Y6 Remote Learning

ANSWER PACK

25th- 29th January 2021

Maths Answers
Lesson 1:

Understand percentages

1 Complete the sentence for each diagram.

a) There are **9** parts out of a hundred shaded. This is **9** %.

b) There are **24** parts out of a hundred shaded. This is **24** %.

c) There are **65** parts out of a hundred shaded. This is **65** %.

2 Complete the table.

Hundred square	Percentage
	15%
	63%
	82%

3 Shade 15% of the hundred square red.
Shade 32% of the hundred square blue.
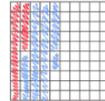
What percentage of the hundred square is **not** shaded? **53** %

4 a) Is 1% of this bar model shaded? **No**
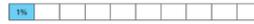
Explain your reasoning.
No split into 10 parts so each part is 10%

b) What percentage of each bar model is shaded?

30 %

70 %
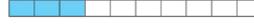
5 Passengers are boarding a plane.
The plane has 100 seats.
a) 10% of the seats are already full.
How many passengers are already on the plane? **10**
b) 15% of the seats have not been booked.
How many seats have been booked? **85**
c) How many passengers still need to board the plane? **75**

6 Dexter has £1 to spend.
He buys some stickers.
I got 35p change.
What percentage of his money did Dexter spend? **65** %

7 Aisha and Brett have been selling tickets for the school play.
There are 100 seats available.
- On Monday they sold 34% of the tickets.
- On Tuesday they sold 42 tickets.
- By the end of Wednesday, 95% of the tickets had been sold.
How many tickets did they sell on Wednesday?
On Wednesday they sold **19** tickets.

8 Shade 85% of this bar model.
Compare answers with a partner.

Lesson 2

Fractions to percentages
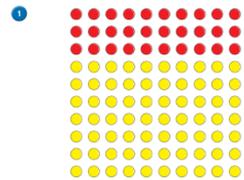
1

a) What fraction of the array of counters is red? **$\frac{3}{10}$**
b) What fraction of the array of counters is yellow? **$\frac{7}{10}$**
c) What percentage of the array of counters is red? **30** %
d) What percentage of the array of counters is yellow? **70** %
e) What do you notice about the two percentages?

2 a) Shade the hundred squares to represent the fractions.
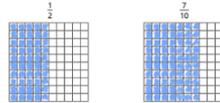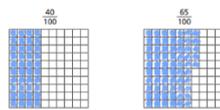
$\frac{40}{100}$ $\frac{65}{100}$ $\frac{1}{2}$ $\frac{7}{10}$

b) Write the fractions as percentages.

$\frac{40}{100}$ = **40** % $\frac{65}{100}$ = **65** %
$\frac{1}{2}$ = **50** % $\frac{7}{10}$ = **70** %

c) Compare your shaded grids with a partner's.
What is the same and what is different?

3 Fill in the missing numbers.

a) $\frac{9}{10} = \frac{90}{100} = $ **90** %   c) $\frac{9}{50} = \frac{18}{100} = $ **18** %
b) $\frac{9}{20} = \frac{45}{100} = $ **45** %   d) $\frac{9}{25} = \frac{36}{100} = $ **36** %

4 $\frac{1}{10}$ is 10%, so $\frac{1}{20}$ must be 20%.
Explain the mistake that Ron has made.
What is the correct answer?
$\frac{1}{20} = $ **5** %

5 Convert the fractions to percentages.
a) $\frac{1}{4} = $ **25%**   b) $\frac{1}{5} = $ **20%**
$\frac{1}{2} = $ **50%** $\frac{2}{5} = $ **40%**
$\frac{3}{4} = $ **75%** $\frac{4}{5} = $ **80%**

c) $\frac{16}{20} = $ **80%**   d) $\frac{45}{50} = $ **90%**
$\frac{8}{20} = $ **40%** $\frac{9}{10} = $ **90%**
$\frac{4}{20} = $ **20%** $\frac{18}{20} = $ **90%**
e) What do you notice?

