Mat 170   Precalculus Online   Spring 2018 B

Instructor: Leslie Loy   Email: Leslie.Loy@asu.edu

Prerequisites: Students entering MAT 170 (Precalculus) are expected to have completed MAT 106 (Intermediate Algebra or high school algebra 2) or its equivalent with a grade of A, B or C.

Class Description: Students will be able to solve and graph various types of algebraic functions (including polynomial, rational, exponential and logarithmic) as well as apply this knowledge to more complex problems. Students will also be able to use the six basic trigonometric functions and their inverses to solve problems, both applied and theoretical.

This is a time intensive class, expect to spend between 20 and 30 hours a week studying and completing assignments. There are strict due dates for both the homework assignments as well as the exams, so pay close attention to the syllabus calendar.

Materials needed for the course:

1. MyMathLab access (required): All class work will be completed in MML. (See blackboard for more details). When registering please use the **exact same name** as it appears in myasu. The textbook is included online with the purchase of the course, which is about $100. The purchase of a hard copy of the textbook is optional. See your list of textbooks in myASU for more information.

2. Graphing Calculator (required): The TI-83 + or TI-84+ calculators are highly recommended. However, calculators that perform symbolic algebraic calculations, such as the TI-89, TI-92 or TI Nspire CX CAS, are not permitted on the midterm or final exams. (The TI Nspire CX model is permitted.)

3. Computer Access: You must have access to a computer with a reliable internet connection. For best results please use Firefox or Chrome as your browser.

Technical Support Contact Information: For technical assistance 24 hours a day, 7 days a week, please contact the University Technology Office Help Desk:

     Technical Support Phone: 480-965-6500
     ASU Helpdesk Phone: 855-278-5080
     Web: http://help.asu.edu/
For information on systems outages see the ASU systems status calendar, please visit:
http://syshealth.asu.edu/

Midterm and Final Exam Information:
The midterm and final exams must be proctored using a service called Software Secure (RPNow), which requires a webcam and a microphone. You will also need an ASU Suncard or government issued ID.

- The Midterm Exam must be taken by **Thursday, April 5, 2018 at 11:59 PM**.
- The Final Exam must be taken by **Friday April 27, 2018 at 11:59 PM**.

Schedule – All due dates at 11:59 PM Arizona time

Dates	Monday	Tuesday	Wednesday	Thursday	Friday
3/12 – 3/16	Class Begins Sign up for MML!	RPNow Practice Quiz due	1.2 due	1.3 due	1.6 due
3/19 – 3/23	1.7, 1.8 due	2.1 due	2.2 due	2.3 due	2.4 due
3/26 – 3/30	2.5 and 2.6 due	3.1 due	3.2 due	3.3 due	3.4 due
4/2 – 4/6	3.5 due	Take Practice Midterm Exam	Practice Midterm Exam due	**Midterm Exam due**	4.1 due
4/9 – 4/13	4.2 due	4.3 due	4.4 due	4.5 due	4.6 due
4/16 – 4/20	4.7 due	5.1 due	5.2 due	5.3 due	5.5 due
4/23 – 4/27	6.1 due	6.2 due	Take Practice Final Exam	Practice Final Exam due	**Final Exam due**

Sections covered

1.2 Basics of Functions and their Graphs

1.3 More on Functions and their Graphs

1.6 Transformations of Functions

1.7 Combinations of Functions, Composite Functions

1.8 Inverse Functions

2.1 Complex Numbers

2.2 Quadratic Functions

2.3 Polynomial Functions and their Graphs

2.4 Dividing Polynomials, Remainder and Factors theorems

2.5 Zeros of Polynomial Functions

2.6 Rational Functions and their graphs

3.1 Exponential functions

3.2 Logarithmic functions

3.3 Properties of Logarithms

3.4 Exponential and Logarithmic Equations

3.5 Exponential Growth and Decay, Modeling Data

4.1 Angles and Radian Measure

4.2 Trigonometric Functions, Unit Circle

4.3 Right Triangle Trigonometry

4.4 Trigonometric Functions of any angle

4.5 Graphs of Sine and Cosine Functions

4.6 Graphs of other Trig Functions

4.7 Inverse Trigonometric Functions

5.1 Verifying Trigonometric Identities

5.2 Sum and Difference Formulas

5.3 Double-Angle, Power Reducing and Half-Angle Formulas

5.5 Trigonometric Equations

6.1 Law of Sines

6.2 Law of Cosines

Instructor Initiated Drop: *It is important to attend all your math classes and access your online course materials for ASU Online and iCourse sections to ensure you do not miss any course assignments or supplemental instruction. Failure to attend class (or access your online course) at the start of the term will result in an* [instructor-initiated drop for non-attendance](#)*.*

> **If you are not enrolled in MyMathLab by Thursday March 15, 2018, at 11 PM, you could be dropped from the class.** You can obtain temporary access if you need to wait for financial aid. If you are having any issues with your account in the first week, you MUST contact the instructor ASAP.

