



GRADE 6

MATHEMATICS

School Level Examination (SLE) 2025

SUBJECT CODE

2

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1

Total Questions: 40

Total Marks: 40

Time: 1 Hour

DO NOT OPEN THIS BOOKLET UNTIL INSTRUCTED TO DO SO

- Carefully fill in your **Name, Class, Roll Number**, and other required details on the **OMR Answer Sheet**.
- Use **only an HB pencil** to fill the OMR Answer Sheet.
- All questions are **compulsory** and carry **one mark** each.
- Only **OMR Answer Sheets** will be evaluated.
- There is **no negative marking** for incorrect answers.
- You may use the **last page** of the question paper for **rough work**.
- **Digital devices** like calculators, smart watches, or mobile phones are **not allowed**.
- After the exam, **submit** both the **OMR Answer Sheet** and the **Question Paper** to the invigilator.

This question paper contains a total of 40 questions, divided into three sections: A, B, and C.

Section A (Logical Reasoning)

1. Anil goes 30 m South, then turns left and walks 40 m, then again turns left and walks 20 m, then again turns left and walks 40 m. How many metres is he from his original position?
(A) 30 m (B) 10 m (C) 20 m (D) 60 m

2. Series A and B follow a certain pattern.

Series A: 8632, 2368, 6264

Series B: 6642, 2466, 4176

Series C: _____, _____, _____

On the same basis, find out the correct answer for the Series C.

- (A) 7461, 1647, 5184 (B) 7164, 1647, 5157 (C) 7641, 1467, 6174 (D) 7146, 1647, 5679

3. In the given matrix, which number should replace X?

(A) 2

(B) 4

(C) 8

(D) 9

4	5	25
5	8	48
6	X	14

4. A man pointing to a photograph says, "The lady in the photograph is my nephew's paternal grandmother." How is the lady in the photograph related to the man's brother's wife who has no other brother?
(A) Mother (B) Sister in law (C) Mother in law (D) Data inadequate
5. In a certain language 458 means "All is well," 876 means "Well done boys" and 689 means "Boys played well". What does 'played' mean in this language?
(A) 9 (B) 8 (C) 7 (D) 6

6. Which of the following interchange of signs and numbers would make the given equation correct?

$$20 \times 2 - 3 \div 4 + 1 = 0$$

(A) $\div$ and $\times$, 2 and 4

(B) $+$ and $-$, 2 and 4

(C) $\div$ and $\times$, 2 and 1

(D) $+$ and $-$, 3 and 4

7. Find the option that would replace the question mark (?) to establish the analogy:

TABLE : 16 23 24 8 1 :: CHAIR : ?

(A) 25 3 23 4 12

(B) 16 24 23 7 1

(C) 3 8 19 1 8

(D) 25 4 23 5 14

8. Six friends, A, B, C, D, E, and F are sitting in a row facing north. Seating arrangements are as follows:

Two persons sit between C and F, and neither of them is sitting at the extreme ends.

D sits third to the right of B.

B is an immediate neighbour of C.

A is at an extreme position, sitting at one of the positions to the right of E.

Who sits third to the left of A?

(A) A

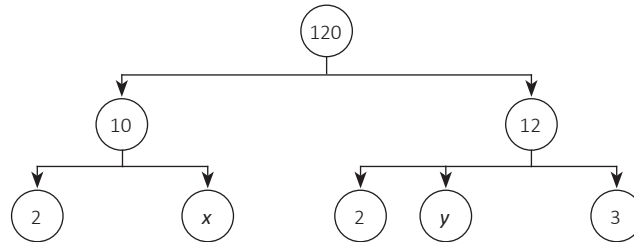
(B) D

(C) E

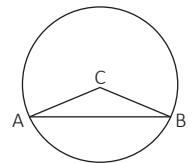
(D) C

Section B (Subject Specific)

9. When rounded off to the nearest hundred, the number 85642 is
 (A) 85700 (B) 85640 (C) 85000 (D) 85600
10. The successor of the largest 3-digit number is _____.
 (A) 998 (B) 999 (C) 1000 (D) 1001
11. $2000 - 25 \div 5 =$ _____
 (A) 395 (B) 1995 (C) 375 (D) 16
12. For the given factor tree, find the LCM of x and y .

