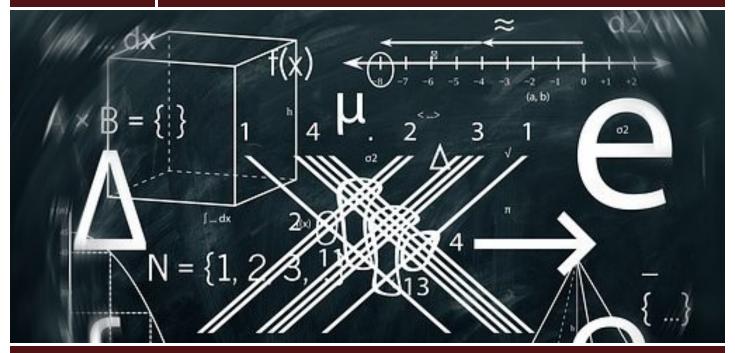
MATH 1316

Home



→Get Started

Syllabus

Course Pacing Guide

Welcome to Math 1316: Survey of Contemporary Mathematics

New to the course?

- Be sure to familiarize yourself with the Syllabus and review the information carefully.
- Be sure to fill out the <u>Course Pacing Guide</u>.
 You must submit it as your first assignment before you will be able to proceed with this course.
- Click <u>Get Started</u> to begin your course.

Returning to the course?: Click Modules to the left and resume where you left off.

- This is a 9-month course. When you registered for the course, you were sent an email to your Texas State account indicating the registration and expiration dates. Remember that all submissions, including exams, must be completed by the course expiration date.
- Students in this course may not complete any exams before any previously submitted assignment has been graded and returned.

At the end of the course, you will be asked to complete a brief course evaluation. Your input will help improve the course.

Course Description

MATH 1316: Survey of Contemporary Mathematics

A study of the uses of mathematics in society today. Emphasis is on concepts rather than technical details. May not be used as a prerequisite for any other mathematics course.

Prerequisite: College Readiness in Mathematics according to the TSI regulations or Math 1311 with a grade of CR.

Course Objectives

This course satisfies the University's General Studies requirement for mathematics. The goal of this course is to emphasize modern uses of mathematics as applied to practical settings. This will be accomplished by the following objectives. The student will learn from the concepts of:

- · Mathematics of Finance—simple and compound interest, amortization, annuities, investing
- Management Science—street networks (Euler circuits), Hamilton circuits, bin packaging, minimum spanning trees, scheduling, set theory, truth tables
- Statistics and Probability—descriptive statistics, sampling and experimental design, normal distribution, polling, basic probability
- · Growth and Form—units of measure, simple and compound interest, geometric properties of shapes, permutations and combinations
- Social sciences—voting methods, apportionment methods, methods for optimization, investment basics

Course Materials

The following materials are required:

Math in Our World by David Sobecki (Author), Allan Bluman (Author)

eBook

Edition: 4th

Purchase the eBook with Connect access -- see below.

You may purchase a paper copy if you'd like, but an electronic version of the textbook comes with the Connect Math online subscription (discussed below).

- · Purchase of eBook with ALEKS code is required.
 - Purchase the eBook and register for an ALEKS account at www.aleks.com.
 - $^{\circ}\,$ In the upper-right corner of the screen, click on $\textbf{Sign Up}\,$
 - The course code for ALEKS is WUT64-UDCHK
 - If you need a little time to collect the funds for the ALEKS Access Code, email me and I will provide directions for registering with a financial aid access code.
- A scientific calculator is required for this course. The course will be taught using the capabilities of the scientific calculator. You may also use a graphing

Assessments and Grading

Your final grade for the course will be comprised of the following learning opportunities that sum to 1000 points:

- Getting Started Quiz (20 points)
- Homework (250 points) The homework is assigned at the end of each lesson and must be completed in ALEKS. You may attempt homework as many times as you wish in order to achieve your desired grade.
- Chapter Tests (180 points) You will take a test via ALEKS at the end of each chapter. You will be allowed three attempts.
- *Mid-Course Exam (220 points) The mid-course exam will be 22 questions inspired by problems presented in the interactive online lessons on Canvas, ALEKS homework, and e-book examples as well as the videos assigned for viewing for chapters 7 and 13. To take the mid-course exam, you must have earned a score of 80% or higher on all homework assignments for Chapters 7 and 13. This exam will be taken in a proctored, testing environment. Before taking the mid-course exam, you must submit an Exam Approval Request form (see Mid-Course Exam information in Course Content).
- *Final Exam (330 points) The final exam will be 32 questions inspired by the problems presented in the interactive online lessons on Canvas, ALEKS homework, and ebook examples as well as the videos assigned for viewing for chapters 10, 11, and 12. To take the final exam, you must have completed all assignments and have earned a score of 80% or higher on all homework assignments for Chapters 10, 11, and 12. Before taking the Final exam, you must submit an Exam Approval Request form (see Final Exam information in Course Content).
- · You must wait at least one week between taking the mid-course exam and the final exam.

