

McGill University. Department of Mathematics and Statistics
COURSE OUTLINE: MATH 133 - Linear Algebra and Geometry

This course will use the Lyryx system which is an online learning and assessment tool. Any student registered in this course **must** sign up for the Lyryx system. When registering for the Lyryx system, it is compulsory to use one's **student ID**. Details on the registration process will be posted on Mycourses and placed in the same folder as the outline.

Textbooks:

1. **Required Text:** "A First Course in Linear Algebra" By Ken Kuttler, Customized Edition. This textbook is available to you, once you have subscribed to the Lyryx system.
2. **Optional Text:** "Elementary Linear Algebra, Second Edition", by W. K. Nicholson, ISBN: 0-07-091142-8, McGraw-Hill, 2004 (paperback)

Topics to be covered:

Vector Geometry, Systems of Linear Equations, **Reduced Echelon Form**, Matrix Algebra, Subspaces of R^n , Linear Transformations, Determinants, Eigenvalues, Eigenvectors and Diagonalization.

Labs:

Labs will be posted on the Lyryx system throughout the semester. It is your responsibility to complete them by the due date.

Quizzes:

Online Quizzes will be given through the Lyryx system. Quizzes will be announced using the News / Announcements module on Mycourses.

Mark scheme:

The final grade for the course is a letter grade based on the formula

$$0.15 * l + 0.15 * q + 0.70 * f$$

where l, q and f are percentage marks for the labs average, quizzes average, and final examination respectively. Note that there is no 100% final option in this course.

Additional resources:

The webwork system can be used for practice. There is a link to the webwork system on the Mycourses.

Right to submit in English or French written work that is to be graded:

In accord with McGill University's Charter of Students' Rights, students in this course have the right to submit in English or in French any written work that is to be graded.

In the event of extraordinary circumstances beyond the University's control, the content and/or evaluation scheme in this course is subject to change.

Academic integrity: McGill University values academic integrity. Therefore all students must understand the meaning and consequences of cheating, plagiarism and other academic offenses under the code of student conduct and disciplinary procedures (see www.mcgill.ca/integrity for more information).

L'université McGill attache une haute importance à l'honnêteté académique. Il incombe par conséquent à tous les étudiants de comprendre ce que l'on entend par tricherie, plagiat et autres infractions académiques, ainsi que les conséquences que peuvent avoir de telles actions selon le code de conduite de l'étudiant et des procédures disciplinaires (pour de plus amples renseignements, veuillez consulter le site <http://www.mcgill.ca/integrity>)

Assignment Plagiarism: Assignments must be done individually. You may not copy another person's work. Furthermore, you must not give a copy of your work to another student.

Supplemental work: No additional work will be given in order to upgrade a final mark. Students with final grade of D or F have the right to apply to take a supplemental exam.

Calculators and Machine Scoring: No Calculators will be allowed during the quizzes and the final examination. Note also that the exam may be part multiple choice and machine scored.

September 2016.