Syllabus (Sample)

MAT142: College Mathematics (Study Hall)

Note: This is a sample course syllabus. When you enroll in this course, you will have access to the full syllabus which will have a unique course summary section with exact due dates.

Our Learning Community

On behalf of your instructional team and your ASU support staff, we're committed to making this course as welcoming, meaningful, and flexible to your needs and interests as possible. This syllabus is an outline of the expectations we have for you as the learner and what you can expect from the course and our team. We're thrilled to have you in the class, we value your success, and look forward to your unique perspectives - diverse perspectives create a valuable learning community.

Course and Faculty Information

Our Journey

What will you learn?

You will learn about set theory, counting techniques, probability theory, statistical measures, financial-based problems, and geometry-based problems. You will apply this knowledge to solve problems in various real-world scenarios. The course will equip you with the skills necessary to tackle mathematical problems in different fields.

Why does this course matter?

Learning math is important because it helps us understand the world around us, make informed decisions, and solve everyday problems. Math is a universal language that underlies everything from the shape of the universe to planning a vacation. By developing a mathematical toolbox that can be applied to real-world situations, we can gain valuable insights into patterns and relationships and become better equipped to make sound decisions.

Course Overview

Course Description: Applies basic college-level mathematics to real-life problems. Topics include numerical reasoning, sets, counting techniques, probability, basic statistics and finance. Appropriate for students whose major does not require MAT 117 or 170.

Credits: 3

Prerequisites: To be successful in this course, we recommend English language fluency and computer literacy. It is helpful to have had Pre-Algebra before taking this course. This course is appropriate for students whose major does not require MAT 117: College Algebra or MAT 170: PreCalculus.

Instructor: Elvira Anisenko

This Study Hall course can be accessed through the Google Classroom site at https://classroom.google.com/

Course Learning Outcomes

At the completion of this course, students will be able to:

1. Apply knowledge about set theory (sets, set notation, and set operations) to solve problems
2. Apply basic counting techniques and probability theory to solve probability-based problems
3. Apply a variety of statistical measures to solve problems
4. Solve a variety of financial-based problems, including problems involving simple and compound interest, annuities, and amortized loans
5. Apply geometric concepts (dimensional analysis, perimeter, area, surface area, volume, similarity, proportions, and trigonometric function) to solve geometry-based problems

Workforce Competencies

After completion of this course, students will have experience with:

1. Application of mathematical skill relevant to all workplaces
2. Collaboration with other learners and coaches to resolve any content and technical challenges with the course
3. Use software to complete exercises to common math problems
4. Apply strategic thinking to common mathematical problems involving real life decisions on probability
5. Apply data analytics skills to visualize data as part of a real life decision-making process
6. Apply budgeting skills to make real life decisions
7. Apply mathematical skills to solve real life building problems

Course Time Commitment

This three-credit course requires approximately **19-20 hours each week** preparing for and actively participating in this course. To view more about credit requirements, please visit the ABOR Policy on Academic Credit page.

Inclusive Statement

Throughout this course, you may be presented with ideas or perspectives that you are unfamiliar or uncomfortable with. We encourage you to critically examine these ideas and take risks by offering your own experiences and perspectives through civil discourse. In return, we will work to foster and create an environment where you feel supported in taking these risks.

When possible, human biases were addressed in the design of this course. If there are aspects of the design, instruction, and/or experiences within this course that result in barriers to your inclusion, please reach out to us with suggestions on how we can further improve this course for you or for others.

Accessibility

If you are in need of disability related accommodations in this course, reach out to ASU Student Accessibility and Inclusive Learning Services by emailing Student.Accessibility@asu.edu or call their office at 480-965-1234.

Instructional Materials & Tools

- **Learning Platform:** We will be using the ALEKS platform to learn. ALEKS is an adaptive learning platform by McGrawHill available to you at no extra cost. All learning and practice assignments, pre-exams, and exams will be on ALEKS. Exams will be proctored by Honorlock, which is also available to you at no extra cost.
- **Textbook:** Reading materials will be provided in each lesson (in PDF) and will be another resource as you learn math with us. There is no required textbook to purchase. If you would like to purchase a hard copy of a textbook, the following text aligns with our course: Sobecki: Math in Our World, 4th Ed. (McGraw Hill).
- **Videos:** Videos from StudyHall (from YouTube) and instructor-led instructional videos (in MediaPlus) featuring ASU instructors will be available in the course, and will be another resource for you as you learn.
- **Discussion Platform**: We will be using InScribe as our discussion platform. Discussions will be used to help us see how math fits into our lives, as a place to ask questions, and as a central place to connect as a class.

