The Hebrew University of Jerusalem

Syllabus

MATHEMATICAL TOOLS IN COMPUTER SCIENCE - 67865

Last update 05-08-2015

HU Credits: 4

Degree/Cycle: 2nd degree (Master)

Responsible Department: computer sciences

Academic year: 0

Semester: 1st Semester

Teaching Languages: Hebrew

Campus: E. Safra

Course/Module Coordinator: Guy Kindler

Coordinator Email: gkindler@cs.huji.ac.il

Coordinator Office Hours: Coordinate in advance

Teaching Staff:

Prof Guy Kindler
Ms. Nitzan Kroyzer

Course/Module description:
This course refreshes some of the undergraduate material in math and extends into some additional directions. The course emphasizes ways in which mathematical tools are used in various fields of computer science

Course/Module aims:
To strengthen the students' command of mathematics and to expose them to new ways of applying mathematics to computer science.

Learning outcomes - On successful completion of this module, students should be able to:
Apply their mathematical background in computer science

Attendance requirements(%):
0

Teaching arrangement and method of instruction: lecture and recitation and a weekly home assignment, a bi-weekly quiz, and a final exam.

Course/Module Content:
Probability, Linear Algebra and its applications, Optimization, a taste of harmonic analysis. For full description see course's site.

Required Reading:
none

Additional Reading Material:
Occasionally given

Course/Module evaluation:
End of year written/oral examination 70 %
Presentation 0 %
Participation in Tutorials 0 %
Project work 0 %

Assignments 0 %
Reports 0 %
Research project 0 %
Quizzes 30 %
Other 0 %

Additional information:
Failure in the final exam will entail failure in the course, even if the averaged exam+quiz grade is above the passing threshold.