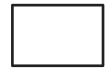
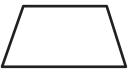
Big Maths Beat That!: Teacher Notes

SAFE Challenge 14			
	Step Location in the SAFE framework		Title of Step
	Progress Drive	Step No.	
Q1	Shape: 2D Shapes	22	I know 'The Quadrilateral Family'
Q2	Shape: Position & Direction	15	I can provide coordinates for a given point
Q3	Shape: Position & Direction	17	I can use x and y coordinates to find points
Q4	Amounts: Amounts of Temperature	9	I can read negative temperatures
Q5	Fractions: Fractions: Counting	12	I can round numbers with 1dp
Q6	Fractions: Fractions: Learn Its	6	I know all of my tables as fractions Learn Its
Q7	Fractions: Fractions: It's Nothing New	6	I can multiply unit fractions (within 1)
Q8	Fractions: Fractions: Calculation	5	I can simplify a fraction using my tables
Q9	Explaining Data: Bar Charts	10	I can find how many more (or fewer) than a given value shown on the horizontal axis (with continuous data)
Q10	Explaining Data: Line Graphs	3	I can explain a range of simple line graphs

(1) Tick the quadrilateral that is a parallelogram







2 Write down the co-ordinates for point A

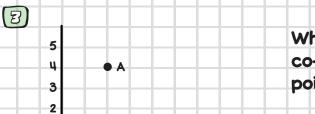
A = (

(B) Round to the nearest whole number:

 $\frac{3}{7}$ of 56 =

$$\frac{1}{6}$$
 of 48 =

°C -3 -5



2 3 4 5

MTWTF

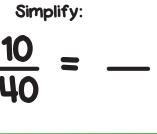
Days

2 3

What is the y co-ordinate of point A?

 $8 \times \frac{1}{9} =$ 7

(8) Simplify:





10 25 20

A school tuck shop recorded its sales over one week.

y =

Class 3b (3) How many pupils **Reading Scores** scored more than 75 marks? 26 - 50 51-75

Temperature

°C

How much money did the sales produce on Wednesday?

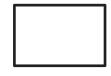
Dave I Beat Toat?

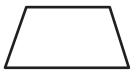


COT LAST SCOLET!

Tick the quadrilateral that is a trapezium







Write down the co-ordinates for point A

Round to the nearest whole number:

 $\frac{1}{7}$ of 56 =

°C

A = (,

6.2 →

 $\frac{1}{4}$ of 32 =

$$\frac{1}{6}$$
 of 48 =

1 0 -1

-3

-5

3

10

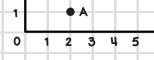
5

2 3

What is the X co-ordinate of point A?

3 Simplify:





 $\chi =$

Height of Trees in the park

How many trees were 21 - 30m tall?

Height (m)

.

Temperature °C

Weight (kg)

2 3

A vet recorded the weight of a puppy over 5 weeks.

How much did the puppy weigh in week 3?

We

MY LAST SCOLLEGI

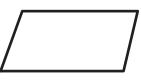
ande I bent tant?!



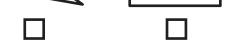
(1) Tick the quadrilateral that is a kite







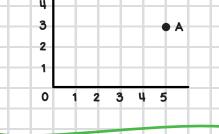






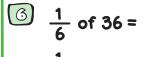






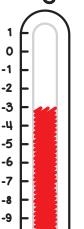
Write down the co-ordinates for point A

(B) Round to the nearest whole number:



$$\frac{1}{9}$$
 of 54 = $\frac{1}{9}$ of 81 =



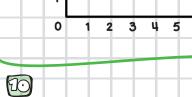




 $7 \times \frac{1}{9} =$ 7

(3) Simplify:





2 3

Months

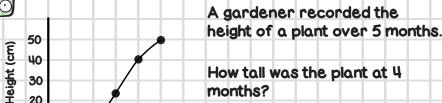
2

X =

Ages of Dogs at the Rescue Centre 9 How many dogs were 3 - 5 years old? 0 - 2 3-5 6 - 8 Age (years)

Temperature

°C



How tall was the plant at 4 months?

