|  |
| --- |
| YORK UNIVERSITY |
| **School of Administrative Studies** |
| AP/ADMS 3330 3.0 – Section G Quantitative Methods II |
| Day: Thursday Time: 7:00 – 10:00pm Location: ACE 003 |
| Instructor: Mohafiqul Kader Email: mkader@yorku.ca |
| Office hours: Thursdays 5:30 – 6:30pmCourse web site on Moodle: <https://moodle.yorku.ca> |

**Course Description:**

This course continues with a case-oriented approach to quantitative business analysis and research methodologies. Statistical techniques, operations research techniques such as linear programming and modeling, metric and non-metric data analysis are amongst the techniques used.

**Prerequisite:** AP/ADMS 2320 3.00. Course credit exclusion: AP/ADMS 3330 3.00. PRIOR TO FALL 2009: Prerequisite: AK/ADMS 2320 3.00 or AK/ADMS 3320 3.00 (prior to Summer 2005). Course credit exclusion: AK/ADMS 3330 3.00

**Required Textbook:**

1. Keller, G., STATISTICS FOR MANAGEMENT AND ECONOMICS, 11th Ed., South-Western Cengage Learning ©. Note that, earlier editions are NOT supported. (This is your QM I textbook you used for 2320.)
2. Quantitative Methods for Business: ADMS 3330. Second Custom Edition, York University Bookstore. This is an abridged version of the original text of Anderson et. al., QUANTITATIVE METHODS FOR BUSINESS, **12th Ed**, South Western Publishing Co. 2013. (Note that Edition 1 of the Custom package that is based on the 10th ed. of the above textbook is NOT supported.)

**Marking Scheme:**

|  |  |
| --- | --- |
| Test - I | 25% |
| Test - II | 25% |
| Attendance | 5 % |
| Final Exam | 45% |
| Total | 100 % |

**Attendance**

1. From eleven lecture sessions, six sessions will be randomly picked for attendance.
2. Among those six Attendance five will be counted towards 5% worth (1% each). For example, if you signed for attendance in four randomly picked sessions and missed two, you will achieve 4% out 5% for the attendance.
3. There is no alternative for the attendance.
4. Attendances can be taken any time during the selected lecture session. Attendance can be taken twice in one lecture as well. *During Attendance you are not allowed to leave the room even if you signed the sheet, unless the class is completed.*
5. You might need to show your photo ID, if asked.
6. Once attendance is completed during the selected lecture session, no name will be added further.

**Term Tests/ Final Exam**

1. Students are NOT allowed to bring a reference/formula sheet. **Formula sheets will be provided by the instructors.**
2. Students **MUST** write tests and the final exam in the section they are registered in.
3. Students **MUST** mark their student numbers on the scantron sheet properly.
4. There are two common term tests counting for 25% each towards the overall grade.
5. Both term tests and the final examination may consist of multiple-choice questions and worded questions.
6. If you miss a term test, the weight of one and only one missed test (25%) will be automatically (no documents such as doctor notes needed) transferred to the final examination. If you miss both term tests, your final examination will only weigh 70%.
7. The final examination will be comprehensive if you miss any one or both term tests. That is, if you miss one term test, or both you will be writing a final exam that includes material from the entire semester.
8. Do not write a test/exam if you do not feel well. Once you write a test/exam, the mark you receive will be used.

**General Policy**

1. **You are not allowed to take pictures or record any content of the lecture.**
2. Concerns regarding marks **will not be accepted after a week** from the releasing of the marks/result not from collecting the work.
3. You are only allowed to attend lectures in which you are enrolled.
4. In case of a fire alarm, students are to get up instantly, collect their personal belongings and leave the building. (They should not wait until a Professor or an invigilator tells them to do so.)
5. Students will not be allowed to write the term tests, or the final exam, unless they are on the class list / sign in sheet. There will be no exceptions. It is the student’s responsibility to ensure that they are properly enrolled.
6. If you must miss a class, it is suggested that you try to obtain any missed notes from a classmate. NOT all class material will be available online. Please note that you are responsible for everything discussed in class (whether mentioned/included in the textbook or not).
7. Due to unavoidable circumstances if any lecture missed, date for make-up lecture will be announced on course web site.
8. In this course marked term tests are returned to the students, it is your duty to collect. After final exam is over, work will not be available. I usually bring marked material for only two weeks, if you didn’t collect and want to collect you need to send me email with your details and I will bring in next meeting.

**Course Outline:**

The following tentative course outline (all inclusive) is subject to "in class" changes as considered necessary by the Course Director.

|  |  |  |  |
| --- | --- | --- | --- |
| **Lecture** | **Date** | **Topic** | **Readings** |
| 1 | Sep 5 | Simple Linear Regression | Keller, Ch. 16 |
| 2 | Sep 12 | Multiple Regression  | Keller, Ch. 17 |
|   |   | ***(Omit 17.4 - Regression Diagnostics III)*** |   |
| 3 | Sep 19 | Model Building | Keller, Ch. 18 |
|   |   | ***(Omit 18.4 - Stepwise Regression)*** |   |
| 4 | Sep 26 | Forecasting | ASW, Ch. 6 |
| 5 | Oct 3 | Decision Analysis | ASW, Ch. 4 |
|  | Oct 6**SUNDAY** | **Term Test I at 2:00pm-3:30pm** (Location: TBA on Course Website) | Covers **Lectures** 1, 2 & 3 |
| 6 | Oct 10 | Project Scheduling: PERT/CPM***(Omit 13.3 – Considering time-cost trade-offs)*** | ASW, Ch. 13 |
|  | Oct 17 | READING WEEK |  |
| 7 | Oct 24 | Linear Programming (LP) - Graphical Method | ASW, Ch. 7 |
| 8 | Oct 31 | LP Computer Solutions, Sensitivity Analysis*LP Formulation* ***(Omit 9.5 - DEA Analysis)*** | ASW, Ch. 8ASW, Ch. 9 |
|  | Nov 3**SUNDAY** | **Term Test 2 at 2:00pm-3:30pm** (Location: TBA on Course Website) | Covers **Lectures** 4, 5 & 6 |
| 9 | Nov 7 | Network Models***(Omit 10.4 – Max Flow Problem)*** | ASW, Ch. 10 |
| 10 | Nov 14 | Integer Linear Programming | ASW, Ch. 11 |
| 11 | Nov 21 | Simulation | ASW, Ch. 16 |
|  | **Common Final Examination** **(Date, time & location to be announced on registrar/university website) (Dec 5-20)** | Covers **Lectures**7,8,9,10& 11 |

**NOTE:**

**Tutorials:** Information will be posted on the course website**.**

**RELEVANT UNIVERSITY REGULATIONS**

**For Relevant University, Faculty and School regulations please check:**

[**http://sas.laps.yorku.ca/students/**](http://sas.laps.yorku.ca/students/)

**NOTE:  To clarify the deferred standing final exam coverage, the deferred examination will be cumulative and cover all material for the semester.  This applies to all students writing a deferred Final Exam including those who wrote both Test 1 and Test 2.**