

Northern Michigan University - Fall 2006
MA 171 – Introduction to Probability and Statistics

Section 04 – 2911 West Science
Monday, Wednesday, Thursday, Friday
11:00 to 11:50 a.m.

Section 06 – 3801 West Science
Monday and Wednesday
7:00 to 8:40 p.m.

instructor: Pat Jennings
office: 321 North Front St. (Near Peter White Library)
office phone: 228-2808
cell phone: 869-1814 (use the cell phone only sparingly)
email: Pat@Jennings.net [please use this email address rather than an on campus one since I rarely check the campus email]

office hours: **by appointment only**
I will be available in the classroom immediately after class. If you need more time, please call me at my office and schedule an appointment.

course content: This course consists of a study of the methods of elementary probability and statistics. Some time is devoted to finding probabilities for both discrete and continuous probability functions, and discussing the role probability plays in estimation and decision making. The main emphasis of the course, however, is on methods of describing data, finding sampling estimates and testing hypotheses. Throughout the course, applications are stressed as is the interpretation and understanding of the statistics and methods used. Topics include descriptive statistics, probability distributions, Central Limit Theorem, hypothesis testing, confidence intervals, regression and correlation, ANOVA, and categorical data.

This course satisfies the Formal Communication Studies requirement. These courses are designed to introduce students to the ways in which information and ideas are expressed using a communication system other than English. Such courses should foster the student's ability to conceptualize and communicate in an orderly, rational manner. Characteristics of a communication system include: 1) possession of a grammar; 2) operation from an established set of rules; 3) reasoning properties such as deduction, inference drawing and problem solving. This includes courses in languages and those in which the central focus of the course is on statistics, computers or formal logic.

Text: General Statistics, Fourth Edition, Chase and Bown (Wiley, 2000)

There is also an optional student manual that you may purchase, but it is not required.

Tutoring: All Campus Tutoring (ACT) will offer MA171 tutoring on a walk-in basis at 111H LRC, by Starbucks. Three of the current tutors have completed MA171, so they should be familiar with the material. Keep in mind that they may not be familiar with the course as I have set it up, however, they can help you with general course material.

Computer: I will assume that everyone in the class has an NMU issued Thinkpad, or something equivalent. You will need the following software for this class (If you have a Thinkpad, these should already be installed)

- Microsoft Word
- Microsoft Excel
- Minitab

In addition, we will use the internet, so you should have a recent web browser, i.e. the last few years.

I will ask for your email address at the beginning of the semester and will use this to convey information to you. It is your responsibility to check your email before class to find assignments, test dates, class cancellations, etc. I will try to get all information to you at least 24 hours in advance. If you change your email address, please email me a message and let me know. Also, if you have any questions about the class, you may email me (or call me) any time.

Grading: Grades will be weighted according to the following:

Chapter Tests	60%
Quizzes	10%
Project	15%
Final Exam	15%

The final grade will be a weighted average of the above corresponding to the following scale:

A	90 - 100
B	80 - 89.99
C	70 - 79.99
D	60 - 69.99
F	less than 60

There will be no other grades given. Incompletes will be pursuant to University policy.

Prerequisites: MA 103, MA 104, or MA 105 or the departmental mathematics placement test. You should be familiar with basic algebra and graphing a straight line. If you do not feel comfortable in this area, please talk to me on the first day of class.

Chapter Tests: Chapter tests will be online (hopefully). You may use books, notes, web pages, or any inanimate object. You may *not* be assisted by another person or let another person take the test for you. All of the work must be done on your own.

You will have from Thursday to Sunday night to take the test. The tests will all be multiple choice, fill in the blank or true/false. If you get the question correct, you will get all of the points, but, if you get it wrong, you will get zero. *However*, you may turn in your notes from the test on Monday in class in order to receive partial credit for any wrong answers. The notes **must** be on regular paper (i.e. no napkins or paper bags), have your name on it, the work must refer to the question number, and it must be readable. If I cannot figure out your notes, I will ignore them.

You must have the test completed by midnight, Sunday. If not, tests can be made up only for a good reason and you must provide documented proof (i.e. note from doctor, subpoena, funeral announcement, etc.) before you can take a makeup. Except for university related functions, I will solely determine whether or not the reason that you have for missing a test is valid.

Quizzes: Quizzes will be given once or twice a week, unannounced, usually spontaneous, and cannot be made up under any circumstances. The easiest way to pass a quiz is to show up in class. If you miss only one or two quizzes, it will not significantly affect your grade, but, missing most of them will. Quizzes are very liberally graded and you are encouraged to work with other classmates.

Project: There will be a project due at the end of the semester. It will be a report encompassing most of the topics we will cover. You will write your project in Microsoft Word and use Excel for the calculations, tables, and graphs. This means that you will have to know how to cut and paste from Excel into Word, which we will cover briefly throughout the semester. You will be graded on neatness and the professionalism of your final product. Ideally, it should be something that you can put in your portfolio for a job interview when you graduate, so, make the most of this opportunity!

Homework: Homework assignments will be given, but not graded. If you want me to go over a particular homework problem, email me the page and problem number and I will go over it the next class. I will not go over any homework problem unless you email it to me first!

As a general rule, you should spend two hours on homework for every hour that you are in class. (This applies for all courses that you take in college) Since this is a 4 credit hour course, you should spend at least 8 hours per week on reading and homework assignments. If you have had an especially hard time with mathematics in the past, plan on spending at least 12 hours per week for this course.

Budget your time wisely! There is nothing worse than cramming for a test on Friday night when your friends are out having a good time. I recommend that you set a schedule for this course (as well as your other courses) and stick to it. Plan your schedule now.

Attendance: Other than the quiz grades, I will not be taking attendance for this course. Since you are making a financial investment in this course, it is to your advantage to put your best effort into learning the material that is presented by attending class regularly, keeping up with the homework, and asking for help if you do not understand something. If you are not able to attend class due to work commitments, child care, or some other reason, let me know and we can work out some reasonable arrangement.

Academic Honesty: You must do all of your own work. If you cheat, you will not learn the material, and if you get away with passing this course by cheating, you will have a very difficult and frustrating time in your later courses. Also, you will be constantly looking over your shoulder worried about getting caught, and that, in itself is not worth it. If you do get caught cheating on a test or other assignment, you will get an automatic **F** for this course, and you could be subject to other sanctions. This includes having someone else take your online test or plagiarizing the project assignment. The bottom line is, if you cheat, you are really cheating yourself out of time, money, and, possibly, your future career.

Disabilities: If you have a need for disability-related accommodations or services, please inform the Coordinator of Disability Services in the Disability Services Office at 2001 C. B. Hedgcock (227-1700; TTY 227-1543). Reasonable and effective accommodations and services will be provided to students if requests are made in a timely manner, with appropriate documentation, in accordance with federal, state and University guidelines.