

Financial Decisions

This course covers three areas of finance: Dynamic asset pricing models, portfolio selection and financial econometrics.

The main text of the course is

John H. Cochrane, 2001, Asset Pricing. Princeton University Press.

This book provides a good background to many of the topics we will cover, but we will also make extensive use of journal articles as well as chapters from a couple of other textbooks.

I. Fundamental Asset Pricing Models

1. The Fundamental Asset Pricing Model

Cochrane chapters 1, 2, Appendix on continuous time mathematics, p. 489-495.

2. Factor Pricing Models (CAPM, ICAPM, APT)

Cochrane chapter 9.

Balvers, R.J., Cosimano, T.F. and B. MacDonald, 1990, Predicting stock returns in an efficient market. *Journal of Finance* 45, 1109-28.

3. Term Structure of Interest Rates

Cochrane, chapter 19

Backus, D., S. Foresi and C. Telmer (1998), Discrete-time Models of Bond Pricing. NBER working paper 6736.

4. Currency Pricing

Backus, D., S. Foresi and C. Telmer, 1998, Affine Models of Currency Pricing: Accounting for the Forward Premium Anomaly. Forthcoming in *Journal of Finance*.

II. Optimal Portfolio Decisions

1. Basic Models and Techniques

Jonathan E. Ingersoll, Jr., 1987, *Theory of Financial Decision Making*. Rowman and Littlefield. Chs. 11,13.

Merton, R., 1969, Lifetime Portfolio Selection under Uncertainty: The Continuous Time Case. *Review of Economics and Statistics* 51, 247-257.

Samuelson, P., 1969, Lifetime portfolio selection by dynamic stochastic programming. *Review of Economics and Statistics* 51, 239-46.

2. Optimal Asset Allocation under Predictability of Returns

Barberis, N., 2000, Investing for the long run when returns are predictable. *Journal of Finance* 55, 225-264.

Campbell, J. and L. Viceira, 1999, Consumption and Portfolio decisions when expected returns are time varying. *Quarterly Journal of Economics* 114, 433-495.

Campbell, J. and L. Viceira, 2001, Who Should Buy Long-Term Bonds? *American Economic Review* 91, 99-127.

Guidolin, M. and A. Timmermann, 2002, Optimal Portfolio Decisions under mixtures of normal return distributions. Manuscript, UCSD.

Kandel, S. and R. Stambaugh, 1996, On the predictability of stock returns: An asset allocation perspective. *Journal of Finance* 51, 385-424.

Lynch, A., 2001, Portfolio choice and equity characteristics: Characterizing the hedging demands induced by return predictability. *Journal of Financial Economics* 62, 67-130.

III. Empirical Modeling and Testing

1. Introduction: Properties of financial time series. Nonlinearity, fat tails, volatility clustering, long-run serial correlation.

Campbell, J.Y., A.W. Lo and A.C. MacKinlay, 1997, *The Econometrics of Financial Markets*, Chs. 2,12.

2. Puzzles in Asset Pricing
Cochrane, Ch. 20, p. 387-389.

Fama, E.F., 1991, Efficient Capital Markets: II. *Journal of Finance* 46, 1575-1617.

Faust, J., 1992, When Are Variance Ratio Tests for Serial Dependence Optimal? *Econometrica* 60, 1215-1226.

Poterba, J.M. and L.H. Summers, 1988, Mean Reversion in Stock Prices: Evidence and Implications. *Journal of Financial Economics* 22, 27-60.

3. GMM tests of asset pricing models
Cochrane Chs. 10,11,14.

Hansen, L. and K. Singleton, 1982, Generalized Instrumental Variables Estimation of Nonlinear Rational Expectations Models. *Econometrica* 50, 1269-1288.

4. Model Instability: Testing, Modeling and Forecasting
Andrews, D.W.K., 1993, Tests for Parameter Instability and Structural Change with Unknown Change Point. *Econometrica* 61, 821-856.

Bai, J. and P. Perron, 1998, Estimating and Testing Linear Models with Multiple Structural Changes. *Econometrica* 66, 47-78.

Bai, J., Perron, P., 2001, Computation and Analysis of Multiple Structural Change Models. Forthcoming in *Journal of Applied Econometrics*.

Hamilton, J. *Time Series Analysis*, 1994. Princeton University Press. Chapters 13,22.

Hansen, B., 2001, The New Econometrics of Structural Change: Dating Breaks in U.S. Labor Productivity. *The Journal of Economic Perspectives* 15 (Fall), 117-128.

