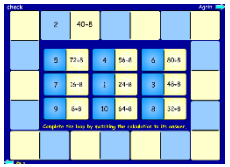
YEAR 6 WEEKLY LEARNING MAT 7

MATHS ZONE

Keep your times table knowledge in check!
Collect points on Maths shed
https://www.mathshed.com/en-gb

How quickly can you complete a loop for each of your times tables?
Can you do it with the corresponding division facts?
https://www.topmarks.co.uk/Flash.aspx?f=loopcardsv6



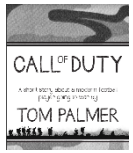
Whiterose Summer Term - Week 4 (w/c 11th May)
https://whiterosemaths.com/homelearning/year-6/

Can you remember how to multiply and divide fractions?
Worksheets are attached below the mat.
Could you produce revision posters/ video guides for next year's Y6?

Square number patterns
Use your written methods to find the answers to
5^2 =
15^2 =
25^2 =
35^2 =
Can you find a rule or pattern that will let you work out?
Any other number ending in 5 mentally?
e.g. 75^2 =

ENGLISH ZONE

Why don't you read one of these books from Tom Palmer?
https://issuu.com/barringtonstoke/docs/call_of_duty/1?e=2213880/7442461



https://www.tompalmer.co.uk/wp-content/uploads/2019/06/Rocky-of-the-Rovers-bind-up.pdf

Can you continue the start of this suspense story?

The engine screamed as the wheels spun round. His heart pounded. Tim knew that he only had seconds to act.

There was a long, moss-covered log wedged underneath the jeep, preventing it from moving. The wheels continued to spin pointlessly, smoke starting to billow out from underneath the bonnet.

A terrifying roar filled his ears, and he knew the monster was right behind him.

Use show don't tell, short sentences and repetition to build up suspense.

Silly sentences – What crazy sentences can you make following the grammar rules.

Start with subject verb
The cat danced.
Add 2 adjectives to make an expanded noun phrase
The ginger, vicious cat danced.
Add an adverb
The ginger, vicious cat danced gracefully.
Add a prepositional phrase of time or place.
The ginger, vicious cat danced gracefully on the kitchen table.
Extending using a conjunction
The ginger, vicious cat danced gracefully on the kitchen table although it knew it might fall off.

Can you rearrange the sentence how does it change the affect?
Could you illustrate your sentences?

TOPIC ZONE

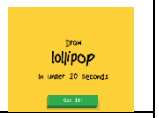
Try the BBC Y6 daily lessons
https://www.bbc.co.uk/bitesize/dailylessons

Bitesize

Try Oak National Academy lessons
https://www.thenational.academy/online-classroom

https://quickdraw.withgoogle.com/

How quick can you draw things so a computer can recognise what they are?

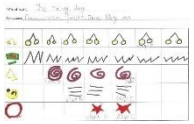


If you could redesign your garden to be the ultimate fun zone. What would it have in it? Would you provide different sections for your parents, pets to enjoy?
Can you:
Draw a plan of the garden
labelling the different sections?
Make it using Lego?

Research and draw all the flags of the countries in South America.
Could you then make a matching pairs game to help you learn the name of some of them?

http://touchpianist.com/
Can you play the piano like a professional?
All you need to do is focus on the rhythm.

Could you create a tune using objects round the house and garden to make different sounds?
Think about the rhythm you hit them in?
Could you write a music score so others could play your tune?



Can you share your learning on your class page

twitter

Keep your eye on the school blog for more fun activities to keep you busy!

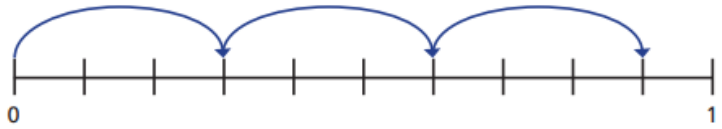
Multiply fractions by integers

1 Complete the calculations.

a)

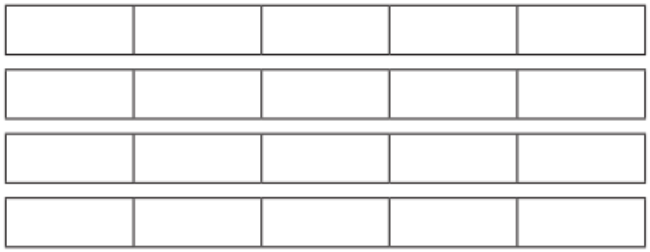
$\frac{2}{7} \times 2 =$ ☐

b)



$3 \times \frac{3}{10} =$ ☐

2 **a)** Shade the bar models to show $\frac{2}{5} \times 4$



b) Complete the multiplication.