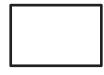


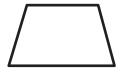


WY LAST SCOUE?!

(1) Tick the quadrilateral that is a rhombus











(B) Round to the nearest whole $\frac{3}{6}$ of 36 =

A = (

number:

 $\frac{1}{9}$ of 54 =

$$\frac{1}{9}$$
 of 81 =

°C

B 5

3

2

2 3

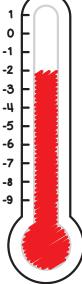
What is the y co-ordinate of point A?

7

$$4 \times \frac{1}{8} =$$

Tadpoles

(3) Simplify:





30

2 3

y =

Number of Tadpoles in Local Ponds (3) How many ponds had 41 - 60 tadpoles? 0 0 - 20 21-40 41-60

Temperature

°C

A pupil recorded the value of their card collection over 5 years. Value (pounds)

What was the value at 3 years?

2

3



MY LAST SCORE?!

MATE I BEAT THAT?

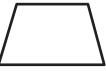


(1) Tick the quadrilateral that is a trapezium













(B) Round to the

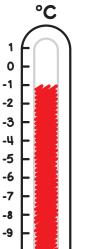
nearest whole number:

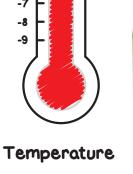
 $\frac{1}{7}$ of 42 =

$$\frac{1}{6}$$
 of 42 =

$$\frac{1}{7}$$
 of 49 =







3 5 3 2 2 3 4 5

2 3

What is the y co-ordinate of point A?

A = (

7

(3)

$$3 \times \frac{1}{7} =$$

2-3

Goals

0 - 1

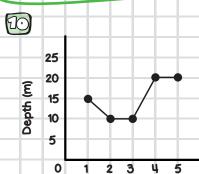
Number of Goals in Football Games

4-5

(3) Simplify:

$$\frac{2}{10} = -$$





Months

Pupils recorded the depth of a river over 5 months.

How many games had 2 - 3 goals?

°C

What was the depth at 4 months?

y =

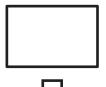
COT LAST SCOLET!

DAVE I BEAT TOAT?!

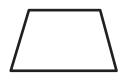


X =

Tick the quadrilateral that is a kite











Round to the nearest whole number:

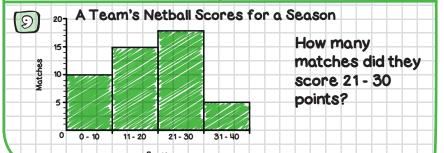
$$\frac{1}{5}$$
 of 35 =

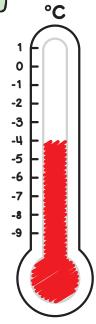
$$\frac{1}{4}$$
 of 36 =

$$\frac{1}{7}$$
 of 63 =

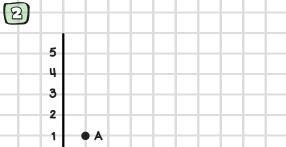






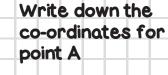


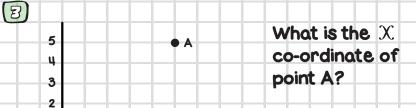


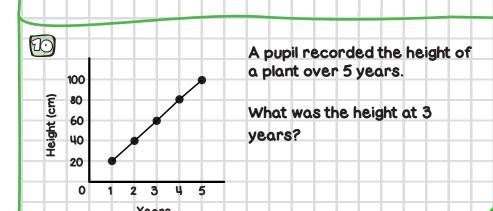


2 3 4 5

2 3 4 5









COT LAST SCOLET!

Dave I Beat Toat?!



