

BIOS 553
Linear Regression

Instructor: Kellie J. Archer, Ph.D.
Schedule: Tuesday and Thursday 9:00AM-10:20AM
Classroom: One Capital Square 5009
Office hours: Tuesday and Thursday 12:00PM-1:00PM
Office: One Capital Square 729

TA: Naha Farhat
Office: One Capital Square 711E
Phone: 827-2073

Required text: Kutner, Nachtsheim, Neter, and Li. *Applied Linear Statistical Models*,
5th Ed., McGraw-Hill/Irwin, 2005. ISBN-0-07-238688-6

Supplemental
Course Materials: posted via Blackboard

Homework: Reading assignment with each class.
Problem solving and programming homework assignments.

Exams: One midterm and one final

Grades: There will be assigned homework as well as a midterm and final exam.
Weighting for the final assigned grade will be as follows:

Homework	40%
Midterm	30%
Final	30%

Students must use the VCU Honor Pledge when handing in any take home work. Please refer to the VCU Honor System at http://www.medschool.vcu.edu/graduate/student_res/honor_system.html.

The Honor System Pledge is “On my honor, I have neither given nor received aid on this assignment, and I pledge that I am in compliance with the VCU Honor System.”

Late homework assignments will not receive any credit.

Software:

- The R programming environment will be used extensively
- SAS will be introduced

Class Rules:

- Read all assignments before class!
- Bring your laptop to class.
- Bring your book to class.
- You must use the VCU Honor Pledge when handing in any take-home work!

Prerequisites: This course is aimed at the entering MS/PhD students in the department of biostatistics. Students must have completed three semesters of Calculus (MATH 200, 201, and 307), Linear Algebra (MATH 310), and one course in statistics (e.g., MATH 309, STAT 210, or STAT 212). Although not required, additional work in mathematics, statistics, or computer science is helpful.

Note : Use of R programming environment is required for homework assignments. When submitting homework both solutions and R code are required to be turned in. Instructions for `source()` and `sink()` functions will be provided.