Homework: The homework will be completed in MML, all due dates are listed on the syllabus calendar as well as in MML. There is a new learning aid built into the homework called Skill Builder. If you cannot answer a problem correctly, the system will lead you to an easier problem. Eventually you will be able to master the given problem. If you earn 100% on the homework, you will earn the prerequisite mastery points in the study plan.

Study Plan: The study plan in MML is very important because earning 100% of the mastery points will open the practice exams. To earn mastery points, go to Study Plan in MML and make sure you are in the Prerequisite tab. Take quizzes in the list and if you do not earn at least 70%, you will need to do some practice problems before the system will allow you to take the quiz again.

Practice Exams: The practice exams are the best way to help you study! To open a practice exam, you must earn ALL prerequisite mastery points in the **Prerequisite tab** in MML. Once you have earned the prerequisite mastery points, you can take the practice exam as many times as you like. The highest grade (not the last) will count towards your overall grade in the class. (5% each)

Exams: The exams must be taken using RPNow, which required a webcam and microphone. You have only one attempt for the midterm and final exams. If you miss an exam you will receive a zero unless you have a documented reason. No notes are allowed when taking the midterm and final exams. *No cell phones or any internet-capable devices are allowed on tests. They must be turned off and made inaccessible for the duration of the test. Accessing a cell phone or internet-capable device for any reason during the test will result in a score of 0 for that test and possible further sanctions through the Dean's office.*

Students in face-to-face or online courses taking exams and quizzes at Arizona State University should 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. In the case of face-to-face courses, students can be required to show a valid identification card, and expect to be monitored by proctors while taking either an 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.

ASU contracts with three online proctoring software companies. Each company has been carefully reviewed for software security and the protection of student data and must meet the standards of the ASU Internet Security Office. In addition, any company employee, including proctors, who would have access to student data must have a background check and be finger printed. Students can take exams in any location that has a reliable Internet connection. It is best to select a quiet location where the student can be alone in a room.

Suggested Plan of Action

You must complete a full semester's worth of work in only 7 weeks. And online! Expect to spend at least 20 to 30 hours a week on the class. This is what I suggest:

1 – Start by locating the appropriate folder in blackboard and read the Section Notes and watch the Short Example Videos. You can find more short example videos on ASU's server: vidman.asu.edu

2 – Next go to MML and click on Multimedia Library. You will find a link for the textbook as well as other resources including short example videos.

3 – Complete the **homework** assignment. If you did not earn all mastery points in the **Study Plan** for the particular section you are working on, try the quizzes. If you miss a homework assignment, you will still need to earn the mastery points in that section to be able to open the practice exams.

4 - Get help! Take advantage of tutoring resources and/or post questions in Piazza. You can also email me directly if you have a question of a personal nature.

Piazza: Piazza is an online forum site specifically created for math and science courses. It features a clean interface that makes following threads easier, the threads are sortable and searchable, and provides the ability to enter symbolic mathematics. It is a collaborative site in which students are encouraged to post questions and other students are encouraged to offer assistance. The instructor and teaching assistants monitor Piazza regularly, offering feedback whenever necessary. Piazza is built into every online course shell and is a required aspect of the course. Look for an email in the first week of classes, which will include a link you must click on to be enrolled in the correct Piazza shell.

Student Rules of Engagement (Piazza):

· All questions related to classwork should be posted to Piazza. Any homework or classwork questions emailed directly to the instructor will not be answered.
· Please include the section number and question number in the header (e.g. Section 11.2, #7).
· Please include a couple lines of your work. You may also photograph your written work and insert the image within the post. Please trim the image size if possible.
· Please be courteous at all times. No vulgar, demeaning, or aggressive language will be tolerated.
· Do not use Piazza to air grievances or to campaign.
· Do not use Piazza for personal messages. Those should be sent by email to the instructor directly.
· Stay on topic. Do not use Piazza for discussions not related to this class.
· Keep a civil and friendly atmosphere. Piazza works best when there are a lot of students willing to engage the forum.
· Please do not expect immediate replies. Instructors usually check the forum daily. In the meantime, other students are encouraged to add feedback and commentary. Instructors may also deliberately stay in the background so as to promote student-led discussions.

Failure to adhere to these requirements may result in your posting privileges being revoked.

