

Anita's Coaching Classes

Surface area

Marks:25

Time : 1:30hrs

[Section (A)] $5 \times 1 = 5$

- 1) Find the curved surface area of a cone having slant height 10 cm and circumference of base is 44 cm.
- 2) Find the total surface area of a sphere having diameter 14 cm.
- 3) Three cubes each of side 5 cm are joined end to end. Find the surface area of the resulting cuboids.
- 4) A rectangular sheet of paper 44 cm x 18 cm is rolled out along its length and a cylinder is formed. Find the radius of the cylinder formed.
- 5) The inner diameter of the well is 3.5 m and 10 m deep find: Inner curved area

[Section (B)] $5 \times 2 = 10$

- 6) A hemispherical bowl made of brass has inner diameter 10.5 cm. find the cost of tin painting it on the inside at the rate of Rs 16 per 100 cm square.
- 7) The height of a cone is 16 cm and its base radius is 12 cm. find the curved and total surface area of the cone. (Use, $\pi = 3.14$.)
- 8) Find the lateral surface area of a closed cylindrical petrol storage tank that is 4.2 m in diameter and 4.5 m high.
- 9) The radius and slant height of a cone are in the ratio 4:7. If its curved surface area of this cone is 792 cm^2 . Find its radius. (use $p = 22/7$)
- 10) The diameter of the moon is one third of the earth. Find out the ratio of the surface area of the moon and earth.

[Section (C)] $2 \times 5 = 10$

- 11) A wooden toy in the form of cone surmounted on a hemisphere. The diameter of the base of the cone is 6 cm and height is 4 cm. find the cost of painting the toy at the rate of Rs 5 per 1000 cm^2
- 12) A heap of wheat is in the form of a cone whose diameter is 10.5 m and height is 3 m. The heap is to be covered by canvas to protect it from rain. Find the area of the canvas required.

Or

A storage tank consists of circular cylinder with a hemisphere adjoined on either end. If the external diameter of the cylinder is 1.4 m and its length be 8 m. find the cost of painting it on the outside at the rate of Rs. 10 per m^2 .