Honor Calculus II Math 118 – Lecture SQ1 and EQ1 January – April 2010

Time and Place: MWF 10:00 – 10:50, CME 344, and R 13:00 – 13:50, AF 1-13

Instructor: Alexander Litvak,

Office: CAB 525, Tel: 492-3397, e-mail: alexandr@math.ualberta.ca (Please, don't forget to sign your e-mail. Please put "MATH 118" in the subject), Homepage: http://www.math.ualberta.ca/~alexandr/ Office Hours: M 11:10 - 12:00, W 11:10 - 12:00, or by appointment (usually I am available MWF 11:10 - 14:40 and R after the class).

Recommended books (no textbook needed):

 John C. Bowman, MATH 117-118 textbook; http://www.math.ualberta.ca/~bowman/m117/m117.pdf
 James S. Muldowney, Advanced Calculus Lecture Notes for Mathematics 117-118, I/II, available at the Math Department main office and online http://www.math.ualberta.ca/honors/files/math117.pdf
 http://www.math.ualberta.ca/honors/files/math118.pdf
 Vladimir A. Zorich, Mathematical analysis I and II.

- 4. Michael Spivak, Calculus, Third Edition, Publish or Perish, Berkeley, 1994.
- 5. Gerald B. Folland, Advanced Calculus.
- 6. Patrick M. Fitzpatrick, Advanced Calculus.

Topics to be covered (tentative): The derivative and its applications. Extended limits and L'Hospital Rule. Integration and the Fundamental Theorem of Calculus. Techniques and applications of integration. Derivatives and integrals of the exponential and trigonometric functions. Introduction to infinite series. Introduction to partial derivatives. There may be additional topics as time permits and adjustments to the course outline.

Prerequisite: Prerequisite: MATH 117 or its equivalent. Students with MATH 113 or 114 will be only admitted with the consent of Department. Please note that this course may not be taken for credit if credit has already been obtained in MATH 101, 115 or SCI 100.

Grading Policy: Your course grade will be based upon your marks in exams and assignments weighted as follows:

- 50% Final (9:00–12:00, Tuesday, April 20)
- 40% In class quizzes (Jan. 21; Feb. 4 and 25; Mar. 11 and 25, Apr. 8)
- 10% Homework Assignments

There will be **no curve**, but the actual distribution of marks will be taken into account. If you miss the final exam and obtain a formal (in writing) University accepted excuse for your absence you might write a **deferred exam** on Saturday, May 8, at 09:00.

Quizzes will be written at the end of corresponding classes (approximately each second Thursday). They will be based on the material and exercises (drill problems) given in the class. There will be a total of 6 quizzes for the term. Your quizzes grade will be based on your best 5 out of 6. Please note, there will be no deferred quizzes, so I strongly recommend to write all the quizzes.

Important Remark: Calculators, notes, books, etc. **are not allowed** during quizzes and final exam.

Homework Assignments (H/A): H/A as well as their solutions will be posted at my homepage. Usually you will have H/A each week and they will be due 17:00 on Wednesdays. H/A should be placed in the appropriate slots in the assignments box on the third floor of CAB by 5:00 pm Wednesday. Please note, late assignments will not be accepted. Your assignments will be returned to you in class as soon as possible after grading. If you don't understand or agree with the grading for a particular problem, please check the posted solutions. After checking the solutions, if you still think that an error was made in the grading, please see me. There will be a total of 11 assignments for the term. Your assignment grade will be based on your best 9 out of 11. During lectures you will also be given many exercises (drill problems). I strongly recommend that you do all of them. The quiz problems will be very similar to the drill problems and H/A.

Dates:

First Class: Jan. 6;
Quizzes: Jan. 21, Feb. 4 and 25, Mar. 11 and 25, Apr. 8;
No classes: Feb. 15–19 (reading week), Apr. 2, and 5;
Last class: Apr. 12; Final exam: Apr. 20; Deferred exam: May 8.

University regulations:

1. Recording of lectures is permitted only with the prior written consent of the professor or if recording is part of an approved accommodation plan.

2. Policy about course outlines can be found in Section 23.4(2) of the University Calendar. The University of Alberta is committed to the highest standards of academic integrity and honesty. Students are expected to be familiar with these standards regarding academic honesty and to uphold the policies of the University in this respect. Students are particularly urged to familiarize themselves with the provisions of the Code of Student Behaviour (online at *www.ualberta.ca/secretariat/appeals.htm*) and avoid any behaviour which could potentially result in suspicions of cheating, plagiarism, misrepresentation of facts and/or participation in an offence. Academic dishonesty is a serious offence and can result in suspension or expulsion from the University.