6 a) Shade the grid in the given proportions.
- $\frac{3}{5}$ green   - 14% red
- $\frac{4}{20}$ blue   - the rest yellow
b) What percentage of the grid is yellow? **6** %

7 a) Use each digit card once to make the statements correct.

| 1 | 2 | 3 | 4 | 5 |

$\frac{\boxed{}}{\boxed{}} > \boxed{4}$ 0%   75% = $\frac{\boxed{3}}{\boxed{4}}$ $\frac{\boxed{}}{\boxed{5}} < 65\%$

b) Are there any other solutions?

Lesson 3

Equivalent FDP

1 What fraction, decimal and percentage of each grid is shaded blue?

fraction = $\frac{1}{100}$ decimal = **0·01**   percentage = **1** %

fraction = $\frac{1}{10}$ decimal = **0·1**   percentage = **10** %

fraction = $\frac{100}{100}$ decimal = **1**   percentage = **100** %

2 Match the equivalent fractions, decimals and percentages.

$\frac{15}{100}$ 0.05   5%
$\frac{1}{20}$ 0.5   15%
$\frac{1}{5}$ 0.2   50%
$\frac{1}{2}$ 0.15   20%
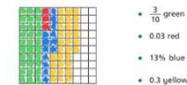
3 a) Shade the grid in the given proportions.
- $\frac{3}{10}$ green
- 0.03 red
- 13% blue
- 0.3 yellow
b) What proportion of the grid is unshaded?
Write your answer as a fraction, decimal and percentage.
fraction = $\frac{6}{25}$ decimal = **0·24**   percentage = **24** %

4 Complete the table.

Fraction	Decimal	Percentage
$\frac{21}{100}$	0.21	**21%**
$\frac{1}{25}$	**0·12**	12%
$\frac{2}{10}$	**0·2**	**20%**
$\frac{2}{5}$	0.4	**40%**
$\frac{11}{25}$	0.44	**44%**
$\frac{1}{25}$	**0·04**	4%
$\frac{3}{4}$	**0·75**	**75%**
$\frac{99}{100}$	0.99	**99%**

5 Amir was asked to complete the statement using <, > or =.
14% **>** 0.4   14 is greater than 4
What mistake has Amir made?
He hasn't compared them in the same form. 0·4=40% and 40%>14% so 14% <0·4

6 Match the decimal cards to the people.
My decimal is $\frac{4}{10}$ less than 100%.   0.65
My decimal cannot be simplified when it is written as a fraction.   0.57
My decimal is 10% less than $\frac{3}{4}$.   0.61
My decimal is greater than 60%.   0.6

7 Use the digit cards to write a decimal greater than $\frac{1}{5}$ but less than 40%.
You may not use a card more than once in each number.

| 0 | 1 | 2 | 3 | 4 | 5 |

e.g. **0 . 2 4**

How many other answers can you find?

Lesson 4:

Lesson 5:

Guidance: Children will have 30 minutes for this test. Long division and long multiplication questions are worth **2 marks** each. Children will be awarded 2 marks for a correct answer. They may get 1 mark for showing a formal method. All other questions are worth 1 mark each.

question	answer	marks
1	94	1
2	1236	1
3	155	1
4	6.2	1
5	56	1
6	7067	1
7	2.522	1
8	317	1
9	109	1
10	$\frac{2}{3}$ or $\frac{4}{6}$	1
11	561	1
12	50	1
13	90	1
14	131	1
15	780.1	1
16	5777	1
17	900	1
18	$\frac{18}{12}$ or $\frac{3}{2}$ or $1\frac{6}{12}$ or $1\frac{1}{2}$	1
19	29.43	1
20	4200	1
21	50 505	1

question	answer	marks
22	1420	1
23	13.85	1
24	2444	2
25	43 711	1
26	315	2
27	$\frac{4}{25}$	1
28	52 972	2
29	26	1
30	$\frac{3}{7}$	1
31	12	1
32	$4\frac{2}{3}$	1
33	52	2
34	$\frac{2}{25}$	1
35	$\frac{17}{30}$	1
36	63	1
		Total 40

