



Department of Mathematics and Computer Science

**Syllabus**  
**Math 0315.034IN Fall 2023**  
**Foundations of Algebra**

**Instructor Information:** Sheri Aajul

**Instructor E-mail:** [saajul@com.edu](mailto:saajul@com.edu)

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

**Virtual Student Hours:** Four half-hour zoom links to student/office hours are in D2L Brightspace content (in the Administrative Material folder.) Students should feel free to ask MATH 1314 questions during this time frame as well as MATH 0315 questions. My office hours are on Sunday from noon to 2 pm. You are always welcome to send email. I want you to master the material and I am happy to meet with you, so do not hesitate to stop by.

**Important Note: Internet is required as is regular reading of College of the Mainland (COM) email.**

This course uses Brightspace with integrated MyLab Math and COM email, so please check your email regularly. You will need access to the internet to gain access to course materials using D2L Brightspace, COM email, and MyLab Math (MML) software. *Some devices like iPads/tablets and cellphones present problems with gaining access to quizzes/tests, so they are not acceptable devices for this class.* If you do not have your own internet access, you can get access on campus in the Library.

**1. Required Textbook/Materials**

The textbook used in this course is: Intermediate Algebra, 8<sup>th</sup> edition, by Tobey, Slater, Blair and Crawford, published by Pearson. An electronic copy of the text is integrated into MyLab Math, so no hardcopy text is needed (unless you want one.) Please use the multimedia version of the textbook available online in our D2L Brightspace class using the MyLab Math link followed by the Multimedia Library Tab. Use the schedule found on this syllabus to determine the chapter/section to read. The multimedia textbook has embedded videos and worked examples so it is a huge help to master course material. Be sure to make a list of important formulas and ideas.

A scientific calculator (like a TI 30) is needed for this course and a TI 84 graphing calculator is recommended for MATH1314 (but you could use the TI-30 for both classes.) A TI 89 or higher cannot be used in this course, nor any internet accessing nor Computer Algebra System (CAS) calculator. Do not use stored programs beyond what comes pre-packed in the calculator.

**MyLab Math (Pearson)**

Please access MyLab Math via Brightspace (in the content section of our course). You can access Brightspace directly from the COM homepage <http://www.com.edu> (scroll down to the

bottom of the page and click on the button for D2 Brightspace) or via <http://com.brightspace.com>. A document in Course Administration walks you through using the MyLab Math course. The best browsers for MyLab Math are Chrome and Safari. You will need to allow pop-ups. Note that MyLab Math contains course text, multimedia, homework, quizzes, tests and grades so if you opted out of *MyLab Math*, your course grade will be zero.

## 2. Course Description

This course is designed to develop skills and understanding in the following areas: basic algebra concepts to include exponents, factoring and radicals; relations and functions, inequalities, algebraic expressions, and equations (absolute value, polynomial, radical, rational), with a special emphasis on linear and quadratic expressions and equations. Prerequisites/co-requisites: Prerequisite of TSIA2 Math Diagnostic 4. This course does not transfer.

## 3. Course Requirements

### Homework Assignments

There is an assigned homework for each section to be completed online using MyLab Math. *Starting on Test 2 material, most homework allows late submission with a 20% penalty on problems submitted after the due date, except if close to an exam or end of course, then there is no late submission option. Penalty applies to late problems and not necessarily to the entire assignment. Late close dates are as follows: All Exam 1 homework closes on 9/10/23; All Exam 2 homework closes on 9/24/23; All Exam 3 homework closes on 10/01/23; and all Exam 4 homework closes on 10/08/23. Final exam homework closes on 12/03/2023. Please keep up with the course and do not procrastinate.*

### Quizzes and Exams

There are four quizzes, four chapter exams and a comprehensive final exam. All of the quizzes and exams are to be done online using MyLab Math.

You may use your approved calculator (which does not access the internet, perform CAS or contain other than original stored programs) on all assessments. I suggest that you create a formula/concept sheet which has three columns, one for the name of the formula or concept, one for the formula or concept, and one for an example of the formula or concept. Study this document regularly and commit the formulas and concepts to memory, but keep the formula sheet handy in case you need it to check a problem on an assessment. **If you really get stuck, you may use your hardcopy textbook, and homework and class notes on assessments (including your self-created formula sheet.) No other material or help is allowed. Do your own work.**

You can retake each quiz just once (with its time frame) to improve your score; the higher score will be the one that counts. The quizzes are open until their respective exams close and you can submit during that time frame without late penalty. There are no retakes on exams. Quizzes have time limits of two hours; Exams 1-4 as well as the final exam have time limits of two and one half hours. At most 4 percentage points of extra credit will be added to your final exam score (for a max score of 100%) for submitting a course evaluation.

