

MATH111 16

STUDENT WARNING: This course syllabus is from a previous semester archive and serves only as a preparatory reference. Please use this syllabus as a reference only until the professor opens the classroom and you have access to the updated course syllabus. Please do NOT purchase any books or start any work based on this syllabus; this syllabus may NOT be the one that your individual instructor uses for a course that has not yet started. If you need to verify course textbooks, please refer to the online course description through your student portal. This syllabus is proprietary material of APUS.

Course Summary

Description

Course Description: This is a course in college trigonometry. It builds on earlier college algebra courses such as MATH110, extends the students' studies to trigonometry, and introduces topics in analytical geometry. Practical applications are provided throughout the course. The course begins by reviewing methods of graphing and solving linear and quadratic functions as well as techniques for solving polynomials. It then concentrates on various trigonometric functions, identities and equations as well as the application of trigonometry to real-life situations. The final part of the course includes exponential and logarithmic functions as well as selected topics in analytic geometry including polar coordinates and the conic sections. While there are no pre-requisites for MATH111, the course assumes the student has completed MATH110 College Algebra or an equivalent college level course.

Course Scope:

This course is presented online through the APUS website. It uses a specially developed online text and workbook and is supplemented by video lectures covering each of the key mathematical skills needed to succeed in the course. The course reviews the basics of algebra and graphing, trigonometric functions (which include angular measure, right triangles, sine and cosine functions and graphing trig functions), trigonometric identities and the applications of trigonometry, complex numbers, complex numbers in trig form, polar coordinates, application of exponential and logarithmic functions and the study of conic sections.

Objectives

After completing the course, the student should be able to accomplish these Course Objectives (CO):

CO-1 Apply the basic concepts of trigonometry to circular functions

CO-2 Analyze problems using trigonometric identities, inverse functions, and equations.

CO-3 Solve problems using triangles, and vectors.

CO-4 Evaluate problems using logarithms and exponential functions.

CO-5 Apply concepts of conic sections to practical applications.

Outline

Week 1: Functions and their Graphs – Part 1

Learning Objectives

Course Objective 1

1.1 Coordinates and Graphs

- Use the Cartesian System
- Compute the Distance and Midpoint Formulas
- Find the Second Endpoint of a Segment
- Explain Collinearity and Distance
- Classify Triangles using the Distance Formula
- Graph Equations by Plotting Points
- Compute the x- and y-Intercepts of an Equation
- Compute the Equation of a Circle
- Graph a Circle
- Write the Equation of a Circle
- Test for Symmetry
- Use Symmetry as a Sketching Aid
- Use the Vertical Line Test on Functions
- Identify Functions Algebraically
- Use Function Notation and Finding Function Values
- Evaluate Piece-wise Defined Functions
- Find Specific Function Values
- Model with Functions
- Find the Domain of a Function

Readings

Book: pp 116 – 139 and 164 - 174

View video lectures in Sections 1.1 and 1.4

Assignment

First required contact

Introduce yourself to your classmates in the discussion forum

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Week 2: Functions and their graphs – Part 2

Learning Objectives

Course Objective 1

1.5 Graphs of Functions

- Find the Domain and Range
- Graph Some Important Functions
- Graph Piecewise-Defined Functions
- Use a Table to Graph Piecewise-Defined Functions
- Model with Piecewise-Defined Functions
- Find Zeroes of a Function
- Determine Intervals Over Which a Function Increases
- Find Relative Minimums and Maximums

1.6 Transformations of Functions

- Translate Functions
- Reflect Functions
- Stretch Functions
- Use Patterns to Graph Functions
- Evaluate Even and Odd Functions

1.7 Combining Functions

- Use Operations with Functions
- Find the Difference Quotient
- Find Composition of Functions
- Find Functions That Form a Given Composite
- Model Composite Functions

1.8 Inverse Functions

- Find Inverse Functions
- Examine the Horizontal Line Test
- Verify That Functions Are Inverses
- Find the Inverse of a Function Graphically
- Find the Inverse of a Function Algebraically

Readings

Book: pp 175-225

View video lectures in Sections 1.5 – 1.8

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test in Thinkwell (5 points)

Complete Assignment Test 2 Critique in the APUS classroom.

