

Course Syllabus

Monetary Economics (440.610)
Masters in Applied Economics Program
Johns Hopkins University

Fall Semester, 2007
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Thursday 6:00 – 8:45

1. General Course Objective:

This course is designed as a survey of the basic theories in monetary economics for master level students. The main objective of the course is to help students understand the core aspects of monetary economy: how monetary phenomena and policies are determined, and how they interact with the rest of the macro economy. For that purpose, several key theoretical frameworks will be constructed, and various monetary economic phenomena including monetary policy actions will be analyzed within such frameworks. Major schools of thought in monetary economics, and their differences, which give rise to different policy implications, will also be discussed within those theoretical frameworks along with the empirical evidence.

Among the topics to be covered include: money demand and money supply, inflation and optimal quantity of money, monetary policy transmission mechanism, the term structure of interest rates, strategy of monetary policy and optimal monetary policy, time inconsistency problem in monetary policy, monetary policy targets and rules. For each topic covered, a core body of theories, issues, and evidence will be presented and discussed.

2. Readings:

2-A) Textbook Sources:

Walsh, Carl, *Monetary Theory and Policy*, 2nd edition, MIT Press, 2003*:

Lectures will primarily follow Walsh's book in terms of the topics covered and their orderings. The book does an excellent job in presenting many of the highly relevant and exciting results from the recent research with an appropriate balance of theory and evidence, and plenty of insights.

However, the book is written essentially for Ph.D. level students and courses in mind, and it could be considered a little too rigorous for this class. Nonetheless, the book is still fairly accessible in most parts, particularly to the students with a good undergraduate level macroeconomics and calculus background as well as some basic econometrics and

statistics knowledge. You should not be afraid of the lengthy mathematical derivations you may run into here and there in the book. You will be neither asked nor expected to follow all the technical details in the book. Focus will be **on a few key steps in the derivation of results and, more importantly, intuition behind them, not the detailed mathematical derivations themselves**. Mathematical derivations and expressions will, in general, be discussed only to the extent they help you organize thoughts, analyze problem, and solidify understandings.

Cochrane, John, *Time Series for Macroeconomics and Finance**, 2005, can be downloaded at http://faculty.chicagosb.edu/john.cochrane/research/Papers/time_series_book.pdf.

Basic knowledge of econometrics and, in particular, **time series analysis** is very helpful for reading and understanding monetary economics literature in general. Since most of you may not be familiar with time series analysis, we will go through some fundamental concepts and models in time series using John Cochrane's lecture notes. We will spend about 15-20 minutes on this at the end of each regular class.

2-B) Other Books for Reading Assignments and Supplementary References:

Blinder, Alan, *Central Banking in Theory and Practice*, MIT Press, 1998*.

Meyer, Laurence, *A Term at the Fed: An Insider's View*, Harper Collins, 2004.

Tuckman, Bruce, *Fixed Income Securities: Tools for Today's Markets*, John Wiley & Sons, Inc., 2nd Edition, 2002.

Enders, Walter, *Applied Econometrics Time Series*, John Wiley & Sons, Inc., 2nd Edition, 2004.

2-C) Articles:

Numerous articles from the FED publications, academic journals, and financial newspapers and magazines such as *WSJ* and *Economist* will also be assigned.

2-D) Background Readings

Any Intermediate Macroeconomic Textbook such as

Abel, Andrew, and Ben Bernanke, *Macroeconomics*, 5th edition, Addison Wesley, 2003.

Froyen, Richard, *Macroeconomics: Theories and Policies*, 8th edition, Prentice Hall, 2005.

Mankiw, Gregory, *Macroeconomics*, 5th edition, Worth, 2003.

Graduate Macroeconomic Textbook:

Romer, David, *Advanced Macroeconomics*, 3rd edition, McGraw-Hill.

* : Required

3. Exams and Other Assignments:

There will be two mid-terms (each 25%) and the final (40%). The final is comprehensive. Other assignments will account for the rest.

4. Tentative Course Outline (The detailed reading list could change somewhat.)

I. Introduction and Overview

Walsh: Introduction and Chapter 1*.

Bernanke, Benjamin (2007), *Globalization and Monetary Policy, Remarks at the Fourth Economic Summit, Stanford Institute for Economic Policy Research.*

Mishkin, Frederic (2007), *Inflation Dynamics*, NBER WP #13147.

