

KENDRIYA VIDYALAYA SANGATHAN JAIPUR REGION  
SESSION ENDING EXAMINATION 2025-26  
CLASS - VIII SUBJECT – MATHS SAMPLE PAPER

MAX. MARKS – 60

DURATION 2:30 Hrs

**Section A - (MCQ- 10 Questions of 1 marks each)**

1	What is the digital root of 489711: a) 5                      b)7                      c)3                      d) 2	1
2	If $31z5$ is a multiple of 9, Where $z$ is a digit .What is the value of $z$ ? a) 9                      b) 9 and 0                      c) 0                      d) 1	1
3	$(a + b)^2 - (a - b)^2 =$ a) $2((a^2 + b^2))$ b) $2ab$ c) $(a^2 + b^2)$ d) $4ab$	1
4	Expand the products: $(5 + z)(y + 9)$ (a) $5z + 45 + yz + 9y$ (b) $5y + 45 + yz + 9z$ (c) $z + 45 + yz + 9y$ (d) $5z + 45 + yz + y$	1
5	If $a, b, c$ & $d$ are in proportion , then a) $ac = bd$ b) $ad = b$ c) $ab = cd$ d) none of these	1
6	The simplest form of ratio $24 : 80$ is a) $3 : 6$ b) $3 : 8$ c) $3 : 10$ d) $4 : 10$	1
7	Fill in the blank:- $40 \text{ cm} : 70 \text{ cm} = 16 \text{ kg} : \underline{\hspace{2cm}}$ a) 13 kg                      b) 28kg                      c) 8 k                      d) 24kg	1
8	Pranavi has 25 marbles, of which 15 are white. What percentages of her marbles are white? a) 10%                      b) 15%                      c) 25%                      d) 60%	1
9	Fill in the blanks: 3 is ----- % of 300 a) 2                      b) 3                      c) 1                      d) 4	1
10	Find the hypotenuse of an isosceles right triangle whose equal sides have length 12 a) Between 16 and 17                      b) Between 15 and 16 c) Between 17 and 18                      d) Between 19 and 20	1

**Section B - ( 5 Questions of 2 marks each)**

11	The sum of four consecutive numbers is 34. What are these numbers?	2
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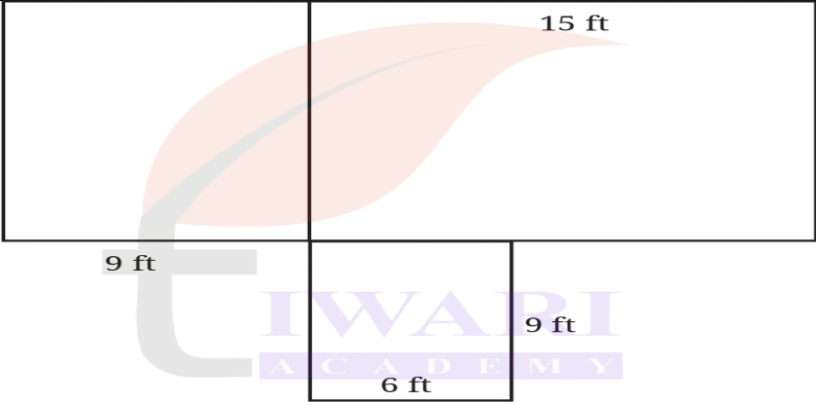
12	Find the product of the following binomials:  $(\frac{1}{2}x - \frac{1}{5}y)(\frac{1}{2}x - \frac{1}{5}y)$	2
13	A car travels 240 km using 20 litres of petrol. How many kilometres will it travel using 35 litres of petrol at the same rate?	2
14	If a shopkeeper buys a geometry box for ₹75 and sells it for ₹110, what is his profit margin with respect to the cost?	2
15	Find the side length of a rhombus whose diagonals are of length 24 unit and 70 units.	2

