Dissertation Proposal

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"Essays on Monetary Policy and Asset Prices"

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In the first chapter, I present a heterogeneous-agent incomplete markets model that accounts for many of the features of the nominal term structure of interest rates. There is a single state variable, termed household risk, which drives the conditional cross-sectional moments of household consumption growth and generates a countercyclical time-varying price of risk. Yields on nominal and real bonds are obtained in closed form and are affine in the state variable. Real yields are procyclical, nominal yields are countercyclical, the real term structure is downward sloping, and the nominal term structure is upward sloping. When calibrated to moments of consumption and dividend growth, the risk-free rate, market return, price-dividend ratio, and inflation, the model is able to produce realistic means and volatilities for nominal bond yields. The model is also able to account for the failure of the expectations hypothesis with coefficients very similar to those in the data.

The covariance of stock and Treasury bond returns has changed from positive in the period from 1965-2000 to negative in the period from 2001-2011. In the second chapter, I examine how a change in the credibility of a monetary authority minimizing an ad hoc loss function, characterized by a movement from a regime of discretion to one of commitment, contributed to a decline in the risk of nominal bonds. The exposure of bond returns to cost-push shocks decreases from the discretion regime to the commitment regime. Cost-push shocks drive bond and stock returns in the same direction. Therefore, there is a decline in nominal bond-stock correlations from the discretion regime to the commitment regime.

The decision of which currency firms choose to denominate their debt in is sensitive to deviations from uncovered interest parity. Deviations from UIP are in turn influenced by monetary policy. The failure of UIP to hold under certain policy regimes will give firms the incentive to issue debt in the lower interest rate currency. When the lower interest rate currency is the foreign currency, firms will face a trade-off between added currency risk and savings due to the failure of UIP. In the third chapter, I attempt to show within a structural model, the connection between monetary policy regime and the currency denomination decision with respect to corporate debt.