

TRIGONOMETRY (Online)

What is Trigonometry?

Trigonometry is a branch of mathematics that studies the relationships between the sides and angles of triangles. In this course we will study these relationships in both acute and oblique triangles. There are six functions of angles which are used in solving for parts of triangles, solving trigonometric equations, and applications in the future course of Calculus. We will also look at the specific graphs associated with each of these six functions.

How much time will this class take?

Although online classes can give you a lot of flexibility with your time, an online class requires excellent study skills and a great deal more discipline than a face-to-face class.

Trigonometry is a four-unit course. This means that a student taking this class **face-to-face** will spend four hours per week in class, **getting instruction from the instructor**. In addition to in-class time, a trigonometry student can expect to spend approximately **two hours** working on homework for every one hour he/she is in class. Therefore, a trigonometry student can expect to spend approximately **12 hours** per week on this course. **As an online student, you can expect to spend at least 12 hours per week on this course as well.** This number may be lower or higher for you, depending on your math preparedness.

I definitely **do not** recommend an online course for students who . . .

- ✓ do not have strong study skills and discipline
- ✓ do not have solid math skills in the prerequisite courses
- ✓ have not taken math for a long time
- ✓ have received a grade lower than a B in a previous math class.

What materials do I need?

- The textbook we will be using is *Lial, Hornsby, Schneider and Daniels, Trigonometry, 10th Edition*



Note: You do not need to buy the book, but you **must** buy the Access Code.

- Scientific Calculator (TI84 **recommended**.)
Note: The library has TI84 calculators available to be checked out for the entire semester.
- **Access Code to My Math Lab (Available in bookstore or Pearson website)**

How do I earn my grade?

HOMEWORK: Online homework will account for **40%** of your grade.

Homework assignments are completed **online** and the assignments can be found at the *My Math Lab* website, www.pearsonmylabandmastering.com. You may work ahead if you like.

It is important to keep up with the deadlines set in the course in order to be successful! Each assignment has a due date; assignments completed after the due date will lose **25%** of the points possible ***for every day it is late.***

ONLINE EXAMS: Online Exams will account for **40%** of your grade. There will be six to seven online exams given, usually (but not always!) covering one chapter of material in each exam and worth 100 points per exam.

Tests will be available three days prior to the deadline. After the deadline the test will no longer be available. You have two attempts to take each online exam, and the highest score of the two will be recorded. If you choose not to take the exam a second time, then your original score is the one recorded. Failure to take an exam will result in a grade of zero for that exam.

*Note: Once you begin the exam you will have 90 minutes to complete it. After the 90 minutes have expired, the exam will no longer be available to you. It is not possible to stop the exam and return to it later! If you attempt to do this you will be locked out of the program and will have to contact me for access to the course. Be sure to plan your exam time accordingly; if you start the exam with less than 90 minutes before the exam deadline, the program will shut you out at the deadline, **not 90 minutes after the time you started!***

Very important note! If, while taking an exam, you attempt to navigate to another website or another part of the Pearson website the system will shut down the test, submit whatever score you had at that point and lock you out of both the exam and the course. **DO NOT** navigate away from the webpage the test is on or try to open another browser!

FINAL EXAM: The online final exam will represent **20%** of your grade. This exam will be comprehensive, worth 100 points and will be given online during finals week.

Attendance

- Since this is an online class, your attendance is based on your working on assignments at www.pearsonmylabandmastering.com on a regular basis and staying up to date on assignments. Failure to complete assignments and online exams in a timely manner may result in your being dropped from the course for nonattendance.
- Students who do not sign up at www.pearsonmylabandmastering.com and complete the first two assignments (Sections 1.1 and 1.2) by **Sunday, January 20, 2019** will be dropped. My Math Lab will allow you to **temporarily** enroll on their site with a

temporary access without buying the access code at the time you enroll in the course.

