Algebra I Notes 1-1

Variables and Expressions Name:

In the algebraic expression 4s, the letter s is called a variable. In algebra, \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ are symbols used to represent unspecified numbers or values. Any letter may be used as a variable.

An \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ consists of one or more number and variables along with one or more arithmetic operations. Here are some examples of algebraic expressions.

Here are some examples of multiplication.

In each expression the quantities being multiplied are called \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_, and the result is called the \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

An expression line $x^{n}$ is raised is called a \_\_\_\_\_\_\_\_\_\_\_\_\_\_. The variable x is called the \_\_\_\_\_\_\_\_\_\_, and n is called the \_\_\_\_\_\_\_\_\_\_\_\_.

|  |  |  |
| --- | --- | --- |
| Symbols | Words | Meaning |
| $$3^{1}$$ |  |  |
| $$3^{2}$$ |  |  |
| $$3^{3}$$ |  |  |
| $$3^{4}$$ |  |  |
| $$2b^{6}$$ |  |  |
| $$x^{n}$$ |  |  |

**Example 1**: Write Algebraic Expressions

Write an algebraic expression for each verbal expression

1. Eight more than a number
2. 7 less the product of 4 and a number x
3. One third of the original area A
4. The product of 7 and m to the fifth power

To \_\_\_\_\_\_\_\_\_\_\_\_\_\_ an expression means to find its value.

**Example 2**: Evaluate Powers

Evaluate $2^{6}$

**Example 3**: Write a verbal expression

Write a verbal expression for each algebraic expression.

1. $4m^{3}$
2. $c^{2}+21d$