

## CHAPTER-6 | Perimeter and Area

QUIZ  
PART-07

1. A regular polygon is a closed figure in which:
- only sides are equal
  - only angles are equal
  - all sides and all angles are equal
  - all sides are curved (C)

**Explanation:** A regular polygon has both equal sides and equal angles.

2. Which of the following is a regular polygon?
- scalene triangle
  - equilateral triangle
  - rectangle
  - irregular pentagon (B)

**Explanation:** An equilateral triangle has all three sides and all three angles equal.

3. The perimeter of a regular polygon is:
- the product of all sides
  - the sum of all its sides
  - twice one side
  - side  $\times$  side (B)

**Explanation:** Perimeter means the total length around the figure, so we add all the sides.

4. The perimeter of an equilateral triangle is:
- $2 \times$  side
  - $3 \times$  side
  - $4 \times$  side
  - side + 2 (B)

**Explanation:** An equilateral triangle has 3 equal sides, so perimeter =  $3 \times$  side.

5. What is the perimeter of an equilateral triangle whose side is 6 m?
- 12 m
  - 16 m
  - 18 m
  - 24 m (C)

**Explanation:** Perimeter =  $3 \times 6 = 18$  m.

6. Which statement is true?
- Every polygon is regular
  - Every regular polygon has equal sides
  - Every triangle is regular
  - Every rectangle is regular (B)

**Explanation:** Equal sides are necessary for a regular polygon, along with equal angles.

7. A regular pentagon has:
- 3 equal sides
  - 4 equal sides
  - 5 equal sides
  - 6 equal sides (C)

**Explanation:** A pentagon has 5 sides, so a regular pentagon has 5 equal sides.

8. Which formula best gives the perimeter of a regular polygon?
- number of sides  $\times$  length of one side
  - $2 \times$  length
  - length  $\times$  breadth
  - side  $\div$  number of sides (A)

**Explanation:** Since all sides are equal, perimeter = number of sides  $\times$  one side.

9. If a regular hexagon has side length 4 cm, its perimeter is:
- 16 cm
  - 20 cm
  - 24 cm
  - 28 cm (C)

**Explanation:** A hexagon has 6 sides, so perimeter =  $6 \times 4 = 24$  cm.

10. Why is a square also a regular polygon?
- because it has 3 sides
  - because its sides are curved
  - because all its sides and all its angles are equal
  - because only its angles are equal (C)

**Explanation:** A square fits the definition of a regular polygon since all four sides and all four angles are equal.