Randall Wright: Lectures on
Micro Foundations for Macro and Monetary Economics

When is it efficient to use money, or other assets, as a payment instruments, either as media of exchange or as collateral for deferred settlement? To discuss this, we need a framework with explicit frictions (e.g., spatial or temporal separation; limited commitment; imperfect information). Institutions like money, collateralized credit, banking, etc. are clearly not captured well by standard GE theory. Search theory is the natural approach, because it has agents trading with each other at terms they choose, not just trading with budget lines at prices taken parametrically. In this setting we can ask how frictions impede the process of exchange and how the above-mentioned institutions may ameliorate the problem.

The approach in these lectures is related to mechanism design, and can be interpreted as the quest for micro foundations in macro and monetary economics. The claim is that frictions matter for theory, for understanding data, and for policy analysis. This is especially relevant for several issues of importance in recent monetary policy – e.g., should Central Banks issue their own digital currency; should any given region have one money (as Europe implemented) or many; or how should we handle privately-issued payment instruments? It is also crucial for sensibly analyzing regulation of private e-money, financial markets, and banking.

Part 1 will present a simple model to illustrate fundamental results on what frictions are needed for monetary exchange to improve efficiency. Some results will focus on fiat currency, but it is important to say that the theory shows how any asset can be valued for liquidity, with big implications for traditional finance (asset-pricing) theory.

Part 2 will introduces a more realistic and less stylized model, although it is extremely tractable, once you learn how to use it. This formulation can still be used to prove theoretical results, but is also amenable to quantitative analysis. Qunatitative versions imply that taking frictions seriously leads to policy results that are quite different from what one finds in "shortcut" (say, cash-in-advance) models. The message: micro foundations matter.