



SECTION-A (1X6=6)

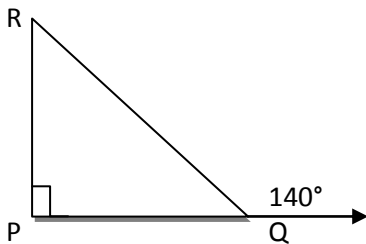
- Decimal form of $-\frac{24}{25}$ is _____ .
a) -2.4 b) -0.96 c) -9.6 d) -94
- In 2^6 , the exponent and power are
a) 6&2 b) 2&6 c) 2&2 d) 6&6
- If S.P. > C.P., then there will be _____ .
a) Profit b) no loss and no profit c) loss
- How many terms are there in $2x - 3y + x$
a) 3 b) 2 c) 4 d) 1
- Intersecting point of 3 altitude of a triangle is _____ .
a) Orthocenter b) circumcentre c) median d) incentre
- Mode of the data 5, 5, 2, 3, 2, 6, 2, 4, 5, 8 is
a) 2 b) 3 c) 4 d) 8

SECTION -B (2x6=12)

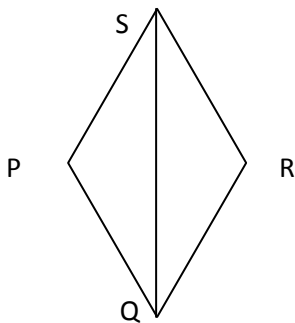
- Find two rational numbers between $\frac{3}{2}$ & $\frac{5}{3}$.
- Find the value of $[4^2 - 3^2] \div (1/7)^2$.
- Solve for x and check

$$\frac{3x}{5} + \frac{2}{5} = 1$$

- In the given triangle find the measurement of $\angle PQR$



- In the following figure $PS=RS$ and $PQ=RQ$, then show that $\triangle PQS \cong \triangle RQS$



- Find the Area of a triangle which Base = 12cm and Altitude=6cm.

SECTION -C (3x10=30)

- Simplify and express the result in rational form

$$\frac{0.144 \div 1.2}{0.016 \div 0.02} + \frac{7}{5} - \frac{21}{8}$$

14. Find the value of x

$$\frac{1}{16} \times \left(\frac{1}{2}\right)^2 = \left(\frac{1}{2}\right)^{3x-6}$$

or

If $\frac{p}{q} = \left(\frac{2}{3}\right)^2 \times \left(\frac{1}{3}\right)^{-4}$ then find $\left(\frac{p}{q}\right)^{-2}$

15. Mr. A sales a bicycle to Mr. B at a profit of 20% and Mr. B sales it to Mr. C at a profit of 25%. If Mr. C pays Rs. 1500 then what did Mr. A pay for it?
16. At what percent per annum will a sum of money double itself in 8 years?
17. Multiply and verify the results for the given values.
(m+n) (2m-3n) ; when m= - 2 and n= 0
18. In a class of 49 students number of girls are $\frac{2}{5}$ of the boys. Then find the number of boys in the class.
19. Find the length of the diagonal of a rectangle ABCD whose sides are 15 cm and 8cm.

OR

If the sides of the triangles are 3m, 4m and 6m then determine whether the triangle is right angled or not.

20. Draw and equilateral triangle ABC whose side is 5cm.
21. A wire is in the form of a circle with radius 42cm. it is bent into a square. Then find the side of the square.
22. A group of 6 students donated of Rs. 20, 25, 100, 45, 30, 20 , then
i) Calculate the mean and mode of the above data.
ii) What value of the student is depicted here ?

SECTION –D (4x8=32)

23. Express in the form of $k \times 10^n$, where $1 \leq k < 10$
 $[(3.4 \times 10^4) \times (5.0 \times 10^{-3})] \div [2.0 \times 10^5]$
24. The S.P of an article is three forth of its C.P. then what is the loss % ?

OR

If x% of Y is 13x, then find the value of Y.

25. Solve for a
 $a - \left(\frac{a-1}{2}\right) = 1 - \left(\frac{a-2}{3}\right)$
26. If O is an interior point of ΔABC , then prove that
 $AB+BC+CA < 2(OA+OB+OC)$
27. Show that in an isosceles triangle, angles opposites to equal sides are equal.
28. Draw a right angled triangle ABC whose hypotenuse AC=5cm and Base BC=4cm.
29. The radii of two circles are in the ratio 2:3. Then what is the ratio of the circumference.
30. Marks obtained by 5 students in the examination are given. Represents this data by means of a bar graph.

Students Name	Swati	Sarada	Sekhar	Sachin	Arpita
Obtained Mark	40	15	25	29	48

THE END