$\frac{2}{5} \times 4 =$ ☐

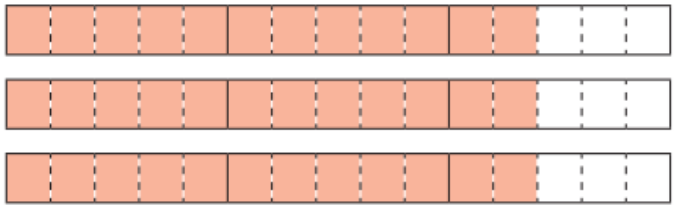
3 Complete the calculations.

a)	**b)**
$\frac{1}{3} \times 1 =$ ☐	$\frac{3}{4} \times 1 =$ ☐
$\frac{1}{3} \times 2 =$ ☐	$\frac{3}{4} \times 2 =$ ☐
$\frac{1}{3} \times 3 =$ ☐	$\frac{3}{4} \times 3 =$ ☐
$\frac{1}{3} \times 4 =$ ☐	$\frac{3}{4} \times 4 =$ ☐
$\frac{1}{3} \times 5 =$ ☐	$\frac{3}{4} \times 5 =$ ☐
$\frac{1}{3} \times 6 =$ ☐	$\frac{3}{4} \times 6 =$ ☐

What patterns do you notice?

4 Complete the multiplication.

$2\frac{2}{5} \times 3 =$ ☐



What method did you use? Is there a different method you could have used?

5 Match the calculations.

$\frac{2}{3} + \frac{2}{3}$	$\frac{1}{2} \times 6$
$\frac{1}{4} \times 24$	$18 \times \frac{1}{4}$
$\frac{3}{4} + \frac{3}{4} + \frac{3}{4} + \frac{3}{4}$	$\frac{1}{6} \times 10$
$\frac{5}{12} \times 4$	$12 \times \frac{1}{2}$
$1\frac{1}{2} \times 3$	$\frac{1}{3} \times 4$

6 Write each answer as a mixed number in its simplest form.

a) $1\frac{1}{5} \times 2 =$ ☐

b) $2\frac{1}{6} \times 3 =$ ☐

c) $2\frac{2}{5} \times 4 =$ ☐

d) $2\frac{2}{5} \times 5 =$ ☐

e) $7 \times 3\frac{1}{2} =$ ☐

f) $\frac{11}{15} \times 7 =$ ☐

7 Fill in the missing numbers.

a) $2\frac{\square}{7} \times 3 = 6\frac{6}{7}$

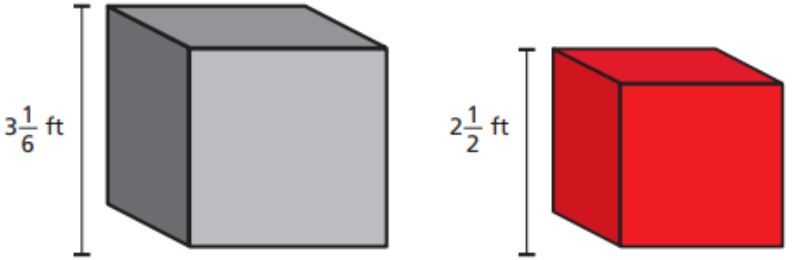
b) $2\frac{\square}{8} \times 3 = 7\frac{1}{2}$

8 Tommy's dog eats $3\frac{1}{2}$ tins of food a week.

How many tins does she eat in a year?

☐

9



Jack builds a tower using grey blocks.

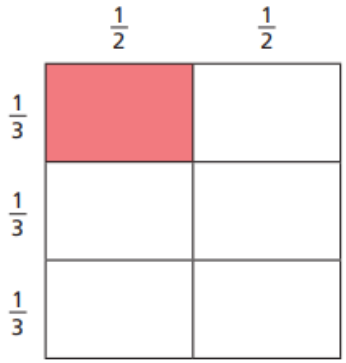
Alex builds a tower using red blocks.

The towers are exactly the same height.

How many blocks could they each have used?

Multiply fractions by fractions

1 Dexter works out $\frac{1}{2} \times \frac{1}{3}$ using a grid method.

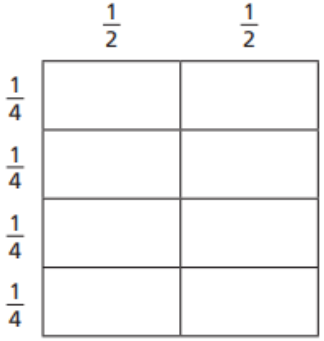


Explain how this shows $\frac{1}{2} \times \frac{1}{3} = \frac{1}{6}$

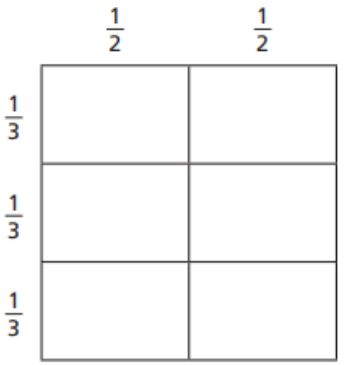
2 Shade the diagrams to show the fraction multiplications.