- A = 900 points and above
- B = 800-899 points
- C = 700-799 points
- D = 600-699 points
- F = less than 600 points

*Regardless of the total points you accumulate, you must earn a total of at least 330 out of 550 points on the two exams to earn a D in this course and a total of at least 375 out of 550 points on the two exams to earn a C in this course.

You may not resubmit an assignment after it has been graded.

How to be successful in this Course

Completing this course successfully will require time and effort on your part. Accordingly, I have compiled the following list of study practices that I believe will help you to be successful in this course:

- Realize that you cannot *cram* this material. Slow and steady wins the race. Please do not try to complete this course in an unreasonably short period of time. One of your first tasks in this course should be to prepare a schedule and stick to it. (The Course Pacing Guide will help you do this.) I suggest you plan to cover no more than one chapter every two weeks. Be careful about stepping away from the course material for an extended period of time.
- Fully utilize ALEKS. Recognize that math is not a spectator sport. Would you expect to watch someone play a sport and then expect to be able to perform at the same level? No. It's the same with math. Think of your brain as a muscle; you have to build it up and get it in shape by practicing, and you practice by working problems. In this course, your "gym" will be ALEKS. You will go there to work out your brain. And just like you have to visit the gym regularly to keep in shape, you'll need to keep visiting Connect Math regularly to retain your mathematical fitness.
 - ALEKS is an interactive workspace for learning, including homework problems and videos. Unlike using a book where there is no feedback, ALEKS has several options to help you understand and practice problems. First, be sure you have tried the problem on your own before you use the available resources. Students are often tempted to follow an example step-by-step. This is not an effective learning strategy. If your attempts to work the problem are not successful, you can select "Guided Solution" to step through the problem, then choose "Try Another" to work a similar problem. Or, after you have tried a problem unsuccessfully several ways, you might choose to select "Show Example" to see a sample problem worked out. You can continue working "Try Another" exercises until you understand the problem, and have earned full credit for the problem. You can also work review exercises at the end of each section in the online textbook.
- Keep a Homework Journal. Don't work your ALEKS homework on scratch paper and then throw it away. If you do this, then what will you have to study from for your exams? Instead, work your homework in a homework journal and you'll have it to study from for your exams. Your homework journal can be a 3-ring binder or a spiral notebook(s); it's up to you. As you do your homework, make notes to yourself in your journal. Write out the equations and processes or whatever helps you make the connections you need to make. Then, when you study for your examinations, your journal will be a useful studytool. If you put the effort into it, your homework journal can be the most useful tool in this course. In addition to working your homework problems in your journal, enhance it with formulas and notes so that you'll have a personalized study guide. The topics in this course involve multi-step solution processes.

 While many of the equations will be provided on the exams, the process steps will not so you will need to learn them. The first step in learning a multi-step process is to write down the steps. So, as you read the material, watch videos and work homework, write out the steps.
- Make a Plan. Self-motivation is necessary for successful completion of this course; no one will be pushing you but you. Use the Course Pacing Guide to help you identify target dates and chart a path for progressing through the course, including when you'll complete each homework, chapter test, and exam. You will benefit the most by completing the assignments in the sequence shown on the study schedule. Also, as you plan your submission dates, remember that I have five business days from the date of receipt to grade your mid-course exam and final exam. Life happens; update your schedule as needed.
- You are not alone. Though self-paced courses offer tremendous convenience for students, they also leave some students feeling isolated. Remember that I am here to help. If you have questions about the course content or structure, please email me via the Inbox tool in the left-hand navigation menu. You can also visit the useful links to reference materials, interactive activities, and videos provided in the lessons. If you're on campus, remember also that you can utilize SLAC and Math Cats for free tutoring. Those of you distant from campus have access to free online tutoring via Smarthinking. Contact the Office of Distance and Extended Learning (ODEL) for additional help as needed. You may e-mail ODEL at corrstudy@txstate.edu (mailto:corrstudy@txstate.edu), phone ODEL at 512.245.2322 or 800.511.8656, or come by the office in 302 Academic Services Building-North. Office hours are Monday through Friday, 8 a.m. to 5 p.m., and the office is open when the university is open.