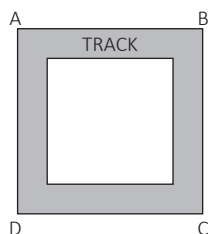


- (A) 1 (B) 2 (C) 10 (D) 5
13. The least number when divided by 12 and 18 gives the same remainder as 3, then the number is
 (A) 6 (B) 36
 (C) 39 (D) 42
14. If 1 is subtracted from an improper fraction, then the new fraction will be
 (A) Proper (B) Improper
 (C) Like fraction (D) Either proper or improper
15. The expanded form of $(-a)^5$ is _____.
 (A) $a \times 5$ (B) $(-a) \times (-a) \times (-a) \times (-a) \times (-a)$
 (C) $a + a + a + a + a$ (D) $a \div 5$
16. Number of lines which can be drawn passing through two given points is
 (A) 1 (B) 2 (C) 3 (D) An infinite number
17. In the given figure, there is a circle with centre at C. If reflex $\angle ACB = 240^\circ$, find the measure of $2\angle CAB$.
 (A) 120° (B) 30°
 (C) 60° (D) 100°



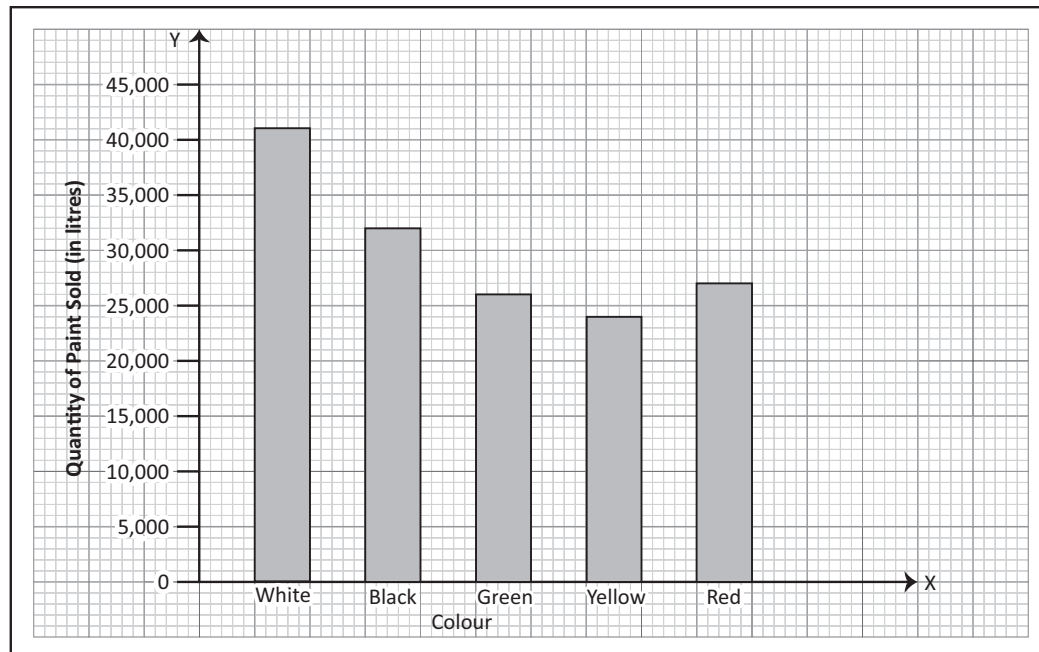
18. What is the difference between the greatest and smallest numbers, which when rounded off to the nearest hundreds become 5,300?
 (A) 99 (B) 100 (C) 97 (D) 101

