

Isolation Pack Maths Year 5

Every day please do practice times tables on Rockstars for 10 minutes

Day 1 - practice multiplication and division, remember to keep in columns!

1 Work out the calculations.

231×3

$615 \div 3$

Use the bus stop method

$1,461 \times 6$

$846 \div 5$

Complete the calculation.

			2		8	
	×				7	
		1		3	6	

Jack is thinking of a number.



When I multiply
my number by 9,
I get 234

What is Jack's number?

Challenge of the day

1 Fill in the missing numbers.

100 less than 20,000 is

more than 20,000 is 20,600

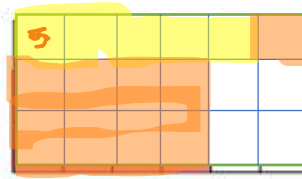
2



25% of my number is 24

What number is Teddy thinking of?

3 Lucy shades in part of a rectangle.



She shades some more squares.

$\frac{7}{8}$ of the rectangle is now shaded.

How many more squares did Lucy shade?



Day 2

Complete the grid for the multiplication 43×16

	40	3
10	400	
6		

Use a grid to work out 36×14

In a theatre there are 52 rows of chairs.

There are 39 chairs in each row.

How many chairs are there altogether?

Annie and Mo each arrange five digit cards to make a 3-digit and a 2-digit number.

They then multiply their numbers together.



Here is Annie's arrangement.

$$\begin{array}{|c|c|c|} \hline 4 & 5 & 8 \\ \hline \end{array} \times \begin{array}{|c|c|} \hline 3 & 9 \\ \hline \end{array}$$

What is her answer?

Mo's answer ends in a zero.

What could his numbers be?

$$\begin{array}{|c|c|c|} \hline & & \\ \hline \end{array} \times \begin{array}{|c|c|} \hline & \\ \hline \end{array}$$

Challenge of the day

Ron and Eva each make a 3-digit number from these digit cards.



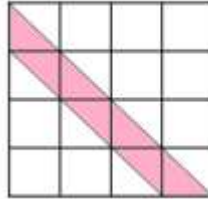
- Ron makes the largest even number possible.
- Eva makes the smallest odd number possible.

What is the difference between their numbers?

2 Circle all the fractions that are greater than 1 but less than 2

$$\frac{12}{5} \quad \frac{12}{6} \quad \frac{12}{7} \quad \frac{12}{8}$$

3 What fraction of this shape is shaded?



Day 3

A jacket costs £43



Six jackets and four pairs of shoes cost £362

How much does a pair of shoes cost?

Some cards are shared between 8 boxes.

There are 57 cards in each box and 3 left over.

How many cards were shared?

9 Work out $20 \times 49 \times 5$

Explain or show your method.

Challenge

1 Which of these numbers round to 2,000 to the nearest 100?

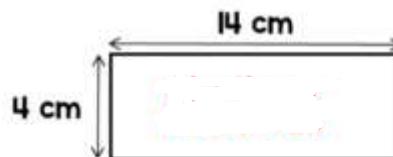
1,950 2,312 2,099 2,045

2 What are the missing numbers?

$$6.4 = 1 + \boxed{}$$

$$3\frac{2}{5} = 1 + \frac{\boxed{}}{5}$$

3 Annie has a 1 metre piece of wire. She cuts the wire into two pieces. She uses the smaller piece to make this rectangle.

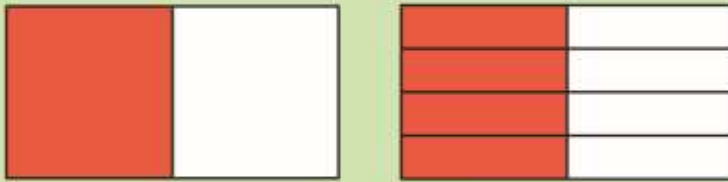


She uses the other piece of wire to make a square.

What is the length of one side of the square?