Meet Your Instructor

Welcome to MATH 1316!



My name is Shane Lowe and I have been a lecturer / senior lecturer at Texas State University since 2011.

My path to Texas State started in Denver, Colorado, where I was raised until I was 12 years old. At age 12, my parents and I moved to Dayton, Ohio, where I graduated high school. After high school, I earned my bachelors of science degree in mathematics from The University of Texas at Austin. I did not do anything with my degree after graduation, until friends encouraged me to go into teaching. At which point, I earned a masters of education degree in secondary education (minor in mathematics) from Texas State University, where I was lucky enough to be hired as a lecturer directly after graduation!

One interesting fact that has influenced my teaching style is that I am the second child in a family of seven children (4 of us are teachers). Since I was one of the older kids, it was expected that I help with the younger kids at all times. From this, I have learned patience and developed a desire to help anyone that is struggling to learn, which means I will do whatever I can to help you understand the mathematical concepts in this course.

Outside of the classroom, I still consider myself a bit of a northern yankee and like to follow the Denver area sports teams when I am not in class (even though I have been in central Texas for over 20 years). I also like to spend time at the movies and enjoy reading historical fiction.

I look forward to meeting and working with all of you.

Click Next to proceed to Correspondence Course Information

Correspondence Course Information

As a correspondence studies student, it is your responsibility to be familiar with correspondence-related policies and services. To this end, I encourage you to review the **Correspondence Course** Information page as well as the **Correspondence Studies website**.

Orientation Video

Please view this orientation video to help you get Astarted in this correspondence course. This video addresses many topics such as Bobcat Mail, Anavigating this course site, test requests, and more.

Online Student Resources

<u>This webpage</u> contains Amultiple resources for online students at Texas State University. Note: Some resources are only Available to students who pay a student service fee.

Click Next to proceed to Technical Requirements and Support.

Technical Requirements and Support

This online course requires technical skills and access to certain technology and software that face-to-face courses may not require.

Learn about <u>skills and technology</u> you need to be successful in this course.
 Also review these <u>tips</u> and <u>interaction guidelines</u> to be a successful online learner.

Many users encounter fewer problems when they use Chrome to access Canvas courses.

Here's how to get help with Canvas:

24/7 Live chat

24/7 Phone support: 245.ITAC (4822)

Tool-specific help

Click Help in the left navigation of any Canvas course**lf you are new to Canvas**, click Student Guide in the left navigation of any course site to learn the basics.

Technical Requirements

Before you begin this course, you'll need to take a number of steps to optimize your computer to ensure that you can view the interactive lessons and demonstrations and also submit your online homework. It is recommended that you review the minimum hardware and software requirements and other important information available on the ITAC Get Started page.

Here's what you'll need in terms of programs (all of which are available for free download):

- A web browser. If you're viewing this page, you already have a web browser, but you'll need to check to make sure it's recent enough to support viewing of the Canvas material. You will also need to use tools within Connect Math to ensure you have the appropriate browser.
- Additionally, many of the links in this course are set to open in new windows. If you have a popup blocker enabled, I'd encourage you to set it to allow pop-ups from Canvas. (If you aren't sure how to do this, just Google "allow pop-ups [insert your browser here]".)

If you haven't already done so, follow the student registration instructions to purchase your *Connect Math* access code. You will need to correspond with the Connect Math technical support if there are any problems setting up your Connect Math access.

Canvas Support

Texas State's <u>Information Technology Assistance Center (ITAC)</u> provides phone and LiveChat technical support for Canvas 24 hours a day, seven days a week, 365 days a year.

To take advantage of these services, visit ITAC online or call 512.245.ITAC (4822). Note also that a number of online Canvas tutorials are available from **Canvas Support**.

Note: Videos in the course may not play in Safari or Firefox. If you are having trouble viewing videos in the course content section, try switching browsers to Chrome.

Click Next to proceed to Review the Syllabus

Review the Syllabus

To help ensure your success in this course, click <u>Syllabus</u> and read carefully to understand course expectations and requirements.

Click Next to proceed to Register for ALEKS

Register for ALEKS

If you have not registered for ALEKS, take a moment and register for an account at www.aleks.com

- For step-by-step instructions on how to register, review the **Student Registration Instructions for Connect Math** document.
- If you need a little time to get the funds together, email your instructor for the financial aid access code and instructions for registering with the financial aid access code.

