

Pre-Calculus Course Syllabus  
Tulahoma High School

### TENNESSEE STATE STANDARDS

Pre-calculus is designed to prepare students for college level STEM focused courses. Students extend their knowledge of the complex number system to use complex numbers in polynomial identities and equations. Topics for student mastery include vectors and matrix quantities, sequences and series, parametric equations, and conic sections. Students use previous knowledge to continue progressing in their understanding of trigonometric functions and using regression equations to model quantitative data.

Pre-calculus includes the following domains and clusters:

- Number Expressions
- The Complex Number System
- Vectors and Matrix Quantities
- Sequences and Series
- Reasoning with Equations and Inequalities
- Parametric Equations
- Conic Sections
- Building Functions
- Interpreting Functions
- Trigonometric Functions
- Graphing Trigonometric Functions
- Applied Trigonometry
- Trigonometric Identities
- Polar Coordinates
- Model with Data

The domain standards are interwoven throughout the content topics. For additional specific standards please visit the state of Tennessee website.

(<https://www.tn.gov/education/article/mathematics-standards>)

The eight Standards for Mathematical Practice are an important component of the mathematics standards for each course. The Standards for Mathematical Practice describe the varieties of expertise, habits of minds, and productive dispositions that educators see to develop in all students.

- ❖ Make sense of problems and persevere in solving them.
- ❖ Reason abstractly and quantitatively.
- ❖ Construct viable arguments and critique the reasoning of others.
- ❖ Model with mathematics.
- ❖ Use appropriate tools strategically.
- ❖ Attend to precision.

- ❖ Look for and make use of structure.
- ❖ Look for and express regularity in repeated reasoning.

## INSTRUCTIONAL MATERIALS ACCESS

Textbook: McGraw Hill, Algebra and Trigonometry, second edition, John Coburn © 2010, Students are given a physical copy of the textbook.

Google Classroom has all supplemental materials (exercises, assignments, and handouts)

Students have access code. Please request code from your child or email Dr. Terry to send you the code.

### 1. **Supplies**

- a) pencils, eraser, lined paper, graph paper, three ring binder (1 or 1 ½ inch)
- b) calculator – can use phone or computer calculator for HW assignments
- c) Room Fees- \$5 to be paid at the beginning of the school year

### 2. **Access**

- a.) grade reports can be found on ed-line and checked regularly
- b.) textbook – access information on Google Classroom – includes all activities

### 3. **Assessment**

50%	Tests
35%	Quizzes
15%	Assignments

- a) Tests will be given every 2 to 3 weeks to cover an entire chapter of material. Dr. Terry will use an option of grading using highlighted mistakes. Students must be present for those 2 consecutive days to participate in this opportunity. The tests will remain at school for future use in class.
- b) Quizzes are given periodically and cover material from several objectives. The purpose is to provide corrective feedback for the student and the teacher. Dr. Terry uses them as an opportunity to re-teach where needed and students should use them as study material for unit tests. Quizzes may or may not be announced in advance. When a student misses class, the quiz is generally not required or counted.
- c) Projects and Problem Solving will be assigned every 2 to 3 weeks. They may be a group assignment or individual. The project may require research from the Internet and/or library and may involve written work, report, or classroom presentation.
- d) Assignments are given just about every day. Dr. Terry will provide some class time, but students are expected to allow 30- 45 minutes a day to complete assignments. Dr. Terry is primarily concerned with mastery of the material and working outside of class reinforces learning.

- e) Final Exams are required for all students. It is to the benefit of the student to have experience studying, preparing, and taking exams. The scoring is done on a curve that benefits every student.
  - f) Grades & Assignments will be posted on Schoology.
- 3.) **Absences-** All school rules to absences apply. Dr. Terry will work out an individual plan for students who have extended absences.
- a) Students should try to get the *homework* assignment from a classmate so as not to get behind. Although the policy is to allow 3 days to make-up assignments, that is highly discouraged in a math class because of the building effect of learning.
  - b) *Quizzes* are not usually make-up work. Quiz grades for absent students will not be added in to the final total of the students' grade.
  - c) Students will always know of *test* day in advance and therefore are expected to take the test when they are present. (The only exception is for extended illnesses.) A student who is absent the day of the test is expected to schedule the make-up test upon their return and within 3 school days. Make ups can be done before school or after school by appointment only.
  - d) Students must apprise Dr. Terry ahead of time of *any field trip days, sports events or other school related activities* that relieve the student from class. At this time Dr. Terry will prepare the lessons for the student and will expect the student to complete the task(s) at hand in the same timely manner as the rest of the class. No extra time will be given.