

## What's One More Dollar Index Between Friends?

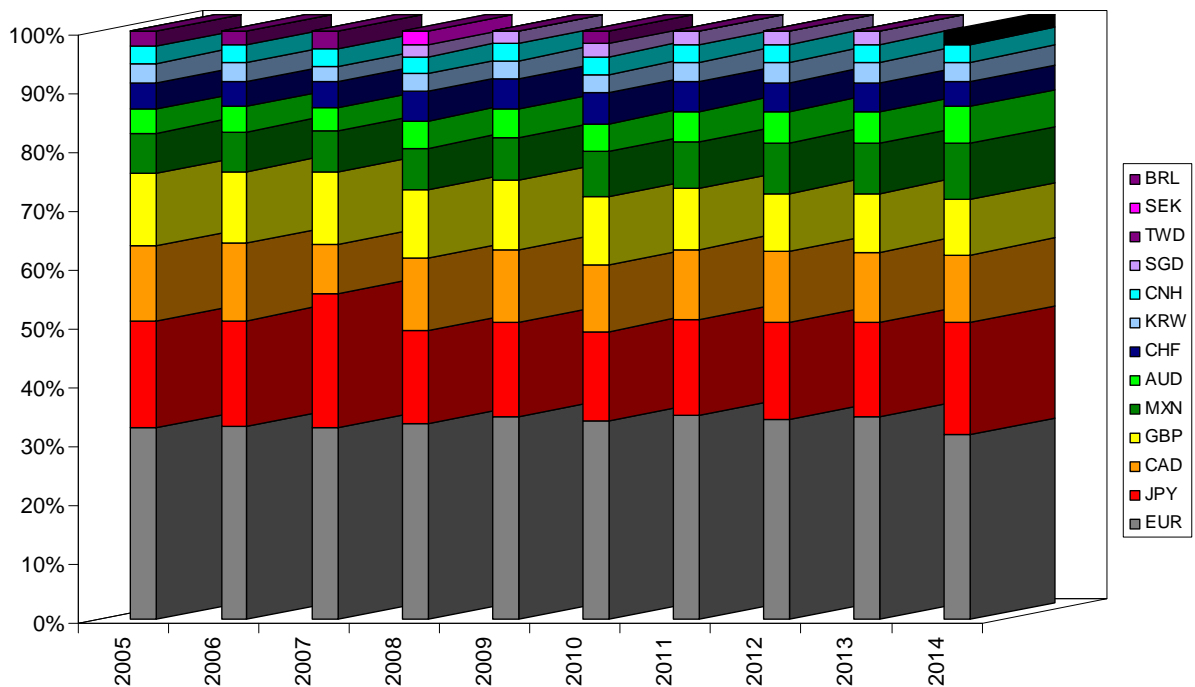
An economist was having lunch a few years back with a local real estate mogul now departed to the great REIT in the sky. He chuckled at changes in the business landscape over the years and exclaimed, "Whoever thought two of the biggest businesses would have names like Google and Yahoo?" When informed the former was a derivation of a nonsense answer to a child's query as to the largest number – the neologism 'googol' is used to denote  $10^{100}$  – and Yahoo is an acronym for "yet another hierarchical object-oriented oracle," he actually took the time to write down the answer. No napkins were harmed in the process.

The never-ending proliferation of indices prompts the same sort of reaction in this precinct: Yet another dollar index. The actual answer is if reasonable people could agree on whether any currency index should be based on financial trading volume, trade weight, liquidity or mathematical constructs such as correlation, one of these approaches would have attained supremacy by now. Market capitalization-weighted approaches to equities have both their detractors and compelling alternatives in the form of equal-weighted and fundamentally weighted indices, but base cases such as the S&P 500 are accepted widely as investment benchmarks.

### The Bloomberg Dollar Index

Our good friends at *Bloomberg* have entered the currency indexation in a significant way, including on their own with a family of correlation-weighted indices and in partnership with J.P. Morgan for both Asian and Latin American currency indices. Bloomberg has returned to the dollar index problem with its Dollar Spot Index (BDXY). This tracks the spot movement of a set of currencies whose weights change annually based on their share of global trade and financial liquidity. Not only do the weights change, so does membership. Thirteen currencies have been represented in the BDXY since its December 31, 2004 history starting date. Maybe thirteen and one-half currencies as the Chinese yuan's (CNY) representation was changed to the offshore Chinese yuan (CNH) starting in 2013. You have to keep up with the times. The composition and weights are presented below.

