



Course Name:	Quantitative Reasoning
Course & Section Number:	MTH033-XXX
Meeting Day(s) & Time(s):	
Credits:	3
Contact Hours:	2 Lab, 2 Lecture
Text:	Prealgebra, Beginning Algebra, & Intermediate Algebra
Instructor's Name:	
Office Hours & Location:	
OCC Phone:	
OCC Email: *	

Please use your Owens email for communications: **sean_stewart@owens.edu**

1. **Use student Owens email account**
2. **Place course and section number in the subject area**
3. **Emails from outside the college system will be deleted and/or reported as spam.**

Preferred:

***EMAIL (Course and Section numbers in subject line)**

Classroom Admittance:

OCC classes (e.g., traditional, land-based, laboratory, hybrid, asynchronous online, synchronous online, etc.) shall only be attended by the officially registered OCC students, instructor of record, guest lecturer, or substitute. Visitors are not permitted in the classroom and should not be invited to attend or participate in the class. See [FERPA](#) for specifics.

General Information:

Student Code of Conduct: All students are expected to follow Owens Community College's [Student Code of Conduct](#), which includes academic honesty, encompassing plagiarism. See the [Board Policy](#) for more information.

Anti-Discrimination and Harassment & Title IX/Sexual Misconduct: All students, faculty, and staff are expected to follow Owens Community College's [Anti-](#)

[Discrimination and Harassment Policy](#) and the College's [Title IX Policy](#)/Sexual Misconduct Procedures and Guidelines. The College strictly prohibits and will not tolerate harassment, discrimination, intimidation, or hostile/offensive working or learning environments.

Religious Accommodations: A student seeking an accommodation for an absence permitted under Ohio's Testing Your Faith Act must provide the instructor with a **written email** notice with the specific dates for an absence and must do so not later than fourteen (14) days after the first day of instruction. **Alternative accommodations are not retroactive, and no academic penalty will be imposed for an absence under the policy*.** The request for alternative accommodation will be kept confidential. Students with questions about a religious accommodation under Ohio's Testing your Faith Act may contact the College's Office of Academic Affairs: provost@owens.edu

*The policy may be found on the Owens website: [3358:11-2-63 Accommodation](#) for a Student Absence for the Observance of Religious Beliefs and Practices Policy

Document Collection: Throughout the semester, your instructors may ask for a variety of assignments, or they may give you tests and/or quizzes for student learning of general education or program assessment. Please save all your materials until the semester's end.

Academic Support:

Disability Services Resource Center: If you have a disability or acquire one, you may be entitled to receive reasonable accommodation intended to assure you an equal opportunity to participate in and benefit from the program. To receive more information or to register for accommodations, please contact the Disability Resource Center at 567-661-7007, email disability@owens.edu, visit <https://www.owens.edu/disability/>, or stop by College Hall 124.

Tutoring Services: Owens Community College offers academic tutoring and assistance in a variety of subjects including accounting, computing, economics, mathematics, science, and writing. For more information go to: <https://www.owens.edu/successcenters/>.

Counseling Services: Counseling

Services provides assistance to students experiencing personal, educational, interpersonal/relationship, family, social, or psychological difficulties. If you feel you may benefit from this service, please contact them at counselingservices@owens.edu. More information is at <https://www.owens.edu/counseling/>.

Campus and Community Connections:

The Center for Campus and Community Connections (College Hall 151) is a walk-in office created to provide retention support through resource stability initiatives and community connections. Go here for more information: <https://www.owens.edu/connection/> or contact connections@owens.edu

Owens Library: The Owens Library offers two locations (Toledo and Findlay) as well as online

resources. For more information visit <https://www.owens.edu/library/>.

Students can find more information on campus resources, student support, student life, and security at this [link](#).

Catalog Description:

Designed to prepare students for the co-requisite Quantitative Reasoning course. Includes instruction in those math concepts needed for entry into the next course. (Not for graduation credit.)

Prerequisites:

None

Course Materials:

Textbook:

Julie Miller, Molly O'Neill, Nancy Hyde, *Developmental Mathematics: Prealgebra, Beginning Algebra, & Intermediate Algebra*, 2nd Edition McGraw-Hill Science/Engineering/Math, 2022.

