Course:Math 10.12StatisticsInstructor:Mr. Charles KleinDay:M-FWinter 2017Office Phone:408 864 8213Time:11:30 am - 12:20 pmRoom E-31Office Hours: S-76gM-Th: 9:30 am-10:20 am

email: kleincharles@fhda.edu website: www.deanza.edu/faculty/kleincharles/

**Email/Phone:** Contact your instructor by email or phone. Visiting during office hours is highly encouraged.

# READ THROUGH THIS ENTIRE GREENSHEET, AND THE INFORMATION ON THE COURSE WEBPAGE, SO THAT YOU ARE FAMILIAR WITH THE CLASS AND ITS MANY DETAILS

**Student Learning Outcomes** (what math from this course you should be able to do at the end of the course)

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

This is a demanding, but rewarding class. If you cannot commit to a minimum of 15 hours per week of study and group work —in addition to class time- then you should take this class in a quarter when you have more time to learn. This is also a collaborative class. You will be expected to work with your classmates both inside and outside of class (no exceptions).

The use of cell/portable phone, beeper, or pager in class is considered impolite and disruptive, if not rude. Please turn them off before entering class. If your phone/beeper goes off during a minitest/exam, your paper will be taken, and you will not be allowed to continue working on it. Your score will be based on the work done up to that point.

S. O. P. 's: In addition to this course syllabus, the instructor's "Home page" and the "General Information" page of the instructor's website: www.deanza.edu/faculty/kleincharles/ is also considered part of the course syllabus, and hence you are also responsible for and bound by the information contained therein

Attendance: Since mathematics is cumulative in nature, attendance at all classes is expected. Students should be aware of appropriate drop dates (Jan. 22, March 3 –See special notes on Dropping a Class in the Schedule of Classes or the General Information page of the instructor's website). *It is the student's complete responsibility to drop this class as I will not drop anyone from the class*.

It is strongly suggested you get the names and phone numbers/emails of <u>several</u> students in the class so that you may contact someone for any missed assignments or XC, should you be absent.

**Prerequisite:** Passing grade (C or better) in Intermediate Algebra or placement exam. Advisory: English Writing 100 and Reading 100 (or Language Arts 100), or English as a Second Language equivalent course.

**Text:** OpenStax College, Introductory Statistics, openstaxcollege.org 2013 – hardcopy text OR download the text (for free) –see details on the instructor course website.

**Related Materials:** TI-83 PLUS or TI-84 graphing calculator preferred (TI-86/89 is acceptable BUT see note under MISCELLANEOUS at end of this document); pencil, small stapler; small pencil sharpener; small ruler. You can check out a TI-83/84 from Library.

TI Calculator Instructions: <a href="http://www.ti.com/calc">http://www.ti.com/calc</a>, <a href="http://www.ti.com/calc">http://www.ti.com/calc</a>, <a href="http://www.ti.com/calc">http://www.ti.com/calc</a>, <a href="http://deanza.edu/faculty/deansusan/">http://deanza.edu/faculty/deansusan/</a> (left-column menu)

**Quizzes:** Quizzes are closed book and with one page of notes (both sides) allowed. Quizzes will test your understanding and completion of the homework problems. You will need to do the homework thoroughly and completely to do well on the quizzes. The lowest quiz score will be dropped. No make-ups are given.

Labs: Lab assignments make use of the calculator. You will not be able to complete most labs in class. No make-ups or late papers will be accepted. You may turn in labs early. The lowest lab score will be dropped. SPECIAL NOTE: In the presentation of your lab, your 'raw data' must be reorganized so that it is presented from lowest to highest data values. The listing of data values is part of the lab. You must work in groups of 4 unless otherwise approved by your instructor. See Miscellaneous for additional information regarding lateness of labs.

Practices & Homework: Start the homework as indicated on the calendar. Following the material of each chapter there is a section known as "Key Terms" – this contains a vocabulary listing from the chapter. Following that section is the "Chapter Review", a section-by-section review/summary of the material. Then there is a "Formula Review". Then there are "Practice" problems – do every question in each practice, as it leads you through a step-by-step solution to problems, as a preparation for doing the Homework problems. Following the Practice section is the "Homework" section –again a section-by-section listing of problems. Following the Homework section is a "Bringing it Together" section, which is NOT necessarily in section order, so it is here that you need to be able to synthesize all the material from the chapter to determine what is most appropriate in solving the particular question. Solutions to Practice & Homework problems are typically found at the very end of the chapter. You are expected to do homework, but it is not collected

**Exams:** 3 exams will be given. Each exam is multiple choice. Bring a pencil, small brown scantron (# 2052 at bookstore). No make-ups are given. Exams are closed book. Students may bring to the exam one 8 —" x 11" page of notes (both sides), a calculator, and, if English is a second language, an English translation dictionary.

- If your lowest exam score is the result of cheating or cell phone mis-use, that score will not be dropped, but the next lowest will.
- If you need to leave the room during a mini-test or exam, including the final, your paper is turned in and you are done.
- At the end of the minitest/exam, you will have <u>ten seconds</u> to turn in your paper. If it is turned in late, a late penalty of a minimum of 10 % off, up to no credit, will be assessed for any mini—test, exam or other assigned work that is turned in late. It is not fair for you to continue working while others are turning in their work.

  Late papers after the official start time of class will not be accepted.

**Final Exam:** A two-hour comprehensive exam will be given. If you miss the final exam without contacting me, you will receive an F for the course. Bring a small, brown scantron (# 2052). Students may bring 2 pages of notes (both sides) to the final. Finals must be taken at scheduled time during finals week – see Finals Schedule in Schedule of Classes. The day and time for the final is already set; consult the DAC schedule of classes. Do not ask to take the final early. Start reviewing for the final after the 3rd exam. Practice finals and other review materials are in the various Appendices.

Extra Credit: There is typically an additional problem/question on each exam and quiz. "XC" problems are also offered "in addition to" rather than "in place of" regular class-work, and are provided at the instructor's discretion; these are generally due the next class. There is no makeup for any missed extra credit. Extra credit is not available to make up for poor quiz/test/lab performance.

# **Topics to Skip**

Ch 3: Venn diagrams

Ch 4: Geometric, Hypergeometric Distributions

Ch 7: Central Limit Theorem for Sums

# Minimum points needed (out of 650) for Grade of:

Total	650	F: < 55 % < 358
Final Exam **	100 pts.	D: 55 % 358
Labs (5 @ 30)	150 pts.	C: 68 % 442
Quizzes (5 @ 20)	100 pts.	B: 78 % 507
Exams (3 @ 100)	300 pts.	A: 88 % 572

<sup>\*\*</sup> The final exam counts twice, and the second score will be used to replace your lowest exam score. If one of the 3 midterm exams is the lowest, then the final score will replace that midterm score. (i.e., exam scores of 50, 60, and 70, and a final exam score of 65 will give you exam points of 60, 65, 65, 70 - which means you just gained 15 free points (average goes up). However, with exam scores of 50, 60, and 70, and a final exam score of 40 will give you scores of 40, 50, 60, 70, and thus your overall average will be pulled down. Clearly you don't want the final to be your lowest exam score.

#### **Miscellaneous**

Bring your book and calculator to class every day.

Chapter videos and podcasts to download are available on Barbara Illowsky's web site:

http:// deanza.edu/ faculty/illowskybarbara/

Take-home papers will not be graded unless they are STAPLED (no doggy-ears/folded corners, or paper clips) before class. All papers turned in must be NEAT and in proper sequence to earn full credit.

• Regarding the TI-86 or TI-89 calculators: They are acceptable if you already have one but you must either download the statistics programs from the TI Web Site or have the instructor put them into your calculator (for the TI-86, not the TI-89). There are calculator instructions for the TI-86 and TI-89 at <a href="http://deanza.edu/faculty/deansusan/">http://deanza.edu/faculty/deansusan/</a> (menu on the left of web-page). The Media Center at De Anza has videos that show you how to use the TI-83 and the TI-86 Calculators.

CELL PHONES, Ipods, and other electronic devices (except your calculator) must be turned off and put away during class. Absolutely no noise from them! If one goes off during a quiz or exam, you WILL HAVE your paper taken from you.

Tutors are available in S-43, the math and science tutoring center. The tutoring center offers tutor-led study groups and tutors as assistants in the labs (S42 and S48). Go to S-43 to sign up for tutoring. Students are encouraged to form study groups. Go to S-43 for help in creating a group with a tutor.

Labs are due by the start of class on the due date. They may be turned in earlier, but THEY WILL NOT BE ACCEPTED LATE. Graphs should be constructed with a ruler OR done by computer. Always label and scale the axes.

Your grade is based on points and not on a "curve."

We expect you to answer word problems and questions with complete English sentences.

CHEATING WILL NOT BE TOLERATED. If anyone is caught cheating, he or she will pay the consequences. That includes the possibility of receiving an F for the class and/or being expelled from the college.

# **Student Services:**

### http://www.deanza.edu/studentservices/

De Anza College has many support services to help you succeed in college. This web site leads you to information about financial aid, child care, counseling, academic support, disability support, student activities, and other services that are here for you. The physical location for most of these services is in the Student Community Services Building.

### **Dropping the Course: from Admissions and Records**

The first two weeks of the quarter, students can drop using the STAR System or over the Internet (up through the Last Day to Drop with No Record listed in the Schedule of Classes). After that date, students must go to Admissions and Records to drop.

After the last day to drop with a "W": if a student tells the Admissions and Records clerk that s/he never attended a class, s/he will be given a Blue Addendum Form and directed to contact the instructor for that class.

## If student attended even one class, the student must follow the following process:

After the last day to drop with a "W": if student wishes to drop and has attended even one class or missed the Withdraw date, the student is given a <u>Petition to the Academic Council</u> to complete. Filing that petition is not a guarantee that your request will be approved.