

SECTION 4.1: INTRODUCTION TO ALGEBRAIC EXPRESSION

Homework: _____

Learning Target(s): 3a. Understanding of what like terms are.

Constant: a _____

Term: an algebraic expression that includes a _____

Monomial: an expression with _____ algebraic term

Polynomial: an expression with _____ or more algebraic terms

Binomial: an expression with _____ algebraic terms

Trinomial: an expression with _____ algebraic terms.

Degree: the _____ of the exponents in a term. To find the degree of a polynomial, you find the degree of each _____ and choose the highest degree.

$$2x^2$$

$$3xy$$

$$-x^3y^2$$

$$5x^2 - 3xy + 2y^3$$

ascending order: Write the polynomials in order of increasing _____ and alphabetical.

$$5x^2 - 3x^3 + 4z + 2z^4 - xz + 5$$

descending order: Write the polynomials in order of decreasing _____ and alphabetical.

$$-2 + 4x^3 - 5x + 7y - 2y^2 + 3xy$$

Problems for the left page

Categorize each algebraic expression.

1. $2x + 4$

2. $3x$

3. -5

4. $4x^2 + 3y - 8$

5. $2x^2 - 4x + 3y + z$

6. $-x - 5$

Write each polynomial in descending order.

7. $3x^2 - 4x^3 + 5 - x$

8. $4xy + 2x^2 - 3x + y$

9. $2x^4 + 3y^3 - 4xz + 3xy - 5$

Write each polynomial in ascending order.

10. $12x + 5 - 3x^2$

11. $4x^2 + 3x - x^4 + 5y - 8$

12. $3xy + 2y^2 - 4x + 8$