

SM2 HW #8-10 (Unit 8 Test Preview #1)

Identify the center and radius of each.

1) $(x + 10)^2 + (y - 8)^2 = 16$

2) $(x + 3)^2 + (y + 3)^2 = 49$

3) $(x - 7)^2 + y^2 = 49$

4) $x^2 + (y + 13)^2 = 27$

Use the information provided to write the standard form equation of each circle.

5) Center: $(9, 13)$
Radius: $\sqrt{31}$

6) Center: $(-3, -10)$
Radius: $\sqrt{66}$

Identify the center and radius of each.

7) $x^2 + y^2 - 8x - 12y - 29 = 0$

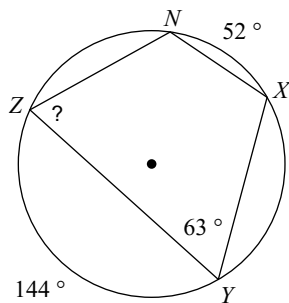
8) $x^2 + y^2 + 14x - 18y + 94 = 0$

9) Prove that the point $(6, -5)$ is on the circle:

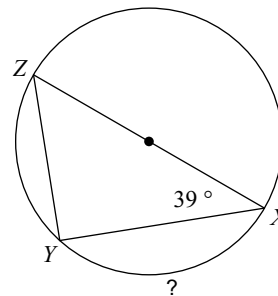
$$(x - 4)^2 + (y + 1)^2 = 20$$

Find the measure of the arc or angle indicated.

10)

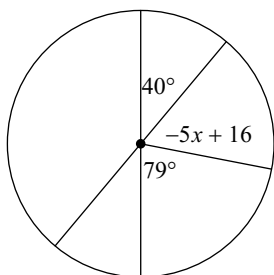


11)



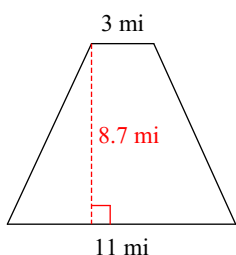
Solve for x . Assume that lines which appear to be diameters are actual diameters.

12)



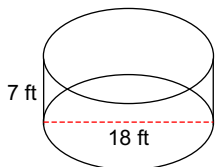
Find the area of each.

14)



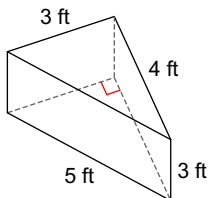
Find the lateral area of each figure. Round your answers to the nearest hundredth, if necessary.

16)



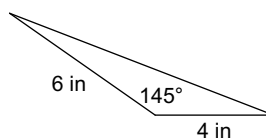
Find the surface area of each figure. Round your answers to the nearest hundredth, if necessary. (The Trapezoids are "Isosceles".)

17)



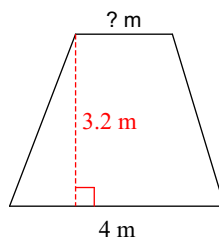
Find the area of each figure. Round your answer to the nearest tenth.

13)



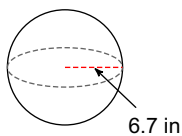
Find the missing measurement. Round your answer to the nearest tenth.

15)

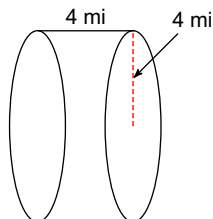


Area = 9.3 m^2

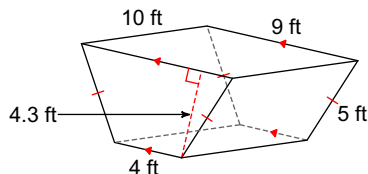
19)



18)

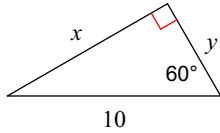


20)

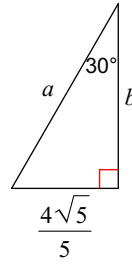


Find the missing side lengths. Leave your answers as radicals in simplest form.

21)

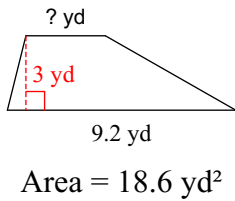


22)



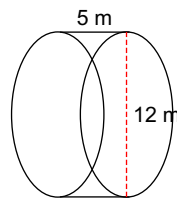
Find the missing measurement. Round your answer to the nearest tenth.

23)



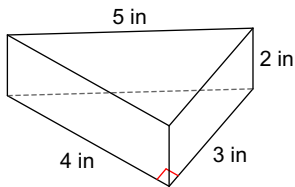
Find the lateral area of each figure. Round your answers to the nearest hundredth, if necessary.

24)

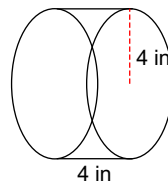


Find the surface area of each figure. Round your answers to the nearest hundredth, if necessary. (The Trapezoids are "Isosceles".)

25)

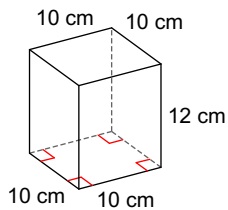


26)

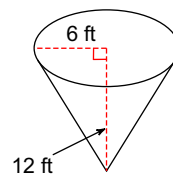


Find the volume of each figure. Round your answers to the nearest hundredth, if necessary.

27)



28)



Find the value of each trigonometric ratio.

29) $\sin X$

