

Math 1324.101CL Math for Business and Social Science Summer 2024 STEM Bldg., Room 119 MTWThF 11:00 am – 12:50 pm ST119 MTWThF 12:51 pm – 1:30 pm ST119

Instructor Information: Ms. Smith

Email: jsmith56@com.edu -

Include your *course* & *section in the subject line when emailing*.

Office phone: 409-933-8647

Office: STEAM Bldg., Suite 325, room 10

Student Hours (Office Hours); Location: STEAM 325-10

1. 1:30pm-2:00pm Monday and Thursday

Required Textbook: The textbook is <u>Finite Mathematics with Applications</u>, 12th edition, by Goldstein, Schneider and Siegel, Pearson Publishing Company. The e-text is provided with *MyLab Math* (*No purchase needed*). The student will need a computer and internet service outside of class to gain access to the online assignments on *MyLab Math*. Computers and internet access are available on campus during specified times. A Texas Instruments **TI84 plus** graphing calculator is required for this course.

Course Description: The application of common algebraic functions, including polynomial, exponential, logarithmic, and rational, to problems in business, economics, and the social sciences are addressed. The applications include mathematics of finance, including simple and compound interest and annuities; systems of linear equations; matrices; linear programming; and probability.

Course Requirements:

Note: Electronic devices, including computers, I-pads, cellphones, ear-buds, audio recorders may not be used, and must be put away (off the student's desk and out of sight) during class. If the instructor sees one of these items during class, the student will be told to leave class.

MyLab Math (MLM) Online Assignments—Go to your Brightspace course. You can access D2L Brightspace at COM at http://com.brightspace.com.

Homework Assignments on *MyLab Math***:** There is a homework assignment for each unit covered. These are listed on the course outline in the syllabus and on the list of assignments on *MyLab Math*. Each day's homework assignments must be completed by 11:59 pm on the due date shown on both the course outline and on

the list of assignments on *MyLab Math*. You should do the assignments as soon as possible after participating in the lecture, reading the appropriate section in the text

book, and watching the associated video(s) on *MyLab Math*. Although the homework is online, and the answers are entered online, you should write your work on paper, neatly showing all steps, and keep it in your notebook with your notes for future reference, both as an aid for preparing for quizzes and exams, and as a place to begin when seeking assistance from your professor, your peers, or the college tutoring center. The student has a limit of five attempts to answer a question correctly on the homework assignments.

Quizzes on MyLab Math: Four quizzes which relate to the student learning outcomes, will be taken on MyLab Math. Like the homework assignments, the due dates are shown on both the course outline in this syllabus and on the assignment list on MyLab Math. Unlike the homework assignments, the quizzes must be taken in **one sitting**, they are **timed**, and the student gets only one attempt to answer each question. The quizzes may be retaken one time. The higher of the two grades will be used to determine the student's quiz average.

You cannot make up a quiz. A specified deadline will be given, and you will not be allowed to submit late. If the quiz assignment is not submitted or is not submitted by the deadline, a grade of zero will be recorded for the quiz assignment grade.

Chapter Exams: There are four exams which cover the chapters in the text book. The exams are taken in class on the due dates shown on the course outline in the syllabus. The student has 90 minutes to take each exam. **Exams may not be retaken**. However, if the grade on the final exam is higher than the lowest chapter exam grade, the final exam grade will replace the lowest chapter exam grade.

Comprehensive Final Exam: The final exam is taken in class on the due date shown on the course outline in the syllabus. The student has 90 minutes to take the final exam. The final exam may not be retaken.

Determination of Course Grade/Detailed Grading Formula:

| Homework Average | 10% |
|--------------------------|------|
| Quiz Average | 10% |
| Average of Chapter Exams | 60% |
| Comprehensive Final Exam | 20% |
| Final Average | 100% |

Grading Scale:

Grade A: Final Average is [89.5, 100] Grade B: Final Average is [79.5, 89.5) Grade C: Final Average is [69.5, 79.5) Grade D: Final Average is [59.5, 69.5) Grade F: Final Average is [0, 59.5) **Late Work, Make-Up, and Extra-Credit Policy:** There is a twenty (20) point penalty for all **homework** submitted after the due date. Any homework assignments that are not finished by the due date of the related exam will be given a grade of zero at that time.

