Is The Yuan Peg Supporting U.S. Treasuries?

Baseball players lament "they give you a round ball and a round bat and tell you to hit it square." Finance ministers and central bankers, positions officially separate in many countries but often as different as the sides on a Mobius strip, lament you can fix a short-term interest rate or fix an exchange rate, but you cannot fix both.

Thus begins a tale of financial sleuthing to reconcile how China can tighten credit and raise short-term interest rates while maintaining the yuan's (CNY) peg to the dollar and how the U.S. can keep financing its Brobdingnagian deficits with interest rates not all that far from two-generation lows. First, let's return to an observation made in September 2008, the apparent global currency deal made between China, the U.S. and the Eurozone to re-peg the yuan to the dollar and to keep the flow of funds coming into U.S. mortgage giants Fannie Mae and Freddie Mac. Everyone emerged from that deal thinking they had won, and if you wish away the events of September 2008, maybe someone would have.

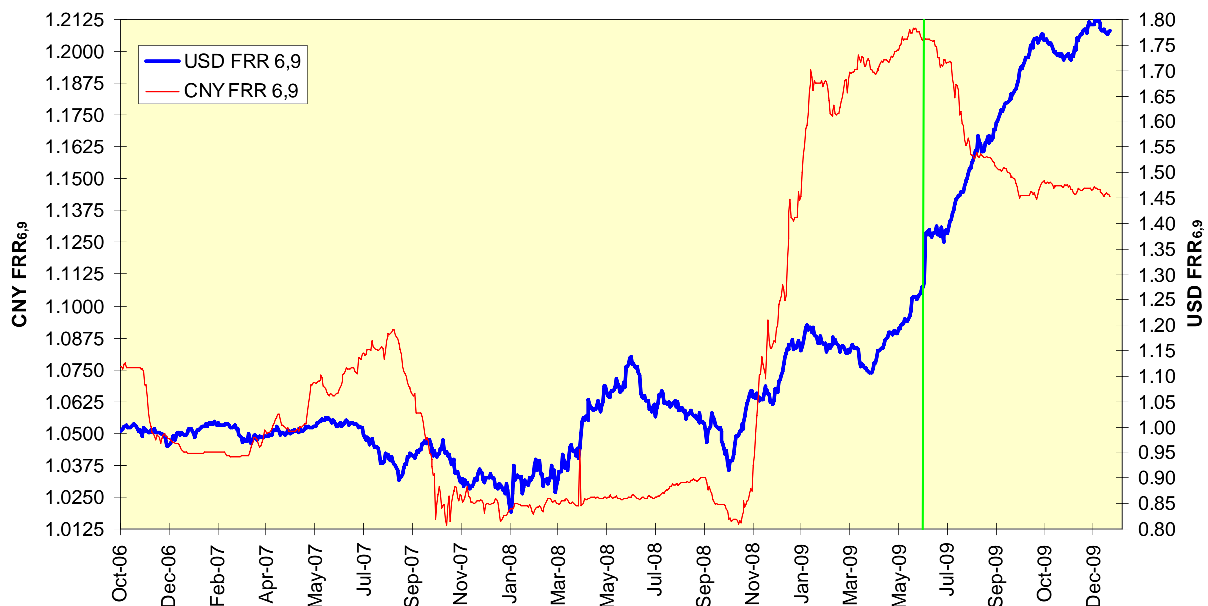
The best predictor of something happening is whether it has happened before, that famous boilerplate on the bottom of every prospectus notwithstanding. If China was willing to finance American profligacy once to keep its yuan undervalued and to keep the dollar from collapsing against the euro, they might be willing to do it again.

The Puzzle Unfolds

If a country is tightening credit, its money market yield curve should flatten. That would be visible in a lower forward rate ratio between six and nine months ($FRR_{6,9}$); this is the rate at which we can lock in three-month borrowing beginning six months from now divided by the nine-month rate itself. The more this ratio exceeds 1.00, the steeper the yield curve.

