

Unpacking Global Capital Flows

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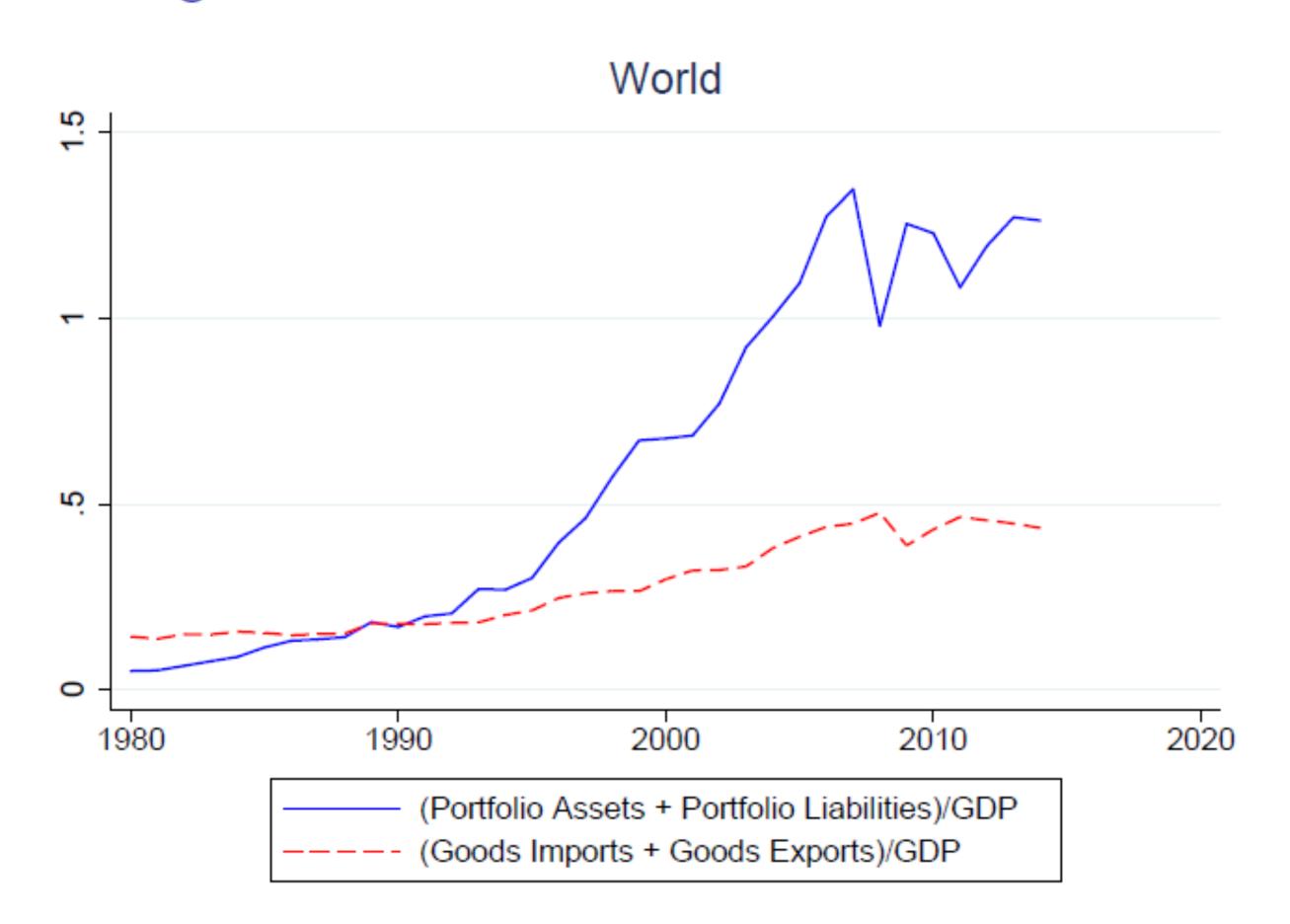
ABSTRACT

Benchmark models of international capital flows and standard practices by national statistical agencies assume that foreign investors are similar to domestic investors: they purchase the same stocks and bonds. This paper documents the empirical failure of this assumption using a novel dataset containing security-level information on the portfolios of investors throughout the world.

Most notably, we find that foreign investors have a significant bias toward their own currency and toward international currencies such as the euro and dollar when buying foreign debt securities. As a result, the extent of foreign investment in an economy has important implications for the allocation of capital across borrowers for all countries other than issuers of international currencies. Finally, we demonstrate that whereas the dollar and euro were both international currencies during 2005-2010, the dollar's share subsequently rises and by 2015 it is the sole international currency.

