Math 10-14 Elementary Statistics and Probability

Andrew Phelps

Fall Quarter 2019
COURSE # 02439

Text: Illowsky and Dean, <u>Collaborative Statistics</u>, 2nd Ed., ISBN 0983804907

> Note: This text is available for purchase in hard copy at the De Anza College Bookstore or for FREE downloading at: http://cnx.org. Access the text by text title, Collaborative Statistics. You may download the text for free onto your computer and print out the pages you want. (Note: If you plan on printing the entire book, it's less expensive to purchase the hard copy at the Bookstore or online.)

Hours:

- Lecture: MTWRF 12:30PM to 1:20PM in Room **E-34**
- Office: Tuesdays and Thursdays 1:30 to 2:00PM
- Office Location: Baldwin Winery #21 — wave or dial **8261** at entry for admission

Communication: 24-Hour Voice Mail: *not available*. If you can't come to class, send an email; <u>do not phone for that purpose</u>.
Also, I have a mailbox in the faculty mailroom Admin. 111 USE THE MAIL SLOT (DROP BOX)

Instructor Class Email: **math_anxiety@yahoo.com**
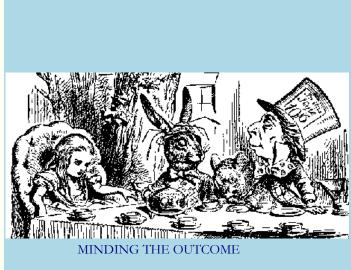
Course Web Site:

http://batstar.net/gather

Homework. Homework is assigned daily, and available on the Course Web Site. *Doing the homework is **key** to learning the material. The best thing is to do everything that is assigned, <u>and more</u>.* **Students who do not keep up will soon fall behind dangerously.** Generally homework is on a ***not hand in*** status. Exception is one Problem Set, to be handed in and graded

Exams. There will be five (5) exams [lowest automatically dropped, when all five taken] — plus the final exam

Labs. Labs will be done primarily by group learning: This is the **only** hand-in work

where students may collaborate. Hand-in lab work graded for general concerns only

Research Reports. Two short papers (<b7< b=""> points total) assigned, regarding the nature and history of statistical method

Final Project. The final project (**12** points, and possible extra credit) involves *evaluating* a given data source. PROJECT DUE DATE AT END OF TERM arrangement will be posted

Extra Credit. A course study extra credit assignment (due at the Final Exam) will be posted on the website. Others will also be posted. These are to help you if you are "caught between two grades"</b7<>

MINDING THE OUTCOME

raw score contributions	
unit(s)	points
Problem Set	2
Lab Hand-In	2
Seek Truth	4
5 Exams (drop 1) @10%	40
Final Exam	30
Spot Quiz	1
Francis Bacon Paper	3
Final Project	12
Subjective	6

Grading. The grades will be based on a "raw score" of between **0** and **100**. Those will be 'curved' (so to speak) by giving students with similar raw scores the same grade **NOTE:** That does *not* necessarily mean that "90=A." Instead, it all depends on the raw score distribution. Midway through the term, or later, I will be able to give you an estimate of how you are doing

Subjective Grade. Based on constructive class participation. **4** is the *default* grade. Personal attacks on the instructor or comments about other students will warrant an automatic **1** or **0**. Persistent disruptive activity will warrant a **1** or less. In group learning situations, your helpfulness to the group will be noted

The Course. (FROM CATALOG) Introduction to data analysis making use of graphical and numerical techniques to study patterns and departures from patterns. The student studies randomness with an emphasis on understanding variation, collects information in the face of uncertainty, checks distributional assumptions, tests hypotheses, uses probability as a tool for anticipating what the distribution of data may look like under a set of assumptions, and uses appropriate statistical models to draw conclusions from data. The course introduces the student to applications in various fields

Calculator. You need a **TI-83** (or **TI-84**) graphing utility

Cellphones. Cellphone or *iPad* use is not permitted in class. Stepping outside to answer the cellphone is forbidden. Please keep your cellphone turned off. Use of cellphone during an exam constitutes grounds for reduction of credit

Attendance. Missing class more than two (2) times after the first week of class, without adequate explanation, will be considered grounds for grade reduction/failure. "Adequate explanation," If you *need* to miss class, send an e-mail to the **math_anxiety** account (preferred).

Coming Late. *On time* arrival expected. Tardiness and leaving class early w/o

permission may be counted as **½** a missed class. Difficult situations require explanation and arrangement — If you *need* to miss class, send an e-mail to the **math_anxiety** account (preferred): Additional discussion may obtain.

Spot Quiz. A quiz (**1** point) may occasionally be given at the beginning of class, only for those who are present.

WebAssign. Not regularly used in course (check with instructor)

Plagiarism. The *appearance* of cheating is grounds for failing a test/assignment or the course itself, at the discretion of the instructor

Intersectionality. Equity at De Anza College relies on the perspective of "intersectionality." Differences need to be entertained from that philosophical framework. Concerns regarding stereotyping and social behavior may be discussed with the instructor or — if needed — referred to the Office of Equity

Preparedness. Due to **AB 705**, there is the possibility that students may not be fully prepared, or ready, to take Math 10. Connection with Student Success (**E-43**), STEM (**S-31**) or corequisite classes, would be an option to consider.

DISCLAIMER. THE POLICY PRESENTED MAY BE ADJUSTED AT THE DISCRETION OF THE INSTRUCTOR

Student Learning Outcome(s):

*Organize, analyze, and utilize appropriate methods to draw conclusions based on sample data by constructing and/or evaluating tables, graphs, and numerical measures of characteristics of data.
*Identify, evaluate, interpret and describe data distributions through the study of sampling distributions and probability theory.
*Collect data, interpret, compose and defend conjectures, and communicate the results of random data using statistical analyses such as interval and point estimates, hypothesis tests, and regression analysis.