Week 3: Polynomial Functions – Part 1

Learning Objectives

Course Objective 1

2.1 Quadratic Functions and Models

- Reflect, Stretch, and Compress Quadratic Functions
- Identify the Vertex and Axis of Symmetry
- Find the Vertex by Completing the Square
- Translate of Quadratic Functions
- Relate the Discriminant to the Graph of a Quadratic Function
- Graph Quadratic Functions
- Write the Equation of a Quadratic Function
- Find the Maximum or Minimum of a Quadratic Function
- Model with Quadratic Functions

2.2 Polynomial Functions and Their Graphs

- Explore End Behavior of Graphs of Polynomial Functions
- Reflect, Stretch, and Translate Polynomial Functions
- Find Zeros and Their Multiplicities for a Polynomial
- Graph Polynomial Functions
- Use the Intermediate Value Theorem and Local Extrema

Readings

Book: pp 226-251

View video lectures in Sections 2.1 – 2.2

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 3 in Thinkwell (5 points)

Complete Assignment Test 3 Critique in the APUS classroom.

Week 4: Polynomial Functions – Part 2

Learning Objectives

Course Objective 1

2.3 Dividing Polynomials

- Solve using Long Division with Polynomials
- Solve using Synthetic Division with Polynomials
- Use the Remainder Theorem
- Review the Factor Theorem

2.4 Real Zeroes of Polynomials

- Factor a Polynomial Given a Zero
- Use Zeroes to Write a Polynomial Function
- Use Zeroes, Degree, and a Point to Write a Polynomial Function
- Review the Rational Zero Theorem
- Find the Zeros of a Polynomial from Start to Finish
- Use Descartes' Rule of Signs

- Find the Upper and Lower Bounds

2.5 Complex Zeros and the Fundamental Theorem of Algebra

- Rewrite Powers of i
- Add and Subtract Complex Numbers
- Multiply Complex Numbers
- Divide Complex Numbers
- Use the Fundamental Theorem of Algebra
- Find All Solutions of a Polynomial Equation
- Use The Conjugate Pair Theorem

Readings

Book: pp 252-281

View video lectures in Sections 2.3 to 2.5

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 4 in Thinkwell (5 points)

Complete Assignment Test 4 Critique in the APUS classroom.

Week 5: Rational Functions and Conics – Part 1

Learning Objectives

Course Objective 1, 5

3.1 Graphing Rational Functions

- Graph Basic Rational Functions
- Find the Vertical Asymptotes of a Rational Function
- Graph Rational Functions with Vertical Asymptotes
- Graph Rational Functions with Vertical and Horizontal Asymptotes
- Explore Oblique Asymptotes

3.2 Parabolas

- Use Conic Sections
- Graph Parabolas
- Write the Equation of a Parabola

Readings

Book: pp 282 - 300

View video lectures in Sections 3.1 – 3.2

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 5 in Thinkwell (5 points)

Complete Assignment Test 5 Critique in the APUS classroom.

Week 6: Rational Functions and Conics – Part 2

Learning Objectives

Course Objective 1, 5

3.3 Ellipses

- Write the Equation of an Ellipse
- Graph Ellipses
- Review the Eccentricity of an Ellipse

3.4 Hyperbolas

- Write the Equation of a Hyperbola
- Graph Hyperbolas
- Apply Hyperbolas to Navigation

3.5 Translations of Conics

- Translate Parabolas
- Translate Ellipses
- Translate Hyperbolas
- Identify a Conic
- Use the Discriminant and Coefficients to Identify a Conic

Readings

Book: pp 301 - 337

View video lectures in Sections 3.3 – 3.5

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 6 in Thinkwell (5 points)

Complete Assignment Test 6 Critique in the APUS classroom.

Week 7: Exponential and Logarithmic Functions – Part 1

Learning Objectives

Course Objective 4

4.1 Exponential Functions

- Review Exponential Functions
- Graph Exponential Functions
- Transform Exponential Functions
- Find Present Value and Future Value
- Find an Interest Rate to Match Given Goals
- Evaluate and Graph a Natural Exponential Function
- Apply Natural Exponential Functions

4.2 Logarithmic Functions

- Review Logarithmic Functions
- Convert Between Exponential and Logarithmic Functions
- Evaluate Logarithms
- Use Properties to Evaluate Logarithms
- Graph Logarithmic Functions
- Match Logarithmic Functions with Their Graphs
- Review Common Logs and Natural Logs
- Evaluate Common Logs and Natural Logs Using a Calculator
- Evaluate Logarithmic Models
- Review Domain of a Natural Log Function

Readings

Book: pp 338 - 363

View video lectures in Sections 4.1 – 4.2

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 7 in Thinkwell (5 points)

Complete Assignment Test 7 Critique in the APUS classroom.

