UNIVERSITY OF ILLINOIS
COLLEGE OF BUSINESS

Finance 591               Spring 2006
Asset Pricing Theory                January 18, 2006

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Office Hours: Mondays 12:00 – 1:00 p.m. and Wednesdays 1:00 – 2:00 p.m. or by appointment.

Course Syllabus

Required:

Class note chapters in pdf file format can be downloaded at www.business.uiuc.edu/gpennacc. Revised chapters will be posted during the weekend (or earlier) prior to class.

Useful References:


Review Articles:


I. Single Period Portfolio Choice and Asset Pricing

1. Expected Utility and Risk Aversion
   “Preferences When Returns are Uncertain”
   *Journal of Economic Perspectives* 1, 121-154. JS
   “Risk Aversion and Risk Premia”
   219-232. JS
   Ingersoll, Chapter 1
   “Risk Aversion and Portfolio Choice”
   Ingersoll, Chapter 3

2. Mean-Variance Analysis
   “Assumptions on Preferences and Asset Returns”
   “The Efficient Frontier without and with a Riskless Asset”
   Ingersoll, Chapter 4
   Cochrane, Chapter 5
   “An Application of Mean Variance Analysis: Cross-Hedging”
   89, 1182-1196. JS

3. The Capital Asset Pricing Model, Arbitrage, and Linear Factor Models
   “The Capital Asset Pricing Model”
   Cochrane, Chapter 9.1
   “Abitrage and Linear Factor Models”
   Ingersoll, Chapter 7
   Cochrane, Chapter 9.4

4. Consumption-Savings Decisions and State Pricing
   Ingersoll, Chapters 2 and 8
   Cochrane, Chapters 1.1-1.4, 2, 3, and 4.1-4.2

II. Multi-Period Consumption, Portfolio Choice, and Asset Pricing

5. The Multi-Period Discrete Time Models
   “Intertemporal Consumption and Portfolio Choice: The Dynamic Programming
   Approach”
   Ingersoll Chapter 11
   Cochrane, Chapter 9.1

6. Multi-Period Market Equilibrium
   “Asset Pricing in the Multi-Period Model and the Lucas Model”
   MIT Press, p.506-12. R
   “Rational Speculative Asset Price Bubbles”
   Cochrane, Chapters 20.1 and 21.1
III. Contingent Claims Pricing

7. Basics of Derivative Pricing
   “Forward and Option Contracts”
   Ingersoll Chapter 14
   Cochrane, Chapter 17.1
   “Binominal Option Pricing”

8. Diffusion Processes and Itô’s Lemma
   Ingersoll Chapters 12 and 16
   Cochrane, Appendix

   “Black-Scholes Option Pricing”
   Cochrane, Chapter 17.2
   “An Equilibrium Term Structure Model”
   Ingersoll, Chapter 18
   Cochrane, Chapter 19
   “Option Pricing with Random Interest Rates”

10. Arbitrage, Martingales, and Pricing Kernels
    Cochrane, Chapter 1.5 and 4.3

11. Mixing Diffusion and Jump Processes
    “Valuing Contingent Claims When Asset Prices Can Jump”

IV. Asset Pricing in Continuous Time

12. Continuous Time Portfolio Choice
    “The Dynamic Programming Approach”
    Ingersoll Chapter 13
    “The Martingale Approach”

13. Equilibrium Asset Pricing
    “An Intertemporal Capital Asset Pricing Model”
    Cochrane, Chapter 9.2-9.3, 9.5
    Ingersoll Chapter 15
    “Breeden’s Consumption CAPM”
“A Cox-Intersoll, and Ross Production Economy”

14. Time-Inseparable Utility
Cochrane, Chapter 21.2 “Recursive Utility”

V. Additional Topics in Asset Pricing

15. Behavioral Finance and Asset Pricing

16. Asset Pricing with Differential Information
“Equilibrium with Private Information”
“A Noisy Rational Expectations Equilibrium”
“Asymmetric Information”

Articles marked R are on reserve under Finance 591 at the Business and Economics Library.
Articles marked JS can be downloaded from JSTOR at http://www.jstor.org/browse.

There will be an in-class mid-term examination on Wednesday, March 15. The final examination will be as scheduled during the final examination week. Homework problems will be assigned weekly and students will be randomly selected to present their answers during class. Plus and minus grades will be used.