

Maths Answers → Week Beginning 04.05.20

Monday

Mild

- 1 Find three different ways to make 4



$$0 + 4 = 4$$

$$1 + 3 = 4$$

$$2 + 2 = 4$$

- 2 Find three different ways to make 6

$$6 + 0 = 6$$

$$5 + 1 = 6$$

$$4 + 2 = 6$$

*Examples

- 3 Circle all the number bonds to 5

$2 + 3$ $5 + 1$ $0 + 4$
 $3 + 3$ $3 + 2$ $4 + 1$
 $0 + 5$

- 4 Colour all the number bonds to 9

8 + 2	4 + 5	7 + 2	0 + 9	0 + 7
9 + 1	2 + 7	8 + 2	8 + 1	3 + 4
7 + 1	3 + 6	1 + 8	5 + 4	5 + 3
4 + 4	0 + 8	9 + 1	6 + 3	2 + 6
7 + 3	5 + 3	2 + 6	9 + 0	9 + 1

Medium

- 1 Complete the additions to match the ten frames.

a) $2 + 8 = 10$

$2 + 18 = 20$

b) $3 + 7 = 10$

$3 + 17 = 20$

- 2 Complete the number bonds.

a) $4 + 6 = 10$

c) $10 = 9 + 1$

$4 + 16 = 20$

$20 = 19 + 1$

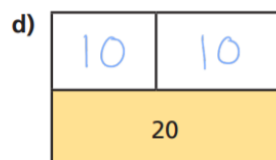
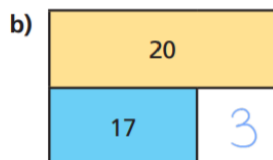
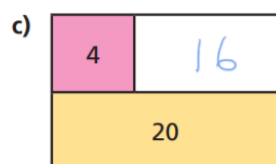
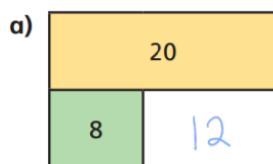
b) $5 + 5 = 10$

d) $10 = 3 + 7$

$5 + 15 = 20$

$20 = 7 + 13$

3 Complete the bar models.



4 Colour all the number bonds to 20

14 + 3	17 + 3	2 + 18	0 + 20	3 + 16	9 + 11	17 + 3	18 + 2	2 + 0
18 + 1	3 + 7	12 + 7	5 + 15	4 + 8	1 + 19	13 + 5	20 + 0	1 + 15
11 + 8	11 + 9	19 + 1	3 + 17	10 + 0	13 + 7	16 + 2	8 + 12	5 + 5
5 + 6	4 + 16	19 + 0	10 + 1	2 + 0	14 + 6	17 + 1	11 + 9	11 + 8
12 + 5	12 + 8	18 + 2	15 + 5	4 + 15	16 + 4	10 + 10	15 + 5	13 + 3

Spicy

- Various answers, for example $9 + 7 = 16$; $10 + 6 = 16$; $11 + 5 = 16$
- No, Freya is incorrect because $16 + 3$ does not equal 20. The correct number bonds are: $16 + 4 = 20$ or $6 + 14 = 20$

3. True or false?

There are double the amount of numbers bonds to 20 than there are number bonds to 10

Prove it – can you use a systematic approach?

False – there are 11 number bonds to 10 and 21 number bonds to 20 Children can show this in various ways.

4. Riddle me this

I'm thinking of a number.

If add 7, the answer is 20.

What number was I thinking of?

How do you know? Explain your answer.

$$13 + 7 = 20$$

Children to make a riddle for a friend.

5. Super Squares!

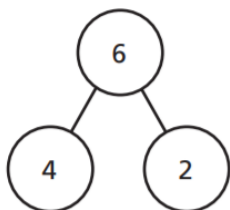
5	7	8
1	11	8
14	2	4

Tuesday

Mild

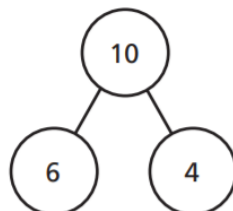
1 Complete the fact families.

a)



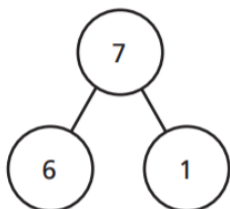
$$\begin{array}{l} 4 + 2 = 6 \\ 2 + 4 = 6 \\ 6 = 4 + 2 \\ 6 = 2 + 4 \end{array}$$

c)



$$\begin{array}{l} 6 + 4 = 10 \\ 4 + 6 = 10 \\ 10 = 6 + 4 \\ 10 = 4 + 6 \end{array}$$

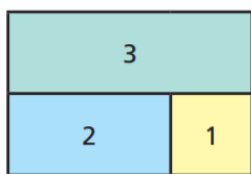
b)



$$\begin{array}{l} 6 + 1 = 7 \\ 1 + 6 = 7 \\ 7 = 6 + 1 \\ 7 = 1 + 6 \end{array}$$