Week 8: Exponential and Logarithmic Functions – Part 2

Learning Objectives

Course Objective 4

4.3 Properties of Logarithms

- Review Properties of Logarithms

- Expand Logarithmic Expressions
- Combine Logarithmic Expressions
- Use the Change of Base Formula

4.4 Exponential and Logarithmic Equations

- Use the One-to-One Property to Solve Exponential Equations
- Solve Exponential Equations Using Logs
- Solve Natural Exponential Equations
- Solve Exponential Equations of Quadratic Type
- Use Exponential Form to Solve Logarithmic Equations
- Review The Distance Modulus Formula
- Solve Logarithmic Equations For Compound Interest

4.5 Exponential and Logarithmic Models

- Predict Change with Logarithmic Models
- Review Exponential Growth and Decay
- Determine Half-Life
- Use Newton's Law of Cooling
- Determine Continuously Compounded Interest
- Use Logistic Models
- Explore Gaussian Models

Readings

Book: pp 364 - 391

View video lectures in Sections 4.3 – 4.5

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 8 in Thinkwell (5 points)

Complete Assignment Test 8 Critique in the APUS classroom.

Week 9: Trigonometric Functions – Part 1

Learning Objectives

Course Objective 2

5.1 Angles and Their Measure

- Measure Angles Using Degrees
- Draw an Angle in Standard Position
- Find the Quadrant in Which an Angle Lies
- Find Coterminal Angles
- Find the Complement and Supplement of an Angle
- Convert Between Degrees and Radians
- Use the Arc Length Formula
- Find Linear and Angular Speeds

- Find the Area of a Sector of a Circle

5.2 Right Angle Trigonometry

- Examine Trigonometric Functions

- Evaluate Trigonometric Functions

- Find an Angle Measure in a Special Right Triangle Using the Value of a Trigonometric Function

- Use Trigonometric Functions to Find Unknown Sides of Right Triangles

- Use Trigonometric Functions to Determine a Length

- Use Trigonometric Functions with an Angle of Elevation or Depression

5.3 Trigonometric Functions in the Coordinate Plane

- Evaluate Trigonometric Functions of an Angle in the Coordinate Plane

- Evaluate Trigonometric Functions Using the Reference Angle

- Use Values of Trigonometric Functions to Find the Value of Another Trigonometric Function

- Explore Trigonometric Functions of Important Angles

5.4 Unit Circle Trigonometry

- Use The Unit Circle

- Use the Unit Circle to Evaluate Trigonometric Functions

- Review The Domain and Period of Sine and Cosine

- Determine Even and Odd Trigonometric Functions

Readings

Book: pp 392 - 435

View video lectures in Sections 5.1 – 5.4

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages

- Watch the video lessons

- Watch the video sample solutions

- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 9 in Thinkwell (5 points)

Complete Assignment Test 9 Critique in the APUS classroom.

Week 10: Trigonometric Functions – Part 2

Learning Objectives

Course Objective 2

5.5 Graphing Sine and Cosine Functions

- Examine the Graphs of the Sine and Cosine Functions

- Change the Amplitude of Sine and Cosine Functions

- Change the Period of Sine and Cosine Functions

- Change the Amplitude and Period of Sine and Cosine Functions

- Find Maximum and Minimum Values and Zeros of Sine and Cosine

- Graph Sine and Cosine Functions with Phase Shifts

- Graph All Types of Sine and Cosine Functions

- Model with Sine and Cosine Functions

5.6 Graphing Other Trigonometric Functions

- Examine the Graph of the Tangent Function
- Examine the Graphs of the Cosecant and Secant Functions
- Examine the Graph of the Cotangent Function
- Graph Tangent Functions: Stretches
- Graph Tangent and Cotangent Functions: Stretches and Changes to the Period
- Graph Cosecant and Secant Functions
- Graph Cosecant and Secant Functions: Changes to the Period
- Shift the Graphs of Other Trigonometric Functions
- Identify the Equation of a Trigonometric Function from Its Graph

5.7 Inverse Trigonometric Functions

- Examine Inverse Trigonometric Functions
- Evaluate Inverse Sine, Cosine, and Tangent Functions
- Evaluate a Composition Involving Inverse Trigonometric Functions
- Explore Inverse Cosecant, Secant, and Cotangent Functions

5.8 Applications of Trigonometric Functions

- Find Unknown Sides and Angles in a Right Triangle
- Explore Trigonometry and Bearings
- Review Harmonic Motion and Damped Harmonic Motion

Readings

Book: pp 436 - 497

View video lectures in Sections 5.5 – 5.8

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 10 in Thinkwell (5 points)

Complete Assignment Test 10 Critique in the APUS classroom.

