1 Lecture 6: Overview

- Krusell-Smith

  Pareto Optima with idiosyncratic risk
  Perfect risk sharing

- tests for perfect risk sharing
- Arrow Debreu markets

2 Krusell & Smith

- out of steady state dynamics with technology shocks
- add heterogeneity in β to match wealth distribution
- recursive equilibrium: representative agent

$$v(k, K) = \max_{c,k'} u(c) + \beta v(k', K')$$

$$c + k' = (1 + r(K))\, k + w(K)$$
$$K' = H(K)$$

- stochastic version:

$$v(k, K, s) = \max_{c,k'} u(c) + \beta v(k', K', s')$$

$$c + k' = (1 + r(K, s))\, k + w(K, s)$$
$$K' = H(K, s)$$

- for the Krusell-Smith model the state is the whole distribution F_t
  larger object!
- K-S method/approximation:
  carry finite amount of moments of F_t as an approximation
- result: don't need many moments; one is enough!
  approximate aggregation

- idea: saving function is non-linear but most people are in the linear region
- tables I and II from paper