Computer & Calculator Requirements

This is a fully online course; therefore, it requires a computer with internet access and the following technologies:

- Chrome Web Browser
- Adobe Acrobat Reader (free) or another program to open up PDFs
- Webcam, microphone, headset/earbuds, and speaker
- Reliable broadband internet connection (DSL or cable) to stream videos.
- **Calculator:** At a minimum, a hand-held scientific calculator is required for this course. A few of the recommended models include the TI-30XS Multiview, TI-34 Multiview. A graphing calculator like the TI-83, or the TI-84 is not required but may be used. You are expected to use your calculator for all assignments and exams. You are permitted to use the ALEKS calculator. Use of cellular phones, including their calculators, are NOT permitted during exams.

Note: A smartphone, iPad, Chromebook, etc. will not be sufficient for completing your work in courses. While you will be able to access course content with mobile devices, you must use a computer for all assignments, quizzes, and virtual labs. Learn more about technical requirements here.

Technology Support

For technical support, contact the Study Hall Support Team at StudyHall@asu.edu. Please provide as much information as possible about your issue, **including screenshots, error messages, and urgency due to upcoming deadlines.**

Additional tech support can be found using the following resources:

- Post in the InScribe Community discussion board
- Contact ALEKS Technical Support for questions about ALEKS
- Contact Honorlock Technical Support for questions about Honorlock

Google Classroom Questions

As you learn to use the Google Classroom platform, the Google Classroom Support Center is a valuable resource with screenshots and tutorials.

Digital Literacy

Digital competency (in this course and in life!) are essential. Below are some resources that may support you in this area:

- Digital Competency: This list helps to identify and assess specific digital competency skills. This is not an exhaustive list, however, it may help you evaluate your gaps in knowledge to better plan for what support or resources you will want to research.
- Pix.org: Pix is an online platform open for everyone to assess, develop, and certify your digital skills
- ASU Library tutorials: This site includes tutorials that cover many skills to support you in building and enhancing your digital literacy skills.

