

Algebra Basics Worksheets

Here are some algebra practice problems:

1. Variables and Expressions

- **Practice Problems:**

1. Evaluate the expression $2a + 3b$ if $a = 4$ and $b = 1$.
 - Answer: 11
2. Simplify the expression $5x + 7y - 3x + 2y$.
 - Answer: $2x + 9y$

2. Equations

- **Practice Problems:**

1. Solve for x : $x - 8 = 12$
 - Answer: $x = 20$
2. Solve for y : $3y + 5 = 14$
 - Answer: $y = 3$

3. Inequalities

- **Practice Problems:**

1. Solve for x : $x + 3 < 7$
 - Answer: $x < 4$
2. Solve for y : $2y - 5 > 3$
 - Answer: $y > 4$

4. Linear Equations

- **Practice Problems:**

1. Solve for x : $4x - 7 = 9$
 - Answer: $x = 4$
2. Graph the equation: $y = 2x + 1$
 - Answer: The line passes through $(0, 1)$ and $(1, 3)$