Click Next to proceed to How to Use ALEKS

Using ALEKS

ALEKS is the online homework platform that provides access to the textbook, videos, homework assignments, and chapter tests for this course. You will need to purchase an access code from www.aleks.com/) (please have a credit/debit card ready to pay for the access code). The ALEKS course ID is WUT64-UDCHK.

- Introduction ALEKS is an adaptive online homework system. However, this course does not
 use the adaptive features of ALEKS. Instead, the Math 1316 course uses ALEKS to complete and
 submit homework assignments and chapter tests. These assignments are designed so that all
 students answer the same number and type of questions to practice the concepts discussed in
 the lessons.
 - Once registered, students are guided through the ALEKS homepage and asked to take a
 'Tools Tutorial' over how to enter answers in ALEKS.
 - Since ALEKS is adaptive, the Math 1316 course has approximately 20 questions over prerequisite concepts. These topics can be completed by clicking the 'Start My Path' or 'Continue My Path' on the left of the screen. Students are not required to complete these topics and these topics are <u>Not Graded!</u>
- Accessing the Textbook From the ALEKS homepage, select the menu icon (three dashes in the upper-left corner). Then, click on the 'Textbook' option and select 'E-Book.' The textbook will open in a new window.
 - There is an option to order a print version of the textbook under the 'E-Book' option.
 - Lecture and example videos from the textbook are accessed through the textbook. (Lecture videos are in the textbook section, example videos are in the exercise sets for the textbook section).
- **Completing an Assignment** To work on a homework assignment or take a chapter test, select the menu icon on the ALEKS homepage. Select the 'Assignments' option. All homework and chapter tests are listed with all chapter tests followed by the homework assignments. Click the title of the desired assignment to start working.
 - Assignments associated with the Midterm exam have a title starting with (1). Assignments
 associated with material for the final exam have a title starting with (2).
 - All homework assignments must be completed in order. To access a future homework assignment, students must score a 70 on the current assignment. (For example, to start section 12.2, a student must have a 70% or above on the 12.1 assignment.)
 - All homework assignments can be submitted and completed at a later time (students only answer the incorrect and unanswered questions from the previous submission.)
 - Chapter tests can only be accessed after completing all the chapter homework assignments to 70% or above.

Please co	ntact your	instructor	for any	other	questions	about re	egistering	and usi	ng ALEk	(S in this
course.										

Click Next to proceed to Free Tutoring Resources

Free Tutoring Resources

A variety of <u>free tutoring resources</u> are available for students enrolled in Texas State correspondence courses.

Click Next to proceed to Academic Integrity.

Academic Integrity

Texas State Academic Honor Code

The <u>Texas State Academic Honor Code</u> applies to all Texas State students, including correspondence students. The <u>Honor Code</u> serves as an affirmation that the University demands the highest standard of integrity in all actions related to the academic community. As stated in the <u>Texas State Student Handbook</u>, <u>Violation of the Honor Code</u> includes, but is not limited to, cheating on an examination or other academic work, plagiarism, collusion, and the abuse of resource materials.

Definitions

As stated per Texas State Honor Code, UPPS No. 07.10.01, Issue no. 8

*Please note that not all activities that constitute academic misconduct are listed in specific detail in UPPS No. 07.10.10, Honor Code. It is expected that students will honor the *spirit* of academic integrity and will not place themselves in the position of being charged with academic misconduct.

Please cite all unoriginal material through the use of <u>standard bibliographical practice</u> explained through the <u>Alkek library site</u>

Incidents of <u>academic dishonesty as outlined by the University</u> will be reported to the administration for disciplinary action. In addition, students will receive a 0 for the assignment or assignments without the opportunity to redo the work.

Academic work signifies outcomes and products such as essays, theses, reports, exams, tests, quizzes, problems, assignments, or other projects submitted for purposes of achieving learning outcomes.

