# MAU0061 : Linear Programming Fall 2019

# Contact Information

Instructor: Jein-Shan Chen

Classroom: C006

Time: Thursdays, 13:20 - 16:20 pm Office: M321, Mathematics Building Email: jschen@math.ntnu.edu.tw

Web-site: http://math.ntnu.edu.tw/~jschen

# Office Hours

You are welcomed to drop by my office whenever I am in or please feel free to make an appointment with me.

#### **Textbook**

Most class materials are from "An Introduction to Linear Programming and Game Theory", by P. R. Thie and G. E. Keough, 3rd edition, John Wiley & Sons, 2008. Nonetheless, no textbook is required and you are expected to take class notes on your own.

#### Homework

As you are probably aware, most learning in a math course takes place when you do your homework. I will assign weekly or biweekly homework.

#### Exams

There will have only one final exam which will be a presentation in English. Each enrolled student needs to do final presentation in English

around 10-15 minutes. The topic (anything related to optimization) is up to presenter's choice.

# **Topics**

- Mathematical Models
- The Linear Programming Model
- The Simplex Method
- Duality Theory
- Sensitivity Analysis
- Integer Programming

# Grades

Your final grade for this course will be determined as follows:

 $\begin{array}{ll} \text{Attendance} & 30 \% \\ \text{Homework} & 30 \% \\ \text{Final} & 40 \% \end{array}$ 

Sometimes you will be asked to attend conferences or workshops related to this course, and attendance of such cases is also counted.