_____ (2006), *Monetary Policy Strategy: How Did We Get Here?*, NBER WP #12515.

II. Money in the Long Run and General Equilibrium Models of Monetary Economy

Walsh, Chapter 2* and 4*.

Background Readings:

Mankiw: Chapter 7-8, Chapter 3-4.

Froyen: Chapter 3-5.

III. Money in the Short Run: Short Run Models and Monetary Policy Transmission Mechanism

Walsh, Chapter 5*, Chapter 7*, and Chapter 1*

Background Readings:

Attfield, C.L.F., D. Demery, and N.W. Duck, *Rational Expectations in Macroeconomics*, 2nd edition, Oxford: Blackwell, 1991.

Mankiw: Chapter 10, 11, 13, 19-2.

Froyen: Chapter 6-13.

Other Readings:

Bernanke, Benjamin (2003), *Remarks at the Federal Reserve Bank of Dallas Conference on the Legacy of Milton and Rose Friedman's Free to Choose*, Dallas, Texas*.

_____ (2004), *The Great Moderation** .

_____ (2007), *The Financial Accelerator and the Credit Channel**.

_____, and Mark Gertler (1995), *Inside the Black Box: The Credit Channel of Monetary Policy Transmission*, NBER WP #5146*.

Ball, Laurence, and Gregory Mankiw (2002), *The NAIRU in Theory and Practice*, NBER WP #8940*.

Economist, *Survey on the World Economy*, October 20th, 2007*.

Mankiw, N.G. (2000), *The Inexorable and Mysterious Tradeoff Between Inflation and Unemployment*, NBER WP #7884*.

_____ (2006), *The Macroeconomist as Scientist and Engineer*, NBER WP #12349*.

Taylor, John (1993), *Discretion versus Policy Rules in Practice*, *Carnegie-Rochester Conference Series on Public Policy*, v. 39, 1993, pp. 195–214*.

Judd, John, and Glenn Rudebusch (1998), *Taylor's Rule and the Fed: 1970-1997*, FRBSF Economic Review, 1998 Number 3*.

Hetzl, Robert L., *The Taylor Rule: Is It a Useful Guide for Understanding Monetary Policy?*, Federal Reserve Bank of Richmond *Economic Quarterly*, v. 86, n. 2, pp. 1–33, Spring 2000.

Clarida, R., J. Gali, and M. Gertler (1999), *The Science of Monetary Policy: A New Keynesian Perspective*, *Journal of Economic Literature*, 37, 1661-1707.

King, Robert (2000), *The New IS-LM Model: Language, Logic, and Limits*, Federal Reserve Bank of Richmond *Economic Quarterly*, v. 86, n. 3, Summer 2000.

Nelson, Edward (2003), *Money and the Transmission Mechanism in the Optimizing IS-LM Specification*, Federal Reserve Bank of St. Louis Working Paper 2003-019A, August 2003.

Stock, James H. and Mark Watson (2001), *Vector Autoregression*, The Journal of Economic Perspectives, Vol. 15, No. 4, Fall 2001, 101-115.

Zha, Tao, "Identifying Monetary Policy: A Primer," Federal Reserve Bank of Atlanta *Economic Review*, v. 82, n. 2, Second Quarter 1997, pp. 26–43.

Cecchetti, Stephen, Peter Hooper, Bruce Kasman, Kermit Schoenholtz, and Mark Watson (2007), *Understanding the Evolving Inflation Process*, NBER WP #2007.

IV. Money and the Open Economy():**

Walsh: Chapter 6

Background Readings:

Mankiw: Chapter 12.

Froyen: Chapter 16.

V. Topics in Monetary Policy

a) Monetary Policy Operating Procedures and Policy Instrument Choice

Walsh: Chapter 9*

Background Readings:

Mankiw: Chapter 18

Froyen: Chapter 17-18

Other Recommended Readings:

Bernanke, Ben, S. (2005), *Implementing Monetary Policy*, FRB, March 30, 2005*

Bernanke, Ben, S. (2004), *The Logic of Monetary Policy*, FRB, December 2, 2004*

Blinder, Alan (1998), *Central Banking in Theory and Practice*, MIT Press, 1998*.