English Answers

Lesson 1:

1. internet café
2. mentions coffee and sticky buns
3. his sister was about to have twins
4. red
5. he looked like a raspberry ripple
6. vanilla- seagull poo
7. There were more emojis for a
8. A young child as her fishing rod is simple
9. cinema- he has student card for cheap tickets
10. No, he thinks it I an excuse

Lesson 2:

1. wheat

2. Tommy

3. straw

Word		Definition
bunkered		dithered
hesitated		hidden
hollering		ragged
tattered		yelling

Lesson 3: Upload your descriptions to Dojo.

32 Windsor Gardens
Notting Hill
London
W11 1MB
United Kingdom[1]

1st August, 2015[2]

Dearest Great-Aunt Lucy[3],

I'm writing to you from my own bedroom in my new home, here in London. I've been adopted by a marvellous family who are called The Browns (whose generosity to bears seems limitless) and I want to tell you all about them and my adventures. [4]

Since you moved[8] into the Home for Retired Bears in Lima so many weeks ago, my[6] life has been extraordinary! Having stowed away aboard a lifeboat on a gigantic container ship, I[6] finally made it to England – just as you said I should[8]. Although it was an extremely long journey, luckily I had just enough of your delicious marmalade[8] to keep me[6] going. On arrival in the port, I climbed on a train and ended up at a huge, bustling railway station where I thought I might find some friends. Unfortunately, I was there for hours before someone spoke to me even though I raised my[6] hat and said, "Good morning," most politely every time anyone passed. In addition, I made sure the label you wrote[8] – the one with 'please look after this bear'- could be seen but everyone ignored me. [5]

Thankfully, just as I[6] was about to give up hope, an especially kind couple – The Browns – saw me and decided that they would take me home and look after me. Can you believe that?[7] Since no one can pronounce my name in Peruvian bear language, they even gave me[6] a new name. I am now called Paddington! Mr Brown explained that is a very distinguished name for a bear. [5]

When we[6] flagged down a taxi, the driver said I couldn't get in because I was a bear; I gave him one of my special hard stares and he soon changed his tune – ha ha![7] At the Browns' home, I[6] was introduced to Mrs Bird (who is their housekeeper: she looks after them all) and their two children – Judy and Jonathan. My[6] room is located in the attic; it has an incredible view of the city. [5]

Mrs Brown insisted that I needed a coat to keep me warm so she's bought me a beautiful blue duffle coat with a red lining. I'm enclosing a picture of myself[6] in it, looking very smart. As you can see, it goes a treat[7] with Great-Uncle's hat. Oh, talking of which[7], I've discovered a brilliant way for any bear to ensure that he's always full of energy: Mrs Bird makes me[6] a marmalade sandwich each morning, which I keep in my[6] hat for emergencies! [5]

Even though I[6]'ve only been here a couple of weeks, I've made lots of friends already. The best is Mr Gruber – he's an antique dealer – in Portobello Road. Whenever we[6] visit his shop, he's always got fascinating artefacts to show us[6]. On the other hand, there are less-friendly neighbours around. Mr Curry (the grumpiest man alive[7]) lives a few doors away and he's ALWAYS complaining about something or other. Do you know what he said to Mr Brown last week? 'Bears make the street look scruffy: you'll reduce our[6] house prices.' What a cheek![7] [5]

