Discussion of Capital Flows and Exchange Rates: A Quantitative Assessment of the Dilemma Hypothesis

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Research Question & Motivation

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Empirical question: role for exchange rate regime with GFC?

Policy question: What are optimal policies for dealing with GFC?

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    - Financial frictions - amplification of shock (bank lending)
    - Trade frictions (LCP exports) needed to match inflation and export response (limited ERPT)
3. Quantitative: Counterfactual exercises
    - Exchange rate regime?
    - Countercyclical tax on domestic credit (financial stability)?
    - Countercyclical tax on foreign borrowing (capital flows management)?

Main Findings

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2. Model: The trade and financial frictions important to match empirical response to GFC
3. Policy experiments:
    - Peg increases macroeconomic volatility (interest rate resp.)
    - Financial stability tool and capital flow measure both reduce real GDP and credit spread...**CC tax domestic credit most effective reducing volatility.**
    - Peg together with policy instruments approximates response real GDP to GFC with flexible exchange rate regime...**Inflation response higher.**

Key Contribution

Relevant quantitative framework + realistic features:

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Relevant quantitative framework + realistic features:

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- Dominant role for US Dollar in finance and trade.

An important step in the direction of understanding optimal policy responses to GFCs.

Discussion

- Important paper, a rich model and a lot of insights
- Well-written, clear exposition, role frictions very clear
- Precision of empirical estimates: Comment #1 & 2
- Heterogeneity in literature: Comment #3
- Financial frictions: Comment #4

1 & 2 Global Factors & Trends

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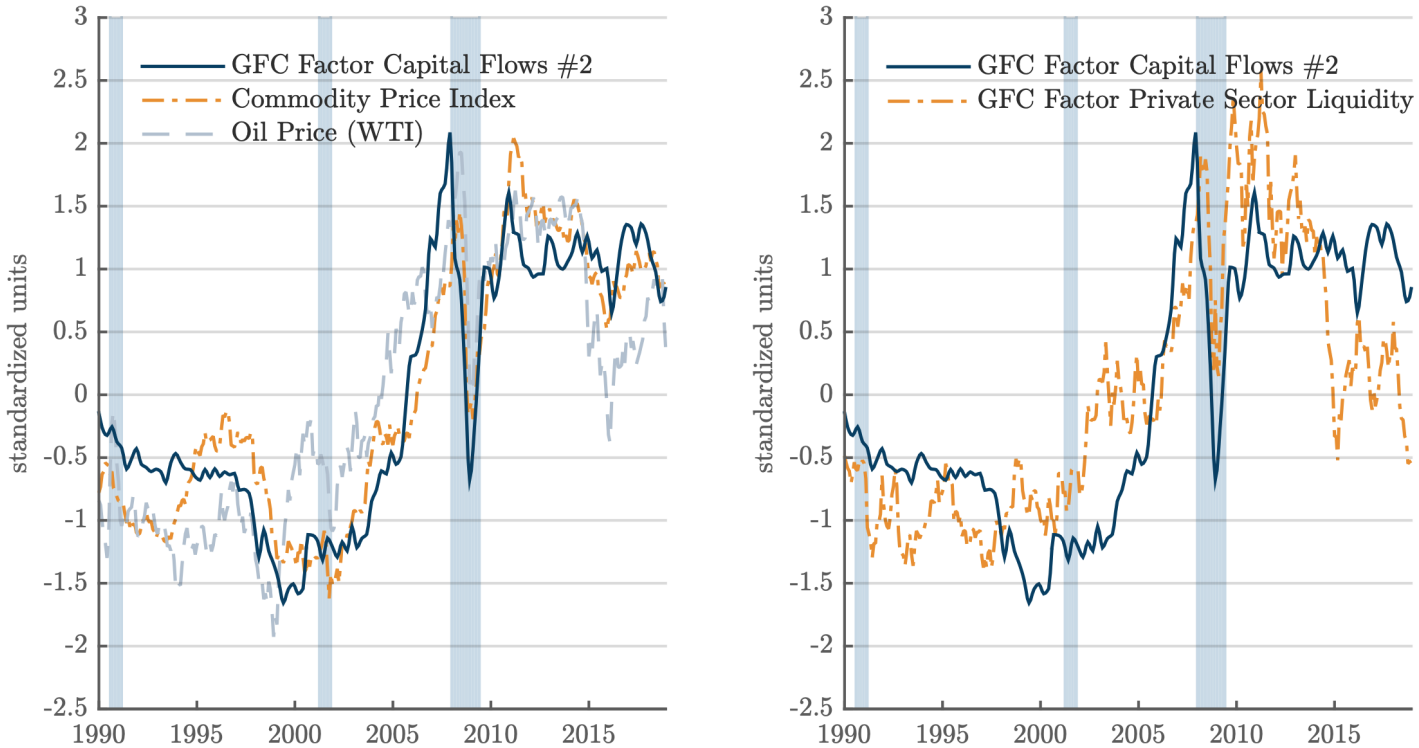
Other important factors