Pastor, L. and R. F. Stambaugh, 2001, The equity premium and structural breaks. *Journal of Finance* 56, 1207-1239.

Paye, B. and A. Timmermann, 2002, How stable are Financial Prediction Models? Evidence from US and International Stock Market Data. Mimeo, UCSD.

Perez-Quiros, G. and A. Timmermann, 2000, Firm Size and Cyclical Variations in Stock Returns. *Journal of Finance*, 1229-1262.

Pesaran, M.H. and A. Timmermann, 2002, Market Timing and Return Prediction under Model Instability. Forthcoming in *Journal of Empirical Finance*.

Pesaran, M.H. and A. Timmermann, 2002, Model Instability and Choice of Observation Window. Mimeo, UCSD.

5. Predictability of Stock Returns
Cochrane ch. 20.1, 20.3

Ait-Sahalia, Y. and M. Brandt, 2001, Variable selection for portfolio choice. *Journal of Finance* 56, 1297-1350.

Brandt, M., 1999, Estimating Portfolio and Consumption Choice: A Conditional Euler Equations Approach, *Journal of Finance* 54, 1609-1645.

Engle and Rosenberg, 2002, JFE.

Lettau, M. and S. Ludvigson, 2001, Consumption, aggregate wealth, and expected stock returns. *Journal of Finance* 56, 815-850.

Pesaran, M.H. and A. Timmermann, 1995, Predictability of Stock Returns: Robustness and Economic Significance. *Journal of Finance* 50, 1201-1228

Satchell, S. and A. Timmermann, 1995, An Assessment of the Economic Value of Non-linear Foreign Exchange Rate Forecasts. *Journal of Forecasting* 14, 477-497.

Timmermann, A. and C.W.J. Granger, 2002, Efficient Market Theory and Forecasting. Forthcoming in *International Journal of Forecasting*.

6. Extreme risks, dependencies in asset returns

Diebold, F.X., T.A. Gunther and A.S. Tay, 1998, Evaluating Density Forecasts with Applications to Financial Risk Management, *International Economic Review* 39, 863-883.

Embrechts, Paul, McNeil, Alexander and Daniel Straumann (1999) Correlation and Dependence in Risk Management: Properties and Pitfalls. Unpublished Manuscript.

Engle, R.F. and S. Manganelli, 2001, CAViaR: Conditional Value At Risk By Regression Quantiles

Gourieroux, C. and J. Jasiak, *Financial Econometrics*, Princeton University Press, 2002. Ch. 16.

Longin, F. and B., 1999, Solnik, Extreme correlation of international equity markets. *Journal of Finance*, 56, 649-676.

Perez-Quiros, G. and A. Timmermann, 2001, Business Cycle Asymmetries in Stock Returns: Evidence from Higher Order Moments and Conditional Densities. *Journal of Econometrics* vol 103, 259-306.

Soderlind, P. and L. Svensson, 1997, New Techniques to Extract Market Expectations from Financial Instruments. *Journal of Monetary Economics* 40, 383-429.

Tay, A.S. and K.F. Wallis, 2000, Density Forecasting: A Survey. *Journal of Forecasting* 19, 235-254.

7. Speculative Bubbles and Noise Trading

De Long, J.B., A. Shleifer, L.H. Summers and R.J. Waldmann, 1990, Noise Trader Risk in Financial Markets. *Journal of Political Economy* 98, 703-738.

Evans, G.W., 1991, Pitfalls in Testing for Explosive Bubbles in Asset Prices. *American Economic Review*, 81, 922-930.

Froot, K. and M. Obstfeld, 1991, Intrinsic Bubbles: The case of Stock Prices. *American Economic Review* 81, 1189-1214.

8. Data-Snooping

Foster, F.D., T. Smith, R.E. Whaley, 1997, Assessing Goodness-of-fit of Asset Pricing Models: The Distribution of the Maximal R^2 . *Journal of Finance* 52, 591-607.

Hansen, P.R., 2001, An unbiased and powerful test for superior predictive ability. Brown University discussion paper.

Lo, A. and A.C. MacKinlay, 1990, Data-Snooping Biases in Tests of Financial Asset Pricing Models. *Review of Financial Studies* 3, 431-468.

Sullivan, R., A. Timmermann, and H. White, 1999, Data-Snooping, Technical Trading Rules and the Bootstrap. *Journal of Finance*, 54, 1647-1692.

White, H., 2000, A Reality Check for Data Snooping. *Econometrica* 68, 1097-1126.