The global financial crisis of 2007-2009 was the most severe since the Great Depression. Understanding this crisis and the responses of central banks and other authorities will help business decision-makers and investors assess financial opportunities and risks in normal times. This course is an MBA elective that examines lessons from the crisis as viewed by a market practitioner.

Several broad questions will be addressed over the semester:

- Why was the crisis so deep, broad and prolonged? What were the sources of market failure? How do we assess financial conditions in a crisis? How do we distinguish between liquidity and solvency threats?
- What are the textbook responses to financial crises? Is there a conflict between the goals of financial stability and economic stabilization?
- How well did central bank policy function? How did the crisis affect policy transmission? Can central banks be effective when policy rates hit zero?
- What role has fiscal policy played in the crisis response?
- How will this crisis alter the financial system and its oversight? How will those changes affect the evolution of business and the economy?

International comparisons during the current crisis will be used to illuminate these key issues. Comparison and contrast with past crises and policy actions also will play an important role. Practical challenges from the experience of market participants will be highlighted and examined. Along the way, key concepts like information asymmetries and asset bubbles will be explored. The course will be conducted using a combination of lecture, discussion, and case analysis. The teaching style will be socratic, so active class participation will be key.

The class also will have at least two special discussion sessions with outside participants: (1) former Treasury Secretary Robert Rubin will address the relationship between the fiscal and monetary authorities; and (2) Dr. Henry Kaufman will examine the evolution of market risk-taking.

Schedule. B30.2343 meets on Thursdays beginning September 23 from 6pm to 9pm. Professor Schoenholtz can be reached by email at kermit.schoenholtz@stern.nyu.edu. Fixed hours will be on Thursdays between 5:00pm and 6:00pm, and appointments can be arranged by email on other occasions.

Prior to the course, students are advised to have read the policy chapters of a textbook on money and banking to understand the traditional functions and operating mechanisms of central banks. One such textbook (on reserve at Bobst Library) is Stephen G. Cecchetti, *Money, Banking and Financial Markets* (ISBN 0073523097), in which the relevant chapters are 15-18, 21 and 22. Web enrichment modules for this textbook that treat aspects of the financial crisis are posted in the Course Documents section on Blackboard.

Required readings appear below and (aside from the readings in AR) will be included in the reading packet distributed at the first class. Required readings should be completed before class, including those for the first session.

Supplementary readings are not included in the reading packet. Supplementary readings address topics that I may discuss in class and provide additional background for interested students. Blackboard Course Documents includes a file with the websites for most supplementary readings. Supplementary readings that are not available on the web will be posted as separate pdf files under Course Documents.

Questions for class discussions and written assignments will be posted on the Blackboard course site, so check the site ahead of class. Students should be prepared to participate in each class. Written assignments should be submitted via Blackboard.

Students are expected to keep abreast of developments in and policy responses to the global crisis, using resources like Bloomberg, the Financial Times, and the WSJ.

Requirements and grades. Students should have completed a course (or be able to demonstrate proficiency) in macroeconomics. Course grades will be based on the following:

- Four take-home assignments. The first three assignments will call for a two-page memo to a portfolio/liability manager anticipating a policy development and its implications or to a policymaker providing and justifying advice on a policy matter. At the end of the course, students also will write a short take-home final essay (five to ten pages) that addresses a critical issue from the class. Specific topics and instructions will be provided via Blackboard. Students will have two weeks for each assignment. Answers are to be completed individually (i.e. no teamwork) and submitted by Blackboard.

- Attendance and class participation (including exceptional contributions on the discussion board).
**Honor Code.** At Stern we believe that honesty and integrity are necessary for a rewarding educational experience. These qualities form the basis for the trust among members of the community (students, faculty, and administrators) that is essential for educational excellence. The Honor Code was instituted several years ago by students, and requires each student to act with integrity in all academic activities and to hold his or her peers to the same standard. In this course, any work submitted for a grade should be your own.

We also hold ourselves to a high standard of professional behavior. Lateness, cellphones, private conversations, browsing the internet, checking your email, and any other behavior that disrupts the class will be considered inappropriate. Repeated violations of this standard will affect your grade.

