Coordinate Geometry - Reflection

Important Concepts

1. The mutual perpendicular lines intersecting each other at their zeroes are called rectangular axes or coordinate axes

2. Horizontal axis is called x-axis and the vertical axis is called y-axis.

3. (0,0) is the called the origin.

4. The position of a point in a plane is expressed by a pair of two numbers called coordinates.

5. Reflection is a map that transforms an object into its mirror image.

6. A point which does not change upon undergoing a certain reflection is said to have reflection symmetry and is known as the invariant point.

7. When the reflection takes place in the x-axis, retain the abscissa as it is, but change the sign of the ordinate.

8. When the reflection takes place in the y-axis, retain the ordinate as it is, but change the sign of the abscissa.

9. When reflection takes place in the origin, change the sign of both the coordinates.

10. M_X means reflection in the x-axis.

11. M_y means reflection in the y-axis.

12. M_o means reflection in the origin.

13. $M_X M_Y$ means that the point is first reflected in the x-axis and then in the y-axis.