Complete the multiplications.

a) $\frac{1}{2} \times \frac{1}{4} =$ ☐



b) $\frac{1}{2} \times \frac{2}{3} =$ ☐



3 **a)** Divide the square to show that $\frac{2}{3} \times \frac{3}{4}$ is equal to $\frac{6}{12}$

b) Mo says $\frac{2}{3} \times \frac{3}{4}$ is equal to $\frac{1}{2}$

Is Mo correct? _____

Explain your answer.

4 Complete the calculations.

a) $\frac{1}{4} \times \frac{1}{5} = \square$

b) $\frac{1}{5} \times \frac{1}{6} = \square$

c) $\square = \frac{1}{7} \times \frac{1}{8}$

d) $\frac{1}{8} \times \frac{1}{9} \times \frac{1}{10} = \square$

e) $\frac{3}{4} \times \frac{1}{5} = \square$

f) $\frac{2}{5} \times \frac{5}{6} = \square$

g) $\frac{5}{7} \times \frac{5}{8} = \square$

h) $\frac{3}{8} \times \frac{2}{9} \times \frac{3}{10} = \square$

5 Use the diagram to complete the calculations.

a) $\frac{1}{3}$ of $\frac{1}{4} = \square$

b) $\frac{2}{3}$ of $\frac{3}{4} = \square$

c) What do you notice about your answers?

Talk to your partner.

6 Fill in the missing numbers.

a) $\frac{1}{10} = \frac{1}{2} \times \frac{1}{\square}$

b) $\frac{1}{5} \times \frac{\square}{3} = \frac{2}{15}$

7 Fill in the missing numbers.

a) $\frac{1}{10} = \frac{\square}{4} \times \frac{\square}{5}$

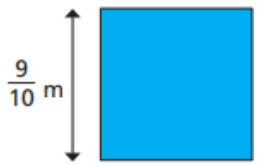
b) $\frac{1}{4} = \frac{\square}{4} \times \frac{\square}{5}$

8 Calculate the area of the shapes.

a)

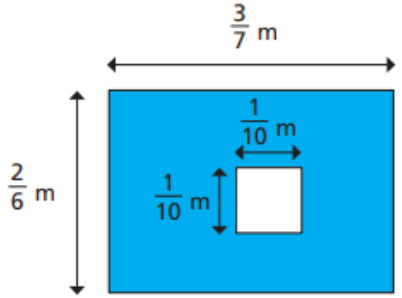
Area = $\square$ m^2

b)



Area = $\square$ m^2

9 Work out the area of the shaded part.



$\square$

Divide fractions by integers (2)

1

$\frac{4}{5} \div 2$ $\frac{4}{5} \div 3$

a) Write two things that are the same about the calculations.

b) Write one thing that is different about the calculations.

c) Draw a diagram to help you work out the answer to $\frac{4}{5} \div 2$

d) Draw a diagram to help you work out the answer to $\frac{4}{5} \div 3$

2 Complete the divisions using the diagrams to help you.

a) $\frac{1}{3} \div 2 =$ 

b) $\frac{1}{3} \div 3 =$ 

c) $\frac{2}{3} \div 3 =$ 

3 $\frac{3}{4}$ of a kilogram of rice is divided equally between two bowls.

How much rice is in each bowl?

4 Work out the divisions.

a) $\frac{1}{5} \div 7 = \square$

b) $\square = \frac{1}{6} \div 3$

c) $\frac{1}{4} \div 9 = \square$

d) $\square = \frac{1}{7} \div 6$

e) $\frac{4}{9} \div 7 = \square$

f) $\square = \frac{5}{6} \div 12$

g) $\frac{8}{3} \div 7 = \square$

h) $\square = \frac{19}{20} \div 5$

i) $\frac{1}{100} \div 25 = \square$

j) $\square = \frac{45}{50} \div 20$

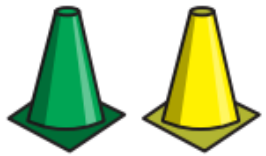
5 Write <, > or = to complete each statement.

a) $\frac{1}{3} \div 5 \bigcirc \frac{1}{5} \div 3$

b) $\frac{1}{3} \div 3 \bigcirc \frac{1}{5} \div 5$

c) $\frac{3}{5} \div 5 \bigcirc \frac{3}{5} \div 3$

6 There are some cones in the PE shed.



Classes 1, 2 and 3 share them equally.

- Class 1 put theirs into 4 equal piles.
- Class 2 put theirs into 5 equal piles.
- Class 3 put theirs into 11 equal piles.

