

MATH 4553, Linear and Nonlinear Programming

Spring 2011

MWF 2:30-3:20pm, Classroom: Life Science East 217

- **Course description:** Prerequisites: MATH 2163, MATH 3013. Linear programming, simplex methods, duality, sensitivity analysis, quadratic programming and constrained nonlinear programming.
- **Instructor:** Yanqiu Wang
 - Office: 441 MATH (405-744-5698).
 - Office Hours: MW 3:30-5:30pm or by appointment.
 - Email: yqwang (AT) math.okstate.edu
- **Webpage:** http://www.math.okstate.edu/~yqwang/teaching/math4553_spring11/
- **Textbook:** Linear programming with Matlab, M.C. Ferris, O.L. Mangasarian and S.J. Wright, MPS-SIAM Series on Optimization, 2007.
Supplementary reading: Linear Programming, Foundations and Extensions, R.J. Vanderbei, Springer, 3rd ed., 2008. (Electronic access to full text from OSU library).
Supplementary reading: Linear and Nonlinear Programming, D.G. Luenberger and Y. Ye, Springer 2003. (Electronic access to full text from OSU library).
- **Grading policy:** Your final grade will be based on the following:
 - 6 homework, 20 points each (120pts);
 - Two mid-term Exams, 50 points each (100pts);
 - Final Exam (100pts): comprehensive;
 - The Total is 320 pts: A ($\geq 90\%$), B ($\geq 80\%$), C ($\geq 70\%$), D ($\geq 60\%$).
- **Make-up policy:**
 - Make-ups for exams will only be allowed for an authorized absence under University Regulations. Normally a written note is required. Student should contact the instructor to schedule a make-up by the end of the next working day after the missed exam.
 - There is NO make-up for homework assignments. You sacrifice 5 points per day for each late homework assignment.
- **Syllabus Attachment** Check <http://osu.okstate.edu/acadaffr/aa/syllabus.htm> (Syllabus Attachment) for university-wide rules regarding dropping a course, academic integrity, and office of student disability services.