¹sender's address	Anyway, Mrs Brown has just shouted up that we're⁶ off for a trip to the Natural History Museum so I've got to get going now⁷. So exciting: apparently there's a blue whale skeleton there... Write soon⁸ and let me⁶ know how you are. What are your friends at the Home for Retired Bears like? ⁹
²date	
³appropriate greeting	Lots of love and marmalade,¹⁰
⁴introduction	Paddington¹¹
⁵paragraphs around a theme	p.s. even though it's pretty yummy⁷, Mrs Bird's marmalade isn't a patch on yours!⁸
⁶first person	
⁷chatty, informal style	
⁸addresses the recipient directly	
⁹conclusion	
¹⁰complimentary close	
¹¹finishes with the sender's name or signature	
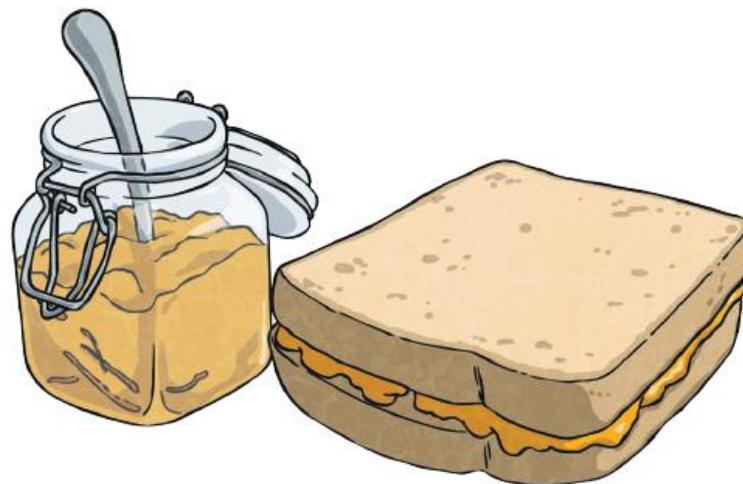
Lesson 5:

Letter 1

Areas of Strength

- The use of rhetorical questions: " That's normal, right?"
- The use of parenthesis: " There were lots of other children (who were crying or shouting) on the train."
- The use of fronted adverbials: "At first," "At the minute,"

Areas of Development

- To use a wider variety of sentence types.
- To use expanded noun phrases to describe the five senses.
- To use a wider variety of relative clauses to add information.

Letter 2

Areas of Strength

- Uses an appropriate greeting and sign off "Dear Mummy and Daay" and "We all send our love"
- The use of parenthesis: "That was made by my new knife (it is a very old one really as you may see by the rust)."
- Includes the sender's address in the top right hand corner

Areas of Development

- To use themed paragraph
- To use expanded noun phrases to describe the five senses.
- To use fronted adverbials

Reading for Productivity: Lesson 1 – Geography Answers

1. When was the Fairtrade Foundation established in the United Kingdom?
The Fairtrade Foundation was established in 1992.

2. What are the main aims of Fairtrade? Give two.
The main aims of Fairtrade are to give small scale farmers a better deal and to offer rural families a stable income.

3. Explain what a Fairtrade deal is.
A Fairtrade deal is one where 50% of the organisation is owned by farmers and workers, giving an equal voice in decision making.

4. Fairtrade Premium is an additional sum of money given to a farmer. What is its purpose?
The Fairtrade Premium is meant to develop the farming community, protecting the environment where people live and work.

5. Why do you think it is important to protect the environment that the farmers and workers live in?
It's important to protect the environment because this would protect the farmers' income, their crop and their way of life.

6. Do you think it is important to buy Fairtrade products? Explain.
Various answers possible. May include themes such as supporting people who are less well off or giving a fair price.

7. Look at the numbers of certified Fairtrade farmers around the world. Are farmers keen to join the Fairtrade system? Why?
Answers may include ideas that explain the large numbers involved. If there are lots of certified farmers, Fairtrade must make a big difference to them.

8. Which of these is **not** a reason to become a Fairtrade School?
Extra pocket money is not a reason to become a Fairtrade School.

9. Every day in the UK, we drink more than 8 million Fairtrade drinks. What does this tell you about people's opinion of Fairtrade?
The fact tells you that lots of people want to support Fairtrade.

