



St **Dunstan's**  
College

St Dunstan's College

11+ Entrance Examination **SAMPLE**

**Subject:** Mathematics

**Date:**

**Length of examination:** 40 Minutes

FIRST NAME: \_\_\_\_\_

SURNAME: \_\_\_\_\_

## Instructions

Answer **ALL** questions in booklet.

You may **not** use a calculator to answer any questions in this paper.

Work as quickly and as carefully as you can.

If you cannot do one of the questions, **go on to the next one**. You can come back to it later, if you have time.

In some questions marks will be awarded for correct methods, so do try to **show your methods** when possible.

If you finish before the end, go back and check your work.

<b>SCORE</b>

- 1) Each card on the left matches one on the right.  
Draw lines to match the cards which are **equal** in value. One has been done for you.

$3 \times 6$   $2 \times 25$

$10 \times 5$   $9 \times 2$

$5 \times 8$   $50 \times 2$

$9 \times 10$   $3 \times 30$

$5 \times 20$   $10 \times 4$

(Total 2 marks)

- 2) Write in the missing numbers.

$150 + \square = 500$

$172 - \square = 60$

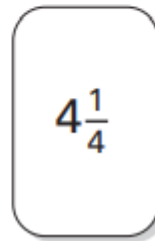
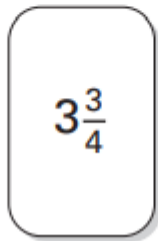
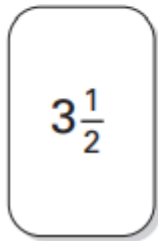
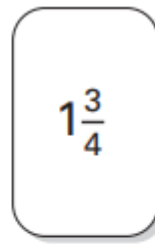
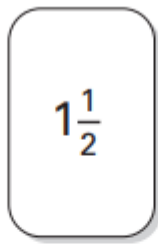
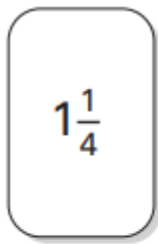
(Total 2 marks)

- 3) Circle two numbers which **add** to make **0.12**.

$0.1$   $0.5$   $0.05$   $0.7$   $0.07$   $0.2$

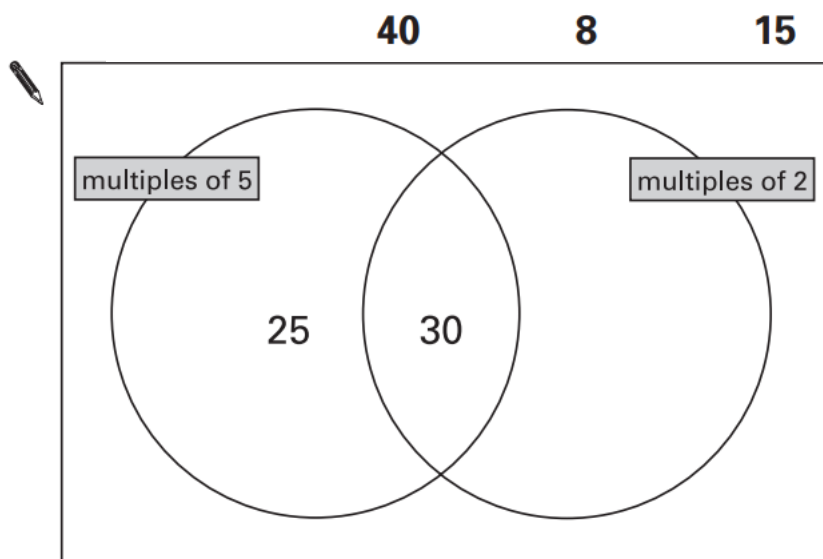
(Total 1 mark)

4) Tick (✓) **two** cards that give a **total of 5**



(Total 1 mark)

5) Write each of these numbers in its correct place on the sorting diagram.



(Total 2 marks)

6) Write in the missing digits.

A pencil icon is to the left of the equation. The equation is:  $\begin{array}{|c|c|c|} \hline 4 & \square & 4 \\ \hline \end{array} + \begin{array}{|c|c|c|} \hline 3 & 8 & \square \\ \hline \end{array} = \begin{array}{|c|c|c|} \hline 8 & 5 & 1 \\ \hline \end{array}$

(Total 2 marks)

7) This table shows the number of children who went walking, sailing or climbing at an outdoor centre:

	May	June	July
walking	25	80	75
sailing	15	42	50
climbing	18	27	23

How many children went **sailing** in **May, June and July** altogether?

