

Department of Mathematics
Christopher Newport University

Math 579
Fall Term 2006

Real Analysis

Instructor: Dr. Khalili
Email: pkhalili@cnu.edu
Web page <http://www.pcs.cnu.edu/~pkhalili/Home.html>
Office: Gosnold 121= 11²
Office Hours: MW 3:00 - 4:00 pm, TTH 1:00-3:30 pm,
Classroom: Gosnold 204
Class Hours: MWF 10:00-10:50 am
Phone: 594-7037(office), 594-7194 (department secretary)

Textbook: **Analysis** with an application to proof, Steven R. Lay, Fourth Edition.

Course Objective: Math 579 is the second transitional course from calculus. This course essentially covers some of the topics we have studied in calculus, however we prove most of the theorems here. The prerequisite for the course is Math 310. I expect that everybody is being familiar with basic mathematics logic, though I will cover those topics briefly. The overall objective of the course is to learn how to prove many rules and theorems we have encountered in calculus of one variable. Therefore our goal is that by the end of the semester everybody will be capable of constructing mathematical proofs independently.

This course is intended to achieve the following objectives

1. Gaining factual knowledge (terminology, classifications, methods, trends)
2. Learning fundamental principles, generalizations, or theories
3. Learning to apply course material (to improve thinking, problem solving, and decisions)

Course Outline:

<u>Chapter</u>	<u>Section</u>
1	1,2,3,4
2	5,6,7
3	10,11,12,13
4	16,17,18,19
5	20,21,22,23
8	32,33,34
9	35,36

Grading System: The course grade is based on three tests, weekly homework (about 10 homework will be collected) and 3 projects and the final exam. Each of these activities account for 20% of the course grade (homework and projects is considered one activity). Final exam is scheduled for Monday December 4, from 11:00-1:30 pm in G-203. .

Homework: Homework will be assigned daily and covered in class the next day.

Grading Scale: The course grade is assigned based on the following scale:

91 - 100 = A

88 - 90 = A⁻

85 - 87 = B⁺

81 - 84 = B

79 - 80 = B⁻

75 - 78 = C⁺

70 - 74 = C

67 - 69 = C⁻

60 - 66 = F

Attendance: Attendance is necessary, and you are responsible for all class materials, assignments and deadlines.

Withdrawal Policy: The withdrawal policy is the same as an official university policy. *Therefore the last day to withdraw or elect Pass/Fail is October 25, 2006.*

University Regulations on Students with Disabilities:

If you believe that you have a disability, you should make an appointment to discuss your needs. In order to receive an accommodation, your disability must be on record in Disability Services located in the Academic Advising Center, Student Union, Room 3125 (Telephone - 594-8763; Fax - 594-8765).