

# Statistics 141 Autumn 2005

**David Rogosa**

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course web page at <http://www-stat.stanford.edu/~rag/stat141>

## **Class Office Hours**

Rogosa: Th 3:45-5, Sequoia room 224

TA's: Ping Li, Rudolfo Angeles, Andreas Eckner, Nilanjan Mukhopadhyhy;  
contact hours

Andreas Eckner: Monday 2-4 pm; Sequoia Hall, office 223A

Rudolfo Angeles: Tuesdays, 1-2PM (formerly 12-2PM), Thursdays, 3:35PM-4:30PM Sequoia 237

Ping Li: 10am to 12pm Wed, Sequoia 108

Nilanjan Mukhopadhyhy, Friday 1-3PM Sequoia 237

## **Review sections**

Wednesday afternoon: 5:15PM in Hewlett 101.

Friday morning: 9-9:50AM, History Corner, Room 105 (200-105)

Special review section: TH2 review, Hewlett 102, Fri 11/11 6-8PM Note: sections will not be held during the Take-home assessment weeks, 10/24, 11/14

## **Section materials**

### **Computing sessions/labs**

R [computer lab session this Thursday \(Oct. 6\)](#), 11AM-12PM, in Sequoia 211; repeated at 3:30PM.

[Second computer lab](#) on recent R activities/content scheduled for Tuesday morning, 11/1 11AM in Sequoia 211; repeat Thursday, Nov 3, 3:35PM.

[Third Computer Lab](#) on recent and current R activities scheduled for Sequoia hall computer lab Wednesday, November 30, 2005: 2:30PM-3:30PM repeated on Thursday, December 1, 2005: 3:35PM-4:35PM.

for references and software: [The R Project for Statistical Computing](#)

for review of R-commands used in lecture and additional resources, see [Rogosa R-diary](#) (updated 11/20)

## **According to the Registrar**

Course: BIOSCI 141, Sec 01

Title: Biostatistics

Min/Max Units: 4- 5

Grading Basis: Letter or Credit/No Credit

Days/Times/Classroom: TTH 02:15PM-03:30PM HERRINT175

REMINDER: First class Tuesday, September 27.

## **According to the Stanford Bulletin**

STATS 141. Biostatistics--(Same as BIOSCI 141.)

Statistical analysis of biological data.

Topics: discrete and continuous distributions, testing hypotheses and confidence procedures, fixed and random effects analysis of variance, regression, and correlation.

Wilcoxon and other nonparametric procedures, inference on contingency tables and other data arising from counts. Tests of goodness of fit.

Emphasis is on finding numerical solutions to biostatistical problems, and practical interpretations and their implications.

GER:DB-Math4-5 units, Aut (Rogosa)

## **Textbooks**

Main Text

*Required: Statistics for the Life Sciences*, Samuels and Witmer, Prentice-Hall, 3rd Edition, 2003.

Available at the bookstore

Can be ordered at [Amazon.com](http://Amazon.com)[3rd ed new]; [older 2nd ed also available without instructor endorsement](#)  
(pending: reserves at the Maths/Comp. Sci. library and Biology)

*Optional* (for those dedicated to R)

*Using R for introductory Statistics*, J. Verzani, Chapman & Hall, 2005.

Available at the bookstore

Draft version of much of the Verzani material available from [R-project](#)

An on-line resource for probability distributions is [A Compendium of Common Probability Distributions](#)

## Course Resources

[Course Outline](#)

[Course Examples and Files](#)

[Course Assignments](#)

### Assignments and Assessment

#### 1. Weekly Problem Sets.

There will be short problems posted approximately weekly on lecture content.

Solutions to these problems will be posted, and these will not be collected and graded.

That said, taking these problem sets seriously is important because that's where much of the real learning takes place. Applied statistical methods is in the doing.

#### 2. Take Home Assessments.

In addition, there will be two graded problem sets:

TH1 will take place during the week of 10/24 covering class material up through 10/20

Details: posting on assignment page Tues 10/25 AM, due Fri 10/28 5PM TBA

TH2 will take place during the week of 11/14 covering class material up through 11/8

Details: due Thurs 11/17 in classroom T175 by 2:15 PM

**3.** In class exam during finals week, scheduled by the Registrar for 12/15 3:30 PM. Exam is open book, open materials. Coverage is approximately half material 11/10 onward, half prior material. Since I got multiple questions on exam schedule I scanned in the [back page of the Time Schedule](#) grid and marked the final.

*Room assignment for 12/15.* I got what I asked for from the Registrar, so if it doesn't work well it's my fault.

Exam location is the classroom T175 and adjoining rooms T185, T195.