Course Information Sheet:
Spring 2012, Math 30800, Section E

Course Title: Bridge to Advanced Mathematics

Catalog Description: This course explores the logical and foundational structures of mathematics, with an emphasis on understanding and writing proofs. Topics include set theory, logic, mathematical induction, relations and orders, functions, Cantors theory of countability, and development of the real number system.

Meeting time and place: Mondays and Wednesdays 2:00-3:15 PM in NAC 6/115.

Instructor Information:

- **Name:** Prof. Hooper
- **Office hours:** Mondays and Wednesdays 1-1:50pm on any day our class meets. Appointments are also accepted.
- **Office:** NAC 6/282
- **Email:** whooper@ccny.cuny.edu
- **Office Phone:** (212) 650-5149

Course Textbooks:

- *Mathematical Proofs* by Chartrand, Polimeni, and Zhang.
- *Elementary Analysis* by Ross.

Grades: Grades will be computed from the following:

- Class Participation and Attendance (5%) (See the attendance policy below.)
- Homework assignments (8%)
- Quizzes (7%)
- Two midterms (20% each) held on Monday, March 5th and Monday, April 16th.
- The final exam (40%) held Wednesday, May 23rd from 1-3:15pm.

Your final score will be tabulated out of 100% as indicated by the percentages above. A curve will then be applied to determine your final grade.

Course information: Course information can be found on the website `http://wphooper.com/teaching/2012-spring-308/`. This site includes a list of homework assignments, a tentative course calendar and a list of course documents.

Blackboard: A record of your grades in this course can be found on blackboard. To access blackboard visit `http://bbhosted.cuny.edu/`. Please let me know if you have trouble accessing blackboard, or trouble using the blackboard website.

Email: It is important that you are accessible via email through blackboard. To change or update your email address go to `http://portal.cuny.edu`, click "Portal login" from the bottom left menu, then login, and select "My profile" on the left menu.

General expectations: For each hour spent in the classroom, I expect you to spend at least two hours reading and understanding the book, understanding lecture notes, and doing

homework. Practice (doing problems and proofs) is an important part of understanding mathematics. Only adequate practice will guarantee that you can complete midterm and exam problems in a timely manner.

Final exam: The final exam will be held on Wednesday, May 23rd from 1-3:15pm. Ensure that you have no time conflicts. A makeup for the final exam is offered only under extremely compelling circumstances. Notify me as soon as you know you will have to miss the final.

Midterms: You will be given the full class period to complete each midterm. If a midterm is missed under well documented and sufficiently compelling circumstances, then a makeup can be taken. Notify me ahead of a midterm you expect to miss to be sure your circumstances are sufficiently compelling. The makeup must be taken within one week of the originally scheduled midterm. A grade of zero will be assigned to anyone who does not take a midterm or a makeup.

Quizzes: There will be a quiz nearly every Wednesday on material covered by the latest homework assignment. Days with quizzes are listed on the calendar page of the course website.

Quiz grades: There will be no makeup quizzes. The lowest two quiz grades will be dropped.

Homework assignments: Homework assignments will be made available on the course website at least one week before the assignment is due. I encourage you to work in groups on the homework problems, especially if this best suits your learning style. Nonetheless, you should be confident that you understand how to do each problem, and should be able to solve similar problems independently. Failure to ensure that you can solve problems independently will surely have a negative effect on exam grades. You must turn in your own write up of each homework problem.

Academic integrity and homework: You must cite any source of extra help on your homework assignments. This includes mentioning students you collaborated with, other texts, and online courses. Failure to do so is a violation of CUNY's Academic Integrity Policy (see below). Copying answers can constitute plagiarism.

Homework grades: Homework will be collected at the beginning of the class it is due. Late homework will not be accepted in this course. The lowest two homework grades will be dropped from computations of your final grade. Homework problems will be graded partially on presentation. In order to get full credit on a problem, a student who reads your answer should be able to easily understand how you solved the problem.

Attendance: As students, class is extremely important for learning. You will be introduced to the material, and the relative importance of topics in the course will be revealed. For this reason, attendance is mandatory and factors into your grade. Missing an excess of eight 50 minute periods (or 4 classes) may result in you being dropped from the course, and will certainly result in a reduction of your final score by 5%. Occasionally, exceptions to

this policy will be made, but only for good reason and only with notification prior to the absence. Good reasons include illness with a doctor's note and many religious observations.

Lateness: Lateness to class in unacceptable because it disrupts the learning process of the whole class. For this reason, any student who arrives more than 5 minutes after class begins will be considered late. Three late attendances are considered the equivalent of one absence. Thus, sufficiently many late attendances will result in actions as described in the Attendance policy. In addition, any student who arrives 15 minutes after a class begins will be considered absent from that class period.

Academic integrity: You are expected to adhere to the CUNY Policy on academic integrity. This policy is posted at `http://www1.ccny.cuny.edu/current/integrity.cfm`.