

Dear Parents or Guardian,

I would like to welcome you and your student to Algebra 1. I believe that your student will succeed in this class and that communication between you and I is one of the many ways to ensure this success. Please read the following information and sign at the bottom. Please fill in the comment section if there is anything I need to know to help make this year easier for your student.

**Curriculum:** New Caney ISD adopted textbooks focusing on problem solving and real-life situations. Each student will be given a textbook to keep at home and a password / username to access the online textbook. I will have a class set for the students to use at school. **In compliance with TEA, middle school students will have to pass the 8<sup>th</sup> grade Math and Reading portions of TAKS in order to be promoted to high school.** In addition, students completing Algebra 1 and the EOC exam will receive high school credit.

**Agenda:** The students are required to record daily activities and homework in their student handbook. The grading policies are in the agenda.

**Homework:** Math homework will be given four days a week. I sometimes assign homework on Fridays when absolutely necessary. All homework is due at the beginning of class.

**Late Work:** In compliance with NCISD Grading Procedures, no late work will be accepted and a zero will be recorded for the grade.

**Make-Up Work:** If your student has been absent from school, it is his/ her responsibility to get the assignments he or she missed. Your student has one day of make-up time for each day absent.

**Tutoring:** Tuesday 6:45-7:15 a.m. If there is a conflict with this time, please let me know so that we can make other arrangements. Tutoring is also available online at <http://my.hrw.com> under the video tab. **User Name: eagles29 Password: eagles**

**Materials:** Refer to the 8<sup>th</sup> grade supply list. **The TI-83 calculator is recommended for this class.** Also, please be aware that all work is to be completed in **pencil** or points will be deducted.

I look forward to working with you and your student. My conference period is 12:42 – 1:34 p.m. Please contact me about any concerns you have at Keefer Crossing 281-577-8840 or email me at [tdemars@newcaneyisd.org](mailto:tdemars@newcaneyisd.org).

Thank You,

Todd DeMars  
Algebra 1

Student Signature: \_\_\_\_\_ E-mail: \_\_\_\_\_

Parent / Guardian Signature: \_\_\_\_\_ Phone#: \_\_\_\_\_

Comments:

# Algebra 1

## Chapter 1: Foundations of Algebra

Variables and expressions

Real numbers

Powers and exponents

Square roots

Order of operations

Properties

Introduction to functions

## Chapter 2: Equations and formulas

Solve 1&2 step equations

Solve multi-step equations

Rates, ratios & proportions

Applications of proportions

Percents

Applications of percents

Percent of increase/decrease

## Chapter 3: Inequalities

Graphing & writing inequalities

Solve 1&2- step inequalities

Solve multi-step inequalities

## Chapter 4: Functions

Graphing relations

Relations and functions

Writing functions

Graphing functions

Scatter plots

Arithmetic sequences

## Chapter 5: Linear Functions

Identifying linear functions

Intercepts

Rate of change and slope

Slope formula

Direct variation

Slope-intercept form

Transforming linear functions

Chapter 6: Systems of Equations and Inequalities

- Solve by graphing
- Solve by substitution
- Solve by elimination
- Solve special systems
- Solve linear inequalities

Chapter 7: Exponents and Polynomials

- Integer exponent
- Scientific notation
- Exponents
- Polynomials
- Special products

Chapter 8: Factoring Polynomials

- Factoring by GCF
- Factoring by  $x^2 + bx + c$
- Factoring by  $ax^2 + bx + c$
- Factoring special products
- Choosing a factoring method

Chapter 9: Quadratic Functions and Equations

- Identify quadratic functions
- Graphing quadratic functions
- Transforming quadratic functions
- Solving quadratic equations

Chapter 10: Data Analysis and Probability

- Organizing & displaying data
- Frequency & histograms
- Data distributions
- Misleading graphs/statistics
- Experimental probability
- Theoretical probability
- Independent & dependent events

Chapter 11: Exponential & Radical  
Functions

Geometric sequences

Exponential functions

Exponential growth & decay

Linear, quadratic, &  
exponential models

Radical expressions

Solve radical equations

Chapter 12: Rational functions & equations

Inverse variation

Simplifying rational  
expressions

Solving rational equations