

FNCE 238/738: Capital Markets

Prof. D. Musto

Course Schedule

This course covers the techniques by which firms go to the capital markets, and the economic issues that arise. As the primary source of funds is debt issuance, the course focuses primarily on the different forms of corporate debt. We analyze the bank-run risk presented by short-term debt, and the mechanisms that have evolved to defend against it. The key issues that arise with longer-term debt are why and how debt contracts constrain issuers, and the legal and strategic environment of distressed or bankrupt borrowers. We cover financing through securitization, starting with the economics of consumer credit, and we address the role of investment intermediaries such as mutual funds. We also consider how issuers bring equity to the market, both at the IPO and later on.

The course is in lecture format, with a 10-15 page note for each class (other than the class with the cases, for which there will be no note). All notes and other course material will be posted on the webCafé site. There is no textbook, but there is a bulkpack. You are advised to read the notes before class, and you are responsible for their content on the tests. The bulkpack readings are for background; you are responsible for their content only to the extent that we discuss it in class. You are generally responsible for the material we discuss in class, whether or not it appears in the notes or other readings.

The assignments to be handed in, on the indicated dates, are

- 6 homeworks; the top 5 of the 6 will count toward your grade
- 3 case write-ups

There are six quizzes, on Wednesdays before Spring Break and Mondays after. The quiz dates are 1/30, 2/13, 2/27, 3/14, 3/28 and 4/11. They will be in-class, taking approximately the first 30 minutes. I will count the top 5 of your 6 scores. There will be no makeups. There will be no tests other than these six quizzes, and there will be no final exam.

Homeworks are to be done individually, while the cases are to be done in groups of 3 to 6.

For the final grade, the coursework will be weighted as follows

- 70% on the top 5 of the 6 tests
- 15% on the top 5 of the 6 homeworks
- 15% on the cases

Class participation can help at the margin.

Jan 11 **Bank Runs**

Diamond and Dybvig, Bank Runs, Deposit Insurance and Liquidity (Journal of Political Economy, June 1983, p. 401-419). This is the classic and fundamental paper on bank runs. The math may be hard to follow; in class we will follow this [simpler numerical version](#).

Diamond/Dybvig Model
Suspension of Convertibility
Lender of Last Resort
Deposit Insurance
Recent policies

Jan 18 **Liquidity and Market Making**

Bagehot, The Only Game in Town, Financial Analysts Journal, Mar/Apr 1971, p12-22. This paper (which is actually by Jack Treynor; Bagehot was a 19th-century financial writer) began the literature on transactions costs, and said most of what had to be said with no math. We will formalize and extend his argument with a little math.

What do we mean by liquidity?
Market structures
Market and Limit orders
Bid/Ask spreads
Trading strategies
Payment for Order Flow

Jan 23 **Bond Basics**

Garbade, Pricing of Bonds. The quantification of bond values is different in some key ways from what we're used to in the stock market. This paper gets you up to speed on those differences.
Fabozzi, Corporate Debt Instruments. This is a primer on the basics of corporate bonds.

Treasury Bonds, Bills and Auctions
Price Quotation, Yield to Maturity
Basic Arbitrage Relationships

Jan 25 **The Repo Market**

Instruments of the Money Market, FRB of Richmond, chapters 6, 9, and 12. This collection of writings about the money market is old, but is still a good resource.
Keane, Repo Rate Patterns for New Treasury Notes. We'll discuss the role of repos in short selling. This paper explains and analyzes one of the popular motives for shorting Treasuries, and its effect on repo rates.

HOMEWORK 1 DUE

How Repos work
Repo pricing: GC and Specials
Margins
Tri-Party Repo
[Run on the Repo Market](#)
Shadow Banking System

Jan 30 **The Commercial Paper Market**

FIRST QUIZ

Pricing
Bank-run risk
Backup lines & Early exit
Recent policies

Feb 1 **Option Basics**

Put/Call Parity
One-period binomial pricing
Multiperiod binomial pricing

Feb 6 **Bonds as Options**

HOMEWORK 2 DUE

Corporate securities as options on firm value
Callable convertibles
Leverage and project choice

Feb 8 **Guest Speaker: Mark Zandi**

Feb 13 **Bond Contracting in Theory**

SECOND QUIZ

Skewed incentives of levered firms
Risk over value
Turning down +NPV
Role of bank monitoring

Feb 15 **Bond Contracting in Practice**

HOMEWORK 3 DUE

Smith and Warner, On Financial Contracting: An Analysis of Bond Covenants. *Journal of Financial Economics*, June 1979, p. 117-161. This is an old, long and very academic paper, but is the canonical reference as regards the philosophy and variety of bond covenants.

Role of bond covenants
Popular covenants and their purpose
Creditors' rights upon default and the role of the trustee
Voting to amend the indenture
144A Market

Feb 20 **Reserve Fund Case**

HAND IN CASE WRITEUP

Feb 22 **Corporate Bankruptcy**

[Here](#) is a brief chronology of bankruptcy law.

[Weiss, The Bankruptcy Code and Violations of Absolute Priority.](#) This paper documents frequent violations of absolute priority in 1980s bankruptcies, and speculates as to their cause

[Werner, Bharath & Panchapegesan, The Changing Nature of Chapter 11.](#) This documents the decline in violations since the 1980s, and also speculates as to the cause.