Grading Policy and Assignments

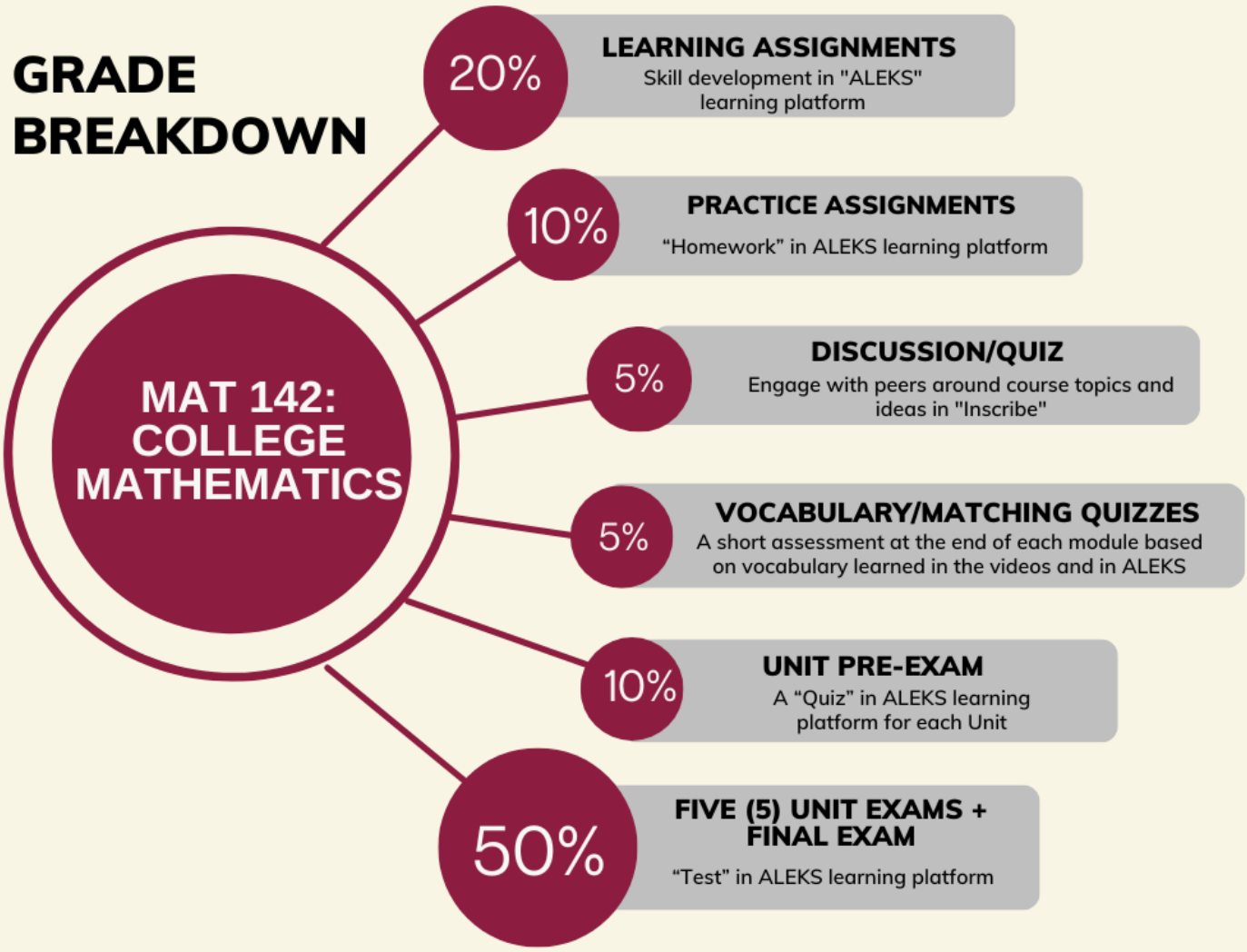
In college, grades are typically used to measure a student's academic performance and are determined by a combination of factors, such as assignments, quizzes, exams, and participation in class. Each college or university has its own grading system, but most use a letter grading scale that ranges from A (excellent) to F (fail). Some institutions may also use a plus/minus grading system that provides more granularity to the grades. The grades received in each course are typically converted to a grade point average (GPA) that represents a student's overall academic performance. In addition to academic performance, grades may also impact a student's eligibility for scholarships, academic honors, and acceptance into certain programs or graduate schools.

Your grade will be determined based on the following grading schema:

- A is any grade between 90% and 100%.
- B is any grade between 80% and 90%.
- C is any grade between 70% and 80%.
- F is any grade below 70%.

Percentage breakdown of assignments

Grades reflect your performance on assignments and adherence to deadlines. The points you earn on each assignment translate into a percentage, and add up to your grade based on the following percentages listed:



Assignments

Initial Knowledge Check (found when you first enter ALEKS)

You will take an Initial Knowledge Check (IKC) in ALEKS to measure current skills, such as needing additional math knowledge or bypassing some of the Learning Assignments. If additional knowledge is needed, ALEKS

will provide you with the preparation you will need. If you already have required knowledge, you may be able to bypass some of the Learning Assignments and get credit for them. The IKC is required.

Learning Assignments (found under Continue My Path in ALEKS)

Each Unit contains several Learning Assignments. A Learning Assignment is composed of videos, readings, and ALEKS math exercises. The ALEKS math exercises are in the ALEKS Modules. You are expected to review the provided instructional materials in Google Classroom for each Learning Assignment before completing the ALEKS Modules. Learning Assignments are worth 20% of your grade.

Practice Assignments (found under the Assignments list in the ALEKS drop-down menu)

Each Unit has several Practice Assignments that are titled with the Unit name, the Word "Practice," and the Practice Assignment number. For example, Unit 2 Practice Assignment: Probability Practice 1 is the first Practice Assignment in Unit 2. Practice Assignments are worth 10% of your grade and are required to move forward in ALEKS to take the Pre-Exams.