1. Global Commodity & Trade Cycle (2^{nd} global factor) (e.g., Miranda-Agrippino & Rey 2021, Degasperi, Hong & Ricco 2021)
2. Macroprudential policy after financial crisis (e.g., Bergant, et al. 2023, Neanidis 2019)

1: Global Factors & Trends

FIGURE 5: CAPITAL FLOWS, PRIVATE LIQUIDITY AND COMMODITY CYCLES



Notes: [Left Panel] Second global factor in capital flows (all directions, all types, solid line), commodity price index (dash-dotted line), oil price (dashed line). [Right Panel] Second global factor in capital flows (all directions, all types, solid line), global factor in world private liquidity (dash-dotted line).

source: Miranda-Aggripino & Rey (2021)

1: Global Factors & Trends

Why is this point important?

- Quantitatively important: Two factors $\approx$ one-third to one-half of variance gross flows (Miranda-Agrippino & Rey 2021, Davis et al. 2021, among others)
- Particularly relevant for private sec. liquidity (Miranda-Agrippino & Rey 2021)
- Empirical analysis should control for this second factor

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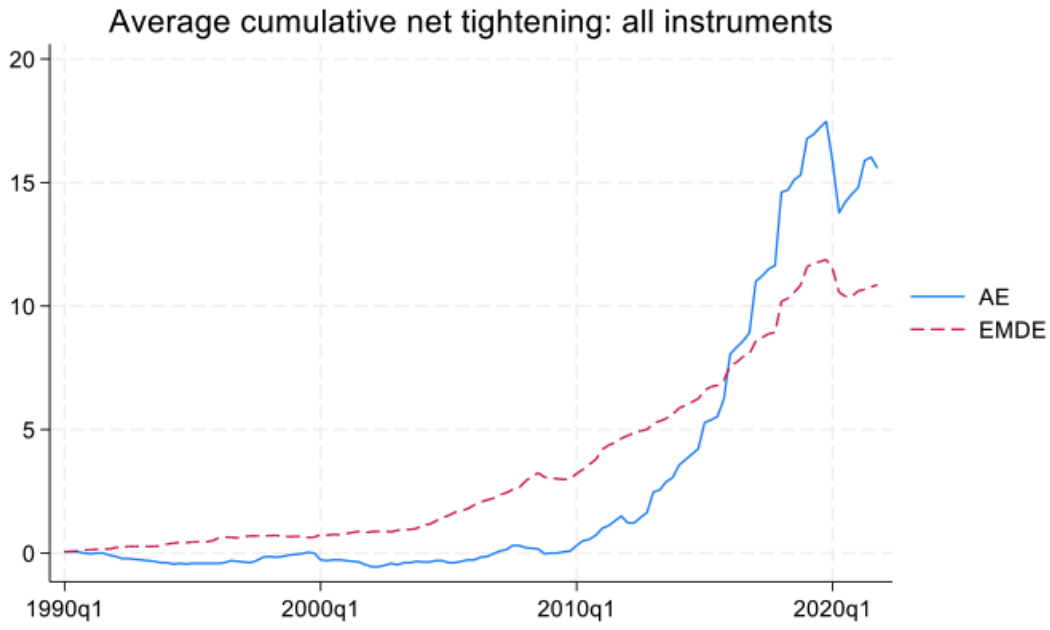
Suggestion:

> Follow literature dynamic factor models (DFMs). Factor one (GFC) in place of US monetary policy and factor two as a control.

2: Global Factors & Trends

The role of macroprudential policy?



Source: based on data from the IMF integrated Macroprudential Policy (iMaPP) database, described in Alam et al. (2024).

(Davenport, Sà, and Wieladek, 2024)

2: Global Factors & Trends

Why is this important?

- Empirical estimates + model to analyse effects of macro-prudential and capital flow measures
- Evidence of macroprudential policies reducing effect of foreign shocks (Bergant et al. 2023, Neanidis 2019, and reviewed in Davenport, Sá, Wieladek 2024).