#### 4. Determination of Course Grade/Detailed Grading Formula

##### Grading Formula:

The course grade will be determined by the following formula:

$$\text{Final Average} = 64\% \text{ Chapter Exam Average} + 16\% \text{ Final Exam} \\ + 10\% \text{ Homework Average} + 10\% \text{ Quiz Average}$$

**The Final Exam score will replace the lowest Chapter Exam Score when it is larger.**

##### Grading Scale:

Grade A: Final Average in [89.5, 100]  
Grade B: Final Average in [79.5, 89.5)  
Grade C: Final Average in [69.5, 79.5)  
Grade D: Final Average in [59.5, 69.5)  
Grade F: Final Average in [0, 59.5)

#### 5. Make-up policy

If you are unable to make a scheduled exam within days specified in the course outline, you will be allowed to make up the exam provided that you notify the instructor before the end of the scheduled exam period and have a legitimate reason for not being able to take the exam.

#### 6. Attendance Policy

**You must log in and be active in MyLab Math each week, preferable at least three times.** In addition to time spent in doing homework, taking quizzes and exams it will be necessary to study, using the course materials. Please plan to spend at least 4 hours per week to be successful in the class.

#### 7. 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 will make every effort to respond to your email within 24 hours of receiving it.

#### 8. Student Learning Outcomes

Upon successful completion of M01315 students will:

1. Define, represent and perform operations on real and complex numbers.
2. Recognize, understand and analyze features of a function
3. Recognize and use algebraic (field) properties, concepts, procedures (including factoring), and algorithms to combine, transform, and evaluate absolute value, polynomial, radical, and rational expressions.
4. Identify and solve absolute value and linear inequalities.
5. Model, interpret and justify mathematical ideas and concepts using multiple representations.

6. Connect and use multiple strands of mathematics in situations and problems, as well as to the study of other disciplines.

### 9. Academic Dishonesty

Do your own work on assessments. 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 on *Standards of Student Conduct and Discipline and Penalties* in the on-line Student Handbook.

### 10. 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 the Department Chair, Leslie Richardson, at (409) 933-8329, [lrichardson@com.edu](mailto:lrichardson@com.edu).

### 11. Course Calendar and Pacing

NOTE: We move through MATH0315 pretty fast as MATH1314 is more abstract and takes more time to master. The material we cover in MATH0315 is needed for success in MATH1314. Note that MATH0315 has a final exam (and a review for final exam homework) towards the end of the semester even though chapter content in covered earlier.

## Side-By-Side MATH 0315 – MATH 1314 Course Calendars

Date Range	MATH0315 Assignments/Assessments	Due Date	MATH1314 Assignments/Assessments
Week 1 8/28 – 9/3	Orientation Homework 1.4 Rules of Exponents (skip scientific notation) 1.5 Operations with Variables; Grouping Symbols 1.6 Evaluating Expressions/Formulas 2.1 First Degree Equations in One Variable 2.4 Solving Word Problems <b>Quiz A (Sections 1.5, 1.6 &amp; 2.1)</b>	9/3/2023	Students work on 0315
Week 2 9/4 – 9/10	2.6 Linear Inequalities 2.3 Absolute Value Equations 2.8 Absolute Value Inequalities <b>Test 1 (1.4, 1.5, 1.6, 2.1, -2.3, 2.4, 2.6, &amp; 2.8)</b> 3.1 Graphing Linear Equations with Two Unknowns	9/4/23 Holiday 9/10/2023	Students work on 0315
		9/13/2023 Census Day	