There are **no make-up exams** unless:

- 1) the student notifies the instructor **before** the exam due date that they will miss the exam, and
- 2) Only extenuating circumstances of a serious nature that are documented will be considered.

Realize not being prepared for the exam is not a legitimate reason for a make-up exam nor is scheduling work/appointments/vacations during the class period. All other missed tests will be assigned a zero, and the zero(s) will be used to calculate overall grade in course.

Extra-credit assignments may also be given throughout the course at the discretion of the instructor. It is never given at the end of the semester to bring up a poor grade. Do not even ask.

Attendance Policy: Students at COM are expected to attend and participate in every session of all classes for which they are registered. Regular attendance is a critical component to being successful in courses. Students should consult with their instructors when it becomes necessary to miss a class. Students are required to attend all classes. College of the Mainland recognizes no excused absences other than those prescribed by law.

To aid in a successful semester for a face-to-face math class, attendance and being engaged by actively participating to gain knowledge through class discussions and taking detailed and organized notes is essential. Students are not considered to be actively engaged when missing any part of a class and/or when their attention is directed to other sources. Because of this, students will be counted absent when:

- 1. Arriving to class 15 minutes late or later,
- 2. Taking break(s) during the class period for a significant amount of time or taking multiple breaks,
- 3. Sleeping during the class period,
- 4. Leaving early (15 minutes or longer), and/or
- 5. Using cellphone(s) and/or earbuds/headsets during the class period since students are expected to have a productive workspace and be engaged with the class discussions to aid students in having an environment that is conducive to optimal learning.

You cannot make-up classes, and it is your responsibility to be punctual and regular at attending class. If you find that you are having trouble arriving on time, adjust your schedule accordingly. Also, please be advised that it is **your** responsibility to get caught up when a class is missed. I am not responsible to send you the notes, nor will I.

Communicating with your instructor: ALL electronic communication with the instructor must be through your COM email. Due to FERPA restrictions, faculty cannot share any information about performance in the class through other electronic means. *I recommend downloading the Outlook app on your smartphone for easy access to COM email and to check your COM email at LEAST once per day*

Table Mapping SLO's and Core Objectives:

| Student Learner Outcomes | Maps to Core Objective | Assessed via this |
|---------------------------------|------------------------|-------------------|
| | | assignment |

| 1. | Solve mathematics of finance | Empirical and Quantitative | Exam |
|----|-------------------------------------|----------------------------|------|
| | problems, including the computation | Skills (EQS) | |
| | of interest, annuities, and | | |
| | amortization of loans. | | |
| 2. | Apply basic matrix operations, | Critical Thinking Skills | Exam |
| | including linear programming | (CT) | |
| | methods, to solve application | | |
| | problems. | | |
| 3. | Demonstrate fundamental | Visual Communication | Exam |
| | probability techniques and | Skills (CS) | |
| | application of those techniques, | | |
| | including expected value, to solve | | |
| | problems. | | |
| 4. | Apply matrix skills and probability | Critical Thinking Skills | Quiz |
| | analyses to model applications to | (CT) | |
| | solve real-world problems. | | |

Academic Dishonesty: College of the Mainland is committed to a high standard of academic integrity. All students are responsible for honesty and independent effort. Incidents of academic and scholastic dishonesty (including cheating, plagiarism, and collusion) will be dealt with in a manner that is consistent with College Policy and the Student Handbook. Any student found to have been academically dishonest on an assignment, quiz or exam will receive a zero for that assignment, quiz or exam and he or she will be referred to the Office of Student Conduct for further disciplinary action. Please read the sections of *Standards of Student Conduct and Discipline and Penalties* in the on-line Student Handbook

Student Concerns: If you have any questions or concerns about any aspect of this course, please contact me using the contact information previously provided. If, after discussing your concern with me, you continue to have questions, please contact Mr. Leslie Richardson, Math Department Chair, at 409-933-8329 or lirichardson@com.edu.

Additional Policies

Unattended Minors/Children in Class

For their safety, unattended minors of students are not permitted on campus while students are in class. In consideration of fellow classmates and staff, please do not bring children to class.