BACKGROUND AND OBJECTIVES

Astounding Growth in Global Gross External Positions



Global portfolios matter *much* more than even 30 years ago and matter for:

- Who gets capital and at what cost
- Exchange rate dynamics
- Net foreign asset dynamics and sustainability
- Macro-prudential policies

Yet relatively little is known about these portfolios, in large part since most existing datasets are highly aggregated and do not offer views on the currency composition of global holdings.

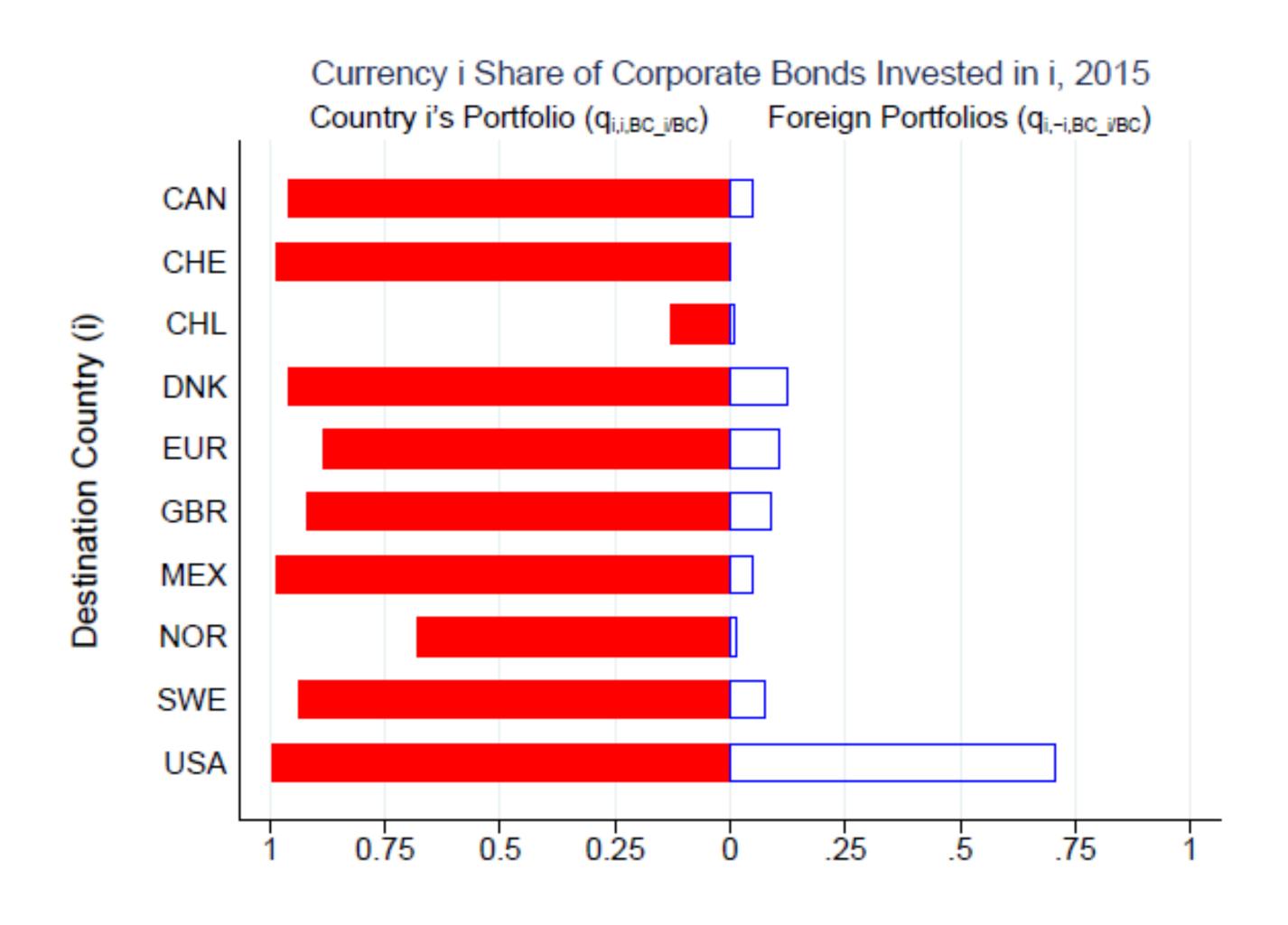
METHODS

Using quarterly mutual fund portfolio data covering \$25 Trillion in positions, we assess how foreign and domestic investors differ when choosing among the same set of investable securities. Note that with data from only one country, this is not possible. Instead, we wish to compare U.S. holdings in the U.K., say, with U.K. holdings in itself. This requires comparable data from multiple domiciles. Our data covers from 1995-2015 (for the U.S.) and 2003-2015 (for the rest of the world) and covers 75 domicile countries with flows to more than 100 markets.

The positions generally include a 9-digit security identifier (the CUSIP) and therefore can be matched with publicly available sources to learn about the security's currency exposure, maturity, issuer, issuer's industry, and issuer's geography.

