

Sentiments, Asset Prices and Business Cycles

This paper studies a production economy with financial frictions and shows that the existence of rents gives rise to multiple equilibria. In our model, some agents – entrepreneurs – are capable of investing in capital whereas others – savers – are not. Agents are also endowed with “trees,” which are assets that entitle them to a stream of dividends. We show that, in the absence of financial frictions, the economy has a unique equilibrium: the interest rate equals the marginal product of capital and the price of trees equals the discounted value of the dividend stream.

With financial frictions, however, the economy has multiple equilibria. In one of them, the capital stock is low and the interest rate consequently high. Given this high interest rate, the discounted value of dividends – and thus the price of trees – is low, tightening borrowing constraints and confirming the low capital stock. In another equilibrium, the capital stock is high and the interest rate consequently low. Given this low interest rate, the discounted value of dividends – and thus the price of trees – is high, relaxing borrowing constraints and confirming the high capital stock.

Both equilibria are fundamental, in the sense that in both of them the price of trees equals the discounted value of the dividends they generate, i.e., there are no bubbles in our economy. Our analysis therefore shows how the presence of financial frictions can give rise to multiple fundamental equilibria, which implies that investor sentiment can play a crucial role in driving the business cycle even in the absence of bubbles.