Annual Weights For Bloomberg Dollar Index

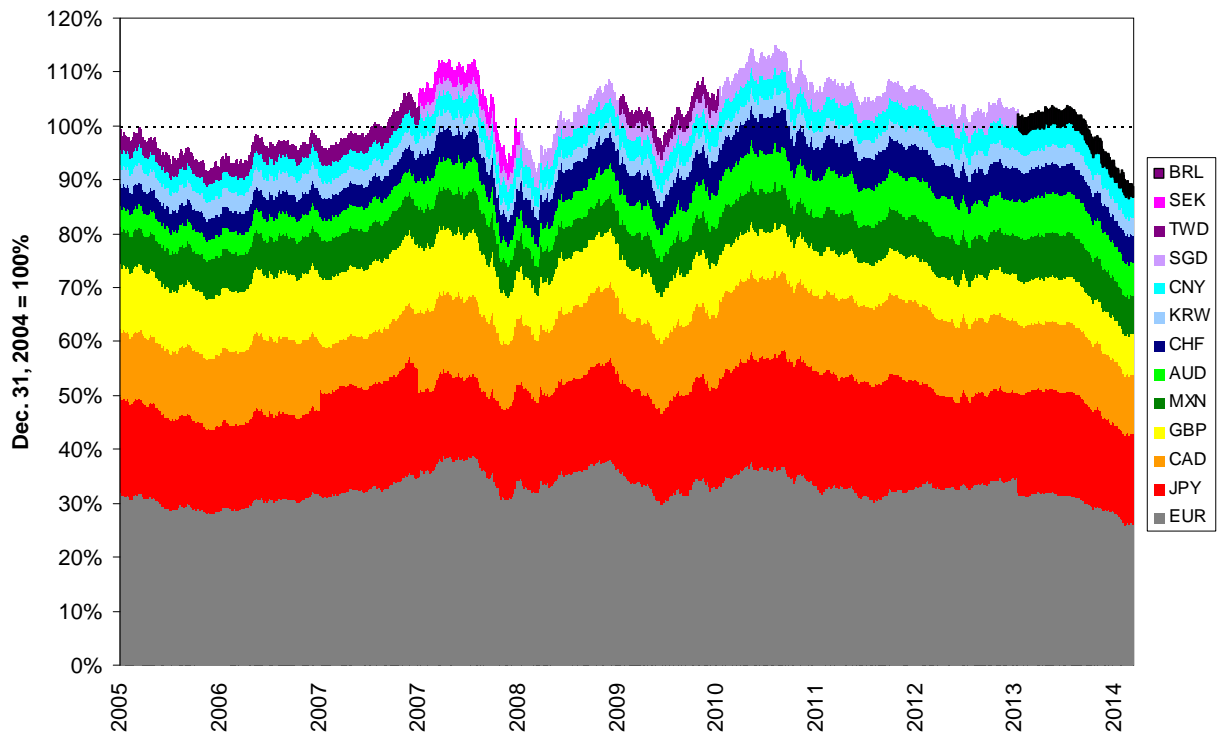


As noted above, no weighting scheme is perfect; the most curious aspect here is the constant 3 percent weight for the Chinese yuan, both in the original onshore and now in the offshore form. The yuan has overtaken the euro for the

second spot in international trade finance, which argues for a greater weight, but its low liquidity and lack of full convertibility argue even more strongly for an even lower weight. If a 3 percent weight sounds like an internal compromise; well, that would be your decision.

If we multiply the BDXY members' exchange rates by their annual weights and sum them, we get a good idea of how the index has moved since the end of 2004. The actual answer is, "Not very much." The index' high-low range has been 88.55 – 114.91 percent. Its maximum occurred in July 2011, just before the August 2011 federal budget crisis in the U.S. and the subsequent start of Operation Twist. The low occurred on February 11, 2015, just before the time of this writing and after a number of countries began undertaking what has to be characterized as competitive devaluation of their currencies.