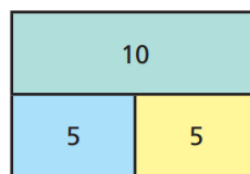
2 Complete the fact families.

a)



$$\begin{array}{l} 2 + 1 = 3 \\ 1 + 2 = 3 \\ 3 = 2 + 1 \\ 3 = 1 + 2 \end{array}$$

b)



$$\begin{array}{l} 5 + 5 = 10 \\ 5 + 5 = 10 \\ 10 = 5 + 5 \\ 10 = 5 + 5 \end{array}$$

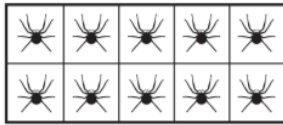
3 Use the digit cards to complete the fact family.



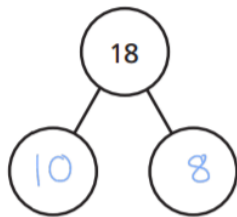
$$\begin{array}{l} 6 + 3 = 9 \\ 3 + 6 = 9 \\ 9 = 6 + 3 \\ 9 = 3 + 6 \end{array}$$

Medium

1 Look at the picture.



Complete the part-whole model and fact family.



$$10 + 8 = 18$$

$$8 + 10 = 18$$

$$18 - 10 = 8$$

$$18 - 8 = 10$$

Can you write each number sentence a different way?

$$18 = 10 + 8$$

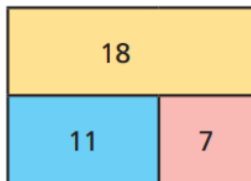
$$18 = 8 + 10$$

$$8 = 18 - 10$$

$$10 = 18 - 8$$

2 Complete the fact family for each bar model.

a)



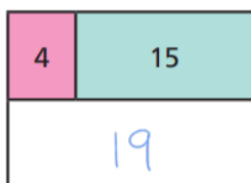
$$11 + 7 = 18$$

$$7 + 11 = 18$$

$$18 - 7 = 11$$

$$18 - 11 = 7$$

b)



$$19 = 4 + 15$$

$$19 = 15 + 4$$

$$15 = 19 - 4$$

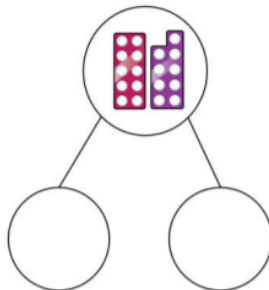
$$4 = 19 - 15$$



3.	Problem	Calculation	Picture
	<i>Problem where the calculation $9 + 7$ is required to find answer.</i>	$9 + 7 = 16$	<i>Pictorial representation for $9 + 7$.</i>
	<i>Problem where the calculation $16 - 9$ is required to find answer.</i>	$16 - 9 = 7$	
	<i>Problem where the calculation $16 - 7$ is required to find answer</i>	$16 - 7 = 9$	<i>Pictorial representation for $16 - 7$.</i>

Spicy

1. Use the cards to write as many addition and subtraction sentences as you can.

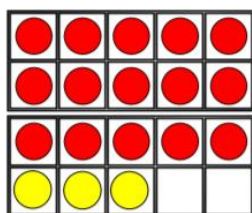


nine	add
ten	subtract
nineteen	is equal to

Children can use the words to create sentences

Possible answers:
Nine add ten is equal to nineteen.
Nine is equal to nineteen subtract ten.

2. Circle the addition and subtraction number sentences that match the ten frames.



- | | |
|---------------|---------------|
| $15 + 3 = 18$ | $15 - 3 = 18$ |
| $3 + 18 = 15$ | $18 - 15 = 3$ |
| $18 + 3 = 15$ | $18 - 3 = 15$ |
| $18 = 3 + 15$ | $15 - 18 = 3$ |

- $15 + 3 = 18$
- $18 - 15 = 3$
- $18 - 3 = 15$
- $18 = 3 + 15$

3.

$$5 + 15 = 20$$

$$20 = 15 + 5$$

$$15 + 5 = 20$$

$$20 = 5 + 15$$

$$20 - 5 = 15$$

$$15 = 20 - 5$$

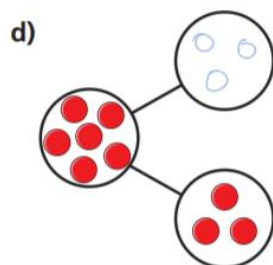
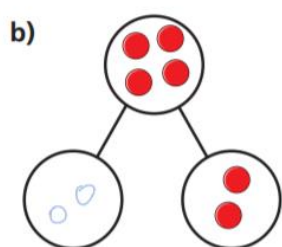
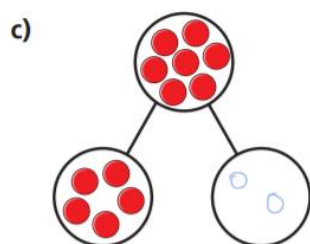
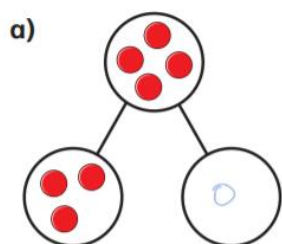
$$20 - 15 = 5$$

