SOUTH PLAINS COLLEGE
MATHEMATICS, ENGINEERING & COMPUTER SCIENCE

MATH0305 – Foundations of Algebra

Section 603

Room: B004, Lubbock Downtown Center
M/W: 5:30 PM – 6:45 PM

Contact

Instructor: Mr. Vargas

Email: evargas@southplainscollege.edu

Phone: (806) 716-4673

Office Hours

M-R: 11:20 PM – 12:50 PM
Levelland Campus, **M101**

F: 8:45 AM – 10:45 AM
Lubbock Downtown Center, **B032**

Description

This course is a study of fundamental mathematics principles and concepts to prepare students for math corequisites. Includes:

- Performing basic arithmetic operations on integers, fractions, and decimals
- Calculations involving exponents and order of operations
- Solving application problems involving proportions, percent, and fractions
- Simplifying algebraic expressions and solving linear equations
- Application problems involving linear models
- Graphs of linear equations in two variables
- Applying rules of exponents; and operations on polynomials.

The course includes a non-course competency-based lab option that requires students to work with a tutor outside of the prescribed class meeting time to develop skills, strategies, and reasoning needed to succeed in mathematics, including communication and appropriate use of technology.
This course will not satisfy graduation requirements.

Supplies

1. Pencils (NOT PENS); Colored Pencils are recommended.
2. Notebook paper to complete your assignments
3. Blank notes will be posted on Blackboard. Students must print and fill in these notes.
4. Large, 3-ring binder with dividers to organize notes and homework.
5. Non-graphing, scientific calculator.

Grading

A: 90-100	**Pass – Excellent Performance**
B: 80-89	**Pass – Good Performance**
C: 70-79	**Pass – Satisfactory Performance**
D: 60-69	**Depends – Less than Satisfactory**
F: 0-59	**Fail – Unsatisfactory Performance**

Weights

Tutor Lab Attendance	15%
Weekly Quizzes	15%
Final Exam	70%
Total	**100%**

Tutoring

Students are required to attend tutoring lab sessions provided by South Plains College to obtain assistance and practice on a weekly basis

1. 1 hour (60 minutes) is required on a Monday through Friday week.
2. Check in on the Penji app to obtain credit for your attendance
3. Your grade is determined by the number of minutes divided by the whole 60-minute session.

Quizz

There will be a weekly quiz on most weeks. Refer to the class calendar to determine when a quiz will be given.

1. Must be taken in class, in person.
2. Must show all work to receive credit for each individual problem

Final

A comprehensive, final exam, will be given at the end of the semester. Students must show all work to receive credit.

Monday Dec 11, 2023 @ 5:00 PM – 7:00 PM in B004 Lubbock Downtown Center

Class Policies and Information

Disclaimer: The instructor reserves the right to alter any class policies/dates as deemed necessary by the instructor. If there are any changes, they will be announced over Blackboard and via your SPC email.

Attendance Policy

The student is expected to **submit at least eighty percent (80%)** of the class assignments to have the best chance of success. If the student fails to meet these minimum requirements, the instructor can remove the student from the class. **Attendance will be taken via a Sign-In Sheet.**

Penji

Students are required to download the **Penji** application on their mobile device. The app enables students to make appointments with a tutor for their weekly tutoring sessions that are mandated by the class.

Gradescope

Students are required to download the **Gradescope** application on their mobile device. The app will be used to show grades to students for the Quiz assignments

Office Hours

Office hours will be held at the listed times. Please come prepared with questions and examples of the attempted problem(s)

South Plains College Email Policy

The instructor will respond to all emails **within 36 hours** during the week day. Emails sent after 5:00 PM on Fridays may not be answered until the following Monday morning.

Additional Support

Online demo videos and a free textbook is available!

- Videos are provided to the student via Blackboard located in each week's folder.
- A free, online textbook, is available for online viewing or digital download.

SPC also offers **free tutoring!** This information is located here.

Drop/Withdrawal

Students should submit a Student Initiated Drop Form online to drop from the course. If the student wishes to withdraw from this or more courses, the student needs to contact the Advising Office.

Wellness Statement

If you are experiencing any of the following symptoms, please do not attend class and either seek medical attention or get tested for COVID-19.:

- Cough, shortness of breath, difficulty breathing
- Fever or chills
- Muscles or body aches
- Vomiting or diarrhea
- New loss of taste and smell

Please also notify DeEtte Edens, BSN, RN, Associate Director of Health & Wellness, at 806-716-2376 or dedens@southplainscollege.edu