Discussions & Vocabulary (accessed through Google Classroom)

After completing the Learning Assignments and the Practice Assignments, you will post your replies to a discussion about the Unit, using InScribe. You will then complete a "Confirm Discussion Participation" quiz to affirm your participation.

You will also take a "Vocabulary Matching" quiz to demonstrate your understanding of the vocabulary used in the Unit.

Each of these quizzes in Google Classroom will be 1% of your grade for a total of 2% for each of the 5 units, which then makes up 10% of your final grade.

Pre-Exams (in ALEKS)

There are five Pre-Exams (one for each unit) and one Pre-Final Exam, totaling 6 Pre-Exams. The Pre-Exams count towards 10% of your grade. The lowest score out of the 6 Pre-Exams will be dropped from your grades and will not affect your final total. When a Pre-Exam score is dropped, this does not mean that the grade is lost. It means that it will not count toward your grade. The prerequisite for the Unit Pre-Exams to open is completion of the Practice Assignments. Pre-Exams are required to move forward in ALEKS to take the Exams.

Exams (in ALEKS)

There are five Unit Exams (one for each unit) and one Final Exam, totaling six Exams. The Final Exam is comprehensive and includes content from all the units. Each of the 5 Unit Exams and the Final Exam have a Pre-Exam that are required to be completed prior to taking the exam. Each exam will involve a mix of mechanical skills and conceptual reasoning.

Three Exam Attempts: You get three attempts at each exam - no additional attempts are available beyond three. Once the exam password has been entered by HonorLock, your attempt has started. Your highest score of the three attempts will become your score for that Exam.

Exam Suggested Due Dates: The suggested due date to take each exam and complete any and all work in the course is in the Schedule. All work must be completed by the last day of the course.

Proctoring: Students in face-to-face or online courses taking exams and quizzes at Arizona State University can expect to be proctored. The process includes verifying the identity of the student and providing either live proctors or other forms of proctoring during the exam or quiz. Proctoring of online students requires presenting a valid identification card as part of the verification process and monitoring by online proctoring software.

Exams in this course are proctored remotely using Honorlock, which records you and your environment during the exam. In order to take an exam, you must

- Install the Chrome browser on your computer - Chromebooks have Chrome already installed - and ensure that it is up-to-date - a tablet won't work
- Install the Honorlock Chrome extension
- Set up your webcam to work with Honorlock
- Ensure that your internet connection is stable and dependable

See specifics about Honorlock proctoring in the Canvas Honorlock Information page in the Course Orientation and Information Module.

Exam Warnings: Any student who accesses a phone or any internet-capable device (other than the exam computer) during an exam for any reason automatically receives a score of zero on the exam. All such devices must be turned off, put away, and made inaccessible during the exam. Anyone using a camera device, other than your webcam, for any reason during an online assessment will receive a score of zero for that exam, and possible further disciplinary measures.

Submitting Assignments

All assignments, unless otherwise announced, must be submitted to the designated area of ALEKS or Google Classroom. Emailed assignments will not be accepted.

Each assignment in ALEKS has a prerequisite assignment. This means that you must go in the order of the assignments listed and complete the previous assignment before completing the one you want to do. We cannot alter the previous assignment so that you can pass into the next assignment. Completing all assignments is necessary to pass the course.

All assignments, unless otherwise announced, MUST be submitted to the designated area of Google Classroom. Do not submit an assignment via email. Please carefully review how to submit coursework on Google Classroom, which is detailed extensively in the Google Classroom Student Guide

Tip: Keep Records of Submissions

It is recommended to take a screenshot of your completed submission with the date included. A screenshot will document that your coursework was submitted correctly and that you double-checked it. It is strongly advised you take a screenshot of the submission confirmation and save the screenshot for ALL assignments. For information on how to take and save a screenshot please see http://take-a-screenshot.org/. Make sure to allow yourself time to take these screenshots prior to each deadline. This is your confirmation and will serve as documentation that you submitted successfully. Not having this proof means you would receive a zero for the assignment if it was not submitted correctly. Please be aware that using someone else's screenshot as verification that you submitted work, other false verifications of work, or manipulating technology in some way to unfairly benefit you, is considered academic dishonesty.