Week 11: Analytic Trigonometry – Part 1

Learning Objectives

Course Objective 2

6.1 Fundamental Trigonometric Identities

- Explore Fundamental Trigonometric Identities
- Use Trigonometric Identities
- Simplify a Trigonometric Expression Using Identities
- Simplify Products of Binomials with Trigonometric Functions
- Factor Trigonometric Expressions
- Prove an Identity

6.2 Solving Trigonometric Equations

- Solve Equations with a Single Trigonometric Function
- Solve Trigonometric Equations Using Inverse Functions

- Solve Trigonometric Equations by Factoring
- Solve Trigonometric Equations Involving a Multiple of an Angle
- Solve Trigonometric Equations of Quadratic Type
- Solve Trigonometric Equations Using Fundamental Identities
- Solve Trigonometric Applications Involving Trigonometric Equations

Readings

Book: pp 498 - 525

View video lectures in Sections 6.1 – 6.2

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 11 in Thinkwell (5 points)

Complete Assignment Test 11 Critique in the APUS classroom.

Week 12: Analytic Trigonometry – Part 2

Learning Objectives

Course Objective 2

6.3 The Sum and Difference Formulas

- Examine the Sum and Difference Formulas
- Use the Sum and Difference Formulas to Find Exact Values
- Use Sum and Difference Formulas to Verify a Cofunction Identity
- Use the Sum and Difference Formulas to Verify an Identity
- Use the Sum and Difference Formulas to Solve an Equation

6.4 Double-Angle, Half-Angle, and Product-Sum Formulas

- Use Double-Angle Formulas
- Use Double-Angle Formulas to Solve Equations
- Use a Power-Reducing Formula
- Use Half-Angle Formulas to Find Exact Values
- Use Product-Sum Formulas

Readings

Book: pp 526-547

View video lectures in Sections 6.3 – 6.4

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 12 in Thinkwell (5 points)

Complete Assignment Test 12 Critique in the APUS classroom.

Week 13: Application of Trigonometry – Part 1

Learning Objectives

Course Objective 3

7.1 The Law of Sines

- Use the Law of Sines Given Two Angles and One Side
- Use the Law of Sines Given One Angle and Two Sides
- Use the Law of Sines: The Ambiguous Case
- Find the Area of an Oblique Triangle

7.2 The Law of Cosines

- Examine the Law of Cosines
- Examine the Law of Cosines (SSS)
- Examine the Law of Cosines (SAS)
- Examine Heron's Formula

7.3 Vectors

- Examine Vectors
- Find the Magnitude and Direction of a Vector
- Use Scalar Multiplication
- Use Vector Arithmetic
- Find the Components of a Vector
- Find a Unit Vector
- Explore Applications of Vectors
- Explore Linear Combinations and Direction Angles of Vectors

Readings

Book: pp 548 - 577

View video lectures in Sections 7.1 – 7.3

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 13 in Thinkwell (5 points)

Complete Assignment Test 13 Critique in the APUS classroom.

Week 14: Application of Trigonometry – Part 2

Learning Objectives

Course Objective 3

7.4 The Dot Product

- Examine the Dot Product of Vectors
- Review Angle Between Two Vectors
- Determine Whether Two Vectors Are Parallel or Orthogonal
- Decompose a Vector into Two Orthogonal Vectors

7.5 Trigonometric Form and Roots of Complex Numbers

- Graph a Complex Number and Finding Its Modulus
- Express a Complex Number in Trigonometric or Polar Form
- Multiply and Divide Complex Numbers Polar Form
- Use DeMoivre's Theorem to Raise a Complex Number to a Power
- Find the roots of Complex Numbers

Readings

Book: pp 578 - 597

View video lectures in Sections 7.4 – 7.5

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

Submit Test 14 in Thinkwell (5 points)

Complete Assignment Test 14 Critique in the APUS classroom.

