AMS-503
Applications of Complex Analysis

Fall 2014
Time: Tuesday, Thursday, 2:30 – 3:50 PM
Location: Frey Hall 305

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Course web page:
http://www.ams.sunysb.edu/~rosamu/Teaching/AMS503/

Course Description

A study of those concepts and techniques in complex function theory that are of interest for their applications. Pertinent material is selected from the following topics: harmonic functions, calculus of residues, conformal mapping, and the argument principle. Application is made to problems in heat conduction, potential theory, fluid dynamics, and feedback systems.

Required Textbooks


Course Policy

Assignments: Homework assignments are due in class typically one week after they are assigned. You are allowed to discuss course materials and homework problems in small groups, but limited to discussion of general ideas only. You must write your solutions completely independently. Under no circumstances may you copy solutions from any source, including but not limited to other students solutions, official solutions distributed in past terms, and solutions from courses taught at other universities. Violation of these rules may result in disciplinary actions.
Exams: The midterm and final exams are closed-book.

Grading:

- Homework assignments: 30%
- Midterm exam: 30%
- Final exam: 40%

Attendance: Students are expected to attend all classes. Students are encouraged to ask questions during and after the class.

University Policy

Academic Integrity

Each student must pursue his or her academic goals honestly and be personally accountable for all submitted work. Representing another person's work as your own is always wrong. Any suspected instance of academic dishonesty will be reported to the Academic Judiciary. For more comprehensive information on academic integrity, including categories of academic dishonesty, please refer to the academic judiciary website at http://www.stonybrook.edu/uaa/academicjudiciary/

Americans with Disabilities Act:

If you have a physical, psychological, medical or learning disability that may impact your course work, please contact Disability Support Services, ECC (Educational Communications Center) Building, room 128, (631) 632-6748. They will determine with you what accommodations are necessary and appropriate. All information and documentation is confidential.