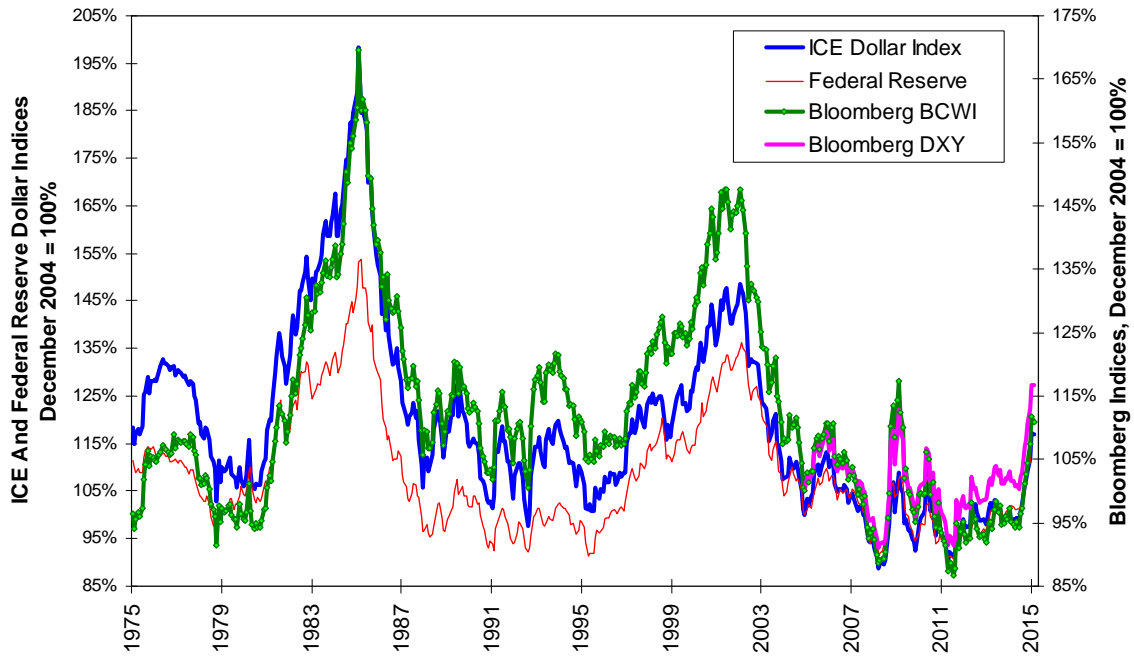
**Cumulative Weighted Return On BDXY Components**



### Comparative Strength

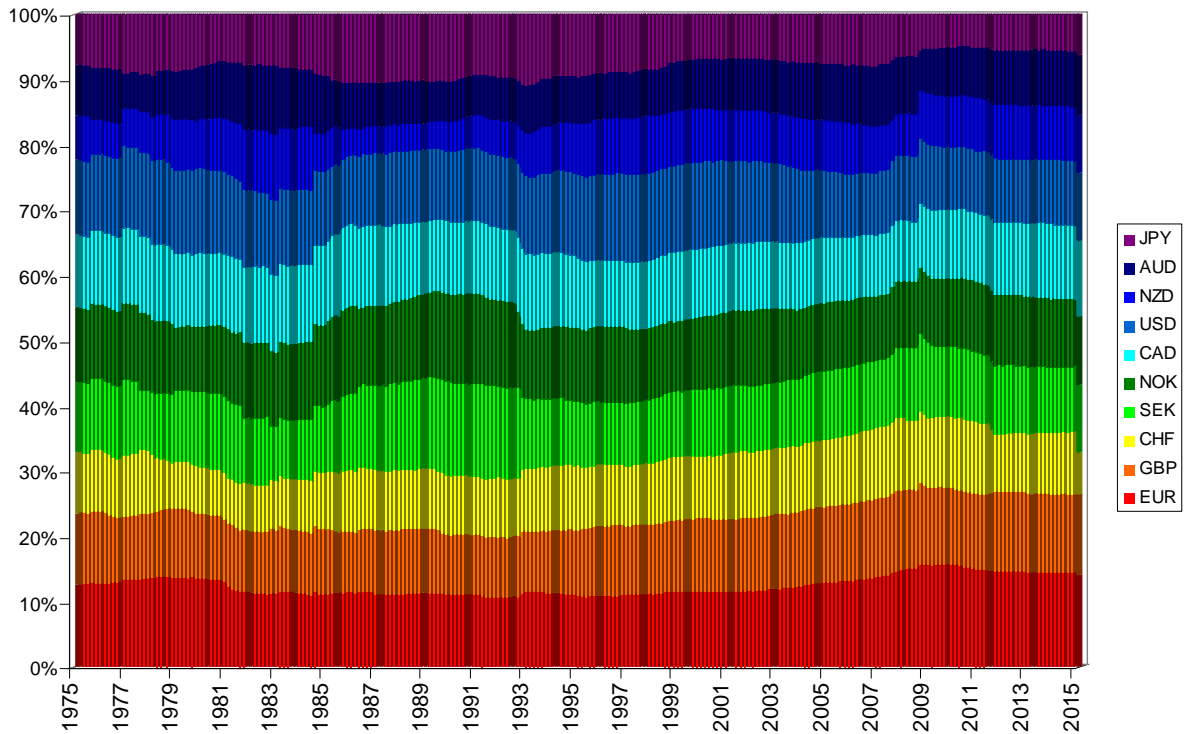
The BDXY has a much shorter history than other dollar indices as the wholly justifiable desire to include the Chinese yuan precludes an earlier starting date; the yuan did not begin its first revaluation until July 2005. However, if we compare it to the ICE Dollar Index (DXY), Bloomberg's own correlation-weighted dollar index (BCWIUSD) and the untraded trade-weighted dollar index maintained by the Federal Reserve from December 2004 onwards, the stronger performance of the BDXY relative to the other three is noticeable.