Course Calendar			
Week		**Topic**	**Assessment**
1	**Aug 28** **Aug 30**	Introduction Tips for success in math courses **Notes 1:** Adding & Subtracting Whole Numbers	Syllabus and Tips **Assignment 1** **Quiz 1**
2	**Sep 4** **Sep 6**	**Sep 4 Labor Day. No Class!** Time Management **Notes 2:** Multiplying & Dividing Whole Numbers	**Assignment 2**
3	**Sep 11** **Sep 13**	Overcoming Anxiety **Notes 3**: Introduction to Integers, Absolute Value, Additive Inverses, Adding & Subtracting Integers **Notes 4:** Multiplying & Dividing Integers	Adding, Subtracting, Multiplying & Dividing Whole Numbers **Assignment 3** **Assignment 4** **Quiz 2**
4	**Sep 18** **Sep 20**	How to Read & Use Class Material **Notes 5:** Evaluating Exponents, Prime Factoring & Square Roots **Notes 6:** Finding Greatest Common Factor (GCF) & Least Common Multiple (LCM)	Absolute Value, Additive Inverses, Adding, Subtracting, Multiplying & Dividing Integers **Assignment 5** **Assignment 6** **Quiz 3**
5	**Sep 25** **Sep 27**	Note Taking for Math **Notes 7:** Simplifying Fractions, Finding Reciprocals, Multiplying & Dividing Fractions **Notes 8:** Adding & Subtracting Fractions; Mixed Numbers	Evaluating Exponents, Prime Factoring & Square Roots, Finding the GCF & LCM **Assignment 7** **Assignment 8** **Quiz 4**
6	**Oct 2** **Oct 4**	Using Available Resources **Notes 9:** Decimal Places, Adding & Subtracting Decimals **Notes 10:** Multiplying & Dividing Decimals	Simplifying Fractions, Finding Reciprocals, Multiplying, Dividing, Adding & Subtracting Fractions, Mixed Numbers **Assignment 9** **Assignment 10** **Quiz 5**
7	**Oct 9** **Oct 11**	Improving Memory **Notes 11:** Percents, Converting Between Fractions, Decimals & Percents **Notes 12:** Order of Operations	Decimal Places, Adding, Subtracting, Multiplying & Dividing Decimals **Assignment 11** **Assignment 12** **Quiz 6**
8	**Oct 16** **Oct 18**	Preparing for a Math Test **Notes 13:** Evaluating Algebraic Expressions **Notes 14:** Solving One-Step and Two-Step Equations (include single fraction)	Percents, Converting Between Fractions, Decimals & Percents, Order of Operations **Assignment 13** **Assignment 14** **Quiz 7**
9	**Oct 23** **Oct 25**	Math Test-Taking Strategies **Notes 15:** Solving Multi-Step Equations **Notes 16:** Percent Equations, Applications of Linear Equations	Evaluating Algebraic Expressions, Solving One- and Two-Step Equations (include single fraction) **Assignment 15** **Assignment 16** **Quiz 8**

10	**Oct 30** **Nov 1**	After Math Test Behavior **Notes 17:** Solving Linear Inequalities **Notes 18:** Solving Compound Inequalities	Solving Multi-Step Equations, Percent Equations, Applications of Linear Equations **Assignment 17** **Assignment 18** **Quiz 9**
11	**Nov 6** **Nov 8**	**Notes 19:** Rules of Exponents Part 1 **Notes 20:** Rules of Exponents Part 2	Solving Linear & Compound Inequalities **Assignment 19** **Assignment 20** **Quiz 10**
12	**Nov 13** **Nov 15**	Preparing for a Math Final Exam **Notes 21:** More with Rules of Exponents **Notes 22:** Intro to Polynomials; Add, Subtract, Multiply Polynomials (including 2 variables), Divide by a Monomial	Rules of Exponents **Assignment 21** **Assignment 22** **Quiz 11**
13	**Nov 20**	**Notes 23:** Coordinate Plane Basics	**Assignment 23**
		Nov 22 – 24 Thanksgiving Holiday. No Class!	
14	**Nov 27** **Nov 29**	**Notes 24:** Intro to Lines & Slope **Notes 25**: Graphing Linear Equations	Intro to Polynomials; Add, Subtract, Multiply Polynomials (including 2 variables), Divide by a Monomial, Coordinate Plane Basics **Assignment 24** **Assignment 25** **Quiz 12**
		Nov 30 Last Day to Drop!	
15	**Dec 4** **Dec 6**	**Review for Comprehensive Final**	Intro to Lines & Slope, Graphing Linear Functions **Quiz 13**
16	**Dec 11**	**Final Exam: Monday Dec 11, 2023 @ 5:00 PM – 7:00 PM in B004 Lubbock Downtown Center**	

South Plains College
Common Course Syllabus: MATH 0305
Revised July 2023

Department: Mathematics, Engineering, and Computer Science

Discipline: Mathematics

Course Number: MATH 0305

Course Title: Foundations of Algebra

Available Formats: conventional and internet

Campuses: Levelland, Downtown Center, Plainview Center

Course Description: This course is a study of fundamental mathematics principles and concepts to help prepare students for math corequisites. Topics include performing basic arithmetic operations on integers, fractions, and decimals; performing calculations involving exponents and order of operations; solving application problems involving proportions, percent, and fractions; simplifying algebraic expressions and solving linear equations; application problems involving linear models; graphs of linear equations in two variables; applying rules of exponents; and operations on polynomials. The course includes a non-course competency-based lab option that will require students to work with academic coaches, peer tutors, or online supplemental tools outside of the prescribed class meeting time to help develop skills, strategies, and reasoning needed to succeed in mathematics, including communication and appropriate use of technology. This course will not satisfy graduation requirements.