Week 15: Analytic Geometry

Learning Objectives

Course Objective 1

10.1 Polar Coordinates

- Explore Polar Coordinates
- Convert Between Polar and Rectangular Coordinates

10.2 Polar Equations

- Write a Polar Equation in Rectangular Form
- Write a Rectangular Equation in Polar Form
- Graph Simple Polar Equations
- Graph Special Polar Equations

Readings

Book: pp 692 - 698

View video lectures in Sections 10.1 – 10.2

Assignment

Participate in this week's discussion forum.

On the Thinkwell site for each section

- Read the Book pages
- Watch the video lessons
- Watch the video sample solutions
- Complete the interactive practice problems

For extra practice, work on the odd numbered problems in the back of each section (answers are in the back of the book starting on page 795)

No Exam this week

Week 16: Final Examination

Learning Objectives

Course Objective 1 – 5

Demonstrate your knowledge of trigonometry

Readings

Assignment

Final required contact – be sure to stop by the discussion forum for the Final Debriefing

Submit Final Examination by 11:59 PM Eastern time, on Sunday. (Covers the material in Weeks 1-14) (20 points)

Complete Assignment Final Exam Critique in the APUS classroom.

Evaluation

Student grades for the course will be based on class participation in 15 Forums, 14 online unit tests and a timed online Final Exam.

Class Participation: The University requires weekly contact from each student. This requirement can be met by taking the Unit Tests and by participation in the Forums. A total of 10% of the final grade will be based on participation in the Forums.

Unit Tests: There will be 14 graded tests during the course, each of which will count as 5% of the final grade. They will be open book and open note tests, however, you may not receive any help from another person. These tests will consist of problems similar to those in the online practice problems at thinkwell.com. They are selected to provide the student with hands on experience in applying the techniques and models being discussed.

Final Examination: The final exam will count as 20% of the final grade. It will be an online, open-book, open-note exam. You may not consult with any other person while taking the exam. This examination will be based on all material covered during the course of the semester. Please coordinate with the professor for any

special arrangements. Unless the professor approves alternate arrangements, students should plan to take the final examination during the last week of the course. You will not need a proctor to take this exam.

Assignment Deadlines: Students must plan and manage competing demands and priorities on their time and are expected to submit classroom assignments on time. Assignment due dates and times are explained in the Lessons. All assignments must be submitted by the last day of class unless you have an approved course extension.

Please see the [Student Handbook](#) to reference the University's [grading scale](#).

Instructors will submit student course grades to the University within seven days after the end of the semester. Official grades will continue to be issued by the University on the grade report form.

Grading:

Name	Grade %
Honor Code Assignment	1.00 %
APUS Honor Code and Pledge	1.00 %
Forums	8.00 %
Forum 1	1.00 %
Forum 2	1.00 %
Forum 3	1.00 %
Forum 4	1.00 %
Forum 5	1.00 %
Forum 6	1.00 %
Forum 7	1.00 %
Forum 8	1.00 %
Homework Practice Tests	15.00 %
Homework Practice Tests	15.00 %
Assignments	56.00 %
Week 1 Test Critique	4.00 %
Week 2 Test Critique	4.00 %
Week 3 Test Critique	4.00 %
Week 4 Test Critique	4.00 %
Week 5 Test Critique	4.00 %
Week 6 Test Critique	4.00 %
Week 7 Test Critique	4.00 %
Week 8 Test Critique	4.00 %
Week 9 Test Critique	4.00 %
Week 10 Test Critique	4.00 %
Week 11 Test Critique	4.00 %
Week 12 Test Critique	4.00 %
Week 13 Test Critique	4.00 %
Week 14 Test Critique	4.00 %
Final Examination	20.00 %
Final Exam Critique	20.00 %

Materials

Book Title: Thinkwell Trigonometry Online Materials - access provided inside the classroom

Author: Burger

Publication Info: Thinkwell

ISBN: THINKWELL-TRIG

Access to Thinkwell will be provided within the classroom. Students who have trouble accessing the Thinkwell site should contact classroomsupport@apus.edu for assistance.

There are video presentations, video sample solutions, interactive practice problems, and an ebook with extra practice problems for each section of the book that are available within the Thinkwell website. Working these problems is a good way to get feedback on how well you understand the material. The site also provides hints on how to get the answers to problems you miss. These practice problems are not part of the evaluation process but are an important factor in success at mastering the subject. Math is not a spectator sport - one learns math by putting the pencil to the paper!

