

# Math 285-201 – Directed Studies

Spring 2013

**Instructor:** Dr. Janice Epstein, Blocker 641H, 845-3261

**Office Hours:** Mondays 9:30 – 11:00A and Wednesdays 10:15 – 11:45A. Also by appointment.

**Email:** [j-epstein@tamu.edu](mailto:j-epstein@tamu.edu). Include your full name and class/section number in any email

**Webpage:** [www.math.tamu.edu/~epstein/Math141](http://www.math.tamu.edu/~epstein/Math141)

**Class Meeting Times:** W 9:10 – 10:00A in BLOC 122

## Catalog Description:

*Math 285: Directed Studies (Credit 1)* Special problems not covered by any other lower-division course in the curriculum; intended for freshman and sophomore students.

*Prerequisite:* Approval of department head.

## Learning Objectives:

- Use Microsoft Excel to model finite mathematics applications.
- Program basic routines on a TI calculator.
- Research applications of finite mathematics in the real world.
- Present a mathematical concept using Power Point.

## Required Materials:

- *Calculator:* A TI-83, TI-84 (Regular, Plus or Silver edition) or the TI-Nspire (non-CAS version) calculator is **REQUIRED** and you must bring your calculator to each class.
- *Microsoft Excel:* You must have access to a computer that can run Microsoft Excel.

**Grading:** There will be 11 lab assignments. The lowest grade will be dropped and your class grade will be the average of the 10 assignment grades.

*Required Averages:* A 90–100%    B 80–89%    C 70–79%    D 60–69%    F 0–59%

**Attendance & Make-up Policy:** Attendance is required in this class.

No make-up exams or late assignments are possible /accepted without a University-approved excused absence (see the Texas A&M University Student Rules).

An absence for a non-acute medical service or regular check-up does not constitute an excused absence.

To be excused, you must notify me in writing prior to the date of absence if possible. Consistent with Texas A&M Student Rules, in cases where advance notification is not feasible (e.g. accident, or emergency) the student must provide notification by the end of the second working day after the absence. This notification should include an explanation of why notice could not be sent prior to the class.

For injury or illness too severe or contagious to attend class, you must provide confirmation of a visit to a health care professional affirming date and time of visit. The Texas A&M University Explanatory Statement for Absence from Class form will not be accepted. It is the student's responsibility to schedule a make-up in a timely manner.

**Copyright:**

All exams, printed handouts and/or assignments, and web-materials are protected by U.S. Copyright Laws. No multiple copies can be made without my written permission. No exams or assignments may be shared with anyone outside of the class.

**Academic Integrity Statement:**

"An Aggie does not lie, cheat, or steal or tolerate those who do."

Upon accepting admission to Texas A&M University, a student immediately assumes a commitment to uphold the Honor Code, to accept responsibility for learning, and to follow the philosophy and rules of the Honor System. Students will be required to state their commitment on examinations, research papers, and other academic work. Ignorance of the rules does not exclude any member of the TAMU community from the requirements or the processes of the Honor System.

For additional information please visit: <http://www.tamu.edu/aggiehonor/>

**Disabilities:**

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit

<http://disability.tamu.edu>

**Tentative Schedule:** All changes will be announced in class, on the web, or via e-mail.

Week 1	Programming a TI calculator
Week 2	Regression using Excel
Week 3	Solving Systems of Equations using Excel
Week 4	Solving Systems of Inequalities using Excel, part 1
Week 5	Solving Systems of Inequalities using Excel, part 2
Week 6	Sets
Week 7	Histograms and Plots in Excel
Week 8	The Birthday Problem
Week 9	Expected Value and Statistics
Week 10	Monte Carlo Simulations, part 1
Week 11	Monte Carlo Simulations, part 2
Week 12	Finance in Excel, part 1
Week 13	Finance in Excel, part 2
Week 14	Presentations