Due Dates/Late Policy for Assignments

This is a session-based (SB), online course. All Units are open from the first day of the course and remain open until the last day of the course, so you can work ahead, as you desire.

It is strongly recommended that you use the "**Suggested Start Dates"** and "**Suggested Completion Dates"** in the table below to help you maintain an appropriate schedule to complete the course.

"Suggested Completion Dates" are not due dates, although ALEKS will list them that way to remind you of the suggested schedule. If you choose to turn something in after a "Suggested Completion Date," ALEKS might show that the assignment is late. However, that's ok because there are no late penalties applied. The last day of the course is a firm due date for all work. No work can be accepted after the official course end date. It is your responsibility to review all content, fulfill all assignments before the official last day of the course, and ask any questions you have in our designated discussion area.

To help you keep up with due dates, we've included a printable checklist below.

Religious Observance Policy

We honor and respect religious and cultural observance. We recognize that some challenges may occur if there's a religious and cultural holiday date that falls when there is a course obligation, like a course due date or scheduling a collaborative learning activity with another classmate or your instructor. To this end, we've set up the course policy and schedule to be available for your planning and is flexible in case of any religious and cultural observance calendar conflict. If you have any questions about course obligations, as described in this policy, that may conflict with religious and cultural observance, please reach out to Studyhall@asu.edu.

When does the course end and how can I get college credit?

This is a session-based course that lasts 8 weeks.The last day of the course is August 16, 2023. Your instructor will finalize grades by August 23 (a week after course ends), and you will be able to request college credit on August 24 (one business day after grade finalization).

It is very important you wait for all grades to be assigned to your coursework. Any assignments that were pending grades will no longer be available to the instructor for grading and will auto-calculate as a 0 in the reporting system.

Key dates

This is a session-based course that lasts	**8 weeks**
The last day of the course is	**Aug 16, 2023**
Your instructor will finalize grades by	**Aug 23, 2023**
You will be able to request college credit on	**Aug 24, 2023**

Communication

There are several ways to communicate with your instructional team in this course.

Inscribe Community Discussion Board

As described above, this course uses a discussion platform called InScribe for general questions and comments about the course. Prior to posting a question or comment, check the syllabus, announcements, and existing posts to ensure it has not already been asked or answered. You are encouraged to respond to the questions of your classmates.

For questions of a personal nature, please tag your InScribe post as “Moderator” so only the Course Team will see it.

Technical Support

For technical support, please use the following resources:

- Post in the InScribe Community discussion board
- Contact the Study Hall Support Team at StudyHall@asu.edu
- Contact ALEKS Technical Support for questions about ALEKS
- Contact Honorlock Technical Support for questions about Honorlock

Please provide as much information as possible about your issue, including screenshots, error messages, and urgency due to upcoming deadlines.

Essential Policies

- Disruptive, Threatening, or Violent Behavior
- ASU Student Rights and Responsibilities
- Prohibition Against Discrimination, Harassment, & Retaliation
- Academic Integrity
- Accessibility and Inclusive Learning

Syllabus Disclaimer

The syllabus is a statement of intent and serves as an implicit agreement between the instructor and the student. Every effort will be made to avoid changing the course schedule but the possibility exists that unforeseen events will make syllabus changes necessary. Remember to check your email and the course site often.

Course Summary (Due Dates):

To help you keep up with due dates, we've included a printable checklist below.

Date (Due by 11:59 pm AZ / MST)	Assignment Checklist
Suggested Start Date: **Tuesday, June 20, 2023** Suggested Completion Date: **Tuesday, June 27, 2023**	**Welcome to College Math** ☐ Reviewing the Start Here Unit ☐ Introduce Yourself to Your classmates ☐ ALEKS Initial Knowledge Check (IKC) ☐ Academic Integrity Agreement ☐ Honorlock Practice
Suggested Start Date: **Tuesday, June 20, 2023** Suggested Completion Date: **Tuesday, June 27, 2023**	**Unit 1: Sets and Counting** ☐ Learning Assignment 1.1 ☐ Learning Assignment 1.2 ☐ Practice Assignment 1
Suggested Start Date: **Tuesday, June 20, 2023** Suggested Completion Date: **Tuesday, June 29, 2023**	**Unit 1: Sets and Counting** ☐ Learning Assignment 1.3 ☐ Learning Assignment 1.4 ☐ Learning Assignment 1.5 ☐ Practice Assignment 2
Suggested Start Date: **Tuesday, June 20, 2023** Suggested Completion Date: **Monday, July 3, 2023**	**Unit 1: Sets and Counting** ☐ Discussion & Quiz ☐ Matching Quiz ☐ Pre-Exam ☐ Exam

