Chapter 11- Perimeter and Area (Practice)

1) A door frame of dimension 3m x 2m is fixed in wall of dimension 10m x 10m. Find the total labour charges for painting the wall if the labour charges for painting $1m^2$ of the wall is Rs. 2.50.

2) The area of a rectangular sheet is 500 cm^2. If the length of the sheet is 25 cm, what is its width? Also find the perimeter of the rectangular sheet.

3) Anu wants to fence the garden in front of her house, on three sides with lengths 20 m, 12 m and 12 m. Find the cost of fencing at the rate of Rs. 150 per meter.

4) A wire is in the shape of a square of side 10 cm. If the wire is re bent into a rectangle of length 12 cm, find the its breadth. Which encloses more area, the square or the rectangle?

5) The area of a square and rectangle are equal. If the side of the square is 40 cm and the breadth of the rectangle is 25 cm, find the length of the rectangle. Also, find the perimeter of the rectangle.

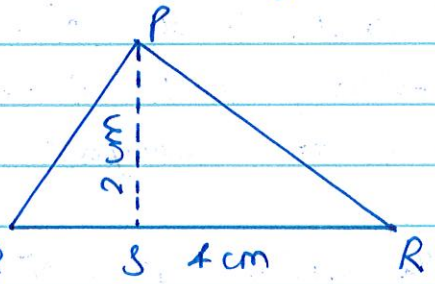
6) One of the sides and the corresponding height of a parallelogram are 4 cm and 3 cm, find the area of the parallelogram.

7) Find the height 'x' if the area of the parallelogram is 24 cm^2 and the base is 4 cm.

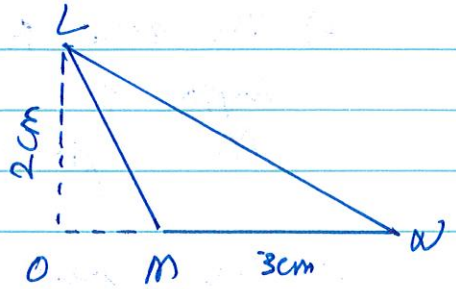
8) Two sides of the parallelogram ABCD are 6cm & 4cm. The height corresponding to the base CD is 3cm. Find the (i) area of the parallelogram (ii) the height corresponding to the base AD.

9) Find the area of the following triangle.

(i)



(ii)



10) Find BC, if the area of ΔABC is $36\ cm^2$ and height AD is 3cm.

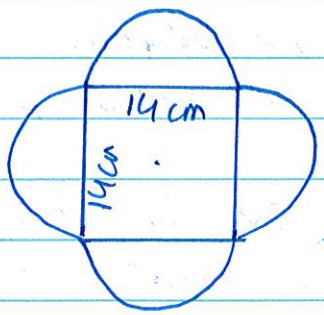
11) In ΔPQR, $PR = 8\ cm$, $QR = 4cm$ and $PL = 5cm$. Find (i) the area of the ΔPQR (ii) QM.

12) What is the circumference of a circle of diameter 10cm. (Take $\pi = 3.14$)?

13) What is the circumference of a circular disc of radius 14cm.

14) The radius of a circular pipe is 10cm. What length of a tape is required to wrap once around the pipe ($\pi = 3.14$)?

15) Find the perimeter and area of given shape. ($\pi = \frac{22}{7}$)

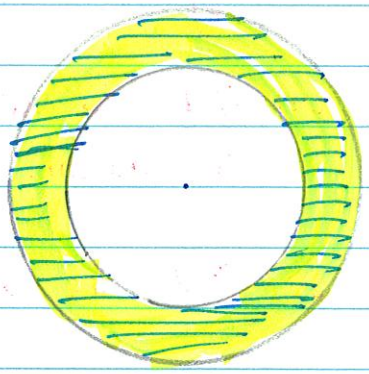


16) Sudhanshu divides a circular disc of radius 7 cm in two equal parts. What is the perimeter of each semicircle shape disc? ($\pi = \frac{22}{7}$)

17) Find the area of circle of radius 30 cm ($\pi = 3.14$)

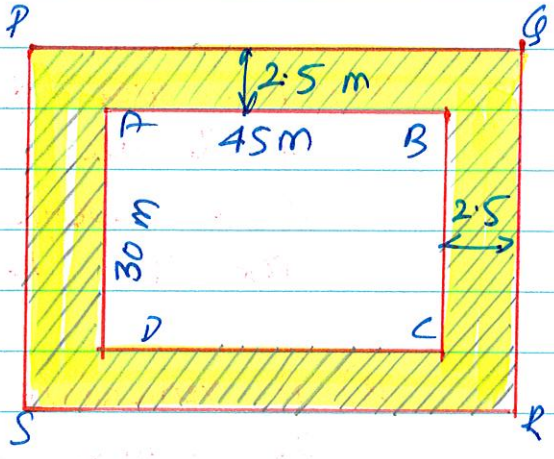
18) Diameter of a circular garden is 9.8 m. Find its area.

19) The adjoining figure shows two circles with the same centre. The radius of the larger circle is 10cm and the radius of smaller circle is 4 cm.



Find (a) The area of larger circle
(b) The area of smaller circle
(c) The area of shaded portion ($\pi = 3.14$)

20) A rectangular park is 45 m long and 30 m wide. A path 2.5 m wide is constructed outside the park. Find the area of path.



21) A path 5m wide runs along inside a square park of side 100 m. Find the area of the path. Also find the cost of cementing it at the rate of Rs. 250 per $10m^2$.

22) Two cross roads, each of width 5m, run at right angles through the centre of a rectangular park of length 70 m and breadth 45m and parallel to its sides. Find the area of the roads. Also find the cost of constructing of the roads at the rate of Rs. 105 per m^2.

23) Find BC, if the area of the ΔABC is 360 cm^2 and its height AD is 18 cm.

24) Find the circumference of a circle if the diameter is 3.5 cm.

25) Find the area of a square park whose perimeter is 60cm.

26) Hamza took a wire of length 44 cm and bent into the shape of a circle. Find the radius of the circle so formed.

27) The area of a square and a rectangle are equal. If the side of the square is 40 cm and breadth of the rectangle a 20 cm, find the length of the rectangle. Also find the perimeter of the rectangle.

28) A verandah 1.25 m wide is constructed all along the outside of a room 5.5 m long and 4 m wide. Find the area of the cost of carpeting the floor of this verandah at the rate of Rs. 15 per sq. m.

29) Find the diameter of a circle whose circumference is 88 cm.

30) The perimeter of a rectangular sheet is 100 cm. If the length is 15 cm, find its area.

31) The radius of a wheel is 3.5 cm. How many revolution will it take to cover a distance of 22 m.

32) A rectangular field is 114 m long and 100 m wide. Two cross roads each of width 6 m are constructed at the centre of this field, one parallel to the length and the other parallel to breadth. Find the area of the cross roads and the area of the remaining field.