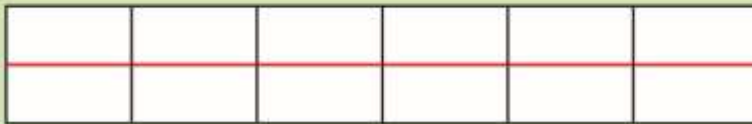
Day 4

- 1 Use the diagram to help you complete the equivalent fraction.



$$\frac{1}{2} = \frac{\square}{8}$$

- 2 Use the diagram to show that $\frac{5}{6}$ is equal to $\frac{10}{12}$

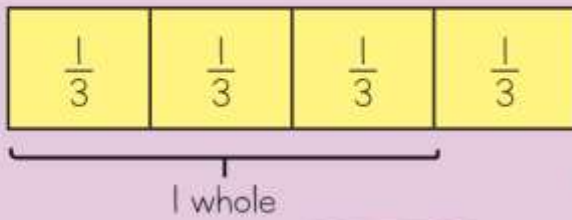


Complete the equivalent fractions.

$$\frac{18}{42} = \frac{\square}{7} \quad \frac{\square}{30} = \frac{2}{5}$$

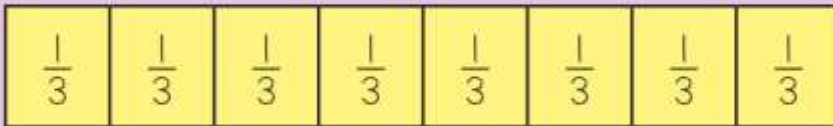
$$\frac{1}{6} = \frac{4}{\square} = \frac{\square}{36}$$

Amir uses a bar model to convert $\frac{4}{3}$ to a mixed number.



$\frac{4}{3}$ is equal to $1\frac{1}{3}$

Convert $\frac{8}{3}$ to a mixed number.



Challenge

1 What are the missing digits?

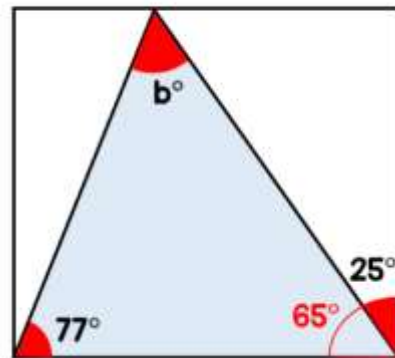
$$\begin{array}{|c|} \hline 3 \\ \hline \end{array} + \begin{array}{|c|} \hline \\ \hline \end{array} 5 = \begin{array}{|c|c|c|} \hline 1 & 1 & 1 \\ \hline \end{array}$$

2 Annie and Ron each think of a number.



The product of their numbers is 762
Work out Ron's number.

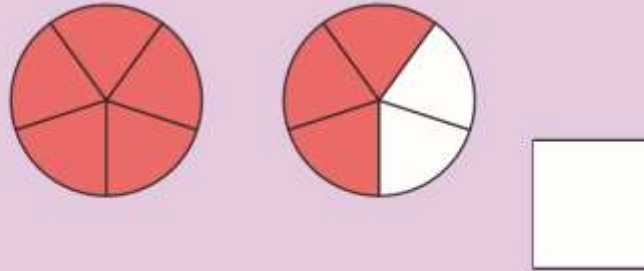
3 Find the size of angle b.



Day 5

- 5 Convert $1\frac{3}{5}$ to an improper fraction.

Use the diagram to help you.



- 6 Fill in the missing numbers.

$$11 \frac{3}{10} = \frac{\boxed{}}{10}$$

$$\boxed{} \frac{1}{4} = \frac{25}{4}$$

- 7 Convert between the mixed numbers and improper fractions.

$$5 \frac{3}{4} = \boxed{}$$

$$\frac{15}{8} = \boxed{}$$

Challenge

1 Marbles are put into bags of 10



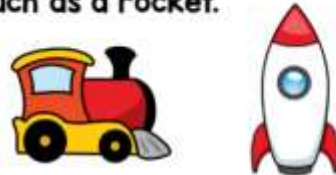
- 67 bags of marbles are packed.
- 3 more marbles are added to each bag.

How many marbles are there in total now?