Tick the quadrilateral that is a parallelogram









Write down the co-ordinates for point A

A = (

Round to the nearest whole number:

5.5 →

 $\frac{3}{6}$ of 54 =

$$\frac{1}{9}$$
 of 63 = $\frac{1}{2}$ of 49 =

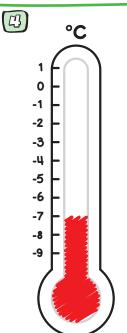
 $\sqrt{2}$ 8 x $\frac{1}{9}$ =

3 Simplify:

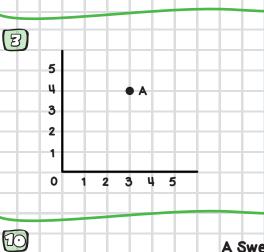
$$\frac{10}{30} = -$$

Weights of Pupils in Class 3B

How many pupils weighed 21 - 30 kilograms?



Temperature °C



TWTF

Days

2 3

What is the X co-ordinate of point A?

X =

A Sweet Shop owner recorded their sales over 5 days.

What was the value of sweets sold on Thursday?



DAVE I BEAT TOAT?!



(1) Tick the quadrilateral that is a trapezium









2 Write down the co-ordinates for point A

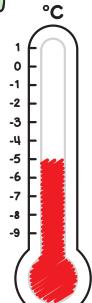
A = (

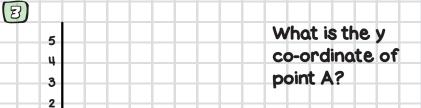
- (B) Round to the nearest whole number:

 $\frac{3}{9}$ of 81=

$$\frac{1}{7}$$
 of 49 =

$$\frac{1}{6}$$
 of 36 =

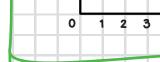


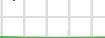




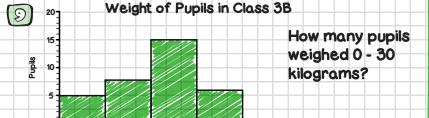


$$\frac{2}{6} = -$$



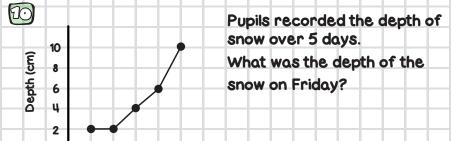


y =





°C



TWTF

Days



31-60

61 - 90

Weight (kg)

WY LAST SCOUE?!

MAVE I BEAT TMAT?!



(1) Tick the quadrilateral that is a rhombus





Number of Conkers Found

101 - 150





Write down the co-ordinates for point A

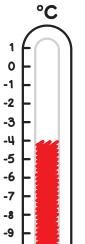
(B) Round to the nearest whole number:

$$\frac{1}{9}$$
 of 81=

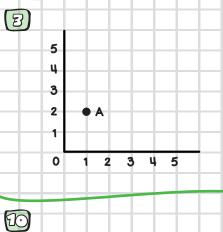
$$\frac{1}{7}$$
 of 49 =

$$\frac{1}{6}$$
 of 36 =









2 3

What is the Xco-ordinate of point A?



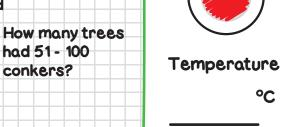
(8) Simplify:

had 51 - 100

conkers?



A vet recorded the weight of a new born horse over 5 weeks. 100 What was the weight of the



°C 2 3 horse at week 2?

X =





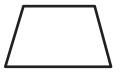
(2)

WY LAST SCODE?!

DAVE I BEAT TOATS!



(1) Tick the quadrilateral that is a trapezium











2

Write down the co-ordinates for point A

(B) Round to the nearest whole number:

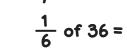
$$\frac{1}{9}$$
 of 81 =

$$\frac{1}{7}$$
 of 49 = $\frac{1}{1}$ of 36 =

[4]



A = (





What is the y 5 co-ordinate of point A?

