

Name: \_\_\_\_\_ Period: \_\_\_\_\_

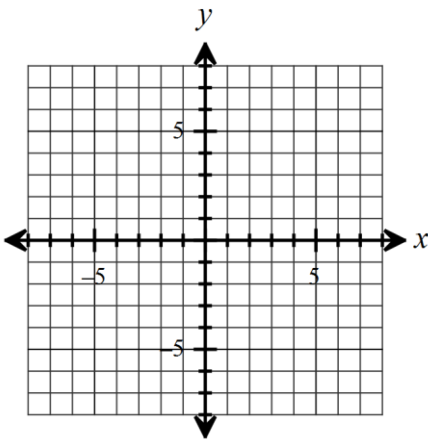
### SM2 12.4 Graphing Circles

Identify the center and radius of each circle. Round the radius to the nearest tenth if necessary. Sketch the graph.

1.  $x^2 + y^2 = 9$

Center: \_\_\_\_\_

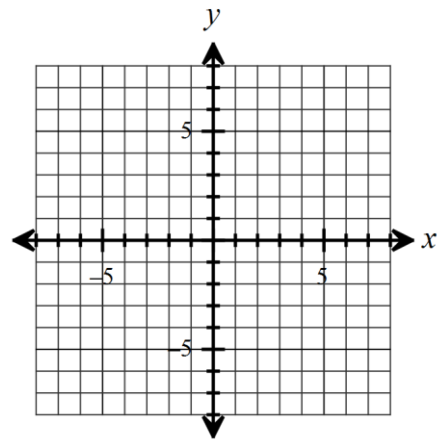
Radius: \_\_\_\_\_



2.  $x^2 + y^2 = 49$

Center: \_\_\_\_\_

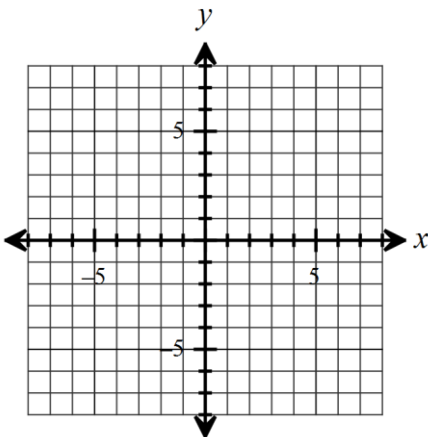
Radius: \_\_\_\_\_



3.  $x^2 + y^2 = 25$

Center: \_\_\_\_\_

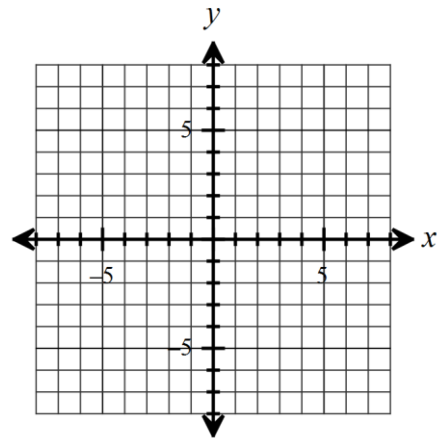
Radius: \_\_\_\_\_



4.  $x^2 + y^2 = 12$

Center: \_\_\_\_\_

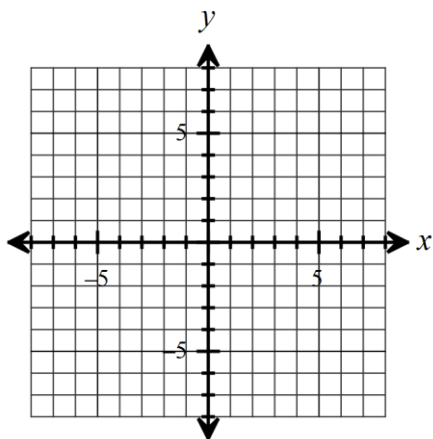
Radius: \_\_\_\_\_



5.  $(x + 3)^2 + (y - 2)^2 = 16$

Center: \_\_\_\_\_

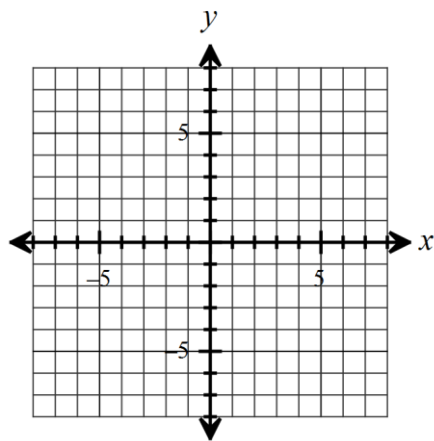
Radius: \_\_\_\_\_



6.  $(x + 2)^2 + (y + 4)^2 = 9$

Center: \_\_\_\_\_

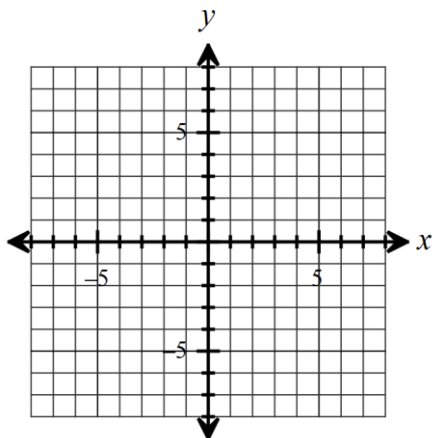
Radius: \_\_\_\_\_



7.  $(x - 1)^2 + (y + 2)^2 = 15$

Center: \_\_\_\_\_

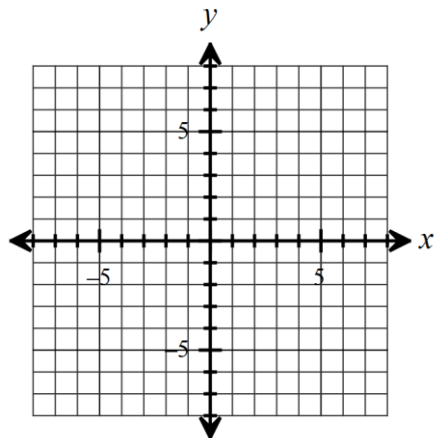
Radius: \_\_\_\_\_



8.  $(x - 2)^2 + (y - 3)^2 = 16$

Center: \_\_\_\_\_

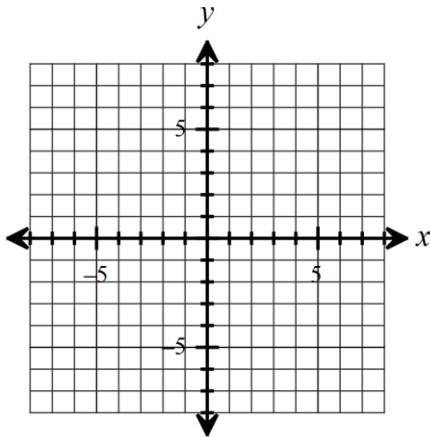
Radius: \_\_\_\_\_