What fraction of the whole number of cones is in each pile?

	Fraction in each pile
Class 1	
Class 2	
Class 3	

7 a) Which of these statements are true? Tick your answers.

$\frac{1}{2} \div 2$ *is equal to* $\frac{1}{2} \times \frac{1}{2}$ ☐

$\frac{1}{2} \div 4 = \frac{1}{2} \times \frac{1}{4}$ ☐

$\frac{1}{2} \div 3 = \frac{1}{2} \times \frac{1}{3}$ ☐

$\frac{1}{2} \div 5 = \frac{1}{2} \times \frac{1}{5}$ ☐

b) What do you notice?

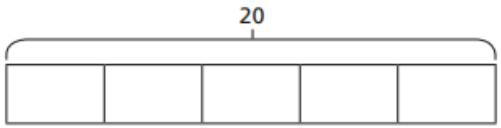
Is it only true for halves?

Does it work for non-unit fractions?

Talk to a partner.

Fractions of an amount

1



a) Shade $\frac{1}{5}$ of the bar model.

b) What is $\frac{1}{5}$ of 20? ☐

2 Use your times tables knowledge to solve the calculations.

a) $\frac{1}{3}$ of 12 = ☐

b) $\frac{1}{4}$ of £20 = ☐

c) $\frac{1}{5}$ of 35 m = ☐

d) $\frac{1}{10}$ of 80 cm = ☐

e) $\frac{1}{12}$ of 60 = ☐

f) $\frac{1}{7}$ of 84 kg = ☐

Now use your answers to solve these calculations.

a) $\frac{2}{3}$ of 12 = ☐

b) $\frac{3}{4}$ of £20 = ☐

c) $\frac{3}{5}$ of 35 m = ☐

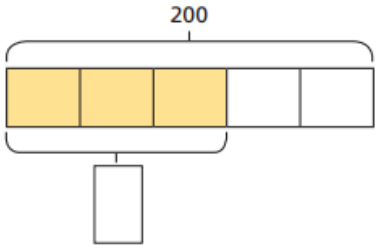
d) $\frac{7}{10}$ of 80 cm = ☐

e) $\frac{11}{12}$ of 60 = ☐

f) $\frac{6}{7}$ of 84 kg = ☐

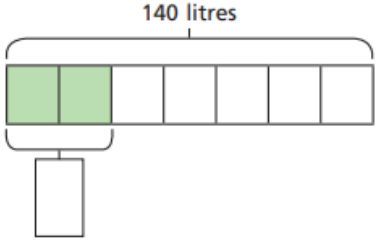
3 Calculate the missing values.

a)



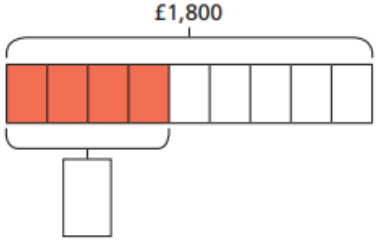
$\frac{3}{5}$ of 200 = ☐

b)



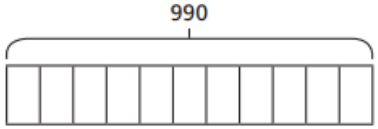
$\frac{2}{7}$ of 140 litres = ☐

c)



$\frac{4}{9}$ of £1,800 = ☐

d)



$\frac{3}{11}$ of 990 = ☐

4 **a)** In a school of 480 pupils, $\frac{2}{3}$ are juniors.

How many juniors are in the school?

b) A factory makes 256 cars.

$\frac{3}{8}$ are electric cars.

How many electric cars does the factory make?

c) Brett uses $\frac{2}{5}$ of his £180 savings to buy a train ticket.

How much of his savings does he have left?

5

Alex has 288 m of fence to paint.

She paints $\frac{3}{12}$ of the whole fence on Monday. She then paints $\frac{1}{2}$ of what is left on Tuesday.

How much fence does she have left to paint?

6 Fill in the missing numbers.

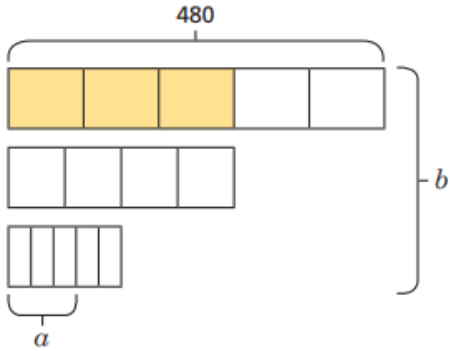
a) $\frac{\square}{10}$ of \$500 = \$150

b) $\frac{\square}{4}$ of 100 kg = 75 kg

c) 42 = $\frac{\square}{100}$ of 700

d) 450 = $\frac{\square}{20}$ of 3,000

7 Find the values of a and b.



a = ☐ b = ☐