Calculator:

Scientific calculator capabilities are required. You may purchase a calculator (such as the TI 30-series) or use an online calculator (such as: [Scientific Calculator](#) or [Calculator Soup](#)).

Use of AI Tools: In this course, students are encouraged to explore and utilize generative AI tools, such as chatbots, text generators, paraphraser, etc., as part of their learning and coursework. Proper attribution and transparency about your usage of an AI tool are expected. Here are some examples of ethical and responsible generative AI use.

- Use AI tools only for tasks that are appropriate for your level of learning and understanding. Do not use AI tools to replace your own thinking or analysis, or to avoid engaging with the course content.
- Cite any AI tools you use properly, following the citation style specified by the instructor.
APA Example:
 - OpenAI. (2024). *ChatGPT* (Mar 14 version) [Large language model]. <https://chat.openai.com/chat>
- Provide evidence of how you used the AI tool and how it contributed to your assignment. Explain what you learned from the AI tool, how you verified its accuracy and reliability, how you integrated its output with your own work, and how you acknowledged its limitations and biases.
- Take full responsibility for any mistakes or errors made by the AI tool. Do not rely on the AI tool to produce flawless or correct results. Always check and edit the output before submitting your work. If you discover any inaccuracies or inconsistencies in the output after submission, notify the instructor immediately and correct them as soon as possible.
- If you are working on a group assignment, discuss the use of AI tools with your group members and agree on how you plan to use them and how you will be transparent with the instructor regarding their use.

If you have any questions about what constitutes ethical and responsible use of AI tools, please consult with the instructor before submitting your work.

You will need access to a computer, reliable Internet connection, and the ability to create Microsoft Word documents.

Instructor/Students Communication Expectations:

Office Hours - My office hours are listed at the top of the of this document. If for any reason I'm out of the office during my designated hours, email me at sean_stewart@owens.edu to set up an appointment. This appointment may be done virtually.

Upon emailing me, place your course and section number on the subject line. When emailing for a medical reason, attach a document with the time and date of your doctor's visit or hospitalization. This includes family members that are in your care. Please, do not include details of the medical circumstance, since you have a right to this privacy.

Make-up policy:

Please contact me if you have any issues which interfere with your ability to complete your work on time, please contact me immediately.

Study and Homework Recommendations

Taking notes during class lectures is a vital part of the learning process. Carefully writing down the steps demonstrated by the instructor is highly recommended. Students are also encouraged to use examples provided by Pearson Education to reinforce understanding.

You may show your work using a variety of methods, as long as the process of solving the question is clearly and completely written.

It is highly recommended that you complete your homework in a spiral notebook prior to taking the chapter quiz, as this will help you achieve the best results. Homework is available for the entire semester, allowing continued practice throughout the course. So, the deadline for each of them will be on the last day of Final Exam week.

Email – If you send me an email I will respond within 24 hours. If you do not hear from me within a reasonable time frame, I probably did not know the information listed above. So, to expedite your issue and resolve it quickly, help me with being specific with your request/question.

Computer – Make sure your computer is ready to receive the required materials for this course. This hasn't been an issue in the past. However, call the Owens Help desk for any issues regarding Bb access

Course Objectives:

Students will explore and apply the basic mathematical skills necessary for Quantitative Reasoning. Various technologies will be introduced and applied throughout the semester.

Student Learning Outcomes:

Students will:

1. Identify their strengths and weaknesses in the context of group roles.
2. Investigate properties of numbers and the number line.
3. Manipulate fractions with various numeric operations.

4. Make connections between decimals and percentages.
5. Manipulate various literal and linear equations to isolate prescribed variables.
6. Construct and solve properties of geometric shapes: perimeter, area, surface area, and volume
7. Express reasoning by writing coherent statements and paragraphs in a variety of contexts.
8. Evaluate and integrate appropriate technological tools for use for different components within the course.