[Chapter 7 Liquidation](#)

- Stay of creditor claims
- Reversal of Preferences and Avoidance of Conveyances
- Absolute Priority
- Involuntary filings

[Chapter 11 Reorganization](#)

- DIP financing
 - Super priority

[Critical Vendors](#)

[Voting Rules](#)

- Exclusivity Period
 - Gerrymandering classes
 - Violations of Absolute Priority
 - Cram-downs

[Section 363 Auctions](#)

[Section 365: Rejecting, Assuming, and Reassigning Leases](#)

[Section 1113: Abrogation of Labor Contracts](#)

Creditors get at least what they would have in Chapter 7

Feb 27 **Financial Distress and Restructuring**

THIRD QUIZ

[Roe, The Voting Prohibition in Bond Workouts.](#) In *Corporate Bankruptcy: Economic and Legal Perspectives*, Cambridge Press, 1996, pp. 415-433. This is the key paper on how the law boxes firms into making exchange offers that face a potentially crippling free-rider problem.

[Fridson, "Coercive" Exchange Offers.](#) This is Marty Fridson's take on the tactical role and social value of exchange offers that address the free-rider problem by weakening covenants.

[Roe & Skeel, Assessing the Chrysler Bankruptcy.](#) This discusses the precedent set by the treatment of secured creditors in the Chrysler case.

- Buoying-up problem
- Minimum participation
- Exit consent / Coercive structures
- Prepackaged bankruptcy
- Bankruptcy Auctions (Section 363)

Feb 29 **Consumer Credit**

HOMEWORK 4 DUE

Musto, What Happens when Information Leaves a Market? Evidence from Post-Bankruptcy Consumers (*Journal of Business*, October 2004, p. 725-748). Yes, this is my own paper, which I have included to demonstrate the role of credit bureaus, credit scores and relevant laws in consumers' access to credit.

Secured borrowing – houses and cars

Unsecured borrowing – credit cards and student loans

Credit bureaus and scores

[Chapter 7](#)

Keep exempt assets, lose others, debt discharged

Attractive to lend post-bankruptcy

[On your file for 10 years; other derogatories stay for 7](#)

[Chapter 13](#)

Pay out of future income

Keep secured assets if you keep paying

Creditors get at least what they would have in Chapter 7

1st –mortgage cram-down policy debate

[Means-testing under BAPCA](#)

Recent and proposed policies and legislation

Mar 12 **Mortgage-backed securities**

Fabozzi, Modigliani, Jones and Ferri, The Mortgage Market and Mortgage-Backed Securities Market

Basic mortgage math

Pooling and tranching

Prepayment

PACs, Floaters, Inverse Floaters

Mar 14 **Asset-Backed Securities**

FOURTH QUIZ

Fabozzi, Modigliani, Jones and Ferri, Asset-Backed Securities Markets

Credit Enhancements

Servicing arrangements

Revolving / Amortizing structure

Ratings

Mar 19 **Mutual Funds and other Investment Pools**

Open-End funds

Closed-End funds

ETFs/ETNs

UCITS

Mar 21 **Southland Case**

HAND IN CASE WRITEUP

Mar 26 **Market for Corporate Control**

Management & Shareholder Proposals
Supermajority Voting
Friendly Takeovers
Hostile Takeovers: Poison Pills & Staggered Boards

Mar 28 **Effect of Financing Decisions on Prices**

FIFTH QUIZ

Myers & Majluf, Corporate financing and investment decisions when firms have information that investors do not have. *Journal of Financial Economics* 13, pp. 187-221.

Smith, Raising Capital: Theory and Evidence, in Chew, *The New Corporate Finance: Where Theory Meets Practice*, 1993, McGraw-Hill. This paper summarizes what the academic literature has found about how a firm's stock price reacts to different financing decisions it can make.

Rational inferences from the decision to sell equity
Event studies of market reactions to financing decisions

Apr 2 **Underwriting**

Ellis, Michaely and O'Hara, When the Underwriter is the Market Maker: An Examination of Trading in the IPO Aftermarket. *Journal of Finance*, June 2000, pp. 1039-74, and Aggarwal, Stabilization Activities by Underwriters after Initial Public Offerings. *Journal of Finance*, June 2000, pp. 1075-1103. These two papers are about the crucial role that after-issuance price support plays in the marketing of IPOs, and in particular in the practice of overselling offerings in the first place.

Rights offerings
Underwritten seasoned offerings
Initial Public Offerings
Overallotment / Green Shoe

Apr 4 **Class Speaker TBA (date may change)**

Apr 9 **Alternative Security Designs**

HOMEWORK 5 DUE

Preferred
Floating-Rate
Reset / Remarketed / Auction-Rate / Floating Conversion Price

Apr 11 **Credit Default Swaps**

SIXTH QUIZ

CDS Pricing (roughly) and trading

Central vs. Bilateral clearing

Settlement auctions

Sovereign CDS

Apr 16 Topic TBA

Apr 18 **Airgas Case**

HAND IN CASE WRITEUP

Apr 23 Wrap-up

HOMEWORK 6 DUE