# Developmental Math (TMTH 0374-2A1) Online


## INSTRUCTOR CONTACT INFORMATION

Instructor: Alfred de la Rosa, Jr.

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Office Phone: (409) 247-4757

Office Location: Building TA5, Room 103

Office Hours: Monday: 11:00 am-2:00 pm
Tuesday: 12:30 pm-1:00 pm; 2:30 pm-3:30 pm
Wednesday: 10:00 am-2:00 pm
Thursday: 12:30 pm-1:00 pm; 2:30 pm-3:30 pm
Friday: 10:00 am-1:00 pm

## CREDIT

3 Semester Credit Hours (3 hours lecture, 0 hours lab)

## MODE OF INSTRUCTION

Online

## PREREQUISITE/CO-REQUISITE:

Must be co-enrolled in TMTH 0174 Base NCBO (Mathematics).

## COURSE DESCRIPTION

The course supports students in developing skills, strategies, and reasoning needed to succeed in mathematics, including communication and appropriate use of technology. Topics include the study of numeracy and the real number system; algebraic concepts, notation, and reasoning; quantitative relationships; mathematical models; and problem solving.

## COURSE OBJECTIVES

Upon completion of this course, the student will be able to

1. Use appropriate symbolic notation and vocabulary to communicate, interpret, and explain mathematical concepts.
2. Define, represent, and perform operations on real numbers, applying numeric reasoning to investigate and describe quantitative relationships and solve real world problems in a variety of contexts.

Approved: Initials/date

3. Use algebraic reasoning to solve problems that require ratios, rates, percentages, and proportions in a variety of contexts using multiple representations.
4. Apply algebraic reasoning to manipulate expressions and equations to solve real world problems.
5. Use graphs, tables, and technology to analyze, interpret, and compare data sets.
6. Construct and use mathematics models in verbal, algebraic, graphical, and tabular form to solve problems in a variety of contexts and to make predictions and decisions.

**REQUIRED TEXTBOOK AND MATERIALS**

1. Pearson *MyMathLab* access
   **NOTE:** With access to *MyMathLab* in TMTH 0374, **no additional MyMathLab access requirement is necessary for TMTH 0174.**
   a. Once students have access to this class in Blackboard, they will be able to access the Pearson website and their assignments in *MyMathLab*.
   b. ISBN 9780138109738
2. Basic six-function calculator--no scientific or graphing calculators or calculators on cell phones, tablets, etc., are permitted.

Access to MyMathLab is available through the Eagle Learning Essentials (ELE) program at $14 per credit hour added to your student account. Students may opt out of this program if they do not wish to participate in it. The deadline for opting out during this 16-week course is February 5, 2025. For more information, please go to **https://www.lit.edu/student-success/eagle-learning-essentials**.

**ATTENDANCE POLICY**

Since this course is taught online, it takes a lot of discipline and self-starting qualities to complete and pass it. Therefore, it is necessary to keep up with assignments by working on them daily, if needed, in order to meet deadlines and not fall behind. It is also very important for students to check for email and announcements from their instructor. Students should check for these daily so that they are up-to-date on information about the course regarding assignments, tests, etc.

**DROP POLICY**

If you wish to drop the course (if eligible), you are responsible for initiating and completing the drop process by the specified drop date as listed on the Academic Calendar. If you stop completing assignments in your online course and fail to drop, you will earn a "DF" in the course. *If you drop this course, you must also drop TMTH 0174.*

**STUDENT EXPECTED TIME REQUIREMENT**

For every hour in class (or unit of credit), students should expect to spend at least two to three hours per week studying and completing assignments. For a 3-credit-hour class, students should prepare to allocate approximately six to nine hours per week outside of class in a 16-week session OR approximately twelve to eighteen hours in an 8-week session. Online/Hybrid students should expect to spend at least as much time in this course as in the traditional, face-to-face class.

**COURSE CALENDAR**

| DATE | TOPIC | READINGS (Due on this Date) | ASSIGNMENTS (Due on this Date) |
|---|---|---|---|
| 1-21-25 | Module 1<br>Part 1: Notation, Order, Rounding<br>Part 2: Applications and Problem Solving<br>Part 3: Exponential Notation; Order of Operations<br>Part 4: Factors vs. Multiples<br>Part 5: Prime vs. Composite; Prime Factorization<br>Part 6: Greatest Common Factor and Least Common Multiple | Module 1 Worksheets<br>**Tuesday, January 21, 2025** | MyMathLab: Module 1, Parts 1-6<br>**Monday, February 3, 2025** |
| 2-3-25 | Module 2<br>Part 1: Fraction Notation and Simplifying<br>Part 2: Multiplication and Division<br>Part 3: Order; Addition and Subtraction<br>Part 4: Mixed Numerals<br>Part 5: Applications and Problem Solving<br>Part 6: Order of Operations<br>Part 7: Simple Probability | Module 2 Worksheets<br>**Monday, February 3, 2025** | MyMathLab: Module 2, Parts 1-7<br>**Monday, February 17, 2025** |
| 2-17-25 | Module 3<br>Part 1: Decimal Notation; Order<br>Part 2: Rounding<br>Part 3: Order of Operations<br>Part 4: Fraction Notation; Decimal Notation<br>Part 5: Applications and Problem Solving | Module 3 Worksheets<br>**Monday, February 17, 2025** | MyMathLab: Module 3, Parts 1-5<br>**Monday, March 3, 2025** |
| 3-3-25 | Module 4<br>Part 1: Ratio and Proportion<br>Part 2: Percent, Decimal, and Fraction Notation<br>Part 3: Solving Percent Problems | Module 4 Worksheets<br>**Monday, March 3, 2025** | MyMathLab: Module 4, Parts 1-5<br>**Monday, March 24, 2025** |

