Course Goals

1. To understand and use several basic statistical summaries (numerical and graphical) to summarize data sets.

2. To understand the principles underlying important data-collection procedures (such as random sampling and randomized comparative experiments).

3. To understand the basic principles that allow us to draw conclusions about a large population from information collected from a smaller sample.

4. To understand in detail the mathematics involved in several of the most commonly used statistical procedures.

5. To be aware of the assumptions under which the use of these statistical procedures is warranted, and to see examples of their use (and misuse) on authentic data.

6. To understand the formal mathematical statements that result that result from these procedures, as well as accurate and inaccurate informal interpretations of those formal statements.

7. To become an educated consumer of statistics as reported in the mass media and in technical reports.

8. To understand how statistics can be used to pursue truth, but also how its misuse can lead to distortion or concealing of the truth.

Course Webpage

The course webpage is the official source for homework assignments. Copies of documents handed out in class will usually be placed on the webpage as well (if copyright restrictions permit). You are responsible for all announcements on the webpage, including assignments, whether they are announced in class or not. I will not change an assignment within 24 hours of the due date.
**Final Grade** The final grade will be a weighted average of your grades on homework, tests, and the final exam. The weights used in determining the final grade are:

- Test 1–2: 25%
- Tests 3–4: 35%
- Homework: 10%
- Projects: 5%
- Exam: 25%

**Reading** The textbook was written to be read. There will be a reading assignment for each class period. There are questions embedded in the text (labeled “Applying Your Knowledge”) that are usually quite helpful in testing yourself as to whether you understand what you have read. The 10 multiple choice questions at the end of each chapter provide a good check on your understanding as well.

**Homework** Homework problems will be assigned based on the readings and the discussion in class. Homework problems are usually collected twice weekly (Tuesdays and Fridays). You should begin work on these problems before they are due since you may ask questions about an assignment in class the day before it is due. Homework is not accepted late for any reason. Because no late homework is accepted, a homework score of 90% will be considered perfect. There will also be a few “project” assignments of a more extended nature and with an extended time to complete. Homework should be completed on 8.5×11 paper and folded lengthwise with name and section letter on the outside.

**Tests** Tests are given only at the scheduled times. Rather than attempting to decide which excuses for missing tests are sufficiently exculpatory, and realizing that there are such excuses, I will allow you to miss tests for any reason you deem acceptable. However, there are no makeup tests. Rather, if you miss a test, your final exam grade will replace that of the missed test. Additionally, your exam grade will replace any lower test grade.

**Final Exam** The final exam must be taken at the scheduled time. The final exam is cumulative – it covers the whole of Mathematics 143.

**Attendance** I do not require attendance nor does it count any part of the grade. You may decide for yourself whether coming to class is important. However most students find that regular attendance is necessary for success in this class. Also common courtesy suggests that you arrive to class on time and do not leave before the end of class (unless an exceptional circumstance requires otherwise). If for any reason you miss class on the day that homework is due you are nevertheless responsible for turning the homework in on time.
Collaboration  
It is perfectly acceptable to help each other. I encourage you to work together on any assignment unless I explicitly say otherwise. Of course academic honesty and common sense require that only honest effort on your part be rewarded; do not turn in “joint” work which is really only the work of someone else. However you do not have to feel guilty turning in work that reflects mostly the good ideas of someone else if you were genuinely working together. Even if your work is joint, you should write your own solutions as independently as possible. That is, do not simply copy from others. This is to ensure that you really understand the solution. You should always indicate in writing the names of those you collaborated with on a problem. Failure to do that is a form of academic dishonesty. Of course, cheating on tests or the final exam is not allowed. Cheating includes the use of unauthorized notes or devices, copying from another student, or consciously allowing another student to copy from your work. Details of Calvin’s policy on academic integrity can be found in the Student Conduct Code [http://www.calvin.edu/student-life/forms-policies/pdf/student-conduct.pdf].

See Me  
If you are having trouble with the course, if you don’t understand something important, if you have some special circumstance that is getting in the way of performing well in this class, or you just want to talk about the course, see me. While I have office hours, I encourage you to come see me anytime that I am in my office (which is most of the day everyday). While I check email regularly and will answer it promptly, email isn’t very useful for answering the more technical questions that might come up in homework. Also, don’t assume that just because you are awake and writing email that I am awake and reading email!

Disabilities  
Calvin will make reasonable accommodations for persons with documented disabilities. Students should notify the Coordinator of Services for Students with Disabilities located in the Student Academic Services office. Students requiring such accommodations should meet with me during the first week of class.

Exceptions  
I reserve the right to make changes or exceptions to the above policies either for the whole class or for individuals. The ultimate goal in this course is learning and formal requirements should not unnecessarily stand in the way of this. As a consequence, if you (individually or collectively) think that any of the above conditions are interfering with learning, let me know and we’ll see what can be done.