19. How much does 2 exceed $-3a - 2b - 3$?
 (A) $5 - 3a + 2b$ (B) $5 - 3a - 2b$
 (C) $-5 - 3a - 2b$ (D) $5 + 3a + 2b$
20. If you are at 8 on the number line, by what distance should you move to reach the integer -5 ?
 (A) 5 (B) -13
 (C) 13 (D) 3
21. Which of the following is an equation with a variable?
 (A) $5 \times 4 - 8 = 2x$ (B) $7 = (11 \times 5) - (12 \times 4)$
 (C) $z + 12 > 24$ (D) $m > z$
22. ABCD is a square playground with a track inside. If the width of the track is 1 metre, and the area of inner square is 64 sq m, then the perimeter of the playground is



- (A) 40 metres (B) 32 metres
 (C) 36 metres (D) 100 metres
23. If the smallest angle of a parallelogram is half of the largest, then half the difference of the two base angles is
 (A) 120° (B) 60°
 (C) 30° (D) 90°
24. A father has three children (triplets). The father's age is three times that of one son. After four years, the average age of all four people will be 22 years. Find the sum of the father's and one son's age after 10 years.
 (A) 68 years (B) 60 years
 (C) 48 years (D) 80 years
25. Which of the following is true?
 I. The commutative law applies to subtraction of integers.
 II. If $a - b$ is an integer, then $b - a$ is always a whole number.
 III. If a negative integer is multiplied odd number of times, then it becomes positive.
 IV. 5 movements required to reach +3 floors from -2 floors.
 (A) I (B) II
 (C) III (D) IV

26. The following chart represents the quantity of acrylic paint sold (in litres) in a country every year.



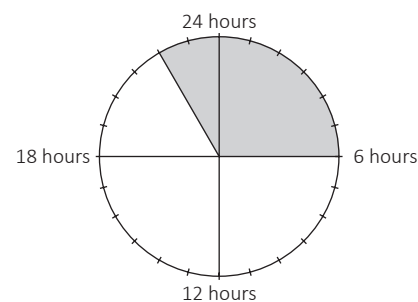
The difference between the quantity of white colour and yellow colour paints is

- (A) 15,000 litres (B) 16,000 litres
 (C) 17,000 litres (D) 18,000 litres
27. Let ABCD be a rectangular cloth of length 8 units and breadth 1 unit. A triangular portion is cut from one corner, having a base of 1 unit and a height of 1 unit. How many such triangles can be cut, and what is the ratio of the area of 4 such triangles to the area of the whole rectangle?
- (A) 16, 1 : 8 (B) 8, 1 : 8 (C) 1, 1 : 4 (D) 16, 1 : 4
28. Kritika buys 25 square tiles, each of side 2 metres. She lays them out in the form of a square and then in the form of a cross. Which arrangement has a greater perimeter, and by how much?
- (A) Square shaped, 40 m (B) Cross shaped, 64 m
 (C) Both have same perimeter (D) Cross shaped, 104 m

Instruction: Q. 29 to 33 are two-key-based questions, having four options A, B, C, and D out of which TWO are correct.

29. An equilateral triangle can have
- (A) Reflection symmetry (B) Only reflection symmetry
 (C) Only rotational symmetry (D) Rotational symmetry
30. Two supplementary adjacent angles always form
- (A) A linear pair (B) Two obtuse angles
 (C) Interior angles (D) A straight line