2 Work out the missing digits.

$$\boxed{5} \times \boxed{} \times \boxed{} = 105$$

3 A toy train costs three times as much as a rocket.



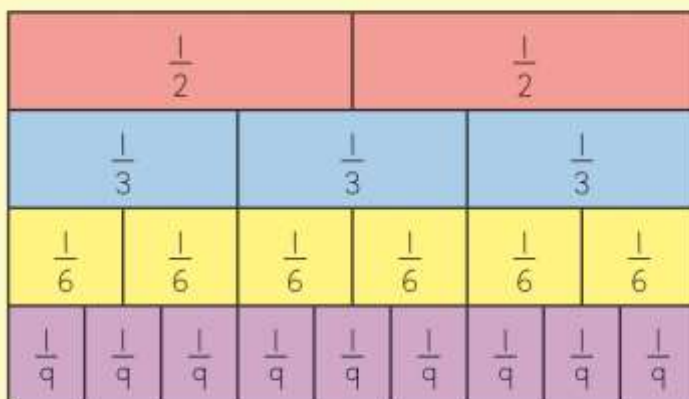
The total cost of the train and rocket is £52

How much does the train cost?



Day 6

Alex is using a fraction wall to compare fractions.



Write <, > or = to complete the statements.

$$\frac{1}{2} \quad \bigcirc \quad \frac{1}{6}$$

$$\frac{2}{3} \quad \bigcirc \quad \frac{5}{9}$$

$$\frac{8}{9} \quad \bigcirc \quad 1$$

Huan and Dani have the same amount of juice in a bottle.

Huan drinks $\frac{2}{3}$ of his juice.

Dani drinks $\frac{5}{9}$ of her juice.

Who has the most juice left?



Challenge

1 The table shows the ages of people in a theme park.

Age	Number of people
Under 18	126
18 - 60	195
Over 60	38

These are the entry costs.

How much money did the theme park make from entry costs?



Given that

$$\triangle + \triangle + \star + \star = 100$$

$$\heartsuit + \heartsuit + \triangle + \star = 78$$

Work out the value of the

3 What are the missing numbers?

$$\boxed{} \times 10 = 42$$

$$\boxed{} \div 10 = 42$$

Day 7

Complete the division.

$$13 \div 3 = \boxed{} \frac{\boxed{}}{3}$$

Put the mixed numbers in order, starting with the smallest.

$$2 \frac{4}{10}$$

$$1 \frac{3}{5}$$

$$2 \frac{1}{5}$$

Explain your answer:

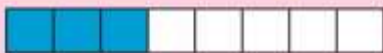
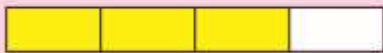
Fill in the missing numbers in the calculations.

$$\frac{1}{10} + \frac{7}{10} + \frac{1}{10} = \frac{\square}{\square} \quad \frac{3}{8} + \frac{\square}{8} = 1$$

$$1 - \frac{\square}{7} = \frac{2}{7}$$

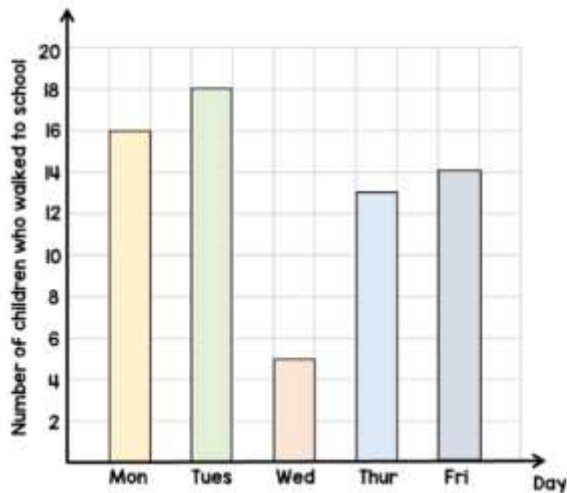
What is $\frac{3}{4} + \frac{3}{8}$?

Use the bar models to help you.



Explain your method.

- 1 There are 25 children in a class. The bar chart shows the number of children in the class who walk to school each day.



- (a) What percentage of the class walked to school on Thursday?
(b) One of the days it rained. Which day do you think it was? Explain to your friend.

- 2 Order the following numbers. Start with the smallest.

3.1 $\frac{18}{5}$ $3\frac{1}{4}$

Day 8

Dexter eats $\frac{3}{5}$ of a pizza.

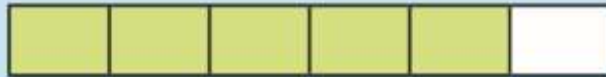
Rosie eats $\frac{4}{15}$ of a pizza.

How much pizza do they eat altogether?