Productive Workplace

Students are expected to bring all tools necessary for success to class every day. These tools include writing implements, notebook/note paper, and an approved calculator. **Food and drinks, except for bottled water, are not allowed in classrooms.** All other items (backpacks, purses, bags, laptops, etc.) must be placed between your feet. In addition, headsets/wireless earbuds and cell phones are to be placed in your backpack, etc. before class starts.

Class Notes

Every week, class notes for each section to be covered that week will be posted on D2L for you to print and follow along during the lectures. It is highly suggested you have these notes for each class session.

Classroom Conduct Policy

Arriving on time, staying the entire class period, eliminating distractions like cell phones, using appropriate language (no cursing), respecting your classmates and the instructor, and cleaning up after yourself are all expectations for students in the classroom. Please abide by these expectations so that the class setting is enjoyable for all students. Regarding cell phones, they should be turned off or set on airplane mode and in your backpack/purse (not on your desk). It is extremely disruptive to the learning environment, so you will be asked to leave if it is a continuous problem. You are not allowed to use laptops during class. You may ONLY use a tablet for not taking purposes. Infractions may result in an automatic withdrawal from the class. Cell phones **cannot** be used during tests or quizzes and refer to testing policies for additional information. Please notify me before class if you have an emergency that requires you to answer your phone during class. Take an emergency phone call outside of the classroom.

Recording of Class

Students may not record all or part of class and/or all or part of a livestream without advanced written consent of the instructor. If you have or think you may have a disability such that you need to record class-related activities, please contact the Student Disability Services. If you have an accommodation to record class-related activities, those recordings may not be shared with any other student, whether in this course or not, or with any other person or on any other platform. If any instructor's recordings are provided, students may use instructor's recordings for their own studying and notetaking. Instructor's recordings are not authorized to be shared with anyone without the prior written approval of the instructor. Failure to comply with requirements regarding recordings may result in a disciplinary referral and/or disciplinary action.

Testing Policy

Prohibited devices include, but are not limited to:

- Cell phones; smart phones; smart watches
- Audio players/recorders, tablets, laptops, notebooks, or any other personal computing devices
- Separate timers
- Cameras or any other photographic equipment
- Any devices, including digital watches, that can be used to record, transmit, receive, or play back audio, photographic, text, or video content.

If your device makes a sound or is in your possession when the device goes off, you may be dismissed, and your score may be recorded as a zero.

<u>If you leave the classroom at any time during an exam, the exam must be submitted for grading.</u> Therefore, it is strongly advised that students take care of all personal business prior to entering the classroom to take an exam.

Course outline:

Tentative Schedule

| Week | Topic | Due Date |
|------|---|------------------------|
| 1 | 3.1 Functions 3.2 Graphs of Functions 3.3 Applications of Linear Functions 3.4 Quadratic Functions and Applications 3.5 Polynomial Functions 3.6 Rational Functions Quiz 1 (3.1 – 3.6) 4.1 Exponential Functions 4.2 Applications of Exponential Functions 4.3 Logarithmic Functions 4.4 Logarithmic and Exponential Equations Review for Exam 1 | June 6 Hw due: June 9 |
| | Exam 1 (3.1 – 4.4) | June 10 |
| 2 | 5.1 Simple Interest and Discount 5.2 Compound Interest 5.3 Anuities, Future Value, and Sinking Funds 5.3 Anuities, Future Value, and Sinking Funds (cont) 5.4 Annuities, Present Value, and Amortization Quiz 2 (5.1-5.4) 6.1 Systems: 2 Linear Equations in 2 Variables 6.2 Larger Systems of Linear Equations 6.3 Applications of Systems of Linear Equations 6.4 Basic Matrix Operations 6.5 Matrix Product and Inverses | June 13 |
| | Review for Exam 2 | Hw due: June 16 |
| 3 | Exam 2 (5.1 – 6.5) 7.1 Graphing Linear Inequalities in Two Variables (cont.) 7.2 Linear Programming 7.3 Applications of Linear Programming 7.4 The Simplex Method: Maximization 7.5 Maximization Applications Quiz 3 (7.2-7.5) 8.1 Sets | June 17th June 24th |
| | | Hw due: June 25 |