- Note: Any student who enrolls with a *temporary access code* will be **required** to have purchased the access code and be **permanently enrolled** in the My Math Lab course by **Sunday, January 27, 2019**. Failure to do so will result in a **drop from the course!**
- Checking your email and Canvas daily is also a part of your attendance. Students are responsible for all information sent to them in emails or posted on the Canvas site. **Not checking your email or Canvas is not an excuse for anything!**
- It is your responsibility to make sure you have a good internet connection and that the computer you are using can handle the necessary software for the course. Technology problems are not an excuse to get extensions, second chances or exceptions for any assignment, **especially on tests**. If your computer 'freezes' during an online exam, you will not be given access to it again and you will receive a grade of zero for that attempt. Remember, you have two attempts for each exam.

GRADING:

At the end of the semester

- The lowest two **homework grades** will be dropped.
 - Whatever score you earn on the final exam will be recorded as your final exam score and will **replace** your **lowest** of the previous online exam scores (**if** the final is higher than that low online exam score). **Note: This does not mean your lowest score is dropped, but that it is replaced by your final exam score. If your final is not higher than the lowest exam score, then your lowest exam score stays.**
 - Missing the final exam will result in a score of 0.
 - There are no makeups for **any** missed online exams or the final exam.
- **Homework** will represent **40%** of the final course grade.
 - **Online Exams** will represent **40%** of the final course grade.
 - The online **Final Exam** will represent **20%** of the final course grade.

Example: If your homework average is 85, the average of your online exams is 75 and your final exam score is 78, then you would compute your grade as follows:

$$(.40)(85) + (.40)(75) + (.20)(78) = 34 + 30 + 15.6 = 79.6$$

The **grading scale** for this course will be:

**89.5% - 100% = A 79.5% - 89.4%= B 66.5% - 79.4%= C 54.5% - 66.4% =
D 0 - 54.4%=F**

Academic Dishonesty: Reedley College rules on plagiarism will be strictly enforced. Academic dishonesty in any form is a very serious offense and will incur serious consequences, including but not limited to receiving a grade of F in the course. **The student receiving the grade on their transcript needs to be the person doing the work at ALL times in this class.** If not, the student will receive an automatic F in the course, and suffer the utmost consequences of plagiarism as set forth by the college's academic regulations.

***NOTE:** If you have a verified need for an academic accommodation or materials in alternate media per the Americans with Disabilities Act or Section 504 of the Rehabilitation Act, please contact me as soon as possible.*

Important Deadlines!!

January 20, 2019	Deadline to be enrolled on My Math lab and have first two assignments completed
January 27, 2019	Deadline to have paid for access code and be PERMANENTLY enrolled in My Math Lab
March 15, 2019	Last Day to Drop
May 21, 2019	FINAL EXAM

Academic Calendar:

- January 21, 2019 (M) – Martin Luther King Holiday (no classes, campus closed)
- February 1, 2019 (F) Last day to add a full-term class
- February 8, 2019 (F) Last day to change a Spring 2019 class to a Pass/No-Pass grading basis
- February 15 – 18, 2019 (F,M) – President's Day holiday (no classes, campus closed)
- March 15, 2019 (F) - Last day to drop a Spring 2019 full-term class
- April 15 – 19, 2019 (M-F) Spring Recess (no classes held, campus open M-TH)
- May 21, 2019 (T) – Final Exam

COURSE OBJECTIVES

Students will be able to:

- apply the trigonometric functions to solve for the parts of a triangle.
- evaluate trigonometric functions of both acute and obtuse angles.
- solve problems involving vectors
- apply the concept of radian measure to circular functions
- apply trigonometric identities to simplify algebraic expressions and solve equations.
- apply the concept of polar coordinates to algebraic operations and graphs.
- apply computing and graphing technology.

COURSE CONTENT OUTLINE

Chapter 1: Trigonometric functions

Chapter 2: Acute Angles and Right Triangles

Chapter 3: Radian Measure and Circular Functions

Chapter 4: Graphs of the Circular Functions

Chapter 5: Trigonometric Identities

Chapter 6: Inverse Circular Functions and Trigonometric Equations

Chapter 7: Applications of Trigonometry and Vectors

Chapter 8: Complex Numbers, Polar Equations and Parametric Equations (as time permits)