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Suggestion:

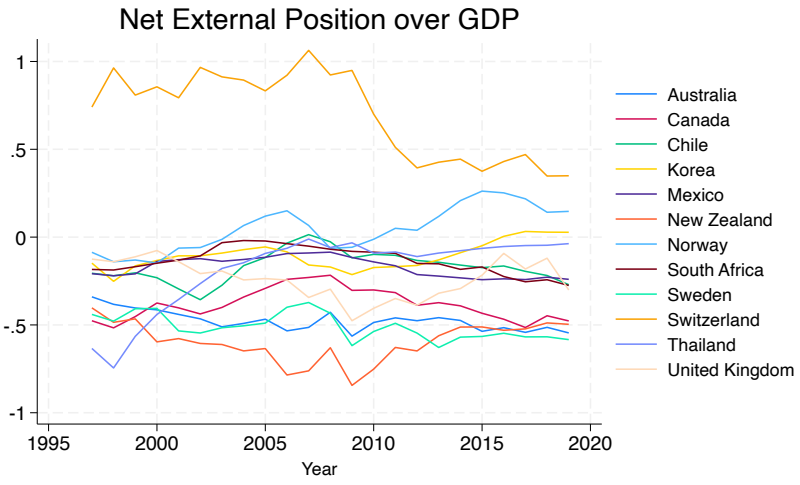
- Control for macroprudential developments (shocks)
- One approach estimates macroprudential reaction function, collect residuals (Ahnert et al. 2021, Gelos et al. 2022).

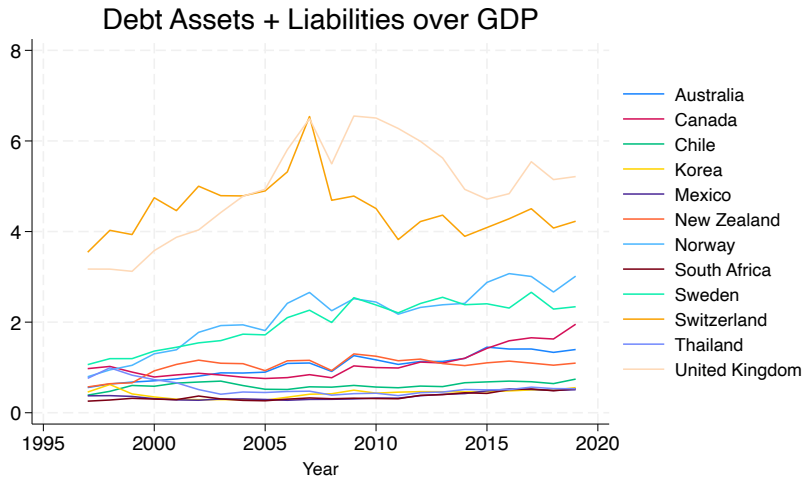
3: Heterogeneity

Important dimensions of heterogeneity from the literature:

1. GFC more important for net debtors & countries larger positions in debt instruments
   (Davis et al. 2021)
2. Driven by debt assets & liabilities (important role for banks)

3: Heterogeneity





Average debt assets and liability ratio 1.4
(Davis et al. 2021 sample)

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Suggestion:

- Report mean-group (Pesaran & Smith 1995),but explore heterogeneity across countries in larger sample, or by groups
- Relevant dimensions: debtors versus creditors (Davis et al., 2021), advanced versus emerging (e.g., de Leo et al. 2022), foreign currency bank borrowing (see comment # 4, de Leo, et al. 2022), Share dollar invoicing in trade (Boz et al. 2022)

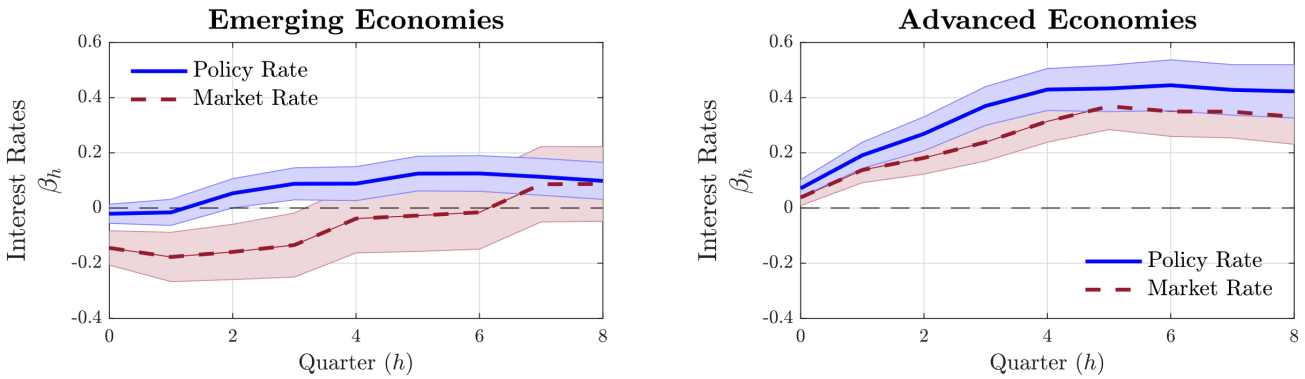
4 Financial Frictions

Financial frictions important for amplification of shock

- Focus on home banks (why foreign banks frictions?)
- Tightness of financial friction θ
- Penalty for foreign currency borrowing γ
- Generate a time-varying wedge in UIP condition

