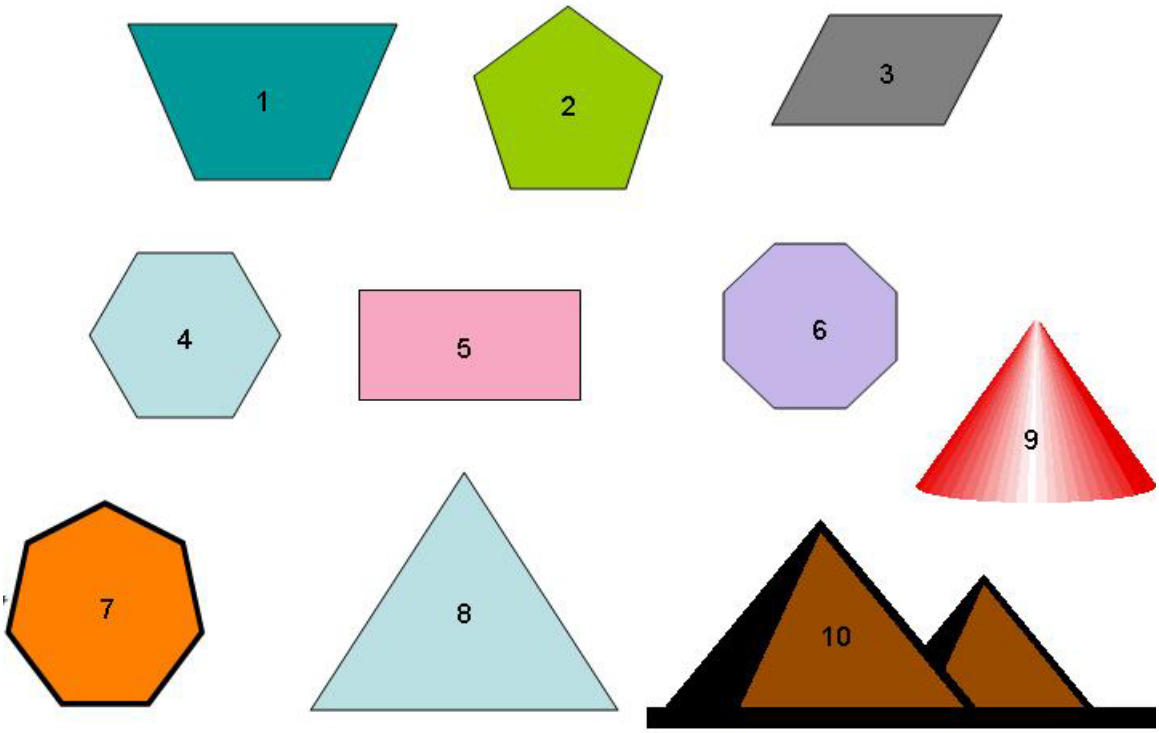
Use the figures below to solve questions 1 through 10.



1. Shape # 1 represents a

   a. Quadrilateral
   b. Parallelogram
   c. Trapezoid
   d. Triangle

2. Shape # 2 represents a

   a. Quadrilateral
   b. Pentagon
   c. Hexagon
   d. Heptagon

3. Shape # 3 represents a

   a. Quadrilateral
   b. Parallelogram
   c. Trapezoid
   d. Triangle

4. Shape #4 represents a

   a. Quadrilateral
   b. Pentagon
   c. Hexagon
   d. Heptagon

5. Shape # 5 represents a

   a. Quadrilateral
   b. Parallelogram
   c. Trapezoid
   d. Pentagon

6. Shape # 6 represents a(n)

   a. Pentagon
   b. Hexagon
   c. Heptagon
   d. Octagon

7. Shape # 7 represents a(n)

   a. Pentagon
   b. Hexagon
   c. Heptagon
   d. Octagon

8. Shape # 8 represents a(n)

   a. Isosceles triangle
   b. Equilateral triangle
   c. Obtuse triangle
   d. Scalene triangle

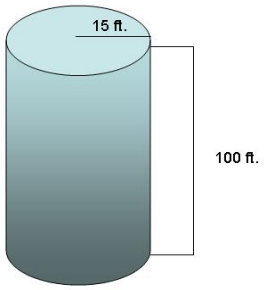
9. Shape # 9 represents a

   a. Triangle
   b. Pyramid
   c. Cone
   d. Circle

10. Shape # 10 represents a

    a. Triangle
    b. Pyramid
    c. Cone
    d. Rectangle

Use the figure below to answer questions 11 through 13.



11. Using the formula $v = \pi r^2 h$, determine how much water the tower can hold if the maximum height it can be filled is 75 feet? ($\pi = 3.14$)

    a. 52,987.50
    b. 26,493.75
    c. 70,650
    d. 35,325

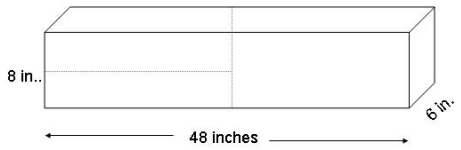
12. Assuming the water tower can be filled to the actual height of the tower, what is the volume?

    a. 52,987.50
    b. 26,496.75
    c. 70,650
    d. 35,325

13. Using the formula πr^2, what is the area of the tower?

    a. 706.50
    b. 353.25
    c. 47.10
    d. 94.20

Using the figure below, answer questions 14 and 15.



14. Using the formula L x W x H, what is the volume of the entire board?

    a. 2,304
    b. 288
    c. 384
    d. 1,152

15. Assuming a carpenter cuts the piece of wood along the dotted lines, what is the volume of the 4" x 6" x 24" piece?

    a. 144
    b. 96
    c. 576
    d. 288

Answer Key

1. C
2. B
3. B
4. C
5. A
6. D
7. C
8. A
9. C
10. B
11. A
12. C
13. A
14. A
15. C