South Plains College
Math 1325.002TR Syllabus
Mathematics for Business, Economics, Life and Social Sciences
Spring 2019

Instructor: Mrs. Morgan Groves
Email: mgroves@southplainscollege.edu
Office: M101
Office Phone: 716-2735

Office Hours: M 7:50am – 8:50am, 1:20pm – 2:20pm
T 2:45pm – 3:45pm
W 1:20pm – 2:20pm
R 7:50am – 8:50am
F 8am – 11am

Textbook: This section does NOT require you to purchase a textbook. All resources are online through Knewton.com (the online homework system) or in your class notes found on Blackboard.

Course Description: This course is designed for Business, Economics, and Life and Social Science majors. It is a heavy application course, meaning the course is primarily word problems relating to the majors listed previously.

Course Requirements: To maximize the potential to complete this course, a student should attend all class meetings, take notes and participate in class, and complete all homework assignments and examinations including the final exam in the allotted time.

Student Learning Outcomes/Competencies:
Upon successful completion of this course students should be able to competently perform the following:

1. Utilize functions and algebraic concepts to model realistic problems from business, economics and life/social sciences situations.
2. Use concepts of limit and continuity to describe behaviors of functions and models.
3. Use the derivative to analyze the local behaviors of mathematical models, and to understand other business and economics definitions
4. Use the indefinite and definite integrals appropriately to describe mathematical models or create new models.

Grading:				
	Tests (4 total)	60%	Grading Scale:	A 90-100
	Daily	20%		B 80-89
	Final Exam	20%		C 70-79
	Bonus Tests	5%		D 60-69
				F 59 or below

****Note: Students must justify answers or show work on all problems to receive full credit.*

Homework: Most homework assignments will be online through a system called Knewton. You can find directions for creating a student account and getting registered into the online homework system attached. Homework is to be completed by the due dates posted on each assignment. No late homework will be accepted. There might be times when homework is written. This work is to be completed in pencil on your own paper showing all steps, the assignment paper acting as a cover sheet.

Tests: There will be a total of 4 exams in this course. No notes/homework/textbooks will be allowed on ANY exam. All exams are expected to be completed in the allotted class time, no exceptions. No exam grades will be dropped. However, ***if your final exam grade is higher than your lowest test grade, then it will replace your lowest test grade at the end of the course if you have fewer than 3 absences.*** Exam corrections are for your own learning well-being and will not be graded but are expected to be completed after each exam is returned. Exam grades are not posted online anywhere. You will get all of your exams back. It is in your best interest to save ALL graded documents until your final grade is assigned at the end of the term. If you do not take the final exam, you will fail the class regardless of your average at the time of the final.

Bonus Tests: There are weekly bonus tests on Knewton. If you complete these tests, you can earn up to 5 percentage points added to your final grade. These tests are optional but they are timed and they do expire at the end of each week. The average of your bonus test scores will determine the number of points added to your final average (i.e. If you average 80% on the bonus tests, then you will be awarded 80(0.05) = 4 points to your final average.) Any bonus test you skip will be scored as a 0.

Late work: Late work is not accepted. If you do not turn in an assignment on time, you will receive a zero.

Class Notes: The class notes (outline) will be posted on Blackboard for you to print. It is the responsibility of the student to bring the notes to class everyday. Be sure to look at the tentative calendar to see what topics we will cover next.

Calculators: There will be times throughout the year when students will need a graphing calculator to complete an assignment. This course is taught under the assumption that each student owns a graphing calculator. I recommend a TI 84 series calculator.

Attendance Policy: Attendance will be taken every class period. Students who arrive late, leave early, or sleep during class will be counted $\frac{1}{2}$ absent. **Any student who misses 4 consecutive classes or exceeds 5 total absences throughout the semester will be administratively dropped and receive a grade of X or F.**

Academic Integrity: Academic dishonesty will not be tolerated. You are expected to uphold the ideas of academic honesty. All work that is graded must be your own. This policy applies to all work attempted in this course. If this policy is violated the student will receive an F for the assignment. If any case of academic dishonesty occurs, <u>you will lose the privilege of allowing your final exam to replace your lowest test grade.</u> Furthermore, the instructor preserves the right to drop you from the course with an F. You will also never be allowed to take another course with this instructor in the future. For more details on what is considered cheating, see the South Plains College catalog. The instructor will make the decision to report you to the college and have the academic dishonesty put on your permanent record. If you are caught cheating on any assignment, you will not be allowed to take another class with this instructor in the future.

Class Rules:

- Be courteous and respectful at all times.
- Be on time and ready to learn.
- Keep your hands and feet to yourself.
- Use only pencil for all assignments.
- No food or drinks in class other than bottled water.
- Students are not permitted to use electronic devices, other than a calculator, in class. **Put the cell phones away!!**
- During testing, all cell phones should be placed on SILENT or turned off, and all smart watches need to be removed and placed inside a bag and out of sight. Any student who

leaves the classroom for any reason (bathroom, phone call, etc.) during an exam will not be allowed to continue the exam upon their return. Once you leave the classroom during an exam, you are done.

