Exercise A

1. The solution of the equation $x - 2y = 4$ is:
(a) (0, 2) (b) (4, 0) (c) (1, 1) (d) (2, 0)

2. In graphical representation of $y = -4$, line is:
(a) parallel to x – axis (b) parallel to y – axis
(c) passes through origin (d) None of these.

3. Solution of the equation $2x + 1 = x + 3$ is:
(a) 3 (b) 1 (c) 2 (d) 4

4. The graph of line $x - y = 0$ passes through:
(a) (2, 3) (b) (3, 4) (c) (5, 6) (d) (0, 0)

5. The graph of line $x + y = 7$ intersect the x-axis at:
(a) (7, 0) (b) (0, 7) (c) (–7, 0) (d) (0, –7)

6. Point (4, 1) lies on the line:
(a) $x + 2y = 5$ (b) $x + 2y = -6$ (c) $x + 2y = 6$ (d) $x + 2y = 16$

7. Graph of $x = 2$ is a line:
(a) parallel to x – axis (b) parallel to y – axis
(c) passes through origin (d) None of these.

8. The linear equation $2x - 5y = 7$ has
(a) a unique solution (b) two solutions
(c) infinitely many solutions (d) no solutions.

9. The equation $2x + 5y = 7$ has a unique solution, if x, y are:
(a) natural numbers (b) positive numbers
(c) real numbers (d) rational numbers.

10. If (2, 0) is a solution of the linear equation $2x + 3y = k$, then the value of k is
(a) 4 (b) 6 (c) 5 (d) 2

11. Any solution of the linear equation $2x + 0y + 9 = 0$ in two variables is of the form
(a) $(-\frac{9}{2}, m)$ (b) $(n, -\frac{9}{2})$ (c) $(0, -\frac{9}{2})$ (d) (–9, 0)

12. The graph of the linear equation $2x + 3y = 6$ cuts the y-axis at the point
(a) (2, 0) (b) (0, 3) (c) (3, 0) (d) (0, 2)

13. The equation $x = 7$, in two variables, can be written as
(a) $x + 0y = 7$ (b) $0x + y = 7$ (c) $0x + 0y = 7$ (d) $x + y = 7$

14. Any point on the x – axis is of the form
(a) (x, y) (b) (0, y) (c) (x, 0) (d) (x, x)

Exercise B

1. Any point on the y = x is of the form
(a) (a, a) (b) (0, a) (c) (a, 0) (d) (a, –a)

2. The equation of x –axis is of the form
(a) x = 0 (b) y = 0 (c) x + y = 0 (d) x = y

3. Graph of y = 6 is a line:
(a) parallel to x – axis at a distance 6 units from the origin
(b) parallel to y – axis at a distance 6 units from the origin
(c) making an intercept 6 on the x –axis.
(d) making an intercept 6 on both the axes.

4. x=5, y=2 is a solution of the linear equation
(a) x + 2y = 7 (b) 5x + 2y = 7 (c) x + y = 7 (d) 5x + y = 7

5. If a linear equation has solutions (–2, 2), (0, 0) and (2, –2), then its is of the form
(a) y – x = 0 (b) x + y = 0 (c) –2x + y = 0 (d) –x + 2y = 0

6. The positive solutions of the equation is ax + by + c = 0 alway lie in the
(a) 1st quadrant (b) 2nd quadrant (c) 3rd quadrant (d)4th quadrant

7. The graph of the linear equation 2x + 3y = 6 is a line which meets the x axis at the point
(a) (2, 0) (b) (0, 3) (c) (3, 0) (d) (0, 2)

8. The graph of the y = x passes through the point
(a) $\left(\frac{3}{2}, -\frac{3}{2}\right)$ (b) $\left(0, \frac{3}{2}\right)$ (c) (1, 1) (d) $\left(\frac{-1}{2}, \frac{1}{2}\right)$

9. If we multiply or divide both sides of a linear equation with a non-zero number, then the solution of the linear equation:
(a) changes (b) remains the same
(c) changes in case of multiplication only (d) changes in case of division only

10. How many linear equation in x and y can be satisfied by x = 1 and y = 2?
(a) only one (b) two (c) infinitely many (d) three

11. The point of the form (a, a) always lies on:
(a) x – axis (b) y – axis (c) on the line y = x (d) on the x + y =0

12. The point of the form (a, –a) always lies on:
(a) x = a (b) y = –a (c) y = x (d) x + y =0

Exercise C

1. Which of the following is not a linear equation in two variables?
(a) $ax + by = c$ (b) $ax^2 + by = c$ (c) $2x + 3y = 5$ (d) $3x + 2y = 6$

2. The graph of $ax + by + c = 0$ is
(a) a straight line parallel to x–axis (b) a straight line parallel to y–axis
(c) a general straight line (d) a line in the 2nd and 3rd quadant

3. The solution of a linear equation in two variables is
(a) a number which satisfies the given equation
(b) an ordered pair which satisfies the given equation
(c) an ordered pair, whose respective values when substituted for x and y in the given equation, satisfies it
(d) none of these

4. One of the solution of a linear equation in two variables is
(a) (3, 2) (b) (3, –2) (c) (2, 3) (d) (–2, –3)

5. The ordered pair (m, n) satisfies the equation $ax + by + c = 0$ if
(a) $am + bn = 0$ (b) $c = 0$ (c) $am + bn + c = 0$ (d) $am + bn - c = 0$

6. The equation of x – axis is
(a) $a = 0$ (b) $y = 0$ (c) $x = 0$ (d) $y = k$

7. From the graph of a line, we can find the coordinates of
(a) only two point lying on the line
(b) only two points only lying on the line
(c) only finite number of points lying on the line.
(d) only infinite number of points lying on the line.

8. A linear equation in two variables has
(a) no solution (b) only one solution (c) only two solutions (d) infinitely many solutions

9. An equation of the form $ax + by + c = 0$ represents a linear equation in two variables, if
(a) $a = 0, b \neq 0$ (b) $a \neq 0, b = 0$ (c) $a = 0, b = 0$ (d) $a = 0, b \neq 0$

10. The graph of the linear equation in two variables $y = mx$ is
(a) a line parallel to x – axis (b) a line parallel to y – axis
(c) a line passing through the origin (d) not a straight line