"U.S. MONETARY POLICY AND FLUCTUATIONS OF INTERNATIONAL BANK LENDING"

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A Time-Varying Impact of FFR on Lending

- Question: How do changes in U.S. FFR affect cross-border bank lending?
- Authors find that Corr(FFR, cross-border lending) varies substantially over time
- They believe that time-varying correlation can be explained by whether:
  - The FFR changes because of fundamentals (TR) or stance (MP)
  - AE to EM flows are booming or stagnating
- They find that:
  - In boom, ΔTR associated with *higher* flows to EMs, but ΔMP has no effect
  - In stagnation regime, higher MP lowers flows to EM but TR has no effect
- Great to document the time-varying correlation and ask, and try to answer, why
- Should we expect the relationship between lending and FFR to be constant through time? Yes, if FFR is the only thing driving lending. No, if it isn't. Need a model. If model correct, FFR itself should be reliable pull-factor toward U.S.
- What is going on? Maybe pull factor toward the US is operative but in the strong TR cases, there is an even more powerful pull factor to EM. US and EM booms may go together—but shouldn't we control explicitly for EM and other factors?

Asking Too much of the FFR Decomposition

- IMF Spillover Report (2014) has a similar flavor to this paper: when FFR is driven by good domestic fundamentals, this leads to more EM flows; but when it reflects, e.g., rising financial-stability concerns in the US, spillover is negative
- But FFR decomposition seems awfully indirect way to get at factors that clearly matter: (i) risk appetite; (ii) EM business cycle; (iii) commodity prices (both a pull and a push factor); (iv) EM interest rates; and (v) U.S. financial-stability risks
- Authors are controlling for growth rate of total lending from country *i* and total borrowing by country *j*. But why is that preferable to controlling for the key push and pull factors? Quarterly growth rates tend to be noisy proxies for key factors
- Identification of some important episodes in the FFR decomposition has issues:
  - Volker era based on *money targeting* and volatile FFR (exclude from sample)
  - Post-2010 period really too-loose policy? Not according to Bernanke (2015)
- FFR decomposition least reliable when most needed. Flows driven by real-time output gap that's subject to revision. And "stance" difficult to interpret
- Announcement effects with no change in FFR important (e.g. taper tantrum)

Is Lending Regime Decomposition Helpful?

- What are the boom-stagnation lending regimes capturing? Seem consistent with collateral-based models (e.g., Bruno and Shin 2015):
  - In "risk-on" periods, asset valuations are high and balance sheet constraints are not binding, so MP-induced tightening of the constraint has no effect
  - In "risk-off" periods, balance sheet constraints are binding, so further falls in asset prices due to MP tightening have significant effects on flows
- Could it be that the stage of the lending cycle is related to their findings?
  - In early "boom" phase, low leverage and high risk appetite → FFR has no effect
  - As cycle matures, (FX) leverage rises, risk appetite wanes, USD richly valued, EM debt overhang → changes in FFR will have a big effect on EM
- Such an interpretation consistent with IMF's past crisis vulnerability work, which has crisis risk depending on FFR interacted with EM debt rather than just FFR
- Is there something circular about predicting lending across regimes defined by the endogenous variable: lending?

Refining the Empirical Approach...

- Is the two-state Markov-switching model the most helpful way to classify data?
  - Alternative three-category approach that describes the data well: lengthy "normal times" interspersed with "surges" and "crashes" (relatively rare)
- What triggers shift between lending regimes? Would like to know whether we are poised to shift from the risk-on boom to the risk-off stagnation regime, but paper has little to say about this
- Would it not be fruitful to allow richer ΔFFR effects by:
  - Adding interaction terms with VIX/credit spread/USD change/EM debt
  - If interaction terms are not enough, generate regimes using VIX/credit spread/USD change/EM debt/combo, allowing for more than two regimes
- Do the results apply broadly? Or driven by big neighbors, off shore financial centers? Maybe estimate Markov switching on common factor in flows instead?
- In **conclusion**, a good question, interesting facts, and an approach that reveals new information. Perhaps room for a richer explanation of the time-varying correlation than is yielded by the chosen decompositions.