$$5 = 20 - 15$$

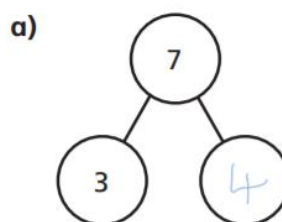
Wednesday

Mild

- 1 Draw counters to complete the part-whole models.



- 2 Complete the part-whole models. Complete the sentences.

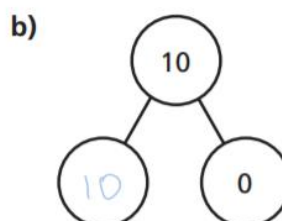


The whole is

7

3 is a part.

4 is a part.



The whole is

10

10 is a part.

0 is a part.

- 3 There are 6 apples in total.

2 apples are green.

The rest are red.

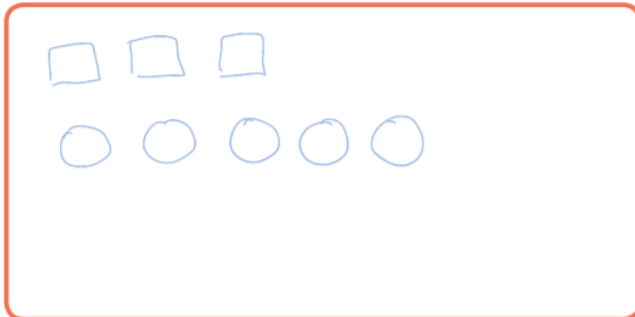
Colour the apples.



Complete the number sentence. $2 + \boxed{4} = 6$

Medium

1. There are 8 shapes in total.
3 of the shapes are squares.
The rest are circles.
Draw a picture to show this.



How many circles are there?

5

Complete the number sentence.

$$3 + 5 = 8$$

2. Complete the number sentences.

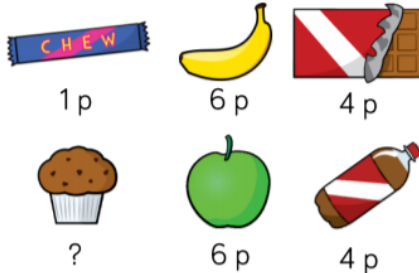
$$4 + 1 = 5$$

$$4 + 0 = 4$$

$$3 + 1 = 4$$

$$5 = 1 + 4$$

- 3.



Eva spends 10p on a chocolate bar and something else. What else could she have bought? Explain how you know.

Jack spent 9p on a banana and a muffin. How much is a muffin? Explain how you know.

Rosie spent 6p on a chocolate bar and something for her brother. What did she buy for her brother? Explain how you know.

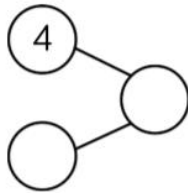
Eva could buy a banana or an apple as they are both 6 p and $4 \text{ p} + 6 \text{ p} = 10 \text{ p}$

A muffin costs 3 p because $6 \text{ p} + 3 \text{ p} = 9 \text{ p}$

Rosie bought her brother two chew bars because $4 \text{ p} + 2 \text{ p} = 6 \text{ p}$ and 1 chew bar is 1 p and nothing else is 2 p

Spicy

1. Using the digits 0 – 9, how many ways can you complete the part-whole model? One of the parts always has to be 4



You can only use each digit once.

Explain why you can't use 0

What other digits can't you use and why?

It could be:

- 4, 1 and 5
- 4, 2 and 6
- 4, 3 and 7
- 4, 5 and 9

You can't use 0 because the whole would have to be 4 and then it would be repeated.

You can't use 8 because if it was a part, the whole would be too big and if it was the whole we would need another 4

- 2.

Theo £10 - £5 = £5, he bought 3 tickets

Aisha £10 - £8 = £2, she bought 5 tickets

Ben £10 - £2 = £8, he bought 1 ticket

$$£10 - £10 = £0$$

If Theo's mum spent £10 she must have bought six tickets (£8 + £2 = £10)



- 3.

Children ring all except stick of cubes and number shapes.

Stick of cubes represents $8 - 3 = 5$ or $8 - 5 = 3$

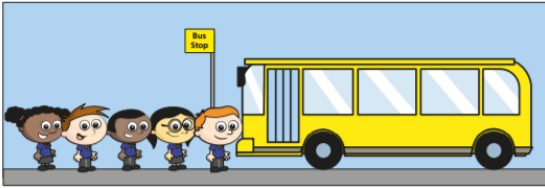
Number shapes represents $6 - 1 = 5$ or $6 - 5 = 1$



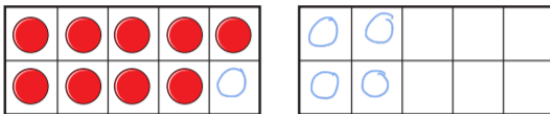
Thursday

Mild

- 1 There are 9 children on the bus.
5 more children get on the bus.



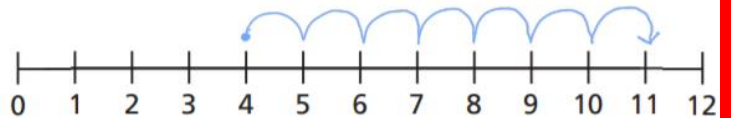
How many children are on the bus now?
Complete the ten frames and the sentences.



$$9 + 5 = 14$$

There are 14 children on the bus now.

- 2 Eva has 4 coins.
Jack gives her 7 more coins.
How many coins does Eva have now?
Draw on the number line and complete the sentences.

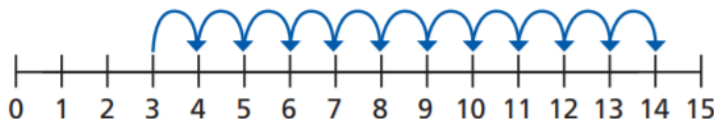


$$4 + 7 = 11$$

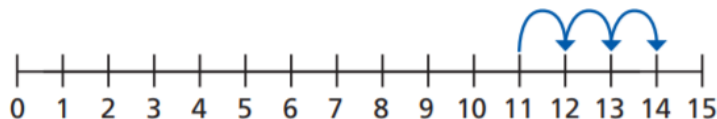
Eva has 11 coins now.

- 3 Ron and Mo are working out $3 + 11$ on a number line.

Ron's method



Mo's method



What is the same and what is different?

The same:

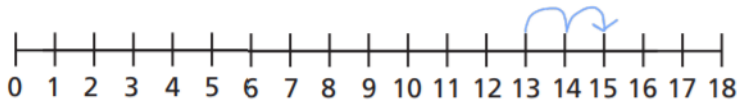
- Both methods give the answer 14
- Both methods use the parts 3 and 11

Different:

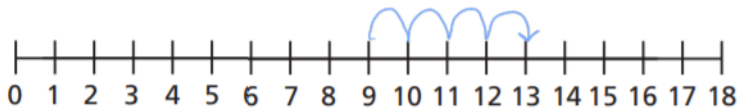
- Ron did $3 + 11$ and Mo did $11 + 3$
- Mo has less jumps than Ron / Ron has more jumps than Mo

Use the number lines to work out the additions.

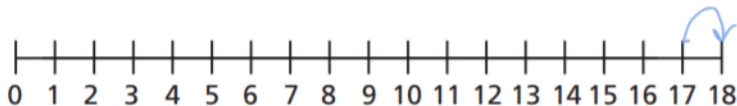
a) $2 + 13 =$ 15



b) $4 + 9 =$ 13



c) $1 + 17 =$ 18



Medium

1. Mo and Jack are working out $11 + 7$
Mo says,



11, 12, 13, 14, 15, 16, 17

Jack says,



12, 13, 14, 15, 16, 17, 18

Use a number line to show who is correct.

Jack is correct as he has counted on 7 steps from 11. Mo has incorrectly included 11 when counting.

2. **False (12)**
3. **True**
4. **9 + 6 circled. Answer: 15**
5. **8 + 5 circled. Answer: 13**

Spicy

1. $11 + 7 = 18$, $13 + 7 = 20$, $8 + 7 = 15$

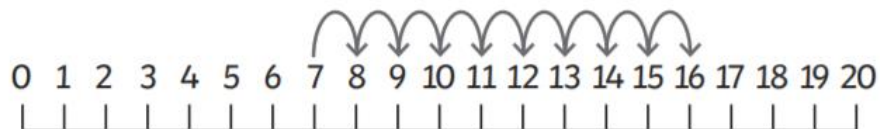
2. $11 + 6 = 17$, $9 + 6 = 15$

3.

Farmer James is incorrect. He started counting on from six rather than seven so his answer is one less than it should be.



Children should draw the correct number line to show that $7 + 9 = 16$.



Shep is incorrect. It doesn't matter whether you start from the greater number or the smaller number as the answer will still be the same. However, it is often easier to start counting from the greater number.

4.

$4 + 12 = 16$



He has 12 sacks outside the barn.

Children create their own counting problems.