### Four Different Dollar Indices



The DXY famously has had the same weights since 1973, with the euro accounting for 57.6 percent of the index by itself. The BCWIUSD's weights change on an ongoing basis based on the degree of correlation between each of the currencies, all of which are majors. These weights change gradually for the most part, but occasionally have an abrupt dislocation, such as the one produced in January 2015 by the lifting of the Swiss franc's ceiling against the euro. The nature of these two indices since 1975 suggests the BDXY is the source of the variation between itself and the other dollar indices.

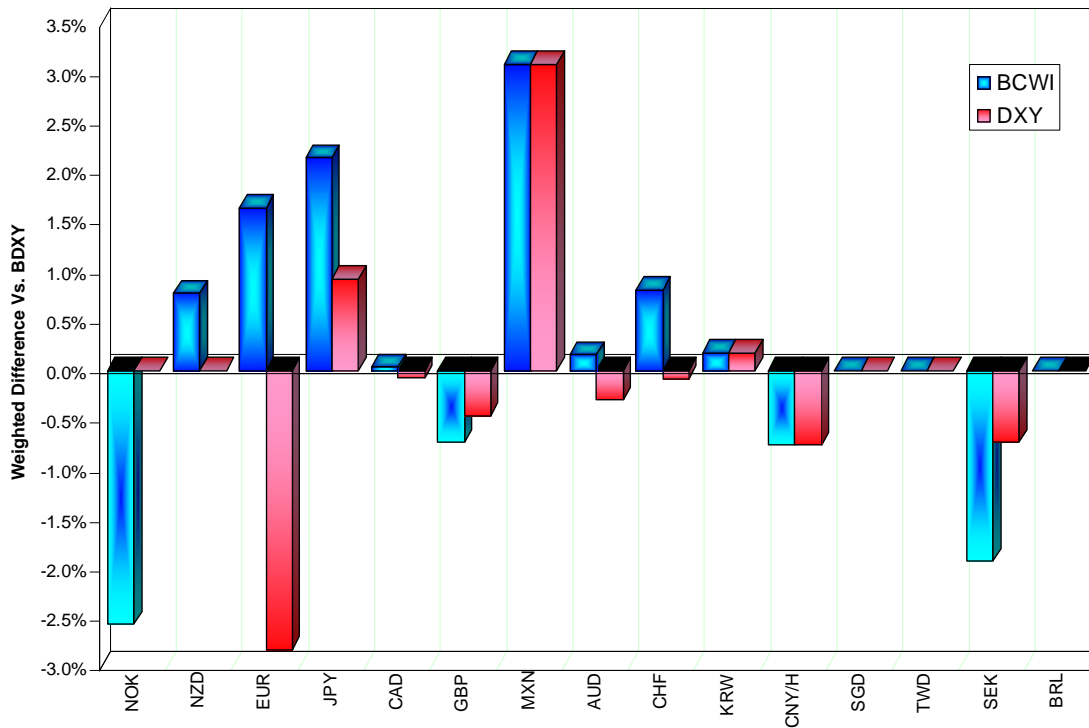
### Weights In Bloomberg Correlation Indices



The net performance differential suggests Bloomberg either effectively over-weights weaker currencies in the index or the other methodologies effectively underweight the stronger currencies. The effective source of the differential has been the inclusion of currencies such as the MXN, KRW, SGD and TWD in the BDXY and the absence, to-date at least, of the NOK and NZD.

If we map each currency's spot return since the end of 2004 multiplied by their difference between the December 2014 weights for both the BCWIUSD and DXY, we see the NZD, EUR, JPY, CAD, MXN, AUD, CHF and KRW have been positive factors for the BCWI vis-à-vis the BDXY, with the opposite applying for the NOK, GBP, CNY/H and SEK. The JPY, MXN and KRW have been positives for the DXY's relative return; the EUR, CAD, GBP, AUD, CHF, CNY/H and SEK have been negatives for the DXY.

### Variance Against BDXY



What do we have at the end of another dollar indexation attempt? The concept of including financial liquidity and trade weights together is appealing, but then we are left with the glaring fudge-factor for the CNY/H and with the problem so much of world trade occurs in USD-priced petroleum and commodities. Financial liquidity is going to become increasingly irregular as regulatory regimes change and as liquidity becomes a function more of high-frequency trading schemes rather than human traders sensing and reacting to longer-term opportunities. We have seen the effects of currency pegs so far in 2015 with the breaking of the Swiss franc ceiling and the imposition of negative interest rates in Denmark to preserve the krone's trading band against the euro.

The simple fact of the matter is no indexation scheme is or can be perfect for long. This should bother no one but apparently it bothers anyone and everyone who has a vested interest in index creation.