## ST. LAWRENCE HIGH SCHOOL <br> TOPIC- Area and Perimeter (Circle)

## CLASS: 9

WORK SHEET NO.-17
Sub: Mathematics
F. M. 15

Solution
Date: 25. 4.2020
Q.1) Choose the correct options: $1 \times 15=15$
i) The diameter of a bicycle wheel is 34 cm . What distance will it cover in 100 revolutions?
d) 110 m
ii) The radius of a circular field is 31.5 m . The distance run by Ram in making 3 complete rounds is b) 594 m
iii) The diameter of a wheel is 28 cm . How many revolutions will it make to travel 352 m ?
d) 400
iv) A wheel 14 cm in diameter makes 3000 revolutions per minute. Its speed is $\qquad$ $\mathrm{m} / \mathrm{sec}$.
b) 22
v) From a rectangular metal Sheet of sides 30 cm and 40 cm , a circular Sheet as big as possible is cut off. Then the area of the remaining Sheet will be $\qquad$ sqcm .
c) 492.86
vi) A 7 m wide path is to be constructed all around and outside a circular garden of diameter 84 m . The cost of constructing the path at Rs12 per sqm is Rs $\qquad$ .

## a) 24024

vii) The difference between the circumference and the diameter of a circle is 30 cm . Then the area of the circle is $\qquad$ sqcm.
d) 154
viii) The Perimeters of a circle and a square are equal. If the area of the square is 121 sqcm then the area of the circle is $\qquad$ sqcm.
b) 154
ix) The perimeter of an equilateral triangle is 126 cm . The area of the incircle of the triangle will be $\qquad$ sqcm.
b) 462
x) If the perimeter of a circle is decreased by $50 \%$ then the $\%$ decrease in area will be
d) $75 \%$
xi) The semi-circumference of a circle is 15.4 cm . Its diameter will be
a) 9.8 cm
xii) The area of a circle is 308 sqcm . The length of the side of a square inscribed in that circle will be

## c) 14 cm

xiii) The length of the side of the rectangle inscribed in a circle of radius 2.5 cm is 4 cm . Then the area of the rectangle is $\qquad$ sqcm.
b) 12
xiv) If the area of a circle inscribed in a square is 154 sqcm , then the area of the square is $\qquad$ sqcm. d) 196
xv ) The total length of a semi-circular bow and the connecting string is 216 m . Then the length of the string will be
d) 84 cm .

