

Math 301A, Spring 2009

Course Syllabus, Call #42617

Title:	Math for Elementary School Teachers
Text:	<i>Mathematics for Teachers: An exploratory Approach to Arithmetic, Algebra, and Geometry</i> , by R. Stein and L. Wallace.
Classroom:	TC 013
Meeting time:	4-5:50 PM, Mondays and Wednesdays
Instructor:	Dr. Corey Dunn
Dr. Dunn's Office:	JB 322
Dr. Dunn's E-mail:	cmdunn "at" csusb.edu
Dr. Dunn's Phone:	(909) 537-5368
Final Exam Date:	Wednesday June 17th, 4-5:50 PM
Midterm:	Wednesday, 5/13
Other Important Dates:	4/8, My 31st birthday! 5/25: Memorial Day... no classes!
Office Hours:	12-4 PM, or by appointment.
Course Website:	(a copy of this syllabus may be found there)

<http://www.math.csusb.edu/faculty/dunn/301A-092/301A-092.html>

General Information

- Information on Grading:** The grading will be on a standard percentage basis, with the ranges of A for 90-100%, B for 80-89%, C for 70-79%, etc. The grades will be computed as follows:

Homework Average:	20%
Rubik's Cube:	10%
Midterm:	30%
Final Exam:	40%

- Information on Homework:** Homework in this course will be collected about once a week, and only part of what is assigned will be graded. In

class I will give out homework questions of two types: those which you are to do on your own which will not be collected, and those which you are to do which you can choose to submit to be graded. You are to choose one problem of the latter group of questions each week to *carefully* prepare and hand in on the announced due date. I will grade the work you have carefully prepared out of 10 points and those scores will average together to become your homework average. Any homework you turn in late will be given a zero, and for this reason, I drop your lowest homework score.

3. **Information on The Rubik's cube:** I will be teaching you how to solve the Rubik's cube this term, and you will be given a grade on how fast you can solve it. *Some* (definitely enough) class time will be devoted to teaching the cube, and we will discuss the specifics of this assignment in class. Our first cubing instruction will take place Monday, April 13th, and so you must get a standard $3 \times 3 \times 3$ Rubik's cube for this class and bring it that day, and pretty much every day thereafter.
4. **Information on Exams:** There will be one midterm exam which begins at the start of class. The date is above, and it will usually take place during the entire class.
5. **Information on the Final Exam:** The final exam will be cumulative, at the date given above.
6. **General information regarding the class:** I can guarantee that if YOU are the person whose cell phone goes off, then everyone will know it. PLEASE save yourself the embarrassment of your cell phone going off by turning it on silent before class starts. It's embarrassing to you, and disruptive to the class. In fact, the only thing I really care about is that you do not disrupt the class with anything unrelated to the class content—this includes cell phones going off, loud non-relevant discussions, and other disrespectful behavior. In addition, I will not tolerate any comments or behavior that are hurtful or disrespectful to anyone in the class at any time.

Please refer to the CSUSB catalogue for the university policy on cheating and/or plagiarism.

If you are in need of an accommodation for a disability in order to participate in this class, please contact Services to Students with Disabilities at UH-183, (909)537-5238.

The 25-35 Student Advice: Study 25 hours a week if you are taking three courses, 35 if you are taking four. This is about 2 hours/unit/week. Time in class and studying is equivalent to a 40-50 hour work week; quite reasonable.

Make sure you are learning. You know something if you can talk about it and teach it to someone else. If you can't, you don't. Test yourself before exams; don't let the instructor be the first to test your knowledge. Plan to graduate in four years.

Objectives and goals: Course Description: We will be discussing the mathematical reasoning behind the structure and arithmetic of real numbers and the connections between numbers and geometry (Chapters 1-8). See the course outline below for specific topics. The goals for the course are as follows:

- to review and master the basic computational and procedural skills in arithmetic and geometry
- to develop conceptual understanding of upper-elementary mathematics
- to discover and discuss why basic algorithms work
- to develop higher order thinking skills necessary for problem solving
- to explain mathematics both orally and in writing
- to consider ways of teaching the material.

These goals are consistent with the goals for students in grades K-12 as outlined in Mathematics Framework for California Public Schools adopted by the California State Board of Education, March 2005 and also with the recommendations for the preparation of teachers of mathematics by the Mathematical Association of America. Included in these recommendations is the following statement: A teacher of mathematics must possess knowledge and have an understanding of mathematics that is considerably deeper than that required for the school mathematics they will teach. Please visit www.cde.ca.gov/ci/ma/cf and www.maa.org for more information. Prerequisites: Completion of Math 115 and the general education requirements in written communication, oral communication, and critical thinking.

In general, I think this course is going to be awesome! I really can't stress enough how important it will be to stay on top of your homework and to see me when you have difficulties. This is the only reason I have office hours, and, unless there is an unavoidable conflict, I will always be there. Email is the best way to contact me, as I check it often. Good luck, and ROCK ON!!!