Currency Competition – Survival of the fittest

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Introduction

As I write this paper on international and vehicle currencies, there are various important events occurring almost simultaneously — The US dollar is depreciating against the Euro. The price of oil is soaring in the international circuit. The gold price has reached its highest peak in almost five years.

All the above-mentioned events indicate the vigorous competition amongst the major currencies to emerge supreme. "We've got two factors driving the dollar at the moment; firstly the whole war situation with Iraq and risk aversion, secondly the seasonal dollar weakness that we often see in December. Throw that in with an extremely illiquid market over the past few days — probably not much better today — and it's a very odd cocktail."[1]

The US dollar has enjoyed the *numero uno* status for quite some time. Last year (2002) has witnessed the US dollar struggle against a rising Euro. Recently, the Euro hit a high of $1.0397 (its strongest showing since January 2000, before retreating to $1.0378); while the dollar fell to 1.3987 Swiss francs (its worst performance since January 1999). Apart from economic factors, there are various political factors that have led to the slide of the US dollar. But the main question to be answered is — Are loyalties[2] switching from the US dollar to the Euro?

> When the relatively most saleable commodities have become 'money', the event has in the first place the effect of substantially increasing their original salebaleness.
>
> **- Karl Menger 1892**

The evolution of money

In separate places all over the world, under different cultures, the concept of a "medium of exchange" grew. People noticed that some goods were easier to trade than others. These "more tradeable goods" had similar properties:

- They were durable.
- They were easily divisible into larger or smaller amounts.
- They were comparatively scarce, so procuring them required effort.
- They were "homogeneous". Every item of the commodity was exactly like every other item.
- They were convenient. It was easy to carry enough around to trade them for other commodities.

Over a period of time, very few commodities had the above-mentioned properties. These select commodities began to exhibit a sixth property, all-important in the evolution of money.

[1] Steven Saywell, senior currency strategist at Citibank
[2] These include loyalties of traders, speculators, investors and the general public.

These commodities (most of them metals) had one thing in common with all other commodities. They were useful and commanded an exchange value in their own right. But because they were easier to trade than any other goods, they came to be perceived as having a value over and above their basic utility. They came to have a value as a "most (easily) tradeable good". They came to have a value as ‘medium of exchange’.

Once this value became widely recognized, the commodity in question was no longer "consumed" for any but the most vital purposes. Instead, it was used in exchange, as it had become ‘money’.

There are some economists who believe that the dictionary of economics does not contain terminologies such as "intrinsic" value. The reason is that value does not reside in the economic good. It always resides in the mind of the individual perceiving the good. When looking to acquire an economic good, an individual must decide how much time, or effort, or other economic goods he or she is willing to offer in exchange. That decision determines the value of that economic good, at that particular time, to that unique individual.

This is a crucial distinction. Value is not in what is beheld, it is in the mind of the holder and of the beholder. The reason why some goods evolve into money while most others do not has nothing to do with the "intrinsic value" of the goods so favored. It is because a large number of individuals have realized that goods used as money have a unique usefulness. Unlike all other goods, they can be exchanged easily, and at any time, for anything.

Whatever its complexity, an economy stands or falls upon very basic foundation stones. Individuals must be free to think and act on their decisions. They must be able to gain the rewards of being right and must bear the cost of being wrong. They must be able to concentrate on what they do best, and what they most enjoy doing, instead of spending their time providing for their immediate wants. They must be able to make provision for the future by preserving a portion of what they have produced. In short, they must think, they must produce and they must save. To achieve that efficiently to the greatest extent possible, they must trade with each other.

A man or woman alone in nature can certainly think, act, and gain the rewards of being right or bear the cost of being wrong. He or she can also, by means of great effort, put aside savings, but only for a limited period of time. Indeed, any man or woman alone in nature has no choice but to do these things, if he or she is to survive at all.

In an advanced economy, physical survival is not often an issue. The extent to which individuals can think, work, produce and trade freely determines the potential of the economy. The confidence with which individuals can save and invest long term determines the prosperity of the economy. To save, invest, and plan for the long term is a luxury not granted to a man and woman alone in nature. It is the exclusive preserve of those living in an advanced economy.

Finally, an advanced economy must, by its nature, be one in which there is indirect exchange, using money. In the place of the seed corn and the week's supply of food, there is money. In the place of laboring all day to procure one's immediate needs for food and shelter, there is money. In the place of never being able to rest on the fruits of past effort, there is money. In the place of being at the mercy of nature or dependent on the nature of mercy, there is money.

The evolution of any civilized society is dependent on the discovery of the idea of money, and on the discovery of something that can be used as money. The future of any civilized society is dependent on the quality of what is used as money.

International currency and vehicle currency

The internationalization of a currency begins when an individual agent or institution residing in a country other than that of this currency accepts or uses it as a medium of exchange, unit of account or store of value. There may be many economists who may argue that the definition of internationalization is too broad. For example, let us consider a world with three countries[3], each one issuing a domestic currency. Assume that all exports of all countries are invoiced in the exporter's currency. Then international currency use is completely analogous to the international trade flows and differences in international currency use reflect nothing more than differences in countries' international trade activities. If these were symmetric, then the definition of internationalization stands void (because every currency is equally international). Thus I have restricted the meaning of internationalization to the use of a third currency (thereby narrowing the definition).

There are two types of vehicle currencies — those which serve as media of exchange in goods exchange and those which serve as media of exchange in currency exchange. In general there are, as in the domestic-money case, synergetic forces at work implