

STAT 790: STATISTICAL METHODS USING R, 1 credits
 Jeff Terpstra and Chunfeng Huang
 Spring Semester 2004
 Lecture: 10:00-10:50 M LLC126

Jeff Terpstra

Office: Waldron 201H
 Phone: 231-8188
 Email: Jeff.Terpstra@ndsu.nodak.edu
 Office Hours: TBA

Chunfeng Huang

Office: Waldron 203E1A
 Phone: 231-7492
 Email: Chunfeng.Huang@ndsu.nodak.edu
 Office Hours: TBA

Prerequisite: Upon the approval of the instructors.

COURSE DESCRIPTION: The software R and its application in statistics.

COURSE OBJECTIVES: The students should be able to perform statistical analysis using R.

GRADING POLICY: Your grade will be based on participation, a midterm and a final projects.

SPECIAL NEEDS: Any students with disabilities or other special needs, who need special accommodations in this course are invited to share these concerns or requests with the instructor as soon as possible.

APPROVED ACADEMIC HONESTY STATEMENT: All work in this course must be completed in a manner consistent with NDSU University Senate Policy, Section 335: Code of Academic Responsibility and Conduct (<http://www.ndsu.nodak.edu/policy/335.htm>).

TENTATIVE SCHEDULE:

Monday Date	Lecturer	Topic(s)
1/12/04		No class , classes start on Tuesday
1/19/04		No class , Martin Luther King Day Holiday
1/26/04	Jeff	Introduction: Downloading R, Getting Help, R Basics
2/02/04	Chunfeng	Introduction: Objects, Vectors, Matrices, Lists, Data Frames, Assignment, etc.
2/09/04	Jeff	Descriptive Statistics and Exploratory Data Analysis (EDA)
2/16/04		No class , President's Day Holiday
2/23/04	Jeff	One and Two Sample Inference Procedures
3/01/04	Chunfeng	Regression and ANOVA
3/08/04	Chunfeng	R Packages (Spline, Survival, etc.)
3/15/04		No class , Spring Break!
3/22/04	Jeff	Programming: Loops, If Then Else, etc.
3/29/04	Chunfeng	Programming: Functions
4/05/04	Jeff	Simulations and Random Number Generation
4/12/04		No class , Holiday/Recess Break
4/19/04	Chunfeng	Newton-Raphson Algorithm
4/26/04	Jeff	Graphics
5/03/04	Chunfeng	Bootstrapping and Resampling Techniques
5/10/04		No class , Final Exam Week