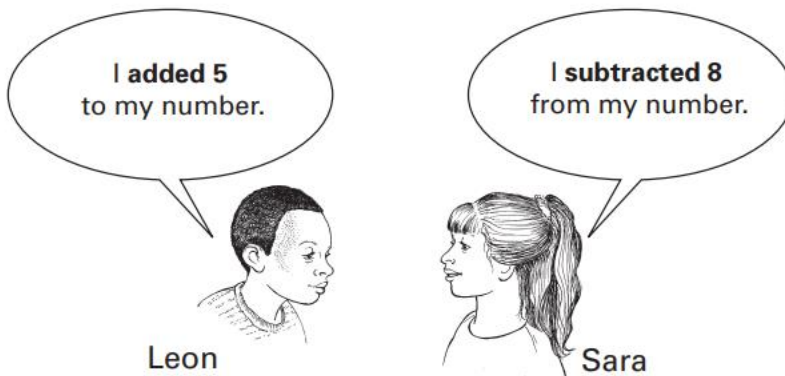


How many **more** children went **walking** in **June** than **climbing** in **June**?



(Total 2 marks)

8) Leon and Sara each started with **different** numbers.



started with?

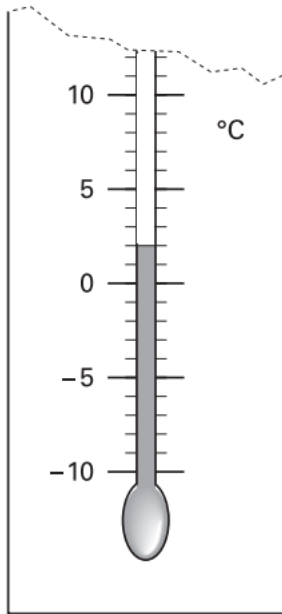
Leon and Sara both get the **same** answer.

What numbers could they have

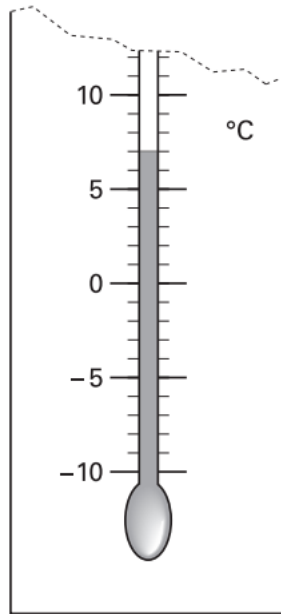
 Leon Sara 

(Total 1 mark)

9) These are the temperatures in York and Rome on a day in winter.



York



Rome

How many degrees **colder** is it in York than in Rome?

  °C

On another day the temperature in York is 4°C. Rome is 7 **degrees colder** than York.  
What is the temperature in **Rome**?

  °C

(Total 2 marks)

10)



Choose **three** of these number cards to make an **even** number that is **greater than 400**



(Total 1 mark)

11)

A sequence starts at **500** and **80** is **subtracted** each time.

500    420    340 ...

The sequence continues in the same way.

Write the **first two numbers** in the sequence which are **less than zero**.



(Total 2 marks)

12) Circle the two decimals which are **closest in value** to each other.

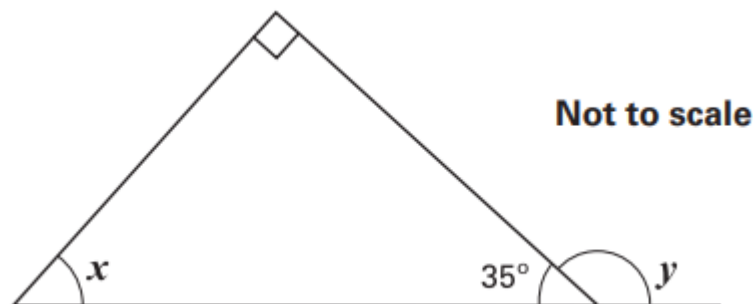


0.9    0.09    0.99    0.1    0.01

(Total 1 mark)

13)

Look at this diagram.



Calculate the size of angle **x** and angle **y**.

Do not use a protractor.

**x** =  °

**y** =  °

(Total 2 marks)

14)

This number sequence follows the rule

***'subtract 10, then divide by 10'***

Write the **two numbers** missing from the sequence.



120

11

0.1

(Total 2 marks)

15)

Dan has a bag of seven counters numbered **1 to 7**

Abeda has a bag of twenty counters numbered **1 to 20**

Each chooses a counter from their own bag without looking.

For each statement, put a tick (✓) if it is **true**. Put a cross (X) if it is **not true**.



Dan is **more likely** than Abeda to choose a '**5**'

They are both **equally likely** to choose  
a **number less than 3**

Dan is **more likely** than Abeda to choose  
an **odd number**.

Abeda is **less likely** than Dan to choose a '**10**'

(Total 2 marks)

16)



6 green apples for 75p



10 red apples for 90p

Jason bought some bags of green apples and some bags of red apples.