- Adhere to the requirements of the Student Code of Conduct.

Core Objectives:
This course satisfies the following Core Objectives:

Communication Skills:

- Develop, interpret, and express ideas through written communication
- Develop, interpret, and express ideas through oral communication
- Develop, interpret, and express ideas through visual communication

Critical Thinking:

- Generate and communicate ideas by combining, changing, and reapplying existing information
- Gather and assess information relevant to a question
- Analyze, evaluate, and synthesize information

Empirical and Quantitative Competency Skills:

- Manipulate and analyze numerical data and arrive at an informed conclusion
- Manipulate and analyze observable facts and arrive at an informed conclusion

Equal Opportunity: South Plains College strives to accommodate the individual needs of all students in order to enhance their opportunities for success in the context of a comprehensive community college setting. It is the policy of South Plains College to offer all educational and employment opportunities without regard to race, color, national origin, religion, gender, disability, or age.

Disability Statement: Students with disabilities, including but not limited to physical, psychiatric, or learning disabilities, who wish to request accommodations in this class should notify the Special Services Office at South Plains College early in the semester so that the appropriate arrangements may be made. In accordance with federal law, a student requesting accommodations must provide acceptable documentation of his/her disability to the Special Services Coordinator. You must also talk directly to your instructor to inform her of your requests. This conversation must happen within the first two weeks of classes.

Campus Concealed Carry:
Campus Concealed Carry - Texas Senate Bill - 11 (Government Code 411.2031, et al.) authorizes the carrying of a concealed handgun in South Plains College buildings only by persons who have been issued and are in possession of a Texas License to Carry a Handgun. Qualified law enforcement officers or those who are otherwise authorized to carry a concealed handgun in the State of Texas are also permitted to do so. Pursuant to Penal Code (PC) 46.035 and South Plains College policy, license holders may not carry a concealed handgun in restricted locations. For a list of locations, please refer to the SPC policy at: http://www.southplainscollege.edu/human_resources/policy_procedure/hhc.php. Pursuant to PC 46.035, the open carrying of handguns is prohibited on all South Plains College campuses. Report violations to the College Police Department at 806-716-2396 or 9-1-1.

Disclaimer
The instructor reserves the right to alter any class policies as deemed necessary by the instructor or South Plains College, and will announce any changes in class. If a student has any questions about a change in policy ask the instructor for clarification.

Tentative Calendar for Math 1325 Spring 2019				
Day	**Date**	**Topic**	**Units**	**Bonus Test**
Tuesday	Jan 15	Syllabus/Algebra Review	Review	1
Thursday	Jan 17	Limits	1.1	
Tuesday	Jan 22	Limits at Infinity/Continuity	1.2	2
Thursday	Jan 24	Limits at Infinity/Continuity	1.2	
Tuesday	Jan 29	The Derivative	1.3	3
Thursday	Jan 31	Basic Derivative Rules	1.4	
Tuesday	**Feb 5**	**Exam 1**	**Unit 1**	4
Thursday	Feb 7	Exponential and Logarithmic Derivative Rules	2.1	
Tuesday	Feb 12	Product, Quotient, and Chain Rules	2.2	5
Thursday	Feb 14	Marginal Analysis	2.3	
Tuesday	Feb 19	Implicit Differentiation	2.4	6
Thursday	Feb 21	Related Rates	2.5	
Tuesday	Feb 26	Elasticity	2.6	7
Thursday	Feb 28	Review for Exam 2		
Tuesday	**Mar 5**	**Exam 2**	**Unit 2**	8
Thursday	Mar 7	First Derivative Test	3.1	
	Mar 11 – 15	**SPRING BREAK**		
Tuesday	Mar 19	Second Derivative Test	3.2	9
Thursday	Mar 21	L'Hopital's Rule, Absolute Extrema	3.3	
Tuesday	Mar 26	Optimization	3.4	10
Thursday	Mar 28	Review for Exam 3		
Tuesday	**Apr 2**	**Exam 3**	**Unit 3**	11
Thursday	Apr 4	Anti-derivatives	4.1	
Tuesday	Apr 9	Integration by Substitution	4.2	12
Thursday	Apr 11	The Definite Integral The Fundamental Theorem of Calculus	4.3	
Tuesday	Apr 16	Area Between Two Curves	4.4	13
Thursday	Apr 18	Applications in Business and Economics	4.5	
Tuesday	Apr 23	Integration by Parts	4.6	14
Thursday	Apr 25	Review for Exam 4		
Tuesday	**Apr 30**	**Exam 4**	**Unit 4**	None
Thursday	May 2	Review for Final		
Tuesday	May 6 - 9	**Final Exam Week**	**Units 1- 4**	None