31. Sleeping time of student A in a 24 hour clock is represented by the shaded portion in figure.

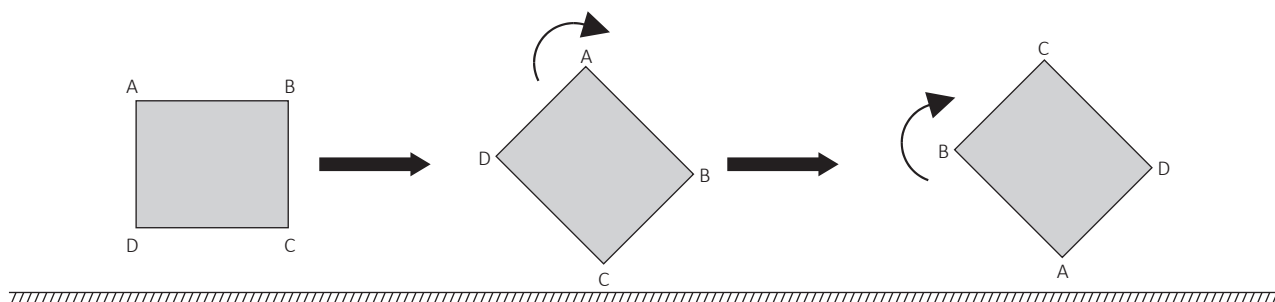


The ratio of sleeping time to waking time is

- (A) 1 : 2 (B) $\frac{\frac{1}{3}\text{rd area of whole circle}}{\frac{2}{3}\text{rd area of whole circle}}$
- (C) 1 : 3 (D) $\frac{\frac{1}{2}\text{ area of whole circle}}{\frac{1}{3}\text{ area of whole circle}}$
32. Rohan lives on the 5th floor of 25 floor building having two floors in basement for parking. To go to the first basement through lift to take his car,
- He needs to go -6 movement by considering his floor as Zero.
 - He needs to go -5 movement by considering his floor as Zero.
 - He needs to go $+6$ movement by considering his floor as Zero.
 - He will press (-1) button in the lift for this
- (A) I (B) II (C) III (D) IV
33. A circle of radius r is folded into two equal halves and then cut along the crease to obtain a semicircle. Which of the following statements is/are true?
- The diameter of the resulting figure is halved.
 - The measure of half a circle is 180° .
 - Perimeter of the resulting figure is $(\pi r + 2r)$.
 - Perimeter of the resulting figure is πr .
- (A) I (B) II (C) III (D) IV

Section C (Competency Enhancement)

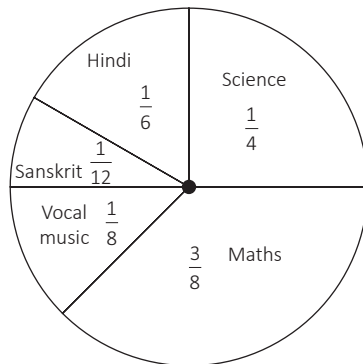
Directions (34 to 36): A rectangle ABCD, having length 12 units and breadth 10 units, is rotating along a horizontal line. After 5 rotations, it stops.



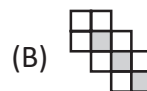
34. Find the distance covered in horizontal line.
- (A) 220 units (B) 44 units (C) 600 units (D) 120 units

35. If the distance covered by the above rectangle is the perimeter of a square, then the length of square is
 (A) 55 units (B) 11 units (C) 150 units (D) 30 units
36. If the same distance is moved by one revolution of a circular wheel, then the radius of the wheel will be
 (A) 35 units (B) 70 units (C) 17.5 units (D) 60 units

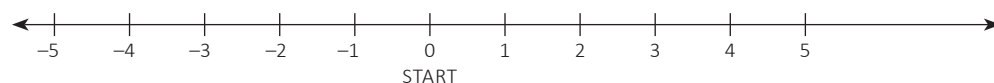
Directions (Q. 37 to 38): A survey was conducted among 120 students studying in Class VI of a school to find out what subjects they preferred. The data is shown below as a fractional diagram. Using this information, answer the following questions.



37. How many students prefer Hindi?
 (A) 15 (B) 45 (C) 30 (D) 20
38. The ratio between the number of students who prefer vocal music to the number of students who prefer maths is
 (A) 1 : 3 (B) 2 : 9 (C) 2 : 3 (D) 4 : 9
39. Which of the following figures represents 0.3?



40. In a game of treasure hunting, the treasure is kept at some point (a positive integer) on a number line. To reach the treasure, a student chooses a jump size, and he or she can only jump in multiples of the chosen jump size. If treasure is kept at 36, what will not be the jump size?



- (A) 9 (B) 10
 (C) 12 (D) 3



SPACE FOR ROUGH WORK