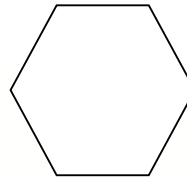
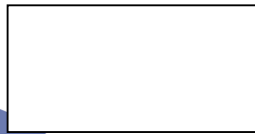


6th – Constructions

1. Draw a line segment \overline{AB} and then draw a perpendicular bisector to it.
2. Draw a line segment \overline{AD} . Mark a point P on it and then draw a perpendicular bisector at P.
3. Draw a line segment \overline{AB} of length 5 cm. now draw a perpendicular bisector of the line segment \overline{AB} .
4. Draw circles of different sizes using compasses.
5. Draw a line segment \overline{PQ} . Mark a point X outside \overline{PQ} . Now draw a perpendicular to \overline{PQ} from this point.
6. Draw three circles of radii 2.5cm, 3 cm, and 4 cm with the same centre.
7. Draw any angle. Construct a copy of the angle using ruler and compasses.
8. Draw an angle of 60° . Make a copy of the angle using ruler and compasses.
9. Construct angles of following measures using ruler and compasses.

- a) 30° b) 45° c) 120° d) 60°

10. Which of the following have lines of symmetry? How many lines of symmetry does each have? Draw a line of symmetry in each of the following:



11. Answer the following:
 - a) Make a list of all the capital alphabets in English which have only one line of symmetry.
 - b) Make a list of all the capital alphabets in English which have no line of symmetry.
 - c) Write the name of three flowers each of which have:
 - a) Only one line of symmetry
 - b) Many lines of symmetry

12. Draw line l and take any point P outside the line. Locate a point Q such that it is symmetrical to point P with respect to l.
13. Identify any three letters of the English alphabet through which no line of symmetry can be drawn.
14. Draw a triangle having
 - a) No line of symmetry
 - b) One line of symmetry
 - c) Three lines of symmetry
15. How many axes of symmetry can be drawn through:
 - a) An isosceles trapezium
 - b) A regular pentagon