Week 3 9/11 – 9/17	3.2 Slope of a Line 3.3 Graphs and the Equations of a Line <b>Quiz B (Sections 3.1, 3.2 &amp; 3.3)-</b> 4.1 Systems of Linear Equations in 2 Variables 4.3 Applications of Systems of Equations	9/17/2023	Students work on 0315
Week 4 9/18 – 9/24	<b>Test 2 (3.1, 3.2, 3.3, 4.1 &amp; 4.3)</b> 5.1 Polynomial 5.4 GCF, Factoring by Grouping 5.5 Factoring Trinomials <b>Quiz C (Section 5.4, 5.5 &amp; 5.6)</b> 5.6 Special Cases of Factoring 5.8 Solving Equations by Factoring	9/24/2023	Students work on 0315
Week 5 9/25 – 10/01	<b>Test 3 (5.1, 5.4, 5.5, 5.6 &amp; 5.8)</b> 5.3 Synthetic Division 6.1 Rational Expressions: Simplifying, Multiplying, Dividing 6.2 Add/Subtract Rational Expressions 7.6 Complex Numbers 3.6 Graphing Functions from Equations <b>Quiz E (Sections 7.6 &amp; 3.6)</b>	10/01/2023	Orientation Homework
Week 6 10/02 – 10/08	<b>Test 4 (5.3, 6.1, 6.2, 3.6 &amp; 7.6)</b>	10/08/2023	1.1 Introduction to Graphs 1.2 Functions and Graphs 1.3/1.4 Linear Functions and Equations 1.5 Zeros of Linear Functions
Week 7 10/09 – 10/15	Students work on 1314	10/15/2023	<b>Quiz 1: Sections 1.1-1.5</b> 2.1 Increasing/Decreasing Piecewise Functions 2.2 Algebra of Functions 2.3 Composition of Functions 2.5 Transformations of Functions (opens early but due 10/22)
Week 8 10/16 – 10/22	Students work on 1314	10/22/2023	<b>Exam 1 (Chapters 1 &amp; 2, excluding 2.4)</b> 3.2 Quadratic Functions 3.3 Graphs of Quadratic Functions
Week 9 10/23 – 10/29	Students work on 1314		4.1 Polynomial Functions 4.2 Graphs of Polynomial Functions ( <i>see TI-84 handout on BrightSpace</i> ) 4.3 Remainder, Factor Theorems
Week 10 10/30 – 11/05	Students work on 1314	11/05/2023	4.5 Rational Functions <b>Quiz 2 Finding Zeros (over 3.2, 4.3 &amp; 4.5)</b> 4.6 Inequalities <b>Exam 2 (Chapters 3 and 4)</b>
Week 11 11/06 – 11/12	Students work on 1314	11/12/2023	5.1 Inverse Functions 5.2 Exponential Functions

			5.3 Logarithmic Functions <b>Quiz 3 Graphing Techniques (over 5.1-5.3)</b>
Week 12 11/13 – 11/19	Students work on 1314	11/19/2023	5.4 Properties of Logarithmic Functions 5.5 Exponential, Logarithmic Equations 5.6 Modeling with Exponential and Logarithmic Functions (due 11/27/23)
Week 13 11/20 – 11/26	Review for Final Exam Homework (closes 12/3/23)	11/23/23 – 11/26/23 <i>Holiday</i>	<b>Exam 3 (Ch. 5) opens early but due 12/3/23</b> <i>See TI-84 handouts for Exam 4 material</i> 6.1/6.3 Solving Linear Systems 2-D general as well as via Gaussian/Gauss-Jordan Elimination (due 12/3/23)
Week 14 11/27 – 12/3	Review for Final Exam Homework	<b>11/28/2023 W-Day</b> 12/3/2023	6.2 Solving Linear Systems 3-D 6.4 Matrix Operations <b>Quiz 4 (over 6.1-6.4)</b>
Week 15 12/4 – 12/10	<b><i>Comprehensive Final Exam opens early</i></b>	12/10/2023	<b>Exam 4 (Chapter 6)</b> Review for Final Exam Homework <b>Final Exam opens on Sunday</b>
Week 16 12/11 – 12/12	<b><i>Comprehensive Final Exam (due Tuesday)</i></b>	0315: 12/12/2023 1314: 12/13/2023	<b>Final Exam (due Wednesday)</b>

## 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](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 at 409-933-8919 or [klachney@com.edu](mailto:klachney@com.edu). The Office of Services for Students with Disabilities is located in the 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 1<sup>st</sup> 8-week session is October 11. The last date to withdraw from the 16-week session is November 28. The last date to withdraw for the 2<sup>nd</sup> 8-week

session is December 7.

**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](mailto:deanofstudents@com.edu) or [communityresources@com.edu](mailto:communityresources@com.edu).