Weighted Grade Scheme:

Evaluation Measure	Value	Outcome Assessed
Attendance and In-Class Participation	10%	1-8
ALEKS Objectives	20%	1-8
Modular Check-In and In-Class Questions	20%	1-8
Pie-Grades & Knowledge Checks	20%	1-8
Modular Activities	30%	1-8

This course is a **Pass/Fail** course and does not count towards graduation. Grades will be calculated on the following scale:

75% and Above	PNP (Pass, No Points)
Less Than 75%	FNC (Fail, No Credit)

Objectives for the week are due according to the Assignment Calendar

Please see Assignment Calendar for dates. You may complete missed objectives after the due date, but it will not change the objective's grade. It will, however, be reflected in the Pie Score and Knowledge Checks.

Pie-Grades and Knowledge Checks:

Knowledge Checks will appear in Aleks after finishing Objectives 2, 4, 6, 8, and 10. These will check knowledge learned over the previous two Objectives.

The results will update the overall Pie score.

The target Pie score after each Knowledge Check is as follows:

- Post-objective 2 – 20%,
- Post-objective 4 – 40%,
- Post-objective 6 – 60%,
- Post-objective 8 – 80%,
- Post-objective 10 – 100%.

Checking-In:

Each module has a “check-in” day. The material for that module will have been completed.

Before class, a Google Doc link will become available in the class Blackboard shell. You must have the doc completed before “check-in” day. Individual student conferences will be held with the instructor to discuss your responses and to work through a plan to help the student. If you are not at the conference, it is expected that you are working on completing your Objective assignment and/or your Knowledge Check.

Last day to **add** before needing instructor signature: DATE at TIME

Last day to **drop** is DATE at TIME (no signature needed).

Assignment Calendar

Week	Day	Date	Activity/Section(s) to be Covered
1			Understanding How to be a student – Roles of Technology in this Course
			Understanding How to be a student – Time Management, Group Roles Speakers
2			Understanding Numbers – The Number Line (SEC 1.2)
			Understanding Numbers – The Number Line (SEC 2.1-2.3)
			Objective 1 Due – TIME
3			Understanding Numbers – The Number Line (SEC 2.4)
			Understanding Numbers – Checking In
			Objective 2 Due – TIME Knowledge Check Scheduled
4			Understanding Numbers Activity
			Understanding Numbers Activity Due
5			Understanding Fractions – Multiplication – Unit Conversion (SEC 4.3, 8.1-8.3)
			Understanding Fractions – Division (SEC 4.3)
			Objective 3 Due – TIME
6			Understanding Fractions – Addition and Subtraction (SEC 4.4-4.5)
			Understanding Fractions – Checking In
			Objective 4 Due – TIME Knowledge Check Scheduled
7			Understanding Fractions Activity
			Understanding Fractions Activity Due
8			Understanding Percentages – Parts of a Whole (SEC 7.1)
			Understanding Percentages – Percent Proportions (SEC 7.2)
			Objective 5 Due – TIME
9			Understanding Percentages – Percent Equations (SEC 7.3)
			Understanding Percentages – Checking In
			Objective 6 Due – TIME Knowledge Check Scheduled
10			Understanding Percentages Activity
			Understanding Percentages Activity Due
11			Understanding Algebra – Linear Equations (SEC 3.1, 3.3)
			Understanding Algebra – Linear Equations (SEC 3.4-3.5)
			Objective 7 Due – TIME
12			Understanding Algebra – Numeric Substitutions (SEC 3.2)
			Understanding Algebra – Checking In
			Objective 8 Due – TIME Knowledge Check Scheduled
13			Understanding Algebra Activity
			Understanding Geometry – Planar Shapes – Perimeter & Area (SEC 8.7)

14			Understanding Geometry – 3-Dimensional Shapes – Surface Area (SEC 8.8)
			Holiday No Classes
			Objective 9 Due – TIME
15			Understanding Geometry – Checking In
			Understanding Geometry – Checking In
			Objective 10 Due – TIME Knowledge Check Scheduled
16			Understanding Geometry Activity Due

Disclaimer: “The instructor reserves the right to amend this syllabus as deemed necessary and will communicate such amendment to the students in the course.”