4 Financial Frictions

Monetary policy response to US tightening



(a) Policy Rates and Market Rates

source: de Leo et al. 2022

- Coefficients regression of interest rates on GDP growth at different horizons
- Disconnect between policy and market short rates (EMEs)

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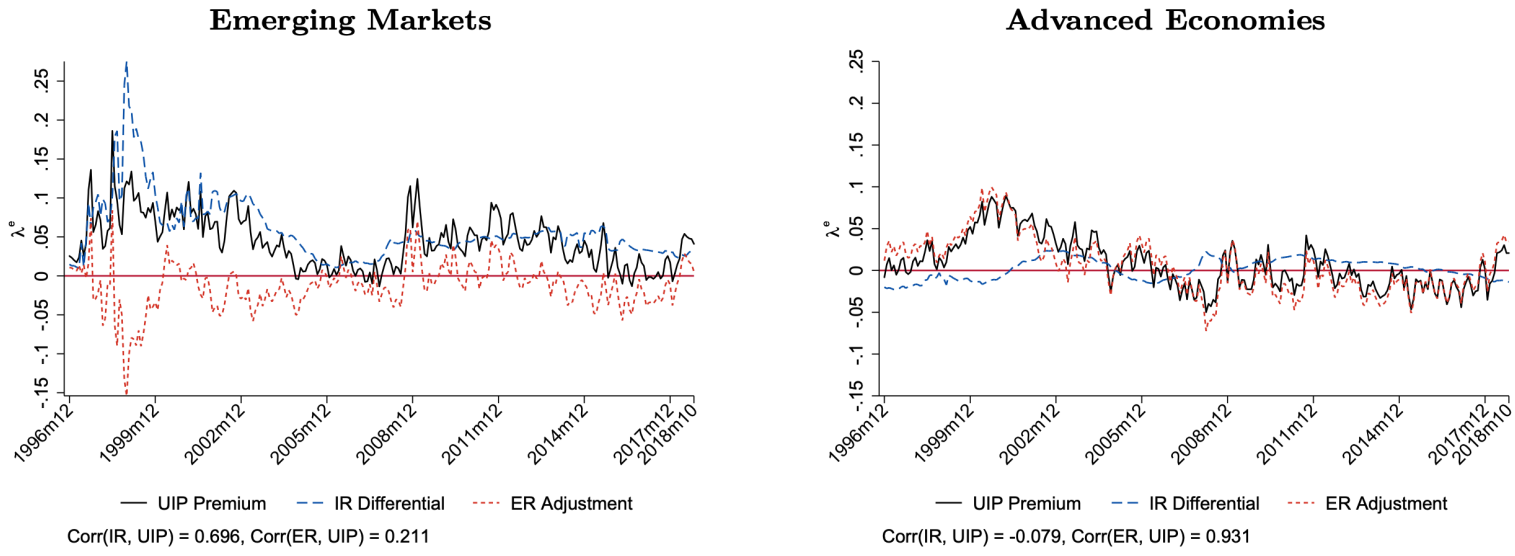
Suggestions:

- Share of optimal proportion of foreign currency debt *x* estimated 0.154 (implies θ, γ jointly)
- Discipline with data, share of external liabilities of the domestic banking sector is around 35% (emerging economies reporting to the BIS). (Hahm et al. 2013; Avdjiev et al. 2022)
- How does impact of GFC (credit spreads) vary with γ?
- Policy experiment limit share of foreign currency borrowing

4 Financial Frictions

How does the wedge vary over time?



B) Interest Rate Differential and Exchange Rate Adjustment Terms

Figure 1: UIP Premium in Advanced Economies and Emerging Markets

source: Kalemli-Özcan & Varela (2021)

UIP premium emerging markets (risk factors) versus advanced economics (deviations from FIRE).

Summary

- Great paper! Cleanly executed and very insightful
- Learned a lot about frictions in GFC transmission
- Quantitative assessment confirms GFC & limits to insulation of flexible exchange rate (Dilemma Rey, 2015)
- Macroprudential policies are not enough to limit inflation output tradeoff in fixed exchange rate regime.
- Policies limiting domestic credit growth seem to perform best in reducing macro-volatility
- Future work could emphasise:
  - Sharpening empirical estimates by controlling important confounding factors
  - Exploring important heterogeneity, particularly foreign currency borrowing and role for GFC transmission and time varying UIP wedge.

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