Reading for Productivity: Lesson 2 – DT Answers

Where does the word cake come from? Old norse (Viking) word kaka

The ancient Greeks word was derived from a word meaning what? Flat

What is a satura? A flat heavy cake

Who were the first culture to show 'true baking skill?' Ancient Eygpt

Match the cake to the civilisation

Ancient Egypt   Fruitcakes
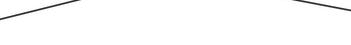
The Romans   Bread sweetened with honey

The Greeks   Cheesecake

How much flour was used in an immense cake mentioned by Chaucer?
13kg

Reading for Productivity: Lesson 3 – Spanish Answers

Q1) How many registered pets were there in Spain last year? 13 million

Q2) How many people over the age of 65 live alone in Spain? Two million

Q3) Which word in the first paragraph means the same as 'increased'? rocketed

Q4) According to the Affinity Foundation, how many abandoned dogs and cats were there in 2018? 138,000

Q5) Explain why people who live alone are more likely to get a pet. A pet can give them company and somebody to spend time with.

Q6) 'The Local reported recently that in the region of Asturias alone, the number of households that now include a dog have **outpaced** those that include humans under the age of 18.' – What do you think the word **outpaced** means? overtaken, beaten

Q7) According to the text, what does every dog and cat have to have to be legal? a microchip

Q8) Look at the final paragraph '**Abandoned pets**'. What is the main message in this paragraph?
   a) There are more pets in Spain than under 15s.
   b) In Spain, people are giving their pets good homes.
   c) People in England, Belgium and Holland look after their pets better than people in Spain.

Q9) 'A study carried out some years ago found that in some situations, people are more willing to help a needy dog than a child and feel more empathy in general towards the animal than a grown-up human.'
How does this statement make you feel as a child under the age of 15? Various answers

Q10) Look at the paragraph beginning 'What is notable...'. What is the link between the growing number of pets and the birth rate? The rate of growing pets is increasing and the birth rate is decreasing

1. Why is Sir Isaac Newton considered to be one of the most important scientists in history? Explain your answer and provide evidence to support it.
   He developed the laws of motion (which became the basis of physics), a new type of mathematics and breakthroughs in optics. He was considered the smartest person that ever lived by Einstein He became warden of the Royal Mint.

2. Why did Isaac's mother want him to leave school?
   So he could help on the farm

3. Isaac is described as being an adequate student. Define the word adequate.
   Satisfactory / reasonable / not excelling

4. Why is he referred to as **Sir** Isaac Newton?
   He was given a knighthood by Queen Anne

5. What is Sir Isaac Newton's theory of gravity also known as?
   Newton's law of universal gravitation

1. Find and copy a phrase that tells us computers are an integral part of life.
   we can barely imagine the world without computers

2. Name two technological developments which didn't exist in the 1950s.
   Accept any two of the following: laptops, smartphones, tablets, games consoles.

3. Why is Charles Babbage sometimes known as the Father of Computing?
   Charles Babbage is sometimes known as the father of computing because he designed the first machine (the Analytical Engine), which could be programmed using an algorithm.

4. Tick the correct box related to each statement in the table:

	True	False
School children in Japan use an abacus called a soroban.	x	
Charles Babbage designed the Bombe.		x
An algorithm is a type of computer.		x
Bletchley Park was the home of Second World War codebreakers.	x	
Microsoft was founded by Steve Jobs.		x

5. Why was the codebreaking work done at Bletchley Park so important in the Second World War?
   The codebreaking work down at Bletchley Park was so important in the Second World War because experts believe that the intelligence gained through codebreaking helped to shorten the war by as much as two years.

6. When did the public first learn about the work done at Bletchley Park during the Second World War? Tick one.
   In the 1970s

7. What are the advantages of universally compatible hardware and software?
   Open question

8. Which of these were created in the 1970s? Tick one.
   Microsoft, Space Invaders and Apple

9. Why is the development of affordable programming hardware and software important?
   Open question

10. Name three things we use computers for today.
    Accept any two of the following: emailing, reading, gaming, texting, accessing the World Wide Web, programming.