 $4 \times \frac{1}{5} =$ 7

(8) Simplify:

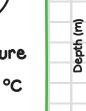
2 3 4 5

2

y =

Number of Sunshine Hours per day (2) How many days had 0 - 3 sunshine Days hours? 0-3 4-6 10 - 12 Sunshine Hours

Temperature



10 Pupils recorded the depth of their pond over 5 days.

What was the depth of the pond at day 4?



WY LAST SCOBE?!

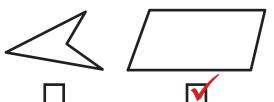
CAVE I BEAT TOATS!

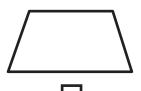
2 3

Days



Tick the quadrilateral that is a parallelogram





Write down the co-ordinates for point A

Round to the nearest whole number:

3.4 → 3

 $\frac{3}{7}$ of 56 = 8

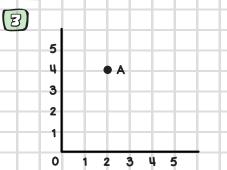
$$\frac{1}{4}$$
 of 32 = 8

$$\frac{1}{6}$$
 of 48 = 8

°C

-3

-5



MTWTF

Days

2 3

What is the y co-ordinate of point A?

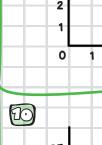
$$\sqrt{2}$$
 8 x $\frac{1}{9}$

8 9

Scores

3 Simplify:

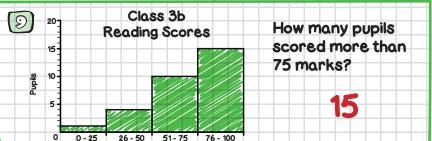
$$\frac{10}{40} = \frac{1}{4}$$



20

2

A school tuck shop recorded its sales over one week.



Temperature



How much money did the sales produce on Wednesday?

y =





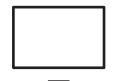
WY LAST SCOBER!

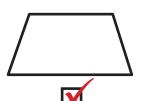
CAVE I BEAT TOATS!



1 Tick the quadrilateral that is a trapezium







°C

Write down the co-ordinates for point A

(B) Round to the

 $\frac{1}{7}$ of 56 =

 $\frac{1}{6}$ of 48 =

A = (3, 2)

nearest whole number:

$$\frac{1}{u}$$
 of 32 = 8

B

5

2

What is the Xco-ordinate of

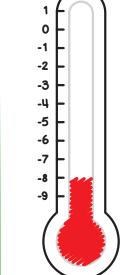
point A?

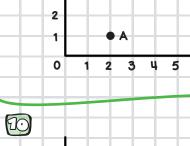
 $4 \times \frac{1}{6} =$

7

(3)

Simplify:





X =

Height of Trees in the park 9 How many trees were 21 - 30m tall? 11 - 20 21 - 30

Height (m)









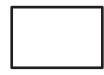
WY LAST SCOBER

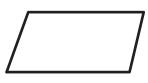
DAVE I BEAT TOATS!

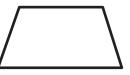


1 Tick the quadrilateral that is a kite









2

3

2



Round to the nearest whole number:

$$\frac{1}{6}$$
 of 36 =

$$\frac{1}{9}$$
 of 54 = 6

$$\frac{1}{9}$$
 of 81 = 9

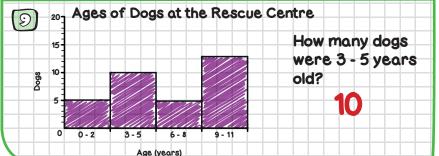


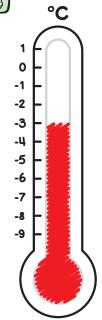
$$7 \times \frac{1}{9} =$$

(8)

Simplify:

$$\frac{2}{10} = \frac{1}{5}$$



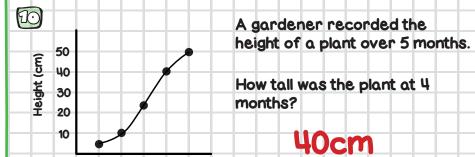


Temperature



Write down the co-ordinates for point A

What is the X5 co-ordinate of point A? 3





2 3



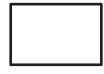
MY LAST SCOBES!