9.  $(x + 4)^2 + y^2 = 4$

Center: \_\_\_\_\_

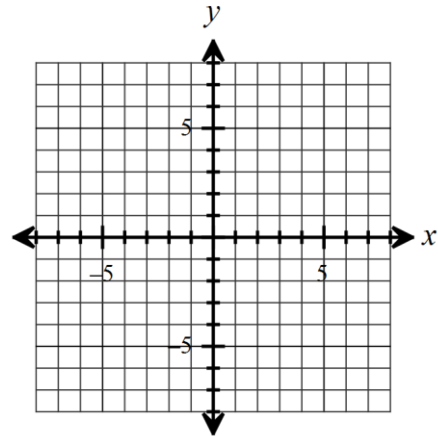
Radius: \_\_\_\_\_



10.  $x^2 + (y - 2)^2 = 25$

Center: \_\_\_\_\_

Radius: \_\_\_\_\_



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

11. Center:  $(0, 0)$       Radius: 10

Equation: \_\_\_\_\_

12. Center:  $(-12, 7)$       Radius:  $\sqrt{19}$

Equation: \_\_\_\_\_

13. Center:  $(7, 11)$       Radius: 8

Equation: \_\_\_\_\_

14. Center:  $(2, -14)$       Radius: 4

Equation: \_\_\_\_\_

15. Center:  $(-2, -7)$       Radius:  $\sqrt{34}$

Equation: \_\_\_\_\_

16. Center:  $(-5, 0)$       Radius: 10

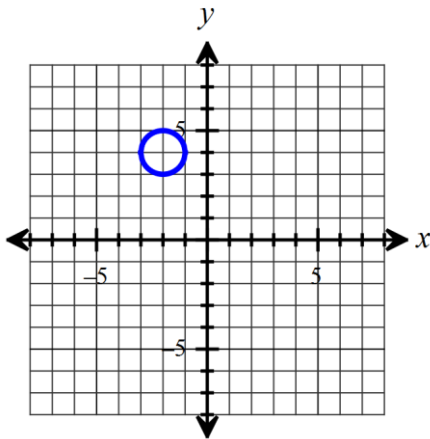
Equation: \_\_\_\_\_

Write the center and radius of each circle. Then write the equation for each circle.

17. Center: \_\_\_\_\_

Radius: \_\_\_\_\_

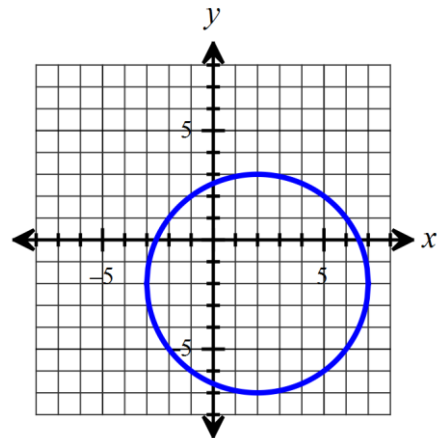
Equation: \_\_\_\_\_



18. Center: \_\_\_\_\_

Radius: \_\_\_\_\_

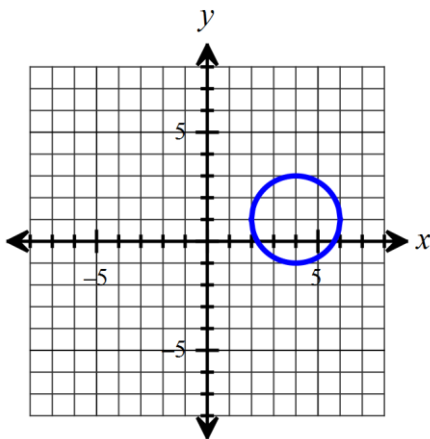
Equation: \_\_\_\_\_



19. Center: \_\_\_\_\_

Radius: \_\_\_\_\_

Equation: \_\_\_\_\_



20. Center: \_\_\_\_\_

Radius: \_\_\_\_\_

Equation: \_\_\_\_\_