He spent **£4.20**

How many **bags** of each type of apple did he buy?

**bags of  
green apples**

**bags of  
red apples**

Nika and Hassan bought some bags of apples.

Nika says,

***'I bought more apples than Hassan, but I spent less money.'***

Explain how this is possible.

---

---

---

**(Total 3 marks)**



17) There are 25 children in the lunch queue, including Nik.

Nik says,

‘There are twice as many children in front of me as there are behind me’.

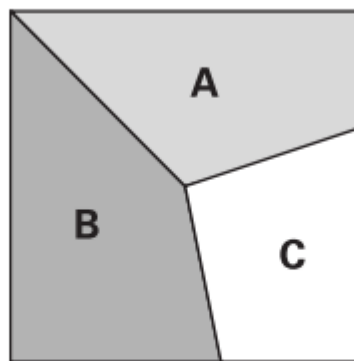
How many children are in front of Nik?

children
----------

(Total 2 marks)

18)

This square is divided into three parts.



Part **A** is  $\frac{1}{3}$  of the area of the square.

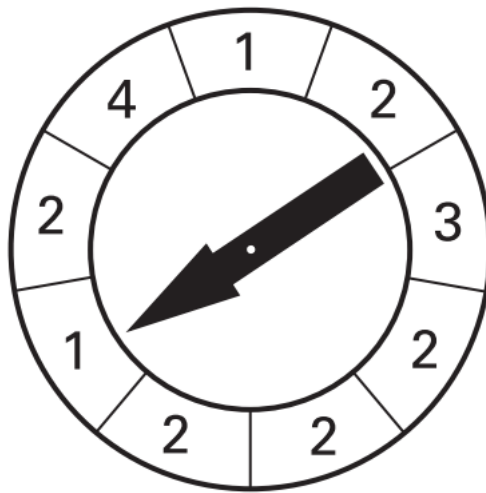
Part **B** is  $\frac{2}{5}$  of the area of the square.

What fraction of the area of the square is in part **C**?

--

(Total 2 marks)

19) This spinner is divided into **nine** equal sections.



Which **two different numbers** on the spinner are equally likely to come up?



and
-----

Meera says, '**2 has a greater than even chance of coming up.**'

Explain why she is correct.

---

---

---

(Total 2 marks)

20). Here is an equation.

$$m - 2n = 10$$

When  $n = 20$  what is the value of  $m$ ?



$$m = \underline{\hspace{2cm}}$$


When  $m = 20$  what is the value of  $n$ ?



$$n = \underline{\hspace{2cm}}$$

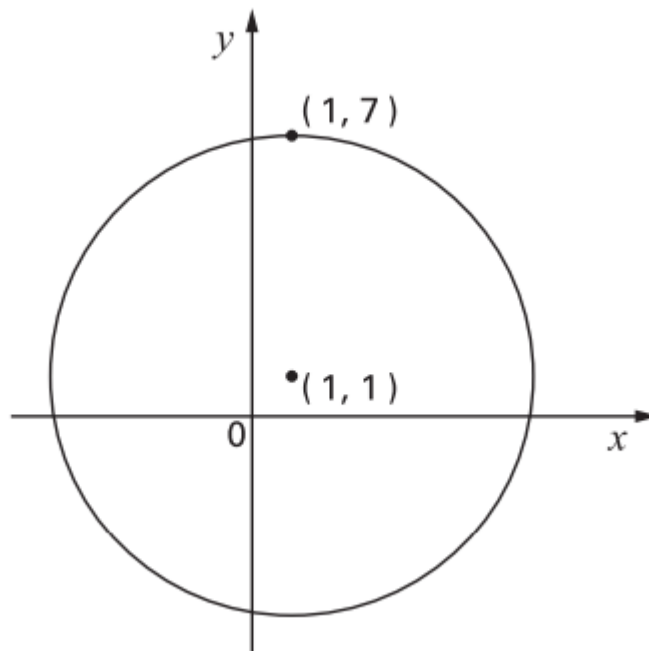
(Total 2 marks)

1) Write **two decimals**, each less than 1, which multiply to make **0.1**.


  ×  = 0.1

(Total 1 mark)

2) Here is a circle with its **centre** at the point **(1,1)**.  
The point **(1,7)** is on the circumference of the circle.



For each of these points, put a tick (✓) to show if it is **inside** the circle, **on** the circle or **outside** the circle. One has been done for you.



	<b>inside the circle</b>	<b>on the circle</b>	<b>outside the circle</b>
<b>(3, 7)</b>			✓
<b>(7, 1)</b>			
<b>(1, -7)</b>			
<b>(-2, -2)</b>			

(Total 3 marks)

**END OF TEST**

**Please go back and check your work.**