

MATH 302–Introduction to Probability, Winter 2014, Term 2, Jan 05, 2015 to Apr 10, 2015

Lectures:

Mon Wed Fri 11:00 - 12:00 Leonard S. Klinck (also known as CSCI) 201

Instructor: A. Levit

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Course webpage: <http://www.math.ubc.ca/~anna.levit/courses/math-302/index.html>

Office Hours: Mon 1:00 - 15:00

Text: A First Course in Probability, 9th Edition, by Sheldon Ross. Pearson, 2010.

NOTE: the 8th and 7th edition would do fine. I will not assign exercises directly from the text on the Homeworks but may suggest you look at particular exercises for practice.

Course Outline

The course will be based on topics from the first 8 chapters of Ross's text.

1. Sample spaces, events, axioms of probability (Ch. 2)
2. Some elementary combinatorics. Combinations and permutations (Ch. 1)
3. Conditional probabilities, independence and Bayes Formula (Ch. 3)
4. Discrete random variables (Ch. 4) and Continuous random variables (Ch. 5)
5. Joint distributions, marginal distributions and conditional distributions (Ch. 6)
6. Expectation: sums, covariance, moment generating functions (Ch. 7)
7. Limit Theorems: weak law of large numbers, central limit theorem (Ch. 8)

Grading Scheme

Weekly Assignments: 20

Midterm: 30

Final exam: 50

Assignments: Weekly homeworks will be assigned and collected on Friday. Homeworks handed in on the following Wednesday will be given a *. Each student has one free *. After that, the grade will be divided by 2. No assignments will be accepted after Wednesday. In addition, there will be weekly WeBWorK assignments.

Midterm: TBA, during the lecture.

Final exam: TBA

Policy on missed assignments and tests.

Students who are unable to hand in a homework due to a medical or equivalent excuse will have that hw not count towards their final grade.

Missing a test normally results in a mark of zero. Exceptions are granted only with prior consent of the instructor or due to a medical emergency. In the latter case, the instructor must be notified within two working days of the missed test and presented with a doctor's note immediately upon the students return to UBC. If an exception is granted for a missed test, the final exam will be used to make up that portion of the grade.