

Solve the following equations and inequalities.

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| <p>1. $x + 14 = 30$</p> <p>2. $5x = -80$</p> <p>3. $5 - x = 7$</p> <p>4. $6x = 90$</p> <p>5. $2x - 5 = 11$</p> <p>6. $2.08x - 13.6 = 21.02$</p> <p>7. $8x - 11 = 49 - 2x$</p> <p>8. $2x + 7 > -5$</p> <p>9. $-7 < 2x - 1 < 13$</p> <p>10. $2x + 3 = 15$</p> <p>11. $x - 7 \leq 20$</p> <p>12. The diameter of a sphere is 4.8 meters.
What is the radius of the sphere?</p> | <p>15. Calculate the volume of a cylinder with radius of 3 feet and height 35 feet.</p> <p>16. Sketch a right triangle having one acute angle of 28°, then label the value of each angle.</p> <p>17. How many square feet of carpet is needed for a 18 foot by 24 foot room?</p> |
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Common Shorthand Names

diameter = D
 radius = r
 circumference = C
 height = h
 width = W
 length = L
 base = b
 area = A
 volume = V
 perimeter = P
 $\pi = 3.14$ (an approximation to pi)

Handy Formulas

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| <p>13. Calculate the circumference of a circle with a radius of 35 feet.</p> <p>14. What is the perimeter of a rectangle with length 3.5 inches and width 2.4 inches?</p> | <p>$D = 2r$ $r = \frac{1}{2}D$
 $C = 2\pi r$ circumference of a circle
 $A = \pi r^2$ area of a circle
 $A = \frac{1}{2}bh$ area of a triangle
 $A = LW$ area of a rectangle
 $P = 2L + 2W$ perimeter of a rectangle
 $V = \pi r^2 h$ volume of a cylinder
 $V = \frac{4}{3}\pi r^3$ volume of a sphere</p> |
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