# MATH103: College Mathematics (3 Credits)

## Faculty Contact Information:


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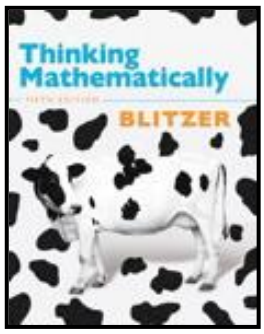


## Course Materials:

1. MATH103 Course Pack: ISBN: 9781408258316
   a. Textbook: Thinking Mathematically, Robert Blitzer, 5th ed., (2011), Pearson Education
   b. Student Solutions Manual for Thinking Mathematically, 5th ed., (2010), Pearson Education
   c. MyMathLab (Internet access required to utilize but optional)
2. Any Scientific calculator with two line algebraic display:
   Recommended: Texas Instrument TI-30X IIS (solar) or IIB (battery), (< $15)

## Grading Information and Criteria:

The following table lists the assessment items and the point distribution for this class.

| Activities | Amount | Points | Weight |
|---|---|---|---|
| 3 x Tests (75 min.) | 3 @ 100 pts. | 300 | 1/2 |
| Final Exam - Part 1 (75 min.) | 100 pts. | 100 | 1/6 |
| Final Exam - Part 2 (75 min.) | 100 pts. | 100 | 1/6 |
| Homework & Attendance | 100 pts. | 100 | 1/6 |
| Total | | 600 | 1/1 |

| Grade | Percent |
|---|---|
| A | 100.0 to 90.0% |
| B | 89.9 to 80.0% |
| C | 79.9 to 70.0% |
| D | 69.9 to 60.0% |
| F | < 60% |

### *Tests:*

A total of three tests lasting one class will be administered in class that will cover specific material in the textbook. The exams are closed book and will be similar to the homework so it is important that you do all assigned homework problems. You will need to use your scientific calculator on tests and the final exam.

### *Final Exam:*

A standardized comprehensive final exam is required in this course. This exam will include the topics and skills covered in the required readings, lectures, and class discussions. The 150 minute common final exam will be split into two parts due to our 75 minute class period. The final exam is closed-notes and closed-book. A formula sheet will be provided.

### *Homework:*

Read the sections before class and work through all example problems to learn problem solving methods and procedures. Attempt to do the assigned homework problems listed and bring to class. Check odd numbered problems with answers in back of textbook and detailed solution in Solutions Manual. It is important to solve the problems before reviewing the solutions. The key to success in mathematics is working problems. The more problems you work, the better you

will become at working them. You will be given a numerical score for each homework assignment, indicating your perceived effort in amount of solving the problems. No homework will be accepted after the test is given covering that content.

***Attendance:***

Your tuition buys you admission to the scheduled show and there are no second showings. Class attendance is mandatory and understanding each lesson depends on understanding the previous lesson. To understand what goes on in class you must be there. Missing class and then expecting to find out what went on from someone else does not work in Math. Mathematics is NOT a spectator sport. It takes effort, desire, determination, discipline, and time management.

***Recitation Sessions:***

In addition to the scheduled class meetings, College Mathematics includes two one-hour Recitation session each week. During these sessions, I will be available to provide you with individual support and tutoring on assigned problems. The recitation session will likely be Monday immediately after class from 6 to 8pm.

## Course Schedule

This is a tentative schedule for the course covering an 8 week session. It may be modified by the instructor as circumstances deem necessary. Please review the sections prior to the class.

| Week | Sections | Assigned Chapters, Quizzes. and Exams |
|---|---|---|
| 1 | Summary<br>Chapter 5 | Summarize course, examine syllabus, and describe resources.<br>*Topics:* order of operations, signed numbers, fractions, exponents, scientific notation, greatest common factor, scientific calculator arithmetic operations, least common multiple, number theory prime numbers, decimals, graphs, tables, charts. |
| 2 | 6.1 ~ 6.4 | *Topics:* applied problems, ratios, proportions, solve linear equations, algebraic expressions. |
| 3 | 6.5 ~ 7.1 | **Test 1**<br>*Topics:* polynomials, linear inequalities, solving quadratic equations, rectangular coordinate system and graphs. |
| 4 | 7.2 ~ 7.6 | *Topics:* graphing linear and quadratic equations, recognizing types of functions and their graphs, definition of functions, applied probability in modeling using functions. |
| 5 | 8.1 ~ 8.5 | **Test 2**<br>*Topics:* simple interest, annuities, compound interest, mortgages, installment loans, percent. |
| 6 | 11.1~ 11.7 | *Topics:* approaches to probabilities, probability rules and applied problems, counting rules, combination, and permutations. |
| 7 | Chapter 12<br>Chapter 1 | **Test 3**<br>*Topics:* frequency distributions and graphs, measures of central tendency, measures of dispersion, normal distribution, z-scores, and applications, scatter plots, correlation, and regression. |
| 8 | Review<br>Final Exam | Final Examination at start of second class Week 8. |