

Equation of a Circle *fluency*



Write the radius of the circle

1 $x^2 + y^2 = 49$

2 $x^2 + y^2 = 100$

3 $x^2 + y^2 = 9$

4 $x^2 + y^2 = 20$

5 $x^2 + y^2 = 6.25$

6 $x^2 + y^2 = 12$



Write the equation of the circle with centre (0, 0) and the radius given

7 5

8 1

9 12

10 2.5

11 $\sqrt{7}$

12 $2\sqrt{3}$



Is the point on the circle? Write yes or no.

13 (3, 4) on $x^2 + y^2 = 25$

14 (5, 12) on $x^2 + y^2 = 169$

15 (2, 3) on $x^2 + y^2 = 16$

16 (-6, 8) on $x^2 + y^2 = 100$

17 (1, 1) on $x^2 + y^2 = 2$

18 (4, -4) on $x^2 + y^2 = 30$



Find the missing coordinate. It is positive.

19 (3, ?) on $x^2 + y^2 = 25$

20 (?, 5) on $x^2 + y^2 = 169$

21 (8, ?) on $x^2 + y^2 = 100$

22 (?, 7) on $x^2 + y^2 = 625$

23 (0.6, ?) on $x^2 + y^2 = 1$

24 (?, 2) on $x^2 + y^2 = 13$



Find the equation of the circle with centre (0, 0) through the point

25 (3, 4)

26 (-5, 12)

27 (1, 2)

28 (2, -2)

29 (6, 8)

30 (-1, -3)