## Nishant eAcademy

## CBSE Sample Paper Class 9 Mathematics 2020-21

Subject: Mathematics Class: 9 Maximum Marks: 80 Duration: 3 hours
Section A: Objective Type Questions (Each question carries 1 mark)

1. If $a=3$ and $b=4$, then the value of $3 a-2 b$ is: (a) -6 (b) 2 (c) 6 (d) -2
2. The sum of the angles of a triangle is: (a) 180 degrees (b) 90 degrees (c) 360 degrees (d) 270 degrees
3. The value of $\sqrt{ }(25 / 4)$ is: (a) $5 / 2$ (b) $2 / 5$ (c) 5 (d) 2
4. If the radius of a circle is 7 cm , then its diameter is: (a) 14 cm (b) 7 cm (c) 3.5 cm (d) 21 cm

Section B: Short Answer Type Questions (Each question carries 2 marks)
5. Solve the equation: $2 x-5=11$
6. Find the LCM and HCF of 12 and 18.
7. The ratio of the number of boys to the number of girls in a class is $3: 5$. If there are 40 students in the class, then find the number of boys and girls.

Section C: Long Answer Type Questions (Each question carries 4 marks)
8. A bag contains 5 red balls, 3 blue balls, and 2 green balls. If a ball is drawn at random, what is the probability of getting a red ball?
9. The cost of 8 pens and 5 pencils is $₹ 68$. The cost of 3 pens and 2 pencils is ₹28. Find the cost of one pen and one pencil.
10. In a right-angled triangle, the length of one of the legs is 12 cm and the hypotenuse is 13 cm . Find the length of the other leg.

Section D: Higher Order Thinking Questions (Each question carries 6 marks)
11. A circular plot of land has a radius of 14 meters. Find the area of the plot and also the cost of fencing it at the rate of ₹ 20 per meter.
12. The sum of the ages of a father and his son is 36 years. 6 years ago, the father's age was 3 times the age of the son. Find their present ages.