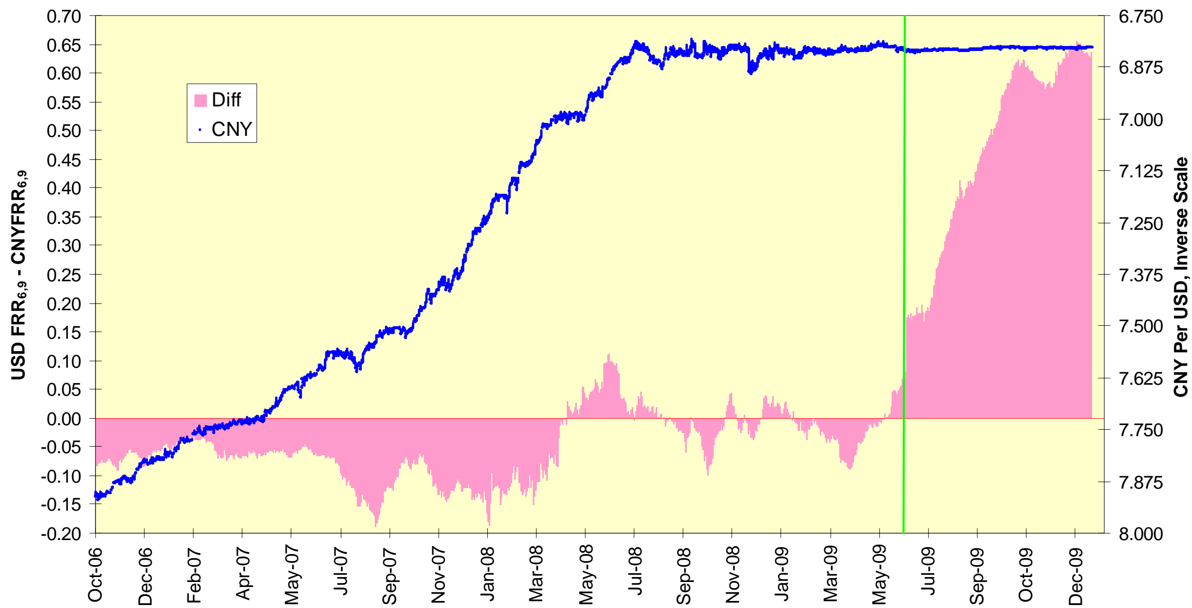
This flattening has been happening in the Shanghai interbank market since June 11, 2009, which not so coincidentally is the date at which U.S. ten-year Treasury rates peaked. The date is marked with a green line on all charts below. While the CNY $FRR_{6,9}$ was flattening, the USD $FRR_{6,9}$ was steepening. We all know the Federal Reserve has been in flood-the-market mode, but how many of us suspected China was tightening simultaneously?

A Tale Of Two Yield Curves



While the American money market yield curve was getting relatively steeper vis-à-vis its Chinese counterpart, the CNY did not budge. Given the moves in the yield curve, this suggested a capital flow from China to the U.S. might have been underway; the money being drained out of the Chinese system was being used to buy dollars and maintain the peg. We should note as well the steeper U.S. money market curve reflects expectations for higher American short-term interest rates; this was discussed in September.

USD Money Market Curve Steepened After U.S. Ten-Year Yields Peaked

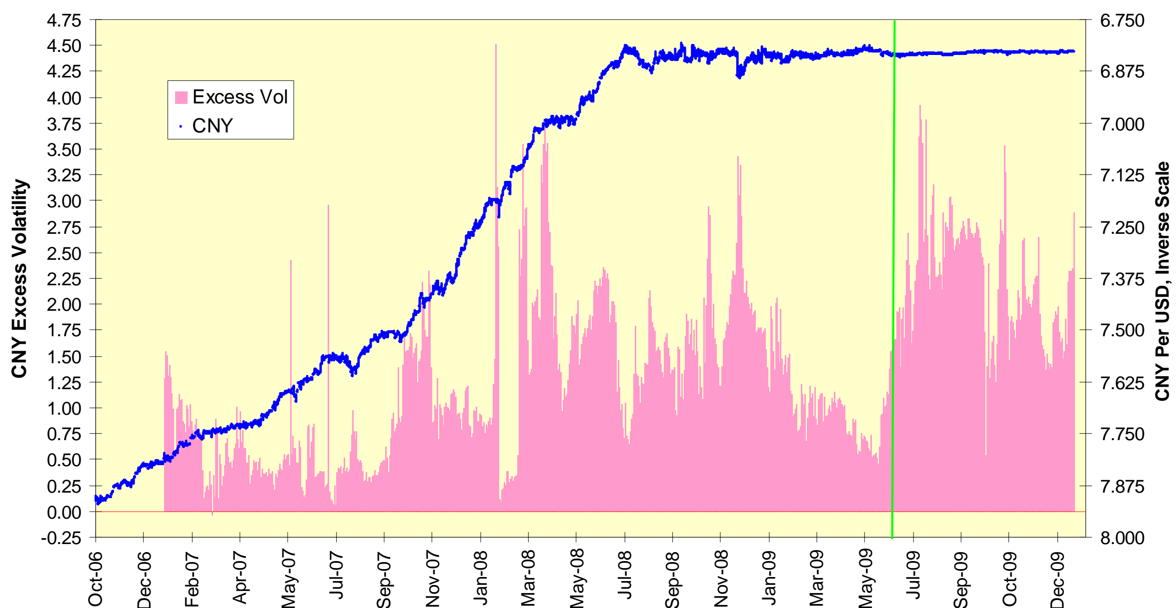


Yuan Insurance

Ask yourself why someone would want or need to buy insurance against a stronger yuan? After all, the country's leaders have become increasingly hostile to any suggestion they allow such a move. However, just as you can buy credit default protection on companies without bonds, you can buy insurance in the currency option markets on such an eventuality.

