COURSE LEARNING OUTCOMES

DEPARTMENT: Mathematics

COURSE #: 19000 **COURSE TITLE: College Algebra** CATEGORY: Prerequisite to course required of all majors TERM OFFERED: Fall/Spring PRE-REQUISITES: a grade of C or higher in Mathematics 80 or . placement by the department PRE/CO-REQUISITES HOURS/CREDITS: 4 hrs./ week; 3 credits. DATE EFFECTIVE: 1/23/07 COURSE COORDINATOR: M. Auth	**CATALOG DESCRIPTION** Intervals, inequalities, exponents, algebraic expressions, equations, lines, operations on functions, inverse functions, graphing polynomials, exponential and logarithmic functions, right triangle trigonometry. **Required Text (with Webassign access code):** Algebra and Trigonometry, 4th edition; by Stewart, Redlin, Watson, Cengage

COURSE LEARNING OUTCOMES
Please describe below all learning outcomes of the course, and indicate the letter(s) of the corresponding Departmental Learning Outcome(s) (see list at bottom) in the column at right.

After taking this course, the student should be able to:	Contributes to Departmental Learning Outcome(s):
1. solve polynomial, rational, and exponential equations and inequalities in one real variable;	a
2. graph linear, polynomial, exponential, and logarithmic equations;	a, b
3. work with transformations of, and translate between, graphs and equations;	a, b
4. determine whether a graph is the graph of a function;	a, b, e1
5. demonstrate basic understanding with function notation, including composite and inverse functions;	a, b
6. become comfortable with basic algebraic techniques with exponents and simplifying rational expressions;	a, b, c
7. find maximum /minimum values for a quadratic functions;	a, b, c
8. understand basic exponential and log functions	a,b
9. become comfortable using right triangle trigonometry	a,b

COURSE ASSESSMENT TOOLS
Please describe below all assessment tools that are used in the course.
You may also indicate the percentage that each assessment contributes to the final grade.

1. Final exam: 40%

2. In-class exams: 40%

3. In-class quizzes 20%

4. 0% webassign hw

DEPARTMENTAL LEARNING OUTCOMES *(to be filled out by departmental mentor)*

The mathematics department, in its varied courses, aims to teach students to

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a. perform numeric and symbolic computations
b. construct and apply symbolic and graphical representations of functions
c. model real-life problems mathematically
d  use technology appropriately to analyze mathematical problems
e. state (e1) and apply (e2) mathematical definitions and theorems
f. prove fundamental theorems
g. construct and present (generally in writing, but, occasionally, orally) a
rigorous mathematical argument.
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