What fraction of the pizza is left?

Use the bar models to help you work out $\frac{1}{3} + \frac{5}{6}$
Give your answer as a mixed number.



Work out the calculations.

$$\frac{7}{8} - \frac{3}{4}$$

$$\frac{1}{4} + \frac{5}{12} - \frac{1}{2}$$

Whitney cycles $2\frac{3}{4}$ km on Monday.

She cycles $2\frac{1}{8}$ km on Tuesday.

How far does she cycle in total on Monday and Tuesday?



Challenge

1 Workers in a factory make toys.

- On Monday they make 2,350 toys.
- On Tuesday they make 235 more toys than they did on Monday.

By Wednesday they have to make 7,500 toys in total.

How many toys do they need to make on Wednesday to make 7,500 in total?

2



Carrots
£1.80 per kg

How much does 250 g of carrots cost?

3



Parsnips
£2.60 per kg

How much does 300 g of parsnips cost?

Day 9

I have made a number on a place value chart.

Ones	Tenths	Hundredths
	0.1 0.1 0.1 0.1 0.1	0.01 0.01 0.01 0.01

Write Whitney's number as a decimal.

Write Whitney's number as a fraction.

What is Whitney's number rounded to the nearest tenth?

Match the decimals to the correct value of the underlined digit.

0.84

0.48

48

84.2

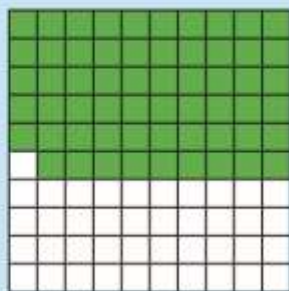
4 ones

4 hundredths

4 tenths

4 tens

Here is a hundred square.



What percentage of the square is shaded?

 %

What fraction of the square is shaded?

- 1 The cost of a pineapple is half the cost of a melon.



How much does the pineapple and melon cost altogether?

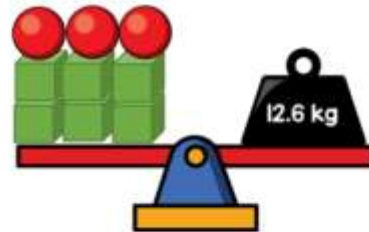
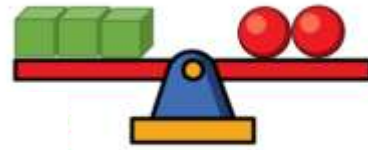
- 2 Tommy thinks of a number.

5 is a factor of my number



Does Tommy's number have to be odd? Explain your answer.

- 3 Gina balances some scales.



What is the mass of a cube?

Day 10

Complete the calculations.

$$\frac{72}{100} = \frac{7}{10} + \frac{\boxed{}}{100}$$

$$\frac{81}{100} = \frac{\boxed{}}{10} + \frac{1}{\boxed{}}$$

Four children are measuring their height.

Aisha	1.39 metres
Teddy	1.37 metres
Scott	1.4 metres
Kim	1.43 metres

Order the children from tallest to shortest.

Filip is taller than Scott but shorter than Kim.

How tall could Filip be?

 m

There are 1,000 people at a concert.

391 of the people are women.

What fraction of the people are women?

Write the fraction of women as a decimal.

Ron is running a 1 km race.

He has run $\frac{485}{1000}$ of the race so far.



How many metres has Ron run?

 m

Challenge

1 Here are some digit cards.



Find the 4-digit number that is closest to 5,000

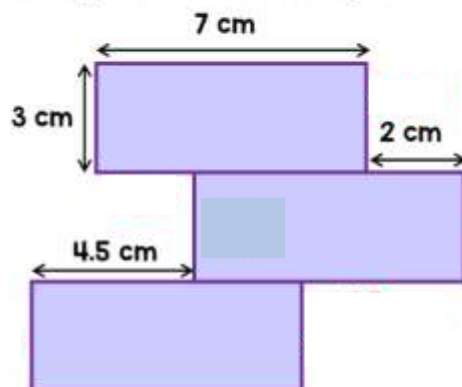
You may use each card only once.

2 Complete the number sentences.

$$65 + \square = 79$$

$$83 + 28 = 82 + \square$$

3 Three identical rectangles are arranged to make a shape.



What is the perimeter of the shape?