**Tentative Course Schedule – Topics, Readings and Assignments**

**September 23**
1. **Origin and propagation of the financial crisis**
   - Risk mispricing: dangers of extrapolation
   - Information asymmetries: failure of delegated monitors
   - Incentive problems: private and public sources
   - Balance sheet exposure, leverage and fire sale externality
   - Systemic vulnerabilities: From Drexel and LTCM to Bear and Lehman
   - International aspects

Required readings:


**September 30**
2. **Compare and contrast: past crises and policies**
   - Long history of financial crises
   - Key financial and policy developments in the Great Depression
   - Japan’s asset bubbles: what policy did (and did not) do
     - Monetary and fiscal actions
     - Regulatory actions and zombie banks


*Assignment A distributed.*
October 7
(3) Financial conditions and monetary policy
  • Why do financial conditions matter?
  • What can a central bank do?
  • Did the Fed create the housing bubble?
  • Understanding financial conditions: the Greenspan "conundrum"


October 14
(4) Lender of last resort
  • Past liquidity crises (19th century, 1907, 1929-33)
  • Classical response: Bagehot
  • Convener of last resort – the LTCM episode
  • Automatic mechanisms: Lombard penalty window – did it work in the crisis?
  • Issues: maturity, collateral, counterparties
  • Is liquidity policy separable from conventional monetary policy?


Assignment A due.

October 21
(5) Policy rules and discretion
  • Price stability, policy predictability and rule-like behavior (Taylor rule)
  • Credibility and independence: Steadying expectations
  • Conventional policy transmission: interest rates
  • What guides such deviations?
  • Inflation vs. deflation: sources of instability
  • Does the policy target depend on the state of price developments?


Assignment B distributed.
October 28
(6) Policy at zero rates
- Managing expectations (e.g. leaving Gold Standard, policy commitments)
- Quantitative easing
- Credit easing: quasi-fiscal actions
- Cooperation with fiscal authority: promise and pitfalls
- Exit strategies – preserving independence and the role of interest payments on reserves
- Discretionary fiscal policy


Special Session: Dr. Henry Kaufman will join a class discussion on the evolution of market risk-taking. Date to be confirmed.

November 4
(7) Complexities of the policy framework
- Multiplicity of policy goals: housing, financial stability, economic stability
- Balkanization of financial stability framework and regulatory competition
  - Domestic
  - International
- Heightened information needs in a crisis
- Special case: ECB vs. multiple national fiscal/supervisory agents in euro area
- Are central banks the natural regulator?

Readings:

Assignment B due.
Assignment C distributed.
November 11
(8) Regulation
- Sources of instability: regulated and unregulated entities
- Why do we have special workout rules for financial intermediaries?
- Regulatory holes: shadow banking system
- Mispriced guarantees: GSEs, deposit insurance, systemic risks
- Compensation and incentives
- Regulatory competition: domestic and international
- Common Exposure
- Too big to resolve
- Sources of pro-cyclicality (“financial accelerator”): capital requirements, risk management (volatility, mark to market, leverage)
- Policy predictability vs. ad hoc responses
- Risks of over-regulation
- New legislative reforms
- International developments

Required reading:

November 18
(9) Costs of financial crises
- Public absorption of intermediaries’ balance sheet losses
- Fiscal sustainability
- Cyclical shortfalls
- Threats to long-run growth
- How to contain risks?


Special Session: Former Treasury Secretary Robert Rubin will join a class discussion on the relationship between the fiscal and monetary authorities. Date to be confirmed.

Assignment C due.

November 25

Thanksgiving break – no class.

Final essay topic distributed via Blackboard by Monday, November 30.
December 2
(10) Future of regulation and the financial system
   • Viral nature of financial innovation
   • What is systemic? Who should have access to the LOLR?
   • Reducing vulnerability to individual failures
   • Strengthening market mechanisms through transparency
   • Pricing systemic risks: capital, leverage and liquidity requirements
   • How to reduce pro-cyclicality
   • International developments


December 9
(11) Possible long-term economic and policy implications
   • Reduced intermediation
     o Higher equilibrium spreads
     o Lower risk-free policy rate
     o Reduced debt intensity?
   • Economic volatility: end of Great Moderation?
   • Should policymakers respond to asset bubbles apart from implications for price stability?


December 16
(12) Contemporary challenges and wrap-up
   • Topical issues of the day
   • Review

Final essay due.