| | 8.1 Sets | |
|---|---|----------------|
| 4 | 8.2 Apps: Venn Diagrams, Contingency | |
| | 8.3 Introduction to Probability | |
| | 8.4 Basic Concepts of Probability | |
| | 8.5 Conditional Probability and | |
| | Independent Events | |
| | 8.6 Bayes Formula | |
| | Review for Exam 3 | June 26 |
| | Exam 3 (7.1 – 8.6) | June 20 |
| | 9.1 Probability Distributions and Expected | |
| | Value | |
| | 9.2 Multiplication Principle, Permutations, | |
| | Combinations | |
| | 9.3 Applications of Counting 9.4 Binomial | |
| | Probability | T 20 |
| | Quiz 4 (9.1-9.4) | June 28 |
| | 10.1 Frequency Distributions | Hw due: July 1 |
| | 10.1 Frequency Distributions | Hw due: July 1 |
| 5 | 10.2 Measures of Central Tendency | j |
| | Review for Exam 4 | |
| | Exam 4 (9.1 – 10.2) | July 2 |
| | Review for Final Exam | · |
| | Comprehensive Final Exam | July 5 |
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PLEASE NOTE: The syllabus is subject to change at the discretion of the instructor.

Important Dates: No Class- Juneteenth-June 19th **W-day** for 1st 5-week session-July 1st **No Class-**July 4th

Institutional Policies and Guidelines

Grade Appeal Process: Concerns about the accuracy of grades should first be discussed with the instructor. A request for a change of grade is a formal request and must be made within six months of the grade assignment. Directions for filing an appeal can be found in the student handbook https://www.com.edu/student-services/docs/Student_Handbook_2023-2024_v2.pdf An appeal will not be considered because of general dissatisfaction with a grade, penalty, or outcome of a course. Disagreement with the instructor's professional judgment of the quality of the student's work and performance is also not an admissible basis for a grade appeal.

Academic Success & Support Services: College of the Mainland is committed to providing students the necessary support and tools for success in their college careers. Support is offered through our Tutoring Services, Library, Counseling, and through Student Services. Please discuss any concerns with your faculty or an advisor.

ADA Statement: Any student with a documented disability needing academic accommodations is requested to contact:

Kimberly Lachney, Student Accessibility Services Coordinator

Phone: 409-933-8919

Email: <u>AccessibilityServices@com.edu</u>

Location: COM Doyle Family Administration Building, Student Success Center

Textbook Purchasing Statement: A student attending College of the Mainland is not under any obligation to purchase a textbook from the college-affiliated bookstore. The same textbook may also be available from an independent retailer, including an online retailer.

Withdrawal Policy: Students may withdraw from this course for any reason prior to the last eligible day for a "W" grade. Before withdrawing students should speak with the instructor and consult an advisor. Students are permitted to withdraw only six times during their college career by state law. The last date to withdraw from the 1st 5-week session is July 1. The last date to withdraw from the 10-week session is July 30. The last date to withdraw for the 2nd 5-week session is August 2.

FN Grading: The FN grade is issued in cases of *failure due to a lack of attendance*, as determined by the instructor. The FN grade may be issued for cases in which the student ceases or fails to attend class, submit assignments, or participate in required capacities, and for which the student has failed to withdraw. The issuing of the FN grade is at the discretion of the instructor. The last date of attendance should be documented for submission of an FN grade.

Early Alert Program: The Student Success Center at College of the Mainland has implemented an Early Alert Program because student success and retention are very important to us. I have been asked to refer students to the program throughout the semester if they are having difficulty completing assignments or have poor attendance. If you are referred to the Early Alert Program you will be contacted by someone in the Student Success Center who will schedule a meeting with you to see what assistance they can offer in order for you to meet your academic goals.

Resources to Help with Stress:

If you are experiencing stress or anxiety about your daily living needs including food, housing or just feel you could benefit from free resources to help you through a difficult time, please click here https://www.com.edu/community-resource-center/. College of the Mainland has partnered with free community resources to help you stay on track with your schoolwork, by addressing life issues that get in the way of doing your best in school. All services are private and confidential. You may also contact the Dean of Students office at deanofstudents@com.edu or communityresources@com.edu.

Nondiscrimination Statement:

The College District prohibits discrimination, including harassment, against any individual on the basis of race, color, religion, national origin, age, veteran status, disability, sex, sexual orientation, gender (including gender identity and gender expression), or any other basis prohibited by law. Retaliation against anyone involved in the complaint process is a violation of College District policy.