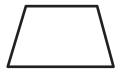




1 Tick the quadrilateral that is a rhombus









2

B

Write down the co-ordinates for point A

(B) Round to the nearest whole number:

 $4 \times \frac{1}{9} =$

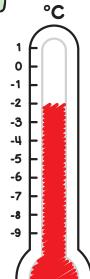
7

 $\frac{3}{6}$ of 36 =

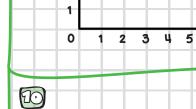
$$\frac{1}{9}$$
 of 54 = 6

$$\frac{1}{9}$$
 of 81 = 9

Simplify:



What is the y 5 co-ordinate of point A? 3



30

2

y =

Number of Tadpoles in Local Ponds (3) How many ponds had 41 - 60 tadpoles? 0 0 - 20 21-40 41-60 Tadpoles

(8)

Temperature

A pupil recorded the value of their card collection over 5 50 years.

What was the value at 3 years?

£20



CAVE I BEAT TOATS

2 3

Value (pounds)



Tick the quadrilateral that is a trapezium









\

2

V

°C

Write down the co-ordinates for point A

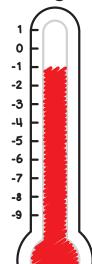
$$A=(3,3)$$

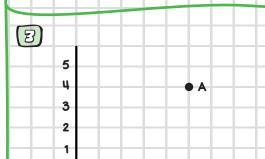
Round to the nearest whole number:

$$\frac{3}{7}$$
 of 42 =

$$\frac{1}{6}$$
 of 42 = 7

$$\frac{1}{7}$$
 of 49 = $\frac{7}{7}$





2 3 4 5

2 3

2 3

What is the y co-ordinate of point A?

$$\boxed{2} \quad 3 \times \frac{1}{7} =$$

<u>3</u>

2 - 3

Goals

Number of Goals in Football Games

4-5

3 Simplify:

$$\frac{2}{10} = \frac{1}{5}$$



Pupils recorded the depth of a river over 5 months.



Temperature

What was the depth at 4 months?

y =

20m



0 - 1

(3)

WY LAST SCOBER

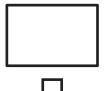
DAVE I BEAT TOAT?

20

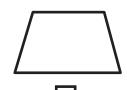
Depth (m)

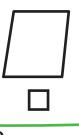


(1) Tick the quadrilateral that is a kite









°C

2

Write down the co-ordinates for point A

(B) Round to the nearest whole number:

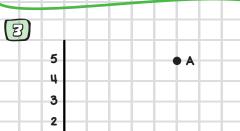
$$\frac{3}{5}$$
 of 35 = 7

$$\frac{1}{4}$$
 of 36 = 9

$$\frac{1}{7}$$
 of 63 = 9

-3

-5



2 3 4 5

2 3

2 3 4 5

What is the Xco-ordinate of point A?

A = (

7 $2 \times \frac{1}{9} =$

0 - 10

11 - 20

(9)

3 Simplify:

$$\frac{5}{15} = \frac{1}{3}$$

points?

18



10 A pupil recorded the height of a plant over 5 years. 100

How many matches did they score 21 - 30

Temperature

What was the height at 3 years?

X =

60cm



21 - 30

207 A Team's Netball Scores for a Season

MY LAST SCOBER!

DAVE I BEAT TOATS!