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| | Part 4: Applications of Percent<br>Part 5: Simple Interest | | |
| 3-24-25 | Module 5<br>Part 1: Measures of Central Tendency<br>Part 2: Interpreting Data from Tables and Graphs<br>Part 3: Interpreting and Drawing Bar Graphs and Line Graphs<br>Part 4: Interpreting and Drawing Circle Graphs | Module 5 Worksheets<br>**Monday, March 24, 2025** | MyMathLab: Module 5, Parts 1-4<br>**Monday, April 7, 2025** |
| 4-7-25 | Module 7<br>Part 1: The Real Numbers<br>Part 2: Addition and Subtraction of Real Numbers<br>Part 3: Applications Involving Addition and Subtraction of Real Numbers<br>Part 4: Multiplication and Division of Real Numbers<br>Part 5: Applications Involving Multiplication and Division of Real Numbers<br>Part 6: Order of Operations<br>Part 7: Introduction to Algebra<br>Part 8: Properties of Real Numbers<br>Part 9: Algebraic Expressions<br>Part 10: Simplifying Algebraic Expressions | Module 7 Worksheets<br>**Monday, April 7, 2025** | MyMathLab: Module 7, Parts 1-10<br>**Monday, April 21, 2025** |
| 4-21-25 | Module 8<br>Part 1: Solving One-Step Equations with Addition or Subtraction<br>Part 2: Solving One-Step Equations with Multiplication or Division<br>Part 3: Solving Multi-Step Equations<br>Part 4: Solving More Multi-Step Equations | Module 8 Worksheets<br>**Monday, April 21, 2025** | MyMathLab: Module 8, Parts 1-5<br>**Wednesday, May 7, 2025** |

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| | Part 5: Applications | | |

**COURSE EVALUATION**

Final grades will be calculated according to the following criteria:

- Course Assignments 40%
- Online Module Tests 60%

**GRADE SCALE**

- 90-100 DA
- 80-89 DB
- 70-79 DC
- 0-69 DF

LIT does not use +/- grading scales

**ACADEMIC DISHONESTY**

Students found to be committing academic dishonesty (cheating, plagiarism, or collusion) may receive disciplinary action. Students need to familiarize themselves with the institution's Academic Dishonesty Policy available in the Student Catalog & Handbook at http://catalog.lit.edu/content.php?catoid=3&navoid=80#academic-dishonesty.

**TECHNICAL REQUIREMENTS**

The latest technical requirements, including hardware, compatible browsers, operating systems, etc., can be accessed online at https://lit.edu/online-learning/online-learning-minimum-computer-requirements. A functional broadband internet connection, such as DSL, cable, or WiFi is necessary to maximize the use of online technology and resources.

**DISABILITIES STATEMENT**

The Americans with Disabilities Act of 1990 and Section 504 of the Rehabilitation Act of 1973 are federal anti-discrimination statutes that provide comprehensive civil rights for persons with disabilities. LIT provides reasonable accommodations as defined in the Rehabilitation Act of 1973, Section 504, and the Americans with Disabilities Act of 1990 to students with a diagnosed disability. The Special Populations Office is located in the Eagles' Nest Room 129 and helps foster a supportive and inclusive educational environment by maintaining partnerships with faculty and staff, as well as promoting awareness among all members of the Lamar Institute of Technology community. If you believe you have a disability requiring an accommodation, please contact the Special Populations Coordinator at (409)-951-5708 or email specialpopulations@lit.edu. You may also visit the online resource at Special Populations - Lamar Institute of Technology (lit.edu).

**STUDENT CODE OF CONDUCT STATEMENT**

It is the responsibility of all registered Lamar Institute of Technology students to access, read, understand, and abide by all published policies, regulations, and procedures listed in the *LIT Catalog and Student Handbook*. The *LIT Catalog and Student Handbook* may be accessed at www.lit.edu. Please note that the online version of the *LIT Catalog and Student Handbook* supersedes all other versions of the same document.

**ARTIFICIAL INTELLIGENCE STATEMENT**

Lamar Institute of Technology (LIT) recognizes the recent advances in Artificial Intelligence (AI), such as ChatGPT, have changed the landscape of many career disciplines and will impact many students in and out of the classroom. To prepare students for their selected careers, LIT desires to guide students in the ethical use of these technologies and incorporate AI into classroom instruction and assignments appropriately. Appropriate use of these technologies is at the discretion of the instructor. Students are reminded that all submitted work must be their own original work unless otherwise specified. Students should contact their instructor with any questions as to the acceptable use of AI/ChatGPT in their courses.

**STARFISH**

LIT utilizes an early alert system called Starfish. Throughout the semester, you may receive emails from Starfish regarding your course grades, attendance, or academic performance. Faculty members record student attendance, raise flags and kudos to express concern or give praise, and you can make an appointment with faculty and staff all through the Starfish home page. You can also login to Blackboard or MyLIT and click on the Starfish link to view academic alerts and detailed information. It is the responsibility of the student to pay attention to these emails and information in Starfish and consider taking the recommended actions. Starfish is used to help you be a successful student at LIT.

**ADDITIONAL COURSE POLICIES/INFORMATION**

1. A webcam and microphone are required for submitting online tests. This means that each student will be recorded while taking his or her exams. Any student violating testing policies during a test will receive a grade of 0 on the exam.
2. The student must purchase all required course materials.
3. The student will be expected to have access to the internet and a computer.
4. Blackboard logon and access to the course a minimum of four times per week.