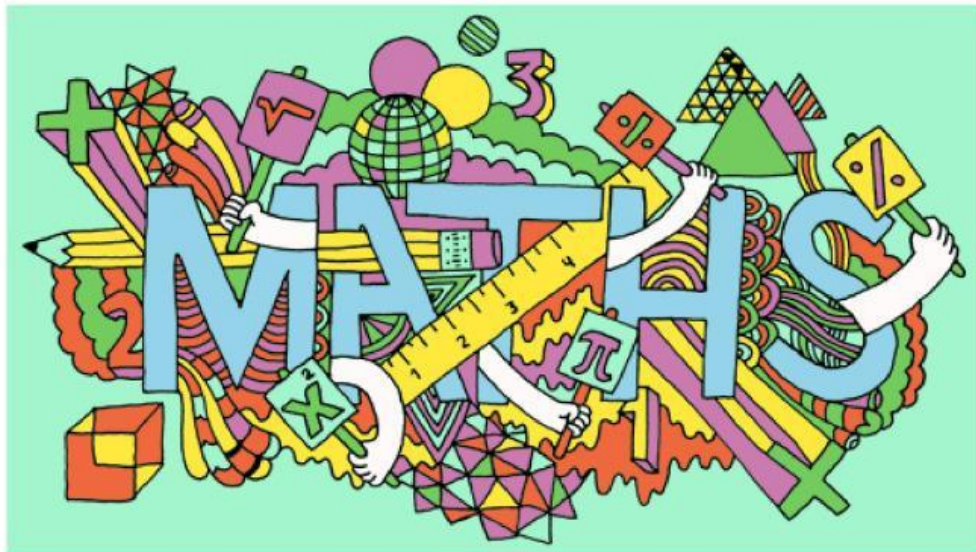




# Maths Department

## Pre-test Practice **Mk 6**

Number logic, areas and perimeters, shapes, number sequences, ratio



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

Question 1

189 bags of sand each weigh 48 kg. What is the total mass of the sand?

231 kg

141kg

9072 kg

978 kg

98 kg

Question 2

In Canada a coin called a quarter is 25 cents. How many quarters are there in \$7.75?

31

30

29

28

27

Question 3

Which of these IS a prime number?

1275

1277

1278

1281

1290

Question 4

If  $24 \times 36 = 864$ , what is the value of  $2400 \times 0.36$ ?

864

86400

8.64

86.4

8640

Question 5

What is the next number in the sequence?

1      8      27      64      \_\_\_\_\_

81

100

121

125

144

Question 6

What is the next number in the sequence?

225      196      169      144      \_\_\_\_\_

132

121

100

81

64

Question 7

What is a half of half of a half?

$\frac{1}{2}$

$\frac{1}{4}$

$\frac{1}{6}$

$\frac{1}{8}$

$\frac{1}{16}$

Question 8

The perimeter of a rectangle is 440 cm. What is the sum of the length and the width?

440 cm

220 cm

110 cm

880 cm

55 cm

Question 9

The dimensions of a rectangle are 210 cm by 490 cm. What is the perimeter of the rectangle?

1400 cm

700 cm

12,600 cm<sup>2</sup>

102,900 cm<sup>2</sup>

102,900 cm

Question 10

A square has an area of  $144 \text{ cm}^2$ . What is its perimeter?

48 cm

12 cm

$12 \text{ cm}^2$

$48 \text{ cm}^2$

24 cm

Question 11

A square has a perimeter of 100 cm. What is its area?

25 cm

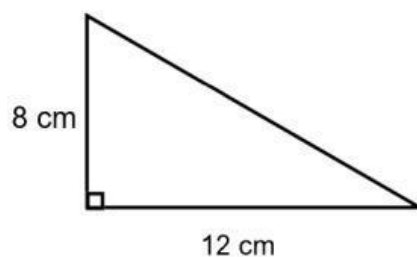
625 cm

$25 \text{ cm}^2$

$625 \text{ cm}^2$

$625,000 \text{ cm}^2$

Question 12



What is the area of the triangle?

$24 \text{ cm}^2$

$96 \text{ cm}^2$

96 cm

48 cm

$48 \text{ cm}^2$

## Question 13

I make a fence by digging in ten posts in a straight line. There are five metres between each post. How far is it from the first post to the last?

50 m

55 m

15 m

45 m

50 m<sup>2</sup>

## Question 14

Gemma and Liv share their winnings in a ratio of 7 : 3. If Gemma gets £21, how much do they share in total?

£10

£21

£30

£9

£51

## Question 15

Sheila and Jeannie share the driving in a ratio of 5 : 3. If Sheila drives 40 km more than Jeannie, how far did Jeannie drive?

100 km

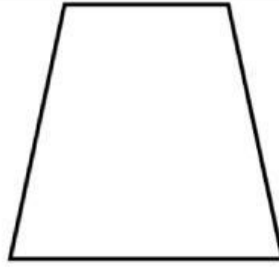
160 km

8 km

60 km

80 km

Question 16



What is the exact name of this shape?

rhombus

quadrilateral

isosceles

trapezium

Isosceles  
trapezium

Question 17



How many lines of symmetry does this ellipse have?

0

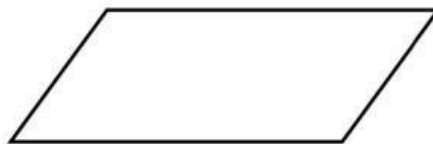
1

2

3

an Infinite number

Question 18



What is the order of rotational symmetry of a parallelogram?

0

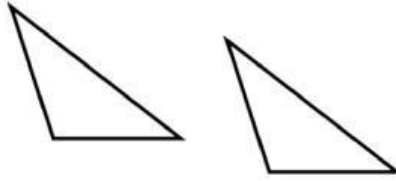
1

2

4

8

Question 19



What word best completes the sentence: the two shapes shown are \_\_\_\_\_ .

regular

congruent

quadrilaterals

right angled

isosceles

Question 20

What is the perimeter of a regular decagon of side 5.5 cm?

50 cm

10 sides

55 cm<sup>2</sup>

5.5 cm

55 cm