Poole, William. (1970), *Optimal Choice of Monetary Policy Instruments in a Simple Stochastic Macro Model*, The Quarterly Journal of Economics, v. 84, n. 2. pp. 197–216, May, 1970.

b) Interest Rates and Monetary Policy: The Term Structure of Interest Rates.

Walsh: 10.3*

Other Recommended Readings:

Bernanke, Ben S. (2005), *The Global Saving Glut and the U.S. Current Account Deficit.*, Federal Reserve Bank of St. Louis. April 14; Federal Reserve Bank of St. Louis Review *

_____ (2006), *Reflections on the Yield Curve and Monetary Policy*, FRB, March 20, 2006*

Estrella, Arturo (2005), *The Yield Curve as a Leading Indicator: Frequently Asked Questions*, Federal Reserve Bank of New York, 2005*.

Ilmanen, Antti, *Understanding the Yield Curve*, Citibank*

Tuckman, Bruce, *Fixed Income Securities: Tools for Today's Markets*, 2nd edition, Wiley, John & Sons, 2002.

Poole, William (2005), *Understanding the Term Structure of Interest Rates*, Federal Reserve Bank of St. Louis, Speech made on June 15, 2005.

Campbell, John Y., Andrew Lo, and A. Craig Mackinlay (1997), *The Econometrics of Financial Markets*: Chapter 10 (and 11), Princeton University Press, 1997.

Shiller, Robert (1990), *The Term Structure of Interest Rates*, in B. Friedman and F. Hahn (eds.), *Handbook of Monetary Economics*, North Holland, 1990.

c) Rules versus Discretion: Time Inconsistency Problem

Walsh: Chapter 8*

Background Readings:

Mankiw: Chapter 14

Froyen: Chapter 18

Other Recommended Readings:

Blinder, Alan, *Central Banking in Theory and Practice*, MIT Press, 1998*.

Richard Dennis (2003), *Time-Inconsistent Monetary Policies: Recent Research*, Federal Reserve Bank of San Francisco *Economic Letter* 2003-10, April 11, 2003.

d) Optimal Monetary Policy Rules: Inflation Targeting and Taylor Rule

Walsh: Chapter 11.

Background Readings:

Mankiw: Chapter 14

Froyen: Chapter 18

Mishkin: Chapter 18, 21

Other Recommended Readings:

Bernanke, Ben and Frederic Mishkin (1997), *Inflation Targeting: A New Framework for Monetary Policy*, NBER WP #5893*.

Bernanke, Ben (2003), *Constrained Discretion and Monetary Policy*, FRB, Remarks before the Money Marketeers of New York University, Feb 2003*.

Gramlich, Edward (2000), *Inflation Targeting, Speech delivered before the Charlotte Economics Club*, FRB, January 2000.

Meyer, Laurence (2001), *Inflation Targets and Inflation Targeting*, Economic Review, Federal Reserve Bank of St. Louis, November/December 2001

Blinder, Alan, *Central Banking in Theory and Practice*, MIT Press, 1998*

Clarida, R., J. Gali, and M. Gertler (1999), "The Science of Monetary Policy: A New Keynesian Perspective", **Journal of Economic Literature**, 37, 1661-1707.

John B. Taylor (1993), *Discretion versus Policy Rules in Practice*, Carnegie-Rochester Conference Series on Public Policy, v. 39, 1993, pp. 195–214*.

e) Monetary policy, Asset prices, and Financial Market.

Ben S. Bernanke (2002), *Asset-Price Bubbles and Monetary Policy*, FRB, Remarks before the New York Chapter of the National Association for Business Economics, New York, New York; October 15, 2002*.

Frederic S. Mishkin (2001), *The Transmission Mechanism and the Role of Asset Prices in Monetary Policy*, NBER Working Paper #8617, 2001*

Cecchetti, Stephen G., Han Genberg, John Lipsky, Sushil Wadhvani (2000), *Asset Prices and Central Bank Policy* (Part 1), Geneva Reports on World Economy 2, CEPR, 2000.

Gertler, Mark, Marvin Goodfriend, Otmar Issing, and Luigi Spaventa (1998), *Asset Prices and Monetary Policy: Four Views*, BIS and CEPR, 1998.