

Economics 102
Intermediate Macroeconomics
FALL 2005

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Time and Location: Monday, Wednesday and Friday, 1pm-2pm ,ANNS111

Final Exam: December 16th, noon to 2pm.

Office Hours: Tuesday 5:00 - 6:00 p.m.

Textbooks:

- *Macroeconomics, an Integrated Approach*, by Auerbach and Kotlikoff (AK). MIT Press
- *Economic Growth*, by Chad Jones

Useful Books:

- Varian: Intermediate Microeconomics

Pre-requisite Courses

There are two requirement you must have previously fulfilled in order to remain in the course: you need passing grades or better in

- Econ 101 or equivalent
- Multi-variable calculus

Everyone who is currently registered for the course but does not meet this requirement will be automatically unregistered from the course in the next two weeks. I am not willing to make exceptions to this rule; it would be pointless for students without this background to suffer through the course.

Course Content

This is an introduction to modern macroeconomics. How does this differ from what you studied in Econ 2? Whereas traditional macroeconomics is based on assumptions about aggregates, such as the Aggregate Supply curve or the Investment-Savings curve, modern macro starts deeper down, with assumptions about how individual households behave, and then builds up a theory of the aggregate economy by adding together (aggregating) the decisions of the individual households. This means that modern macro is a lot more like microeconomics (Econ 101); although macro addresses questions similar to those of Econ 2, the basic method consists of solving optimization problems of households and firms.

The reason that we are using the AK book is that it is the only macro textbook for undergraduates that faithfully reflects the concern of modern macro economists with the lifecycle of the household; people work when young and save so that they can consume more when old and retired. We will be able to use this approach, known as the "overlapping generations model" (OLG) not only to incorporate people's concerns for the future into the model economy but also to compare economies with different age distributions. This lets us deal with questions concerning the aging of the US population, or the difference between the industrial economies and those of less developed countries, which tend to have a much higher share of young people in their population.

The order of topics will follow closely that of the AK book. So why should you bother with classes at all, why not just read the book? First, the book tends to restrict the mathematical discussion to the simplest possible examples, the lectures will extend the discussion in the book to problems that are more realistic. Second, it is important to contrast the discussion of the book with what one would learn from a more traditional approach. The best example of this is the social security policy debate; the analysis in the book asks how different policies affect long-term levels of income per worker. In lecture we will contrast this with the case where income per worker is fixed, as is assumed in less sophisticated arguments. However the

discussion in the book is restricted to the case where workers only consume when old; we will extend the analysis to a more realistic model where workers consume throughout their life. Finally, one disadvantage of the approach in the book, from the point of view of the average undergrad, is that the mathematical symbols (subscripts and superscripts, etc) can be hard to follow. In lectures, we do the math and talk it through at the same time, so it will be more accessible to students without a lot of mathematical background.

Outline

Lectures	Week Beginning	Theme	Main Reading
1-2	Sept. 7	Outputs, Inputs and Growth	AK Ch.1, Jones Ch. 1
3-5	Sept.12	The Solow Model	Jones ch. 2
6-7	Sept. 19	Input Supply: The OLG model	AK Ch 2.
***	Sept. 23d	Test 1	
8-10	Sept. 26th	The Evolution of Output	AK Ch. 3
11-13	Oct. 3d	Fiscal Policy, Saving and Growth	AK Ch. 6
14-16	Oct. 10th	Growth with Technical Progress	Jones Ch. 3
17-20	Oct. 19th/24th	Economic Fluctuations	AK Ch. 4-5
***	Oct. 28th	Test 2	***
20-22	Oct. 31st	Money and Prices	AK Ch. 7
23-25	Nov. 7th	The Keynesian Model	AK Ch. 8
26-28	Nov. 14th	Recessions	AK Ch. 9
29-30	Nov. 21st	Unemployment	AK Ch. 10
31-32	Nov. 28th	Stabilization Policy	AK Ch. 11
***	Dec. 2nd	Test 3	***
33-35	Dec. 6th	Saving in an Open Economy	AK Ch. 13
***	Dec. 16th	Final Exam	***

Grading

There will be 3 tests and a final exam. Each test will count for 20% of the grade, and the final exam will count for 40%. The idea is that it is easier and more enjoyable to stay on top of the material rather than take notes that only make sense much later. The tests will focus on solving the types of problems we do in class; however they will ask you to do this in the context of a discussion of macroeconomic policy.