Prerequisite: This course is designed for students who test between 910-949 with a diagnostic level of 1-3 or TSIA: ABE Math Level 3-4.

Credit: 3 **Lecture:** 2 **Lab:** 2

Textbook: No textbook required, course materials will be provided on Blackboard

Supplies: Please see the instructor's course information sheet for specific supplies.

This course partially satisfies a Core Curriculum Requirement: No

Student Learning Outcomes: Upon completion of this course and receiving a passing grade, the student will be able to:

1. Add, subtract, multiply and divide real numbers.
2. Use the order of operations to simplify an expression.
3. Simplify algebraic expressions.
4. Solve linear equations.
5. Translate and solve word problems.
6. Solve linear inequalities.
7. Graph equations in two variables by the intercept method and the slope intercept method.
8. Evaluate expressions using exponent rules.
9. Add, subtract, multiply and divide polynomials.

Student Learning Outcomes Assessment: Comprehensive Final Exam

Course Evaluation: There will be a comprehensive departmental final exam given by all instructors.

Attendance/Student Engagement Policy: Attendance and effort are the most important activities for success in this course. The instructor maintains records of the student's engagement throughout the semester. The student will be allowed to miss twenty percent (20%) of class assignments for the semester, ***for any reason***. Should this number be exceeded, the instructor has the right to drop the student with a grade of F or an X, depending on the instructor's discretion.

Plagiarism violations include, but are not limited to, the following:

1. Turning in a paper that has been purchased, borrowed, or downloaded from another student, an online term paper site, or a mail order term paper mill;

2. Cutting and pasting together information from books, articles, other papers, or online sites without providing proper documentation;
3. Using direct quotations (three or more words) from a source without showing them to be direct quotations and citing them; or
4. Missing in-text citations.

Cheating violations include, but are not limited to, the following:

1. Obtaining an examination by stealing or collusion;
2. Discovering the content of an examination before it is given;
3. Using an unauthorized source of information (notes, textbook, text messaging, internet, apps) during an examination, quiz, or homework assignment;
4. Entering an office or building to obtain an unfair advantage;
5. Taking an examination for another;
6. Altering grade records;
7. Copying another's work during an examination or on a homework assignment;
8. Rewriting another student's work in Peer Editing so that the writing is no longer the original student's;
9. Taking pictures of a test, test answers, or someone else's paper.

Student Code of Conduct Policy: Any successful learning experience requires mutual respect from the student and the instructor. Neither the instructor nor the student should be subject to others' rude, disruptive, intimidating, aggressive, or demeaning behavior**.** Student conduct that disrupts the learning process or is deemed disrespectful or threatening shall not be tolerated and may lead to disciplinary action and/or removal from class.
For information regarding official South Plains College statements about intellectual exchange, disabilities, non-discrimination, Title IX Pregnancy Accommodations, CARE Team, and Campus Concealed Carry, please visit https://www.southplainscollege.edu/syllabusstatements/.
South Plains College policies, return to campus plan, and protocols regarding COVID-19 can be found here: https://www.southplainscollege.edu/emergency/covid19-faq.php.
SPC Bookstore Price Match Guarantee Policy: If you find a lower price on a textbook, the South Plains College bookstore will match that price. The difference will be given to the student on a bookstore gift certificate! The gift certificate can be spent on anything in the store.

If students have already purchased textbooks and then find a better price later, the South Plains College bookstore will price match through the first week of the semester. The student must have a copy of the receipt and the book has to be in stock at the competition at the time of the price match.

The South Plains College bookstore will happily price match BN.com & books on Amazon noted as *ships from and sold by Amazon.com*. Online marketplaces such as *Other Sellers* on Amazon, Amazon's Warehouse Deals, *fulfilled by* Amazon, BN.com Marketplace, and peer-to-peer pricing are not eligible. They will price match the exact textbook, in the same edition and format, including all accompanying materials, like workbooks and CDs.

A textbook is only eligible for price match if it is in stock on a competitor's website at time of the price match request. Additional membership discounts and offers cannot be applied to the student's refund.

Price matching is only available on in-store purchases. Digital books, access codes sold via publisher sites, rentals and special orders are not eligible. Only one price match per title per customer is allowed.

Note: The instructor reserves the right to modify the course syllabus and policies, as well as notify students of any changes, at any point during the semester.