Height (cm)



2 3 4 5

Days

(1) Tick the quadrilateral that is a parallelogram









2 Write down the co-ordinates for point A

(B) Round to the nearest whole number:

$$5.5 \rightarrow 6$$

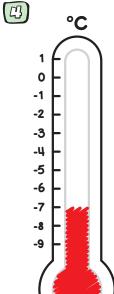
7

 $\frac{1}{6}$ of 54 =

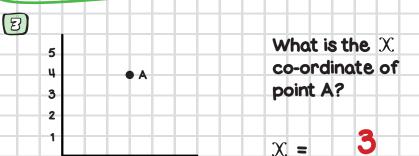
$$\frac{1}{9}$$
 of 63 = $\frac{7}{}$

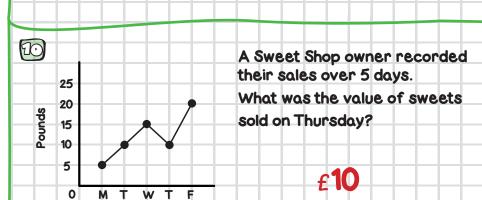
$$\frac{1}{7}$$
 of 49 = $\frac{7}{7}$

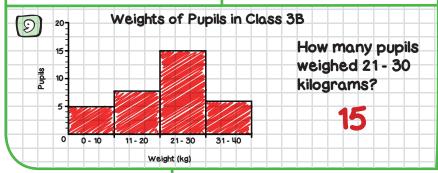
$$\frac{10}{30} = \frac{1}{3}$$











MY LAST SCOBER

ague I beat taats!



(1) Tick the quadrilateral that is a trapezium









°C

Write down the co-ordinates for point A

Round to the nearest whole number:

 $\frac{1}{9}$ of 81=

[4]

2

2

B

A = (3,

(B)

 $\frac{1}{7}$ of 49 =

$$\frac{1}{6}$$
 of 36 = 6

-3

-4

-5



What is the y 5 co-ordinate of point A?

 $6 \times \frac{1}{7} =$ 7

31-60

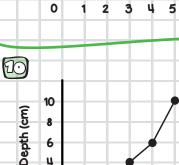
61 - 90

Weight (kg)

(3) Simplify:

$$\frac{2}{6} = \frac{1}{3}$$





MTWTF

Days

y =

Weight of Pupils in Class 3B (2) How many pupils weighed 0 - 30 Pupils kilograms?

Temperature

Pupils recorded the depth of snow over 5 days.

What was the depth of the snow on Friday?

10cm



ague I beat taats!



(1) Tick the quadrilateral that is a rhombus









2

Write down the co-ordinates for point A

A = (3,

(B) Round to the nearest whole number:

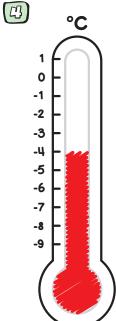
$$6.2 \rightarrow 6$$

 $4 \times \frac{1}{9} =$

 $\frac{1}{9}$ of 81=

$$\frac{1}{7}$$
 of 49 = $\frac{7}{7}$

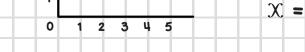
$$\frac{1}{6}$$
 of 36 = 6



B What is the X5 co-ordinate of point A? 3 2

7

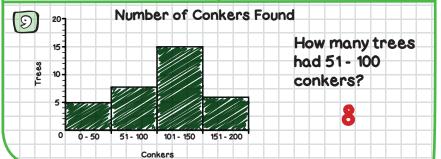
$$\frac{10}{20} = \frac{1}{2}$$



2 3

2 3





Temperature

40kg



ande I bent tant?



(1) Tick the quadrilateral that is a trapezium

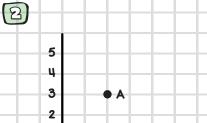












2 3 4 5

Write down the co-ordinates for point A

$$A = (2, 3)$$

(B) Round to the nearest whole number:

7

(2)

Days

 $4 \times \frac{1}{5} =$

$$\frac{1}{9}$$
 of 81=

$$\frac{1}{7}$$
 of 49 = $\frac{7}{7}$

$$\frac{1}{6}$$
 of 36 = 6





What is the y 5 co-ordinate of point A?

B







Simplify:

(3)

Number of Sunshine Hours per day

How many days

hours?

had 0 - 3 sunshine



10 Pupils recorded the depth of their pond over 5 days.

Temperature

What was the depth of the pond at day 4?

3m



0-3

4-6

Sunshine Hours

COUGAST SCORES! CAUE I BEAT TOATS!

2 3

Depth (m)

