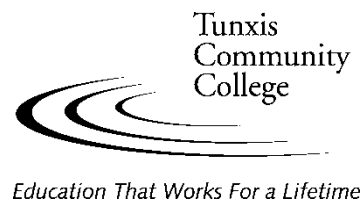


# COURSE SYLLABUS



<b>Course Title:</b>	Calculus for Business & Social Science II	<b>Date submitted:</b>	Spring 2014 (AAC: 14-92)	
<b>Department:</b>	Mathematics & Science			
<b>Curriculum:</b>	Mathematics			
<b>Course Descriptors:</b> Make certain that the course descriptors are consistent with college and Board of Trustees policies, and the current course numbering system.	<b>Course Code:</b> (eg. ACC 101) <table border="1"><tr><td>MAT*191</td></tr></table>	MAT*191	<b>Prerequisites:</b>	
	MAT*191			
	<b>Course Type:</b> <table border="1"><tr><td>L</td></tr></table>	L	C- or better in Calculus for Business and Social Science I	
	L			
	A: Clinical B: Lab D: Distance Learning I: Individual/Independent L: Lecture N: M: Seminar Internship P: Practicum U: Studio X: Combined Lecture/Lab Y: Combined Lecture/Clinical/Lab Z: Combined Lecture/Studio			
	<b>Elective Type:</b> <table border="1"><tr><td>G/LAS/M</td></tr></table>	G/LAS/M		
	G/LAS/M			
	AH: Art History E: English FA: Fine Arts FL: Foreign Language G: General HI: History HU: Humanities LAS: Liberal Arts & Sciences M: Math S: Science SS: Social Science			
	<b>Credit Hours:</b> <table border="1"><tr><td>3</td></tr></table>	3	<b>Corequisites:</b>	
	3			
<b>Developmental:</b> (yes/no) <table border="1"><tr><td>No</td></tr></table>	No	None		
No				
Lecture: <table border="1"><tr><td>3</td></tr></table>	3			
3				
Clinical: <table border="1"><tr><td>0</td></tr></table>	0			
0				
Lab: <table border="1"><tr><td>0</td></tr></table>	0			
0				
Studio: <table border="1"><tr><td>0</td></tr></table>	0			
0				
Other: <table border="1"><tr><td>0</td></tr></table>	0			
0				
<b>Contact Hours:</b>	TOTAL: <table border="1"><tr><td>3</td></tr></table>	3	<b>Other Requirements:</b>	
3				
<b>Class Maximum:</b> <table border="1"><tr><td>30</td></tr></table>	30	None		
30				
<b>Semesters Offered:</b> <table border="1"><tr><td>F/S/Su</td></tr></table>	F/S/Su			
F/S/Su				
<b>Ability-Based Education (ABE) Statement:</b>	At Tunxis Community College students are assessed on the knowledge and skills they have learned. The faculty identified the General Education Abilities critical to students' success in their professional and personal lives. In every class, students are assessed on course abilities, sometimes program abilities, and, in most classes, at least one General Education Ability. Students will receive an evaluation of the degree to which they have demonstrated or not demonstrated that General Education Ability.			
<b>Catalog Course Description:</b>	Continuation of Calculus for Business and Social Science I. Topics include: techniques of integration, application of the definite integral, differential equations and multivariate calculus.			
<b>Topical Outline:</b> List course content in outline format.	1. Integration 2. Functions of Several Variables 3. Differential Equations 4. Probability 5. Trigonometric Functions 6. Sequences and Series			
<b>Outcomes:</b>	Upon successful completion of this course, the student will be able to do the following:			

## Calculus for Business & Social Science I COURSE SYLLABUS — page 2

<p>Describe measurable skills or knowledge that students should be able to demonstrate as evidence that they have mastered the course content.</p>	<p><b>COURSE:</b></p> <p>To understand the area under the curve as the limit of Riemann sums.</p> <ol style="list-style-type: none"> <li>2. To extend the concepts of derivative and integral to functions of more than one variable.</li> <li>3. To solve and interpret differential equations.</li> <li>4. To use the derivative and integral techniques to examine probability and trigonometric functions.</li> <li>5. To expand functions in a Taylor series.</li> </ol> <hr/> <p><b>PROGRAM:</b> <i>(Numbering reflects Program Outcomes as they appear in the college catalog)</i></p> <hr/> <p><b>GENERAL EDUCATION:</b> <i>(Numbering reflects General Education Outcomes as they appear in the college catalog)</i></p> <p><b>7. Quantitative Reasoning</b> -Students will learn to recognize, understand, and use the quantitative elements they encounter in various aspects of their lives. Students will develop a habit of mind that uses quantitative skills to solve problems and make informed decisions.</p> <p style="padding-left: 40px;"><b>Demonstrates:</b> Interprets numerical information and applies sufficient laws of logic and mathematics to solve problems using numbers, symbols, graphs and/or descriptions.</p> <p style="padding-left: 40px;"><b>Does Not Demonstrate:</b> Misinterprets numerical information or insufficiently applies laws of logic and mathematics to solve problems using numbers, symbols, graphs and/or descriptions.</p>
<p><b>Evaluation:</b> List how the above outcomes will be assessed.</p>	<p><b>Assessment will be based on the following criteria:</b></p> <p>Teacher-prepared tests Quizzes Final exam Written projects/writing assignments where assigned</p>
<p><b>Instructional Resources:</b></p> <p>List library (e.g. books, journals, on-line resources), technological (e.g. Smartboard, software), and other resources (e.g. equipment, supplies, facilities) required and desired to teach this course.</p>	<p>Required: classrooms with sufficient seating and board access Desired: None</p>
<p><b>Textbook(s)</b></p>	<p>Refer to current academic year printout.</p>