Cheating in general means, but is not limited to, engaging or attempting to engage in any of the following activities:

 Copying from another student's test paper, laboratory report, other report, computer files, data listing, programs, or from any electronic device or equipment;

- Using, during a test, materials not authorized by the person giving the test;
- Collaborating, without authorization, with another person during an examination or in preparing academic work;
- Knowingly, and without authorization, using, buying, selling, stealing, transporting, soliciting, copying, or possessing, in whole or in part, the content of an unadministered test;
- Substituting for another student—or permitting another person to substitute for oneself—in taking an exam or preparing academic work;
- Bribing another person to obtain an unadministered test or information about an unadministered test;
- Purchasing, or otherwise acquiring and submitting as one's own work, any research paper or
 other writing assignment prepared by an individual or firm. This section does not apply to the
 typing of the rough or final versions of an assignment by a professional typist;
- Submitting the same essay, thesis, report, or another project, without substantial revision or expansion of the work, in an attempt to obtain credit for work submitted in a previous course;
- Falsifying data.

<u>Plagiarism</u> in general means, but is not limited to, the appropriation of another's work and the inadequately or inappropriately acknowledged incorporation of that work in one's own written, oral, visual or the performance of an original act or routine that is offered for credit.

<u>Collusion</u> in general means, but is not limited to, the unauthorized collaboration with another person in preparing any work offered for credit.

<u>Abuse of resource materials</u> in general means, but is not limited to, the mutilation, destruction, concealment, theft or alteration of materials provided to assist students in the mastery of course content.

Notice of Intellectual Property Rights

The text and images on this page and pages linked to it are protected by **copyright**. Lectures and examination questions are also protected by copyright law. You are authorized to take notes in class and to use the online materials provided, thereby creating derivative works from my lectures and other materials. However, this authorization extends only to making one set of notes or answers for your own personal use and no other use. You are not authorized to provide copies, notes or examination questions to anyone else, or to make any commercial use of them without prior written consent.

As stated per Texas State Honor Code, UPPS No. 07.10.01, Issue no. 8.

Click Next to proceed to Students Requiring Accommodation Through the Office of Disability Services.

Students Requiring Accommodation Through the Office of Disability Services

The Office of Distance and Extended Learning is committed to helping students with disabilities achieve their educational goals.

A disability is not a barrier to correspondence study, and we provide reasonable accommodations to individuals in coursework and test taking.

Students who require special accommodations need to provide verification of their disability to the **Office of Disability Services**, Suite 5-5.1 LBJ Student Center, 512.245.3451 (voice/TTY).

Students should then notify the Office of Distance and Extended Learning at corrstudy@txstate.edu of any disability-related accommodation needs as soon as possible to avoid a delay in accommodations.

Click Next to proceed to Tips for Success.

Tips for Success

- 1. Pace yourself in the course, giving yourself plenty of time to CAREFULLY READ each chapter and complete each assignment.
- 2. Highlight or underline key terms, important facts, results of relevant studies, and repeated names as you read. You should expect to recognize or use these in an assessment.
- Be sure you are focused on the material when you are reading. If you are worried or thinking about something else, you aren't concentrating and reading won't help you learn.
- 4. Carefully read the information related to your mid-course and final exams (if you have them).
- 5. Ask for help! Contact your instructor if you have any questions or concerns. Remember, you can also use the free tutoring resources that have been provided to you through Texas State University.

More tips are available on the **Tips for Online Success**

Click Next to proceed to Course Pacing Guide/Course Study Schedule.

Submission 1: Course Pacing Guide/Course Study Schedule



- Due No Due Date
- Points 0
- Submitting a file upload
- File Types pdf, doc, and jpg

Download and add target dates to this Course Pacing Guide/Course Study Schedule

Then click Submit Assignment and attach and submit your completed document.

After you upload your document, click Next to proceed with the course.

Click Next to proceed to Getting Started Quiz.

7.1 Introduction

This page is part of the module Chapter 7: Consumer Math and hasn't been unlocked yet.

Completion Prerequisites

The following requirements need to be completed before this page will be unlocked:

Course Pacing Guide/Course Study Schedule

<u>Submission 1: Course Pacing Guide/Course Study Schedule</u> must submit the assignment

A Get Started Quiz

7.1 Online Classroom

This page is part of the module Chapter 7: Consumer Math and hasn't been unlocked yet.

Completion Prerequisites

The following requirements need to be completed before this page will be unlocked:

Course Pacing Guide/Course Study Schedule

<u>Submission 1: Course Pacing Guide/Course Study Schedule</u> must submit the assignment

A Get Started Quiz

7.1 Homework

This page is part of the module Chapter 7: Consumer Math and hasn't been unlocked yet.

Completion Prerequisites

The following requirements need to be completed before this page will be unlocked:

Course Pacing Guide/Course Study Schedule

<u>Submission 1: Course Pacing Guide/Course Study Schedule</u> must submit the assignment

A Get Started Quiz