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P.T. 1 EXAMINATION (2022-23)
SUBJECT: MATHEMATICS
CLASS: VIII

MAX. MARKS:40   **DURATION: 1.30 HRS**

All questions are compulsory.

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Section A
Question N0. 1 to 4 are M.C.Q. Choose the correct option. Each question carries 1 mark.

1. Additive inverse of a is

   (a) -a   (b) 0   (c) $\frac{1}{a}$ (d) $-\frac{1}{a}$

2. Value of x in 2x – 3 =7

   (a) 5   (b) – 5   (c) $\frac{1}{5}$ (d) $\frac{-1}{5}$
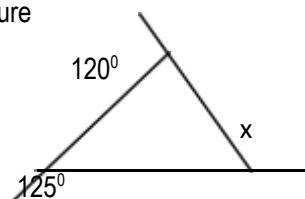
3. Sum of interior angles of a Quadrilateral is

   (a) 90^0 (b) 180^0 (c) 360^0 (d) 540^0

4 Maximum exterior angle possible for a regular polygon is

   (a) 60^0 (b) 120^0 (c) 30^0 (d) 180^0

Question N0. 5 to 8 carries 2 mark each.

5. Find x in the given figure

6. A rational number is represented in the form $\frac{p}{q}$, $where$ $q \neq 0$. There are infinite rational numbers between two rational

   Numbers.

   Write a rational number between $\frac{1}{2}$ and $\frac{3}{4}$

7. For verification in mathematics we need to solve LHS and RHS individually and if the results are of both sides are

   Same then problem verified

   Verify   - (-x)=x   for x= $\frac{-13}{17}$

8. If you subtract $\frac{1}{2}$ from a number and multiply the result by $\frac{1}{2}$,you get $\frac{1}{8}$. What is the number?

Section B
Question N0. 9 to 11 are very short type Questions, Each question carries 1 mark.

9. Can a quadrilateral ABCD be a parallelogram if AB=DC= 8cm AD= 4 cm and BC= 4.4 cm?

10. Solve for x

$$4x + 3 = 6 + 2x$$

11. Multiply $\frac{6}{13}$ by the reciprocal of $\frac{-7}{16}$.

Question N0. 12 to 13 are Fill in the Blanks, Each question carries 1 mark.

12. Reciprocal of - 1 is ....

13. Sum of interior angles of a polygon with n sides is ....

Question N0. 14 to 16 are True / False Questions, Each question carries 1 mark.

14. Value of x in 7x – 9 =16 is 2

15. $\frac{-8}{9}$ is the multiplicative inverse of $-\ 1\frac{1}{8}$.

16. Each exterior angle of a regular polygon of 15 sides is 24^0.

Section C

17. Find $\frac{2}{5} \times \frac{-3}{7} - \frac{1}{14} - \frac{3}{7} \times \frac{3}{5}$ (5)

18. Write two rational numbers between $\frac{-3}{2}$ and $\frac{5}{3}$ (2)

19. Solve for x

$$\frac{2x}{3} + 1 = \frac{7x}{15} + \frac{1}{2}$$ (3)

20. One of the two digits of a two digit number is three times the other digit. If you interchange the digits of this two

    digit number and add the resulting number to the original number, you get 88. What is the original number? (5)

21. Two adjacent angles of a parallelogram are in the ratio 3 : 2. Find the measure of each angle of parallelogram. (2)

22.Explain how a square is

  (i) a quadrilateral

  (ii) a parallelogram

  (iii) a rectangle   (3)