

MATH 130.4 - Precalculus Syllabus - Fall 2008

Time/Place: MTWF 8:00-8:50 Ayres 111
Instructor: Jon Gray
E-mail: gray@math.utk.edu
Office/Office Hours: Ayres 002, MWF 9:00-9:45 or by appointment
Text: Precalculus, by Stewart, Redlin, and Watson, Fifth Edition [Webassign Edition]

Course Description: Review of algebraic, logarithmic, exponential, and trigonometric functions. Math 130 does not satisfy the Quantitative Reasoning requirement. 4 credit hours. A, B, C, NC grading.

Requisites: A satisfactory placement score. Math 109 is a co-requisite for students who did not study trigonometry in high school or college. Students who have earned a grade of C or better in 141 or 151 may not subsequently receive credit for 130.

Grades:

Average of 4 Exams:	55%
Quizzes:	6%
Oral Exams:	3%
Webassign:	6%
Final Exam:	30%
Total:	100%

Letter grade Table		Final exam score			
		80-100	70-79	60-69	0-59
Course average	90 – 100	A	B+	C+	NC
	85 – 89	B+	B+	C+	NC
	80 – 84	B	B	C+	NC
	75 – 79	C+	C+	C+	NC
	70 – 74	C	C	C	NC
	0 – 69	NC	NC	NC	NC

- Various:**
- ★ Attendance is optional, but there will be frequent quizzes.
 - ★ Missed quizzes and exams score zero and under no circumstance may a quiz or exam be made-up.
 - ★ Calculators may not be used in this course except for homework, Webassign, and the Final Exam. Use of cell phones and calculators with advanced alpha-numeric capabilities (e.g., TI-89) is forbidden in this course.
 - ★ I shall present you with a list of possible questions for the Oral Exams. It is your responsibility to research the topics listed on the sheet and be prepared to come to my office to answer three randomly chosen questions. One must be completed during 6-8 of October and the last two during 17-21 of November.
 - ★ Super quizzes will be given no more than once a week and will be worth fourteen points while standard quizzes will be worth four points. One point on either will be used as attendance.
 - ★ The deadlines to drop without a W, with a W, or with a WP/WF grade are 29-Aug., 21-Oct., and 11-Nov., respectively.
 - ★ The final exam will be 4-Dec., 8 - 10 a.m., location TBA.

Departmental Information

Math 109 (Algebra Workshop):

This is a one credit hour self-paced tutorial workshop for students who need additional help (as determined by placement exams, assessment exams or classroom performance). Students practice algebraic and trigonometric skills needed (but not necessarily taught) to master the material covered in Math 130. This one-credit course meets at a time selected by the student and compatible with his/her schedule. Interested students should register for the section that best fits their class schedule. Attendance is required. Once registered, students can find more information at <http://online.utk.edu> under Math 109 Algebra Workshop. Students completing the requirements for Math 109 receive up to 10 points that will be added to their lowest Math 130 test score (excluding the final exam). S/NC grading.

Disability Services:

If you need course adaptations or accommodations because of a documented disability or if you have emergency information to share, please contact the Office of Disability Services at 2227 Dunford Hall at 974-6087.

Math Tutorial Center:

The Math Tutorial Center is in Ayres Hall room 322. It provides free tutoring. Hours of operation are posted at <http://www.math.utk.edu/MTC/>. Please make use of this free service.

Academic Standards of Conduct:

All students are expected to abide by the University Honor Statement. These violations are serious offenses, subject to disciplinary action that may include failure in a course and/or dismissal from the University. The instructor has full authority to suspend a student from his/her class, to assign an "F" in an exercise or examination, or to assign an "F" in the course. See "Hilltopics" for more complete information. A report of all offenses will be sent to appropriate deans and the Office of Student Judicial Affairs for possible further action.

The Honor Statement

An essential feature of the University of Tennessee is a commitment to maintaining an atmosphere of intellectual integrity and academic honesty. As a student of the University, I pledge that I will neither knowingly give nor receive any inappropriate assistance in academic work, thus affirming my own personal commitment to honor and integrity.

Math 130 Precalculus Departmental Syllabus

Fall 2008

Section	days	Topic	Exercises
1.1	1-2	Real Numbers	3, 7, 13, 18, 21-26 all, 29, 31, 37, 39, 43, 45, 47, 50, 55, 59-66 all, 79
1.2	3-4	Exponents & Radicals	1-73 odd, 83, 95
1.3	5-6	Algebraic Expressions	11-97 odd, 101
1.4	7-8	Rational Expressions	1-61 odd, 65-69 odd, 73, 81, 93
1.5	9-10	Equations	5-25 odd, 31, 33, 37-63 odd, 75-89 odd, 95-99 all, 104
1.7	11-12	Inequalities	7-69 odd, 83, 85, 87, 95, 101
1.8	13-14	Coordinate Geometry	7, 9, 17, 25, 26, 27, 45, 51-89 odd, 95
1.9	15	Graphing Calculators	3, 9, 17, 18, 21, 25, 27, 39, 41, 49, 59, 61
1.10	16-17	Lines	1-51 odd, 57, 62, 68, 71
Exam 1	18	Chapter 1	
2.1	19	What is a Function?	11-29 odd, 32, 35, 36, 38, 43, 49, 62, 67
2.2	20-21	Graphs of Functions	1-49 odd, 55-71 odd, 85
2.4	22	Transformations of Functions	1-47 odd, 53, 61-69 odd
2.7	23-24	Combining Functions	1-11 odd, 17-51 odd, 61
2.8	25-26	One-to-one and Inverses	1-59 odd, 63, 65-69 odd, 71, 75
3.1	27	Polynomial Functions	3-17 odd, 23-35 odd, 49, 51, 56, 61, 62, 77, 82
3.2	28	Dividing Polynomials	1-21 odd, 35, 55-65 odd
3.6	29-30	Rational Functions	1, 5-9 odd, 15-23 odd, 35-51 odd, 65, 69, 75, 77, 83
Exam 2	31	Chapters 2 & 3	
4.1	32	Exponential Functions	5-43 odd, 65, 67, 71
4.2	33	Logarithmic Functions	1, 7, 8, 9, 15-63 odd, 85
4.3	34	Laws of Logarithms	1-47 odd, 61, 63, 66
4.4	35-36	Exponential and Logarithmic Equations	1-51 odd, 55, 63-66 all, 75, 77
5.1	37	Unit Circle	13-53 odd
5.2	38-39	Trigonometric Functions of Real Numbers	1-67 odd, 79
5.3	40-41	Trigonometric Graphs	1-35 odd, 41-49 odd, 57, 59, 69, 75, 77
5.4	42	More Trigonometric Graphs	1-35 odd
Extra	43	Catch-up & review	
Exam 3	44	Chapters 4 & 5	
6.1	45	Angle Measure	1-59 odd, 67, 73
6.2	46	Trigonometry of Right Triangles	1-35 odd, 47, 49
6.3	47	Trig Functions of Angles	1-49 odd
7.1	48	Trigonometric Identities	1-93 every other odd
7.2	49	Add and Subtract Formulas	1-37 odd
7.3	50	Double- & Half-Angle Formulas	1, 3, 7, 9, 15-29 odd, 35, 59-65 odd, 69
7.4	51-52	Inverse Trigonometric Functions	1-35 odd, 41, 43, 53
Exam 4	53	Chapters 6, 7.1 – 7.4	
7.5	54-55	Trigonometric Equations	1-35 odd, 41, 49, 51, 53, 65
Review	56-57	Review for Final Exam	Learning Objectives Handouts
Final Exam		Comprehensive	4-Dec., 8am-10am