INTERNATIONAL INDIAN SCHOOL BURAIDAH

Worksheet For The Academic Year 2025-26

CLASS: IX SUBJECT: Mathematics DATE: 02/11/2025

LESSON-4 Linear Equations in Two Variables

1) The general form of a linear equation in two variables is _____.

2) In a linear equation in two variables 'a' and 'b' are not equal to _____.

3) Form linear equations for the following:

a) In a one day cricket match , Biju & Siju together scored 198 runs.

b) Total number of legs in a herd of goats and hens is 40.

4) Write the following as standard form of linear equation in two variables:

Also write the values of a , b , c.

a) $x = 7 + y$ b) $3x = 12 - 2y$ c) $7x - 5y = 35$ d) $5 + y = \sqrt{2}\,x$

e) $2x + 9 = 0$ f) $x - 5 = \sqrt{3}\,y$

5) Write each of the following as equation in two variables:

a) $2y = 3$ b) $3x = -5$ c) $x = -2$ d) $\pi y = 7$ e) $y - 2 = 0$

6) Find three solutions for the following equations:

a) $2x + y = 7$ b) $3x + 2y = 1$ c) $x = 3y$ d) $2x - 3y = 12$ e) $x + \pi y = 8$

7) Check which of the following is a solution of $2x - y = 4$

a) (0 , 2) b) (1 , 1) c) (2 , 0) d) (4 , 0) e) ($\sqrt{2}$, $4\sqrt{2}$)

8) Find the value of k for each of the following if x = 1 , y = 1 is its solution:

a) $9kx + 12ky = 63$ b) $5x + 2ky = 3k$ c) $kx - 3y = 7$ Ans: a) 3 b) 5 c) 10

9) Find the value of k for each of the following if x = 2 , y = 1 is its solution:

a) $3x + 2y = k$ b) $2x - ky = 6$ c) $\frac{x}{4} + \frac{y}{3} = 5k$ Ans: a) 8 b) -2 c) $\frac{1}{6}$

10) Linear equations in two variables have _____ no.of solutions.

11) Check if x = 2 , y = 1 is a solution of the following equations:

a) $2x + 5y = 9$ b) $x + y + 4 = 0$ c) $\frac{5}{2}x + 3y = 14$