

## Summer School on Liquidity in Financial Markets and Institutions Finance Theory Group

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### Collateral and Intermediation in Equilibrium

This lecture discusses general equilibrium and intermediation in dynamic models of collateralized finance. This class of models provides a useful framework to analyze dynamic financing of firms, intermediaries, and households. Financial contracting is subject to limited enforcement without exclusion. The optimal dynamic contract can be implemented with complete markets in one-period ahead Arrow securities subject to state-by-state collateral constraints. The first part of the lecture considers collateralized household finance in general equilibrium focusing on the effect of collateral scarcity on equilibrium interest rates, investment, insurance, and inequality (see Rampini and Viswanathan (2017a)). The second part of the lecture considers the role of financial intermediaries that are better able to collateralize claims than households; the net worth of intermediaries affects the severity and protractedness of macroeconomic downturns (see Rampini and Viswanathan (2017b)). To prepare for the lecture, please read these two papers.

If you are not familiar with the basic model of dynamic collateralized financing of Rampini and Viswanathan (2010, 2013), you may want to review the lecture on “*Dynamic Collateralized Finance*” from the FTG Summer School in 2015 (the lecture notes are available here and a recording here). Preliminary lecture notes for this year’s lecture will be available at <https://faculty.fuqua.duke.edu/~rampini/> in due course. You can contact me at [rampini@duke.edu](mailto:rampini@duke.edu).

#### 1. Papers on Equilibrium Household Insurance and Intermediation

Rampini, A.A., and S. Viswanathan, 2017a, Household risk management, Working paper, Duke University.

Rampini, A.A., and S. Viswanathan, 2017b, Financial intermediary capital, Working paper, Duke University.

#### 2. Papers on Dynamic Collateralized Finance

Rampini, A.A., and S. Viswanathan, 2010, Collateral, risk management, and the distribution of debt capacity, *Journal of Finance* 65, 2293-2322.

Rampini, A.A., and S. Viswanathan, 2013, Collateral and capital structure, *Journal of Financial Economics* 109, 466-492.

Rampini, A.A., 2016, Financing durable assets, Working paper, Duke University.