

Grade 6 Practical Geometry Worksheets

Grade 6 Maths Practical Geometry Multiple Choice Questions (MCQs)

1. **Which geometrical instrument is used to draw line segments and to measure their lengths?**

- (a) ruler
- (b) compasses
- (c) divider
- (d) set squares

2. **Which geometrical instrument is used to draw perpendicular and parallel lines?**

- (a) ruler
- (b) compasses
- (c) divider
- (d) set squares

3. **Which geometrical instrument is used to compare lengths?**

- (a) protractor
- (b) compasses
- (c) divider
- (d) set squares

4. **Which geometrical instrument is used to draw and measure angles?**

- (a) protractor
- (b) compasses
- (c) divider
- (d) set squares

5. **Which geometrical instrument is used to mark off equal lengths but not to measure them and draw arcs and circles?**

- (a) protractor
- (b) compasses
- (c) divider
- (d) set squares

6. **Name the geometrical instrument having a pair—a pointer on one end and a pencil on the other.**

- (a) protractor
- (b) compasses
- (c) divider
- (d) set squares

7. Name the geometrical instrument having a pair of pointers.

- (a) protractor
- (b) compasses
- (c) divider
- (d) set squares

8. Name the geometrical instrument having two triangular pieces.

- (a) ruler
- (b) compasses
- (c) divider
- (d) set squares

9. Name the geometrical instrument having a semi-circular device graduated into 180 degree-parts.

- (a) protractor
- (b) compasses
- (c) divider
- (d) set squares

10. A is a simple closed curve all of whose points are at the same distance from a fixed point.

- (a) circle
- (b) diameter
- (c) radius
- (d) none of these

11. Which of the following angles cannot be constructed using ruler and compasses?

- (a) 75°
- (b) 15°
- (c) 135°
- (d) 85°

12. The instrument to measure an angle is a:

- (a) ruler
- (b) protractor
- (c) divider
- (d) compasses

13. The instrument to draw a circle is:

- (a) ruler
- (b) protractor
- (c) divider
- (d) compasses

14. Number of set squares in the geometry box is:

- (a) 0
- (b) 1
- (c) 2
- (d) 3

15. The line segment joining any two points on the circle is called

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- (a) chord
- (b) diameter
- (c) radius
- (d) none of these

16. A is the longest chord of a circle.

- (a) circle
- (b) diameter
- (c) radius
- (d) none of these

17. The line segments forming a polygon are called

- (a) vertices
- (b) sides
- (c) angles
- (d) curves

18. Number of lines which can be drawn from one point:

- (a) one
- (b) infinite
- (c) two
- (d) zero

19. A line has length.

- (a) definite
- (b) indefinite
- (c) no
- (d) none of these

20. The edge of a ruler draws

- (a) ray
- (b) line
- (c) line segment
- (d) curve

Class 6 Maths Practical Geometry True(T) or False(F)

1. With ruler and compasses, we can bisect any given line segment.
2. Only one perpendicular bisector can be drawn to a given line segment.
3. With a given centre and a given radius, only one circle can be drawn,
4. Using only the two set-squares of the geometry box, an angle of 40° can be drawn.
5. Infinitely many perpendiculars can be drawn to a given ray.
6. Using the set squares $30^\circ - 60^\circ - 90^\circ$ and $45^\circ - 45^\circ - 90^\circ$, we can draw an angle of 75° .

Class 6 Maths Practical Geometry Very Short Answer Type Questions

1. Draw a line segment AB and then draw perpendicular bisector of it.
2. Draw any angle. Construct a copy of the angle using ruler and compasses.
3. If $AB = 8.4\text{cm}$ and $CD = 2.6\text{cm}$, construct the following line segments.
 - (i) $AB + CD$
 - (ii) $2AB$
 - (iii) $AB - CD$
4. Draw an angle of 50° with the help of a protractor. Draw a ray bisecting this angle.
5. Draw a circle with centre O and radius 4.8cm.
6. Draw a circle with centre O and radii 3.2cm and 4cm.
7. Draw a line segment AB. Produce it to AC so that $AC = 3AB$. Verify by measurement.
8. Draw a line segment $PQ = 5.7\text{cm}$. with $PQ = 5.7\text{cm}$ as diameter, draw a circle.

Class 6 Maths Practical Geometry Short Answer Type Questions

1. Draw a circle with centre O and any radius. Draw its chord and name it AB. Draw the perpendicular bisector of AB. Does it pass through the centre of the circle?
2. Draw an angle of 150° and label it $\angle XYZ$. Construct its bisector. Measure each of the angle so obtained.
3. Use a protractor to draw $\angle POQ = 80^\circ$ Make a copy of it using a ruler and a compass.
4. Use a ruler and a compass to draw the following angles:
 - (a) 30°
 - (b) 45°

Class 6 Maths Practical Geometry Long Answer Type Questions

1. Draw a line AB. Mark a point P on it. Use a ruler and a compass to draw a perpendicular to AB through P.
2. Construct a line segment of 6.2cm. Bisect it and measure the length of each part.
3. Draw a line AB. Take a point P outside it. Through P draw a line perpendicular to AB.