RESULTS

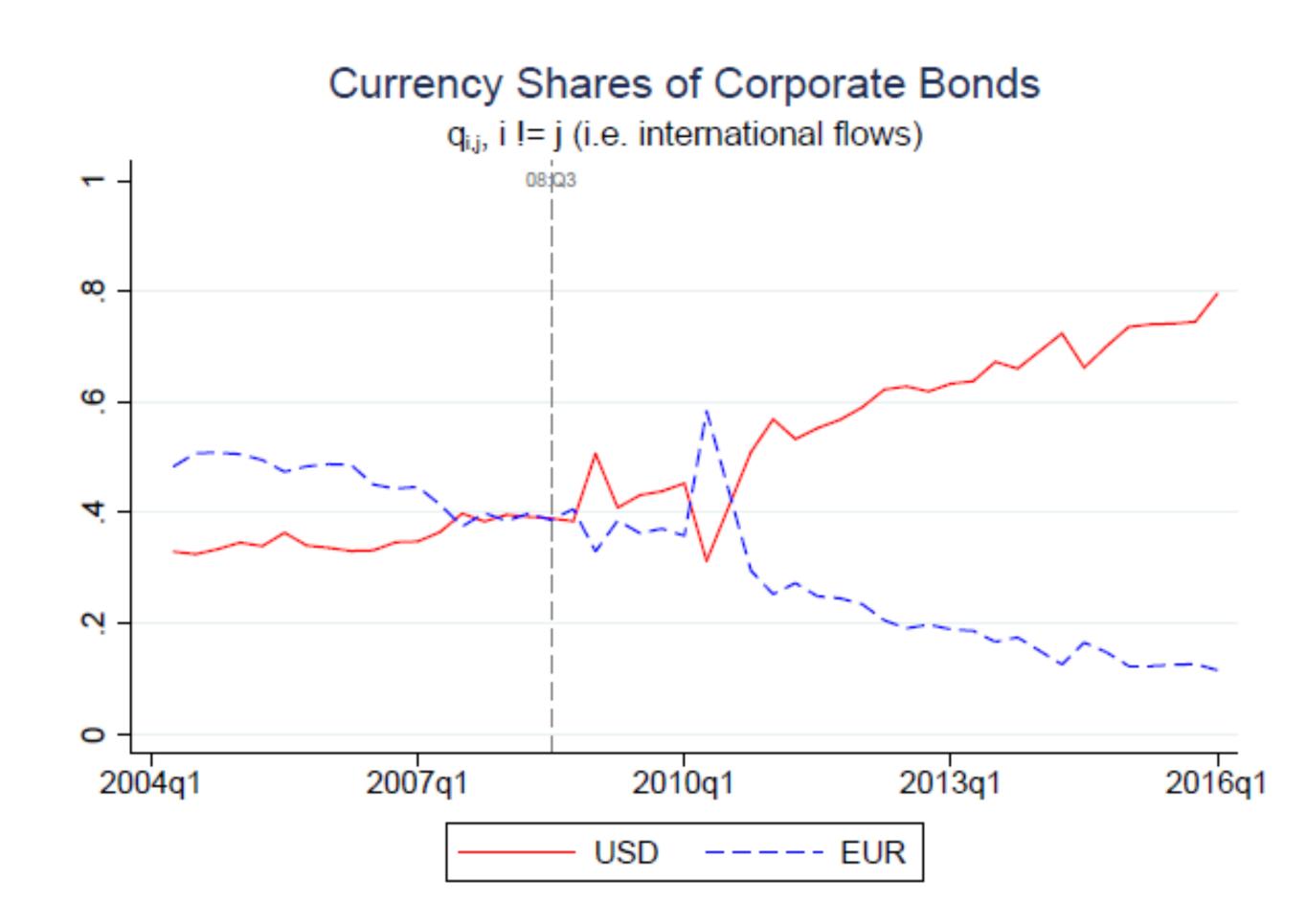
Our first finding is that foreigners investing in country "i"'s bonds almost never take on risk associated with currency i, even though that is the standard assumption made in international macro models. For example, in the below chart, we see that whereas 95 percent of Canadian investment through mutual funds in Canadian corporate bonds is made in Canadian dollars, less than 10 percent of foreign investment through mutual funds in Canadian corporate bonds is in Canadian dollars.



This leads to foreign portfolios being more concentrated than domestic portfolios in all countries other than the U.S., which in 2015 issues a global currency, the USD, where one sees that foreigners don't require their own currency when investing.

RESULTS (CONT'D)

What's more, whereas the euro used to be an international currency too, we find that the share of the dollar has surged in recent years as seen below:



This has caused a widening of the gap in foreign and domestic portfolio differences between the USA and Europe, as measured by the Euclidean Norm in their portfolio shares:

