Syllabus for UWX MA116: College Algebra

NOTE: This syllabus document contains the basic information of this course. The most current syllabus is available in the full course.

Course Description

The study of functions, including polynomial, rational, exponential, and logarithmic functions. Topics include systems of equations, inequalities, matrices, determinants, analytic geometry and conic sections, sequences and series, the binomial theorem, and mathematical induction. Students will formulate, analyze, solve, and interpret mathematical and real-world problems. This course is intended to provide algebra skills required for calculus.

Prerequisite(s)

Grade of C or better in UWX MA093 or placement into UWX MA116.

Course Outcomes

Upon completing this course, you will be able to do the following:
- Identify and interpret properties of elementary functions given in analytic or graphical form. Features include, but are not limited to, domain, range, intercepts, real and complex zeros, end behavior, and asymptotes.
- For functions presented analytically, use the features identified above to produce the graph of the function.
- Solve equations and inequalities involving elementary functions, both graphically and analytically.
- Analyze, construct, and solve equations and inequalities arising from applied problems that can be modeled by elementary functions and interpret the results.
- Use function operations, including transformations, compositions and inverses, to create new functions. Students will analyze the relationships between the original and the resulting functions using analytic and graphical techniques.

Course Requirements/Components

Assignment	Percent
Discussions	20%
MyLab Homework	30%
Midterm Exam	25%
Final Exam	25%

Total	100%

Discussions

Discussions are assigned in each lesson of the course and will cumulatively account for 20% of your final course grade.

MyLab Homework

Online Pearson MyLab Math homework is assigned in each unit of this course and will cumulatively account for 30% of your final course grade.

Exams

Midterm and Final Exam assessments account for 25% each, for the total of 50%.

Extra Credit

A small amount of extra credit points will be available as a practice midterm exam (3%) and a practice final exam (3%) and w2ill be added to your total balance of points. They are particularly useful in borderline grade cases.

Grading

The following grading scale will be used to evaluate all course requirements and to determine your final grade:

Grade	Percentage Range
A	93% - 100%
A-	90% - 92%
B+	87% - 89%
B	83% - 86%
B-	80% - 82%
C+	77% - 79%
C	73% - 76%
C-	70% - 72%
D+	67% - 69%
D	60% - 66%
F	59% and under