

STA 3024

Introduction to Statistics II

Summer B 2011

Section: 5126

Class Hours: M T W R F 4th Period (12:30-1:45PM)

Meeting Place: PUGH 170

Course Website: <http://www.stat.ufl.edu/~dasgupta>

Instructor: *Shibasish Dasgupta*

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Office Hours: FRIDAY: 4:00 –5:15 PM

Or, by appointment.

Note: Office Hours may change depending on my convenience.

Teaching Assistants:

1. *Chuan Wang*

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E-mail: [wchuan@stat.ufl.edu](mailto:wchuan@stat.ufl.edu)

Office Hours: M T W R F 3rd Period (11 AM-12:15 PM)

## ***2. Yeon Hee Park***

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**Office Hours:** M W 5th Period (2 PM-3:15 PM)

## ***3. Subhadip Pal***

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**Office Hours:** T R 5th Period (2 PM-3:15 PM)

## **Course Description and Objectives**

STA 3024 is a second course in statistics that applies tools from STA 2023 to develop a variety of statistical methods that can be used to make decisions with data in the real world.

This course is intended to be accessible to students both with and without a mathematical background, as no calculus is required. The following topics will be covered:

1. Contingency tables and the chi-squared test
2. Analysis of variance in both one-way and two-way layouts
3. Regression, with an emphasis on inference
4. Nonparametric methods

**Text:** Alan Agresti and Chris Franklin, *Statistics: The Art and Science of Learning from Data*, Pearson Prentice Hall, 2008.

If you bought Volume 1 for STA 2023, you can buy Volume 2 to complete it. Although the textbook will not be used for any graded assignments or required readings, you will still find it useful as a source of extra problems and as a reference for additional information or alternative explanations.

**Prerequisites:** STA 2023, which covered chapters 1 – 10 of the above text i.e.

- Graphical and Numerical descriptive measures.
- Concepts of correlation and regression.
- Basic probability concepts, random variables and sampling distributions.
- Large and small sample confidence intervals and significance tests for parameters associated with a single population and for comparison of two populations.

The main concepts from STA 2023 will be reviewed along the way as the course progresses.

**Lecture Notes** will be posted on the course webpage usually a day or two before the class. You should print out the notes and bring them to class to save yourself some writing. The notes will be incomplete with some blanks. By the end of the class you should have filled out the blanks and will thus have a complete set of notes which can be reviewed later as needed.

**Announcements** for the course and other relevant information will be posted on the course website. You should check the announcement page frequently to keep yourself updated on what's going on.

### **Calculators**

For exams, quizzes, and homework problems, you will need a calculator that can at least do arithmetic and square roots. Any scientific or graphing calculator will work as well. (If it was fine for STA 2023, it will be fine for this course.) Please be aware that saving notes into a calculator and accessing them during an exam is considered cheating and will be dealt with accordingly.

**Course Structure:** The final grade in the course will be based on your performance on 3 exams (100 points each) & 3 quizzes (10 points each) in every week (generally on every Mondays).

**Exams** - There will be **THREE** closed book, multiple choice and non-cumulative exams given in class during the semester, each worth 100 points. Each quiz worth 10 **BONUS** points and it will be based on the materials taught in that week. The tentative exam & quiz dates are as follows:

| Exam   | Day & Date       | Time     |
|--------|------------------|----------|
| Quiz 1 | Tuesday, July 5  | in class |
| Exam 1 | Monday, July 11  | in class |
| Quiz 2 | Monday, July 18  | in class |
| Exam 2 | Monday, July 25  | in class |
| Quiz 3 | Monday, August 1 | in class |
| Exam 3 | Friday, August 5 | in class |

### **Attendance**

Attendance is strongly recommended. If you try to avoid me, you'll lose something!!!

**Make up Policy:** If you are unable to take an exam and / a quiz due to conflict or illness, you must contact me as soon as possible to discuss your options. Valid documentation will be required for any make-ups. I don't entertain make-ups without any strong reason.

**Grading:** Your final grading will be based on a total of 300 points. Your total earned bonus points in 3 quizzes out of the 30 points will be added to your total earned points in 3 exams.

So, WORK HARD!!!

| Points    | Grade | GPA  |
|-----------|-------|------|
| 280 - 300 | A     | 4.00 |
| 255 - 279 | A -   | 3.67 |
| 225 - 254 | B +   | 3.33 |
| 200 - 224 | B     | 3.00 |
| 165 - 199 | B -   | 2.67 |
| 120 - 164 | C +   | 2.33 |
| 90 - 119  | C     | 2.00 |
| 60 - 89   | C -   | 1.67 |
| 30 - 59   | D     | 1.00 |
| 0 - 29    | E     | 0.00 |

**General Course Policies:**

**E-mail:**

Please e-mail me or the TA if you want to know any **necessary** information. Please be aware that statistical questions should be communicated in person (in class or during office hours) since they often require pictures and formulas that make it very hard to communicate through email.

### **Incomplete Grades**

An incomplete grade will only be given under extraordinarily extenuating circumstances that prevent the student from completing the course requirements. Having a failing grade in the course is not an extraordinarily extenuating circumstance.

### **Students with Disabilities**

Any student requesting accommodation for disabilities must first register with the Dean of Students Office, who will provide documentation to the student, who must then provide this documentation to me privately as soon as possible.

### **Privacy Policies**

Student records are confidential. Only information designated as UF directory information may be released without your written consent. This includes requests from parents or anyone else who contacts me about your performance in the class.

### **Academic Honesty**

All students are required to abide by UF's academic honesty guidelines. For students in this course, the relevant portions can be summarized as follows: Do not cheat!!!