**Section C - ( 4 Questions of 3 marks each)**

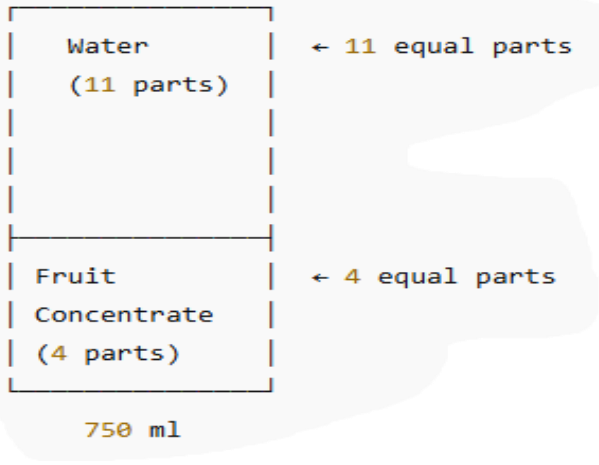
16	The sides of a triangle are in the ratio 1: 3: 5 and the perimeter of the triangle is 90cm. Find the length of largest and smallest sides of the triangle.	3
17	How many multiples of 9 are there between the numbers 4300 and 4400?	3
18	Find $406^2$ and $99^2$ using suitable identities	3
19	Surya wants to use a deep orange colour to capture the sunset. He mixes some red paint and yellow paint to make this colour. The red paint makes up $\frac{3}{4}$ of this mixture. (i) What percentage of the colour is made with red (ii) What percentage of the colour is made with yellow. (iii) What is the fraction of yellow part?	3

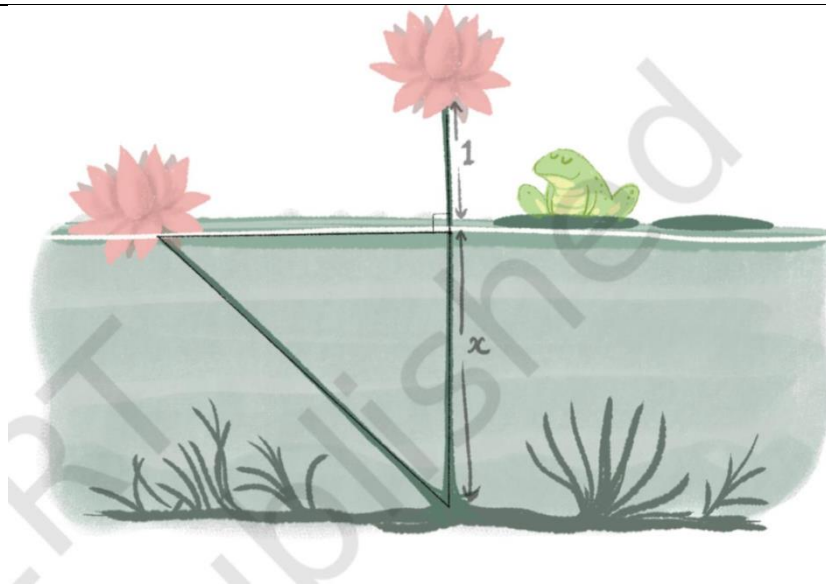
**Section D - ( 4 Questions of 5 marks each)**

20	If $m-n=16$ and $m^2+n^2=400$ , then find $mn$ . Also find the value of $(m+n)^2 = ?$ and $(m+n)^2 - (m-n)^2 = ?$	5
21	Find three numbers that leave a remainder of 2 when divided by 3 and also a remainder of 2 when divided by 4. Write an algebraic expression to describe all such numbers.	5
22	A mason is building a house in the shape shown in the diagram. He needs to construct both the outer walls and the inner wall that separates two rooms. To build a wall of 10-feet, he requires Approximately 1450 bricks. How many bricks would he need to build the house? Assume all walls are of the same height and thickness	5

		
23	<p>If a right-angled triangle has a short side of length 3 cm and hypotenuse of length 5 cm, what is the length of the third side? Again, try drawing the triangle and measuring, and then find your answer using Baudhayana's Theorem</p>	5

**Section E- ( 2 Question of 4 marks each ) ( case study based question )**

24	 <p>To prepare a <b>fruit squash drink</b>, the ratio of <b>fruit concentrate to water</b> is <b>4 : 11</b>. If <b>750 ml</b> of the drink is to be prepared, answer the following:</p> <p>(i) What percentage of the mixture is <b>fruit concentrate</b>?</p> <p>(ii) What percentage of the mixture is <b>water</b>?</p> <p>(iii) How much <b>fruit concentrate</b> is required?</p> <p>(iv) How much <b>water</b> is required?</p>	1 1 1 1
25	<p>In a lake surrounded by chakra and krauñcha birds, there is a lotus flower peeping out of the water, with the tip of its stem 1 unit above the water. On being swayed by a gentle breeze, the tip touches the water 3 units away from its original position. Answer the following questions</p>	



- 1) Find the hypotenuse.
- 2) Find the other two sides.
- 3) Find the depth of lake.

1  
2  
1