rupees.

Calculate the amount he receives correct to the nearest rupee.

.................................... rupees  [2]

**(b)** Wang changes 5400 Chinese yuan into dollars.

Calculate how much he receives in dollars, correct to the nearest cent.

$ ............................................  [2]

**(c)** Gretal lives in Spain and goes on holiday to Wales.
She spends 3500 euros in total on travel and hotels in the ratio

travel : hotels = 4 : 3.

**(i)** Work out how much Gretal spends, in euros, on travel.

........................................ euros  [2]

**(ii)** Work out how much she spends, **in pounds**, on hotels.