Grading: I will be using plus/minus for final grades.
A+ = [97,100];   A = [93,97);   A- = [90,93)
B+ = [87,90);   B = [83,87);   B- = [80,83)
C+ = [77,80);   C = [70,77)
D = [60,70);   E = [0,60)

Course Work	Percent
Homework	20%
Practice Midterm Exam	5%
Practice Final Exam	5%
Midterm Exam	35%
Final Exam	35%

In-Person Tutoring: MATH TUTOR CENTER: PSA 116
The Math Tutor Center provides free, quality tutoring to all ASU students registered in mat170. However, **you must bring your Sun Card**. Click on the following link for available times:
https://math.asu.edu/resources/math-tutoring-center

Online Tutoring: The University Academic Success Programs offers free online tutoring:
https://tutoring.asu.edu/student-services/online-tutoring

Grade of Incomplete: A grade of incomplete, "I", will be awarded only in the event that a documented emergency or illness prevents the student who is doing acceptable work from completing a small percentage of the course requirements.

Course Withdrawal: A student may withdraw from a course with a grade of W during the withdrawal period. The instructor's signature is not required. It is a student's responsibility to verify that that they have in fact withdrawn from a class.

Withdrawal deadline: April 1, 2018
Complete Withdrawal deadline: April 27, 2018

Final Exam Make-up Policy: Exceptions to the schedule and requests for make-up examinations can be granted only by the Department Chair, Associate Department Chair or the Coordinator of First Year Mathematics, and for one of the following reasons:
1. Religious conflict (e.g., the student celebrates the Sabbath on Saturday)
2. The student has more than three exams scheduled on the same day as the math final.
3. There is a last-minute personal or medical emergency

The Department reserves the right to request written documentation to substantiate any claim of hardship. Make-up exams will NOT be given for reasons of nonrefundable airline tickets, vacation plans, work schedules, weddings, family reunions, and other such activities. Students should consult the final exam schedule before making end-of-semester travel plans.

Academic Integrity Statement: *Academic honesty is expected of all students in all examinations, papers, laboratory work, academic transactions and records. The possible sanctions include, but are not limited to, appropriate grade penalties, course failure (indicated on the transcript as a grade of E), course failure due to academic dishonesty (indicated on the transcript as a grade of XE), loss of registration privileges, disqualification and dismissal. For more information, see http://provost.asu.edu/academicintegrity.*

Students with Disabilities
Disability Accommodations: Qualified students with disabilities who will require disability accommodations in this class are encouraged to make their requests to me at the beginning of the semester either during office hours or by appointment. Note: Prior to receiving disability accommodations, verification of eligibility from the Disability Resource Center (DRC) is required. Disability information is confidential.

Establishing Eligibility for Disability Accommodations
Students who feel they will need disability accommodations in this class but have not registered with the Disability Resource Center (DRC) should contact DRC immediately. Their office is located on the first floor of the Matthews Center Building. DRC staff can also be reached at: 480-965-1234 (V), 480-965-9000 (TTY). For additional information, visit: www.asu.edu/studentaffairs/ed/drc. Their hours are 8:00 AM to 5:00 PM, Monday through Friday.

Policy on Threatening Behavior
All incidents and allegations of violent or threatening conduct by an ASU student (whether on-or off campus) must be reported to the ASU Police Department (ASU PD) and the Office of the Dean of Students. If either office determines that the behavior poses or has posed a serious threat to personal safety or to the welfare of the campus, the student will not be permitted to return to campus or reside in any ASU residence hall until an appropriate threat assessment has been completed and, if necessary, conditions for return are imposed. ASU PD, the Office of the Dean of Students, and other appropriate offices will coordinate the assessment in light of the relevant circumstances.
Title IX is a federal law that provides that no person be excluded on the basis of sex from participation in, be denied benefits of, or be subjected to discrimination under any education program or activity. Both Title IX and university policy make clear that sexual violence and harassment based on sex is prohibited. An individual who believes they have been subjected to sexual violence or harassed on the basis of sex can seek support, including counseling and academic support, from the university. If you or someone you know has been harassed on the basis of sex or sexually assaulted, you can find information and resources at https://sexualviolenceprevention.asu.edu/faqs.
As a mandated reporter, I am obligated to report any information I become aware of regarding alleged acts of sexual discrimination, including sexual violence and dating violence. ASU Counseling Services, https://eoss.asu.edu/counseling, is available if you wish discuss any concerns confidentially and privately.

Syllabus Changes (Disclaimer): The instructor reserves the right to alter the syllabus via email and/or by notification on the course Announcements in Blackboard in order to meet the needs of the students in the class. It is the student's responsibility to check for updates frequently in Blackboard. This syllabus is the official document for this course. Any conflicting statements found on Blackboard are superseded by this syllabus.