Course description: Econometrics uses data to analyze economic questions. The objective of this course is to familiarize students with basic methods of econometrics and with the mechanics of writing a research paper that uses these methods. We will learn how to describe and compare economic variables and how to examine relationships among them. This course is a key part of the economics major. It will enable students to understand quantitative analyses which are used in upper level courses, and to perform such analyses on their own.

Prerequisites: The formal prerequisite is Eco 101, Introduction to Economics. Informal prerequisites include a strong interest in applied economics and enthusiasm to work with economic data. Computer work will be part of the course, but no previous training in computers is expected.

Readings: We will use Introduction to Econometrics, Brief Edition by Stock and Watson. I encourage you to buy the books but will also place two copies on a 2-hour reserve in the library. You will definitely need Economical Writing by McCloskey.

Course requirements:
1. Online Quizzes There will be an online quiz prior to each class. You will have to complete the quiz by 1am on the day of our class. You may NOT collaborate with others on the quiz. It must be only your work that is reflected in the quiz.

2. Midterm There will be two midterm exams. The midterms will be open book and open note.

3. Research paper The research paper should be an original empirical analysis of an economic topic. You may choose any topic that interests you. In the paper you should utilize the statistical and econometric techniques that we will learn in this course. A substantial part of your work will involve finding and preparing data for your analysis. You should plan to see me before you start writing. I can help you to formulate your research question and point you to a source of data. You can also look at a sample paper and a list of important data sources available on Nexus. The paper will be written in the following stages:

   a. Interesting empirical work, 1% of your grade, due end of week 3. Identify two or more academic papers, magazine/newspaper articles or blog posts that use data. Explain why you found those papers/articles/posts interesting.

   b. Data, 2% of your grade, due end of week 6. Describe the potential data sources for your project. Include the description of variables that you would like to use. If you already have the data, calculate the descriptive statistics of your variables.

   c. Proposal, 5% of your grade, due end of week 8. The proposal should include the following: What is the question you are asking? What is the hypothesis you want to test? Why is your question interesting or important to others? How is your paper related to existing work? What data will you use? What are the variables and their descriptions? How are you planning to answer your question, i.e. what is the methodology you propose?

   d. Rough Draft, 10% of your grade, due end of week 10. In addition to the information contained in your proposal, your rough draft should include the empirical analysis,
interpretation of your results, and your conclusion. Do not underestimate the importance of good writing. Use the Writing Center and *Economical Writing* to help you organize your ideas clearly and concisely. Revise, be original and write an engaging paper.

e. **Final Paper.** 12% of your grade, due end of exams.

4. **Attendance** Participating in class discussion is an important component of the course. The material in this course is cumulative. This means that each topic builds on the previous one. I will keep attendance and will subtract one point for each unexcused absence.

5. **Professional code of conduct** I ask that you arrive five minutes early so that you are prepared to start the class on time. Late arrivals and wandering in and out of the classroom disrupt the learning of other students and therefore are not acceptable. I also ask that you do not use your laptops or cellphones during class.

The final course grade will be determined according to the following table:

<table>
<thead>
<tr>
<th>Course Component</th>
<th>Weight</th>
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</thead>
<tbody>
<tr>
<td>Midterm I (February 3)</td>
<td>30%</td>
</tr>
<tr>
<td>Midterm II (March 9)</td>
<td>30%</td>
</tr>
<tr>
<td>Quizzes (prior to every class)</td>
<td>10%</td>
</tr>
<tr>
<td>Research Paper Process</td>
<td>15%</td>
</tr>
<tr>
<td>Research Paper Product (due end of exams)</td>
<td>15%</td>
</tr>
</tbody>
</table>

A score of 95 and above is an A, 90-94 A-, 87-89 B+, 83-86 B, 80-82 B-, 77-79 C+, 73-76 C, 70-72 C-, 65-69 D, 64 or below is an F.

It is the policy of Union College to make reasonable accommodations for qualified individuals with disabilities. If you are a person with a disability and wish to request accommodations to complete your course requirements, please make an appointment with me as soon as possible to discuss your request. All discussions will remain confidential.

Union College recognizes the need to create an environment of mutual trust as part of its educational mission. Responsible participation in an academic community requires respect for and acknowledgement of the thoughts and work of others, whether expressed in the present or in some distant time and place.

Matriculation at the College is taken to signify implicit agreement with the Academic Honor Code, available at honorcode.union.edu. It is each student's responsibility to ensure that submitted work is his or her own and does not involve any form of academic misconduct. Students are expected to ask their course instructors for clarification regarding, but not limited to, collaboration, citations, and plagiarism. Ignorance is not an excuse for breaching academic integrity.