Suggested Start Date: **Tuesday, July 4, 2023** Suggested Completion Date: **Thursday, July 6, 2023**	**Unit 2: Probability** ☐ Learning Assignment 2.1 ☐ Learning Assignment 2.2 ☐ Practice Assignment 1
Suggested Start Date: **Tuesday, July 4, 2023** Suggested Completion Date: **Monday, July 10, 2023**	**Unit 2: Probability** ☐ Learning Assignment 2.3 ☐ Learning Assignment 2.4 ☐ Practice Assignment 2
Suggested Start Date: **Tuesday, July 4, 2023** Suggested Completion Date: **Thursday, July 13, 2023**	**Unit 2: Probability** ☐ Discussion & Quiz ☐ Matching Quiz ☐ Pre-Exam ☐ Exam
Suggested Start Date: **Tuesday, July 11, 2023** Suggested Completion Date: **Monday, July 17, 2023**	**Unit 3: Statistics** ☐ Learning Assignment 3.1 ☐ Learning Assignment 3.2 ☐ Practice Assignment 1
Suggested Start Date: **Tuesday, July 11, 2023** Suggested Completion Date: **Thursday, July 20, 2023**	**Unit 3: Statistics** ☐ Learning Assignment 3.3 ☐ Learning Assignment 3.4 ☐ Practice Assignment 2
Suggested Start Date: **Tuesday, July 11, 2023**	**Unit 3: Statistics** ☐ Discussion & Quiz ☐ Matching Quiz

Suggested Completion Date: **Monday, July 24, 2023**	☐ Pre-Exam ☐ Exam
Suggested Start Date: **Tuesday, July 25, 2023** Suggested Completion Date: **Tuesday, July 27, 2023**	**Unit 4: Finance** ☐ Learning Assignment 4.1 ☐ Learning Assignment 4.2 ☐ Practice Assignment 1
Suggested Start Date: **Tuesday, July 25, 2023** Suggested Completion Date: **Monday, July 31, 2023**	**Unit 4: Finance** ☐ Learning Assignment 4.3 ☐ Practice Assignment 2 ☐ Learning Assignment 4.4 ☐ Practice Assignment 3
Suggested Start Date: **Tuesday, July 25, 2023** Suggested Completion Date: **Thursday, August 3, 2023**	**Unit 4: Finance** ☐ Discussion & Quiz ☐ Matching Quiz ☐ Pre-Exam ☐ Exam
Suggested Start Date: **Tuesday, August 1, 2023** Suggested Completion Date: **Monday, August 7, 2023**	**Unit 5: Geometry** ☐ Learning Assignment 5.1 ☐ Learning Assignment 5.2 ☐ Practice Assignment 1
Suggested Start Date: **Tuesday, August 1, 2023** Suggested Completion Date: **Tuesday, August 10, 2023**	**Unit 5: Geometry** ☐ Learning Assignment 5.3 ☐ Learning Assignment 5.4 ☐ Learning Assignment 5.5 ☐ Practice Assignment 2

Suggested Start Date: **Tuesday, August 1, 2023** Suggested Completion Date: **Monday, August 14, 2023**	**Unit 5: Geometry** ☐ Discussion & Quiz ☐ Matching Quiz ☐ Pre-Exam ☐ Exam
Suggested Start Date: **Tuesday, August 15, 2023** Suggested Completion Date: **Tuesday, August 16, 2023**	**Final Exam** ☐ Pre-Exam ☐ Exam
Wednesday, August 16, 2023	***All coursework must be completed, and late work will not be accepted.***

[1] "Suggested Start Date" refers to the suggested date to start the work. All units and lessons are open in ALEKS until the last day of the course, and you are welcome to work ahead.

[2] "Suggested Completion Date" refers to the suggested date to complete the work. These are not due dates. However, all work must be completed by the course end date because that is when the course closes.