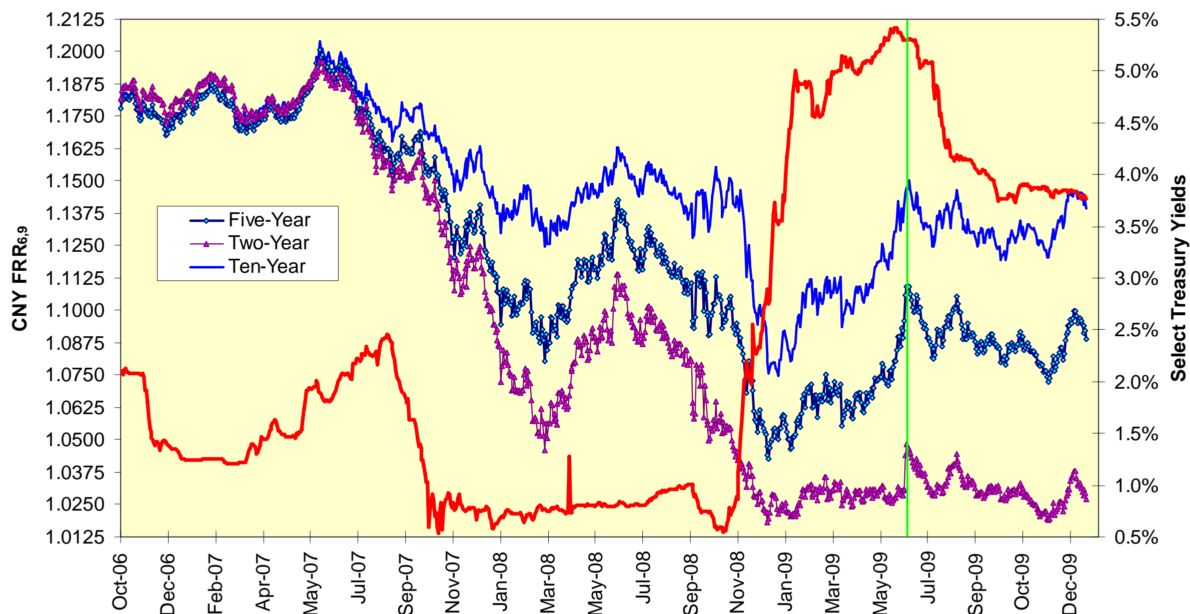
We can measure the market's anxiety by the extent to which option implied volatility exceeds historic volatility. Here the historic volatility used is a high-low-close measure that expands during periods of market uncertainty and contracts during strongly trending markets. At first, this "excess volatility," or ratio of implied volatility to high-low-close volatility, minus 1.00, on three-month non-deliverable CNY forwards jumped as soon as the CNY $FRR_{6,9}$ began to flatten and U.S. interest rates began to stabilize and fall. Then the trade stopped and the market stopped over-insuring itself against a stronger CNY. Those who profit from being "in-the-know" knew something.

Yuan Excess Volatility



The Treasury Impact

Finally, let's see how two-, five- and ten-year Treasury yields fell once the CNY $FRR_{6,9}$ began to flatten. If the money being withdrawn from the Chinese system was finding its way into the U.S. markets, we should see lower U.S. interest rates along with the money market moves and flat yuan noted earlier. And this is exactly what took place.



Please note how this entire inference can hold without tracing actual dollar flows attributable to China in either one of the many Treasury auctions or in the monthly Treasury International Capital Statistics report. Flows can be masked, executed through notional financing or executed through third parties. Price cannot be hidden; it is what it is.

What is the point of having $2.4 trillion in reserves if you cannot throw your weight around? China has the means, opportunity and motive to keep financing the U.S., to keep its yuan undervalued while it tightens domestic credit and to keep the dollar from collapsing against the euro.

Cool.

Finally, I have posed the question more than once how U.S. short-term interest rates could stay near 0% or even go negative when the crisis of 2008 clearly had passed. I also marveled at how the Treasury could keep auctioning so much debt without the market bursting. I can stop asking those questions now; the answer seems to be we have a rich symbiont willing to take any return just to keep us in the game.

Not cool.