STAT 515, Statistical Methods I – Summer I 2007

Instructor:

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Course Web Page: http://www.stat.sc.edu/~hitchcock/stat515.html

Classes:

Meeting Times:

Mon-Tue-Wed-Thu 10:30 a.m.-12:45 p.m.,

Welsh Humanities Classroom Building, Room 202

Office Hours:

Mon 9:40-10:20 a.m., Tues 9:40-10:20 a.m., Wed 9:40-10:20 a.m., Thu 9:40-10:20 a.m., or please feel free to make an appointment.

Textbook:

Statistics (10th Edition), by J.T. McClave and T. Sincich, Prentice Hall, 2006.

Prerequisite: A grade of C or higher in MATH 111 or equivalent; or a grade of C or higher in STAT 201 or equivalent.

Course Outline: Chapters 1-11 and 13 of the McClave & Sincich textbook. Topics covered include: descriptive statistics, elementary probability, discrete and continuous random variables, sampling distributions, point and interval estimation, hypothesis testing, one-way ANOVA, simple linear regression, and contingency tables.

Homework:

Daily homework exercises from the textbook are assigned on the course web page. These homework exercises will not be collected, but it is important that you do them each day, because we will have a quiz almost every class in this class. The quiz problem(s) will be very similar or identical to one or more of the assigned homework problems. A schedule of homework problems and possible quiz topics is given on the course web page.

Answers to odd-numbered problems are given in the back of the book. I have placed a solution manual for the even-numbered problems on reserve in the USC library (for use in the library building only, for up to 2 hours). You may use this as a resource to help as you do the homework problems, but I make no guarantee of the accuracy of every solution. Please do not photocopy the manual, since it is a copyright violation!

Quizzes:

We will have a quiz during each class, beginning Wednesday, June 6 (except dates when exams are scheduled). This makes a total of 14 quizzes. Your best 11 quiz grades will make up your quiz average. You will not be allowed to make up any quizzes; if you miss a quiz, it will be one of the quiz grades that are dropped when the quiz average is calculated.

The quiz problem(s) will be very similar or identical to one or more of the assigned homework problems. You will not be allowed to use notes for the quizzes. Quizzes will usually be given near the end of class each day, but may be given at the beginning of class occasionally. A schedule of homework problems and possible quiz topics is given on the course web page.

Graduate Students: Any students enrolling in the course for graduate credit must do a short data-analysis project that will count for one-quarter of their quiz grade. Any graduate students should please see me for details.

Exams:

There will be two in-class midterm exams (June 14, June 26) and a final exam on July 6. Exams may not normally be made up, except in extreme circumstances, for which written documentation of excuse (doctor's note, funeral notice, etc.) is required. If you suspect you may miss an exam day, it is important to contact me well in advance of the test date.

Grading:

The course grade will be based on quiz average (20%), the two midterm exams (25% each), and a final exam (30%). The overall course average will result in the following grades: 90-100 = A, 87-89 = B+, 80-86 = B, 77-79 = C+, 70-76 = C, 67-69 = D+, 60-66 = D, 59 and below = F.

For graduate students only: 91-100 = A, 88-90 = B+, 81-87 = B, 78-80 = C+, 71-77 = C, 68-70 = D+, 61-67 = D, 60 and below = F.

Computing:

Some problems in this course involving computations will be done using the popular computer package Minitab. Detailed instructions for the Minitab analyses will be posted on the course web page. You will have an account on the MATHSTAT Windows-NT domain. Currently the computers in LC 124, LC 303A and PSC 102 have Minitab.

Course Schedule: Mondays through Thursdays, June 4 through July 3:

June 6 – June 13: Daily quizzes

June 14: Midterm exam 1

June 18 – June 25: Daily quizzes

June 26: Midterm exam 2

June 27 – July 3: Daily quizzes

Friday, July 6: (10:30 a.m.-12:45 p.m.) Final exam