

Numerical Analysis I
MA 468/568-21, Fall 2000

Class meets Tuesdays and Thursdays 8:00-10:05am in Room CB 124

Instructor: Dr. Nikolai Chernov

Office: 492-A Campbell Hall, ph. 934-2154 or 934-8613

Office hours: Tuesdays and Thursdays, 3:30-5:30pm and by appointment.

E-mail: chernov@math.uab.edu

Text: D. Kincaid & W. Cheney, *Numerical Analysis*, 2-nd Ed., Brooks/Cole, 1996.

Syllabus: Floating point numbers and round-off errors. Stable and unstable calculations. Polynomial interpolation. Hermite interpolation. Spline interpolation. Taylor series. Numerical differentiation. Numerical integration.

Grading policy:

Programming assignments	30 %
Test I (due Oct. 5)	20 %
Test II (due Oct. 26)	20 %
Final exam (due Nov. 16)	30 %

Assignments and tests: Programming assignments and tests are take-home. They are given approximately one each week on Thursdays, the tests - one week before they are due. You will work on assignments and tests individually and submit written reports including the print-outs of the codes of your computer programs and numerical results. Reports are due one week after the assignments are given. Occasionally, I may ask you questions on your reports. Half credit is given for late reports (no late reports on the final test!).

Withdrawal Policy: The last day to withdraw with a grade of **W** is Oct. 20. (There are no more WP or WF at UAB!)

Computer programming. You may use a computer in the computer lab, or your favorite PC at home or anywhere. You are expected to know one computer language - QBASIC or FORTRAN or C/C++ or PASCAL. For those without programming experience, extra effort will need to be made to pick up some language within the first few weeks. A guide in FORTRAN is available.

Welcome to MA 468/568 and best of luck to you all.