**Extended Algebra A Syllabus**

Throughout the school year we will be exploring many topics of algebra. Below is a quick list of the questions that will be answered as we cover each unit.

* What are variables and how are they used?
* What are the algebraic properties and how do they make it possible to write and simplify algebraic expressions?
* How can the adding, subtracting, multiplying, or dividing help solve equations?
* What is the distributive property and how do you collect terms in an equation?
* What are the types of measures of central tendancy and how do they help organize data?
* What is the difference between equations and inequalities?
* What are the exceptions to solving inequalities?
* How are proportions used to solve problems and how do they relate to percentages, probabilities and similar figures?
* What are functions and how can they be represented visually?
* What is unique about linear quations?
* How does the rate of change relate to the slope of a line?
* What are the different forms of linear equations and how are they used?
* What does the graph of an absolute value equation look like?

As you can see, many of these units involve memorizing particular rules or forms of algebra. The students will be presented with different situations, diagrams, and a set of tools to use. As they master each fundamental concept they will be asked to progress to higher levels of understanding. Therefore review will be needed along the way to ensure that concepts are not lost as they move to new units.

**Grading Process**

I grade this class on three categories: Tests, Quizzes, and Homework. My philosophy is that math is a practiced skill much like a sport. The daily homework is just like a practice. It covers main concepts and reviews previous sections as well as provides some challenge problems to stretch the mind. I do not however expect everyone to be perfect the first time they learn a new concept, so daily work is typically graded on effort. I should be able to see that logical attempts were made on every problem with work shown. Randomly I may give pop quizzes over homework problems, and that would replace a daily homework score.

The quizzes and tests, however, are more like performing in the actual ballgame. That is where I can tell if each of the students has understood the concepts and can apply them. I am very specific and detailed when I grade those. Therefore the scale below is how each category is weighted.

Homework = 20% Quizzes = 30% Tests 50%

**Classroom Expectations**

In order to make it the best environment for learning we need to maintain three important principles every day; **Readiness, Responsibility and Respect**.

First we must be **Ready** for class. Students will be in attendance daily. Regular attendance is vital to the success of all students. Students will also be in their seat before the bell rings and have all of their supplies with them. Such as, book, pencil, pen, paper, graph paper and geometry tools if necessary. Book bags will not be allowed in the classroom, as they cause a distraction.

Second we must be **Responsible** for ourselves. That would mean that any assignment given previously should be completed on time, labeled correctly and handed-in. If a student has missed some class for illness or other reasons they will be required to hand-in the late work when they return to class. Students will be given 2 days extra to make-up any assignments that they missed due to an unexpected absence. A student may make an appointment with me to go over the concepts outside of class time. I will be available:

Tuesday – Friday Morning 7:45-8:10 (Mondays are Faculty Meetings)

3rd or 7th period By Appointment

After school 3:30-4:00

Finally, we must have **Respect** for everyone. Algebra has many difficult concepts to cover and each student needs the best environment to be able to learn. Any behavior that disrupts that learning will not be tolerated.