Web Sites – www.thinkwell.com

Included with the class is a subscription to Thinkwell - an online resource provided by the publisher with video lectures and guided Practice Problems to aid in understanding the material more easily. Homework, unit tests, and supplementary information is available through Thinkwell. The advantage of using Thinkwell is the variety of help buttons that can be used for guidance in solving each problem.

Supplementary Materials

The lessons contain links to online supplementary materials for this class. You may click on the links in the lessons directly to view them. In addition to these, the following public domain web sites are useful. Please abide by the university's academic honesty policy when using Internet sources as well. Note web site addresses are subject to change.

Site Name	Web Site URL/Address
Khan Academy	http://www.khanacademy.org/
PatrickJMT	http://patrickjmt.com/
Purplemath	http://www.purplemath.com/modules/
VirtualMathLab	http://www.wtamu.edu/academic/anns/mps/math/mathlab/
APUS Trigonometry Videos	http://www.apus.edu/media/mathWV/trigonometry.htm
APUS You Tube Channel	https://www.youtube.com/user/APUS07/videos?query=trigonometry

Course Guidelines

Citation and Reference Style

- Attention Please: Students will follow the APA Format as the sole citation and reference style used in written work submitted as part of coursework to the University. Assignments completed in a narrative essay or composition format must follow the citation style cited in the APA Format.

Tutoring

- [Tutor.com](https://www.tutor.com) offers online homework help and learning resources by connecting students to certified tutors for one-on-one help. AMU and APU students are eligible for 10 free hours* of tutoring provided by APUS. Tutors are available 24/7 unless otherwise noted. Tutor.com also has a SkillCenter Resource Library offering educational resources, worksheets, videos, websites and career help. Accessing these resources does not count against tutoring hours and is also available 24/7. Please visit the APUS Library and search for 'Tutor' to create an account.

Late Assignments

- Students are expected to submit classroom assignments by the posted due date and to complete the course according to the published class schedule. The due date for each assignment is listed under each Assignment.
- Generally speaking, late work may result in a deduction up to 15% of the grade for each day late, not to exceed 5 days.
- As a working adult I know your time is limited and often out of your control. Faculty may be more flexible if they know ahead of time of any potential late assignments.

Turn It In

- Faculty may require assignments be submitted to Turnitin.com. Turnitin.com will analyze a paper and report instances of potential plagiarism for the student to edit before submitting it for a grade. In some cases professors may require students to use Turnitin.com. This is automatically processed through the Assignments area of the course.

Academic Dishonesty

- Academic Dishonesty incorporates more than plagiarism, which is using the work of others without citation. Academic dishonesty includes any use of content purchased or retrieved from web services such as CourseHero.com. Additionally, allowing your work to be placed on such web services is academic dishonesty, as it is enabling the dishonesty of others. The copy and pasting of content from any web page, without citation as a direct quote, is academic dishonesty. When in doubt, do not copy/paste, and always cite.

Submission Guidelines

- Some assignments may have very specific requirements for formatting (such as font, margins, etc) and submission file type (such as .docx, .pdf, etc) See the assignment instructions for details. In general, standard file types such as those associated with Microsoft Office are preferred, unless otherwise specified.

Disclaimer Statement

- Course content may vary from the outline to meet the needs of this particular group.

Communicating on the Forum

- Forums are the heart of the interaction in this course. The more engaged and lively the exchanges, the more interesting and fun the course will be. Only substantive comments will receive credit. Although there is a final posting time after which the instructor will grade comments, it is not sufficient to wait until the last day to contribute your comments/questions on the forum. The purpose of the forums is to actively participate in an on-going discussion about the assigned content.
- “Substantive” means comments that contribute something new and hopefully important to the discussion. Thus a message that simply says “I agree” is not substantive. A substantive comment

contributes a new idea or perspective, a good follow-up question to a point made, offers a response to a question, provides an example or illustration of a key point, points out an inconsistency in an argument, etc.

- As a class, if we run into conflicting view points, we must respect each individual's own opinion. Hateful and hurtful comments towards other individuals, students, groups, peoples, and/or societies will not be tolerated.
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University Policies

[Student Handbook](#)

- [Drop/Withdrawal policy](#)
- [Extension Requests](#)
- [Academic Probation](#)
- [Appeals](#)
- [Disability Accommodations](#)

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