Name: \_\_\_\_\_

GCSE (1 - 9)

## **Calculation Problems**

## Instructions

- Use black ink or ball-point pen.
- Answer all questions.
- Answer the questions in the spaces provided
- there may be more space than you need.
- Diagrams are NOT accurately drawn, unless otherwise indicated.
- You must show all your working out.

## Information

- The marks for each question are shown in brackets
- use this as a guide as to how much time to spend on each question.

## **Advice**

- Read each question carefully before you start to answer it.
- Keep an eye on the time.
- Try to answer every question.
- Check your answers if you have time at the end

1	Amelia wants to buy 6 sausage rolls.	
	Each sausage roll costs 84p	
	Amelia pays with a £20 note.	
	(a) Work out how much change Amelia will get from £20.	
	£	
	±	(2)
	(b) When in the shop Amelia finds out that the price of the sausage rolls has been increased.	
	How does this affect the amount of change she will get?	
		•••••
	(Total for question 1 is 2 y	(1)
-	(Total for question 1 is 3 i	mai ks)
2	Ava wants to buy as many chocolate bars as she can.	
	She has £5 to spend on chocolate bars.	
	Each chocolate bar costs £0.35	
	Work out how much change Ava will get from £5.	
	£	
_	(Total for question 2 is 3 i	marks)

Mason wants to	buy 6 pens.				
Each pen costs 2	28p				
Mason pays with	h a £10 note.				
(a) Work out ho	w much char	nge Mason will	get from £10.		
				£.	(2
(b) When in the	shop Mason	finds out that t	the price of the pe	ens has been reduced	
How does this a	ffect the amo	ount of change l	ne will get?		
		•••••			•••••
				(T) + 1.4	(1
				(Total for quest	tion 3 is 3 mark
Mr Blair buys 3	0 pens, 30 ru	lers, 30 pencils	and 30 calculator	rs.	
Mr Blair buys 3	0 pens, 30 ru			rs.	
Mr Blair buys 3	0 pens, 30 ru	Pens Pens	ice List 5 for 85p	rs.	
Mr Blair buys 3	0 pens, 30 ru	Pens Rulers Pencils	ice List	rs.	
Mr Blair buys 3	0 pens, 30 ru	Pens Rulers	ice List 5 for 85p 10 for £2.64	rs.	
Mr Blair buys 3		Pens Rulers Pencils Calculators	5 for 85p 10 for £2.64 6 for 52p £6.25 each	rs.	
		Pens Rulers Pencils Calculators	5 for 85p 10 for £2.64 6 for 52p £6.25 each	rs.	
		Pens Rulers Pencils Calculators	5 for 85p 10 for £2.64 6 for 52p £6.25 each	rs.	
		Pens Rulers Pencils Calculators	5 for 85p 10 for £2.64 6 for 52p £6.25 each	rs.	
		Pens Rulers Pencils Calculators	5 for 85p 10 for £2.64 6 for 52p £6.25 each	rs.	
		Pens Rulers Pencils Calculators	5 for 85p 10 for £2.64 6 for 52p £6.25 each	rs.	
		Pens Rulers Pencils Calculators	5 for 85p 10 for £2.64 6 for 52p £6.25 each	rs.	
		Pens Rulers Pencils Calculators	5 for 85p 10 for £2.64 6 for 52p £6.25 each	rs.	
		Pens Rulers Pencils Calculators	5 for 85p 10 for £2.64 6 for 52p £6.25 each		

5	Mo buys a car.	
	The total cost of the car is £6000	
	Mo pays a deposit of £900 Her then pays 12 equal monthly payments.	
	How much is each monthly payment?	
		£
		(Total for question 5 is 2 marks)
6	Liam goes to a Cafe. He buys  3 coffees for £1.60 each 2 teas for £1.10 each 5 cakes for £2.15 each	
	Work out the total amount that Liam spends.	
		£
		(Total for question 6 is 2 marks)

7	David buys 3 pens and 5 pencils from the stationary shop. The total cost is £1.15.	
	James buys 4 pens for £1.20.	
	Work out how much it would cost to buy 1 pen and 2 pencils.	
		£
		Total for question 7 is 3 marks)
0	2 1 1 4 4 610 40	
8	2 calculators cost £10.40 3 pens cost £3.54	
	Jude wants to buy 30 calculators and 30 pens. He only has £200	
	Does Jude have enough money to buy 30 calculators and 30 pens? You must show how you get your answer.	•
		TD 4 16 4 4 4 5 5
		Total for question 15 is 4 marks)

9	A piece of string is 350 cm long.	
	John cuts three 40 cm lengths off the string. He then cuts the rest into as many 35 cm lengths as possible	2.
	Work out how many 35 cm lengths of string John cuts.	
		(Total for question 9 is 3 marks)
		(Total for question 9 is 3 marks)
 10	Molly gets paid £9.20 for each hour she works from Monda She gets paid £11.40 for each hour she works on Saturday.	
10	Molly gets paid £9.20 for each hour she works from Monda She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.
10	She gets paid £11.40 for each hour she works on Saturday.  Last week Molly worked 12 hours from Monday to Friday	ny to Friday.

11	Aiden wants to buy a chocolate bar for every student in year 7.
	There are 110 students in year 7.
	A pack of 6 chocolate bars costs £1.20
	Work out how much Aiden will have to pay for the chocolate bars.
	£
	(Total for question 11 is 3 marks)
12	Noah and Mia saved a total of £482. Mia saved £34 more than Noah.
	How much did Noah save?
	£
	(Total for question 12 is 2 marks)

Abigail has boiled a kettle. She has 1.7 litres of water.	
Abigail wants to make as many cups of tea as possible. For each cup of tea she needs 200ml of water.	
How many cups of tea an Abigail make?	
	(Total for question 13 is 3 marks)
A shop sells washing powder in 650g packs.	
Jacob has no washing powder. He estimates that he does 2 washes a week, using 40g each wash	n.
Jacob wants to buy enough washing powder for 13 weeks.	
How many packs of washing powder does Jacob need to buy?	
	(Total for question 14 is 3 marks)
	She has 1.7 litres of water.  Abigail wants to make as many cups of tea as possible. For each cup of tea she needs 200ml of water.  How many cups of tea an Abigail make?  A shop sells washing powder in 650g packs.  Jacob has no washing powder.  He estimates that he does 2 washes a week, using 40g each wash Jacob wants to buy enough washing powder for 13 weeks.