

Variable versus Fixed Rate Mortgages and Optimal Monetary Policy

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Abstract

The overall aim of the research presented in this thesis is threefold: To empirically examine monetary transmission to UK retail mortgage rates; to examine why fixed versus variable rate mortgage lending differs across EU-15 countries; and to build a DSGE model which can be used for analysing optimal monetary policy in economies with different proportions of fixed or variable rate mortgage contracts. Chapter 2 investigates the transmission from UK policy and a range of wholesale money market rates to retail mortgage rates using a single-equation error correction model (SEECM) framework, from 1995 to 2009. The results add to previous studies by showing that the UK retail banking sector is imperfectly competitive at the aggregate level. More specifically, discounted rates, and to a lesser extent fixed rates behave competitively, whilst standard variable rates do not, which can be interpreted as evidence of exploitation of inert borrower behaviour. A snap-shot of the relative levels of variable rate lending across EU-15 countries is taken in the next Chapter 3, illustrating general cross-country differences. Risk simulations show that economies more conducive to variable rate mortgages include those with relatively volatile, persistent, and low inflation; low and stable real interest rates; high real income growth; and low correlation between inflation and real interest rate shocks. Regressions show that macroeconomic histories may indeed be important determinants of variable rate mortgage prevalence. The final Chapter 4 integrates a quantity optimising banking sector that lends under either a fixed or variable rate, into a model with borrowing constrained households. This provides a framework that can be used to investigate relationships between the structure of debt contracts and monetary policy. In particular, the propagation of a productivity shock in the non-durable sector under Ramsey monetary policy is presented, and it is demonstrated that the introduction of overlapping debt contracts tempers the effect of the financial multiplier. An appropriate design of the composition of fixed versus variable rate debt contracts, both their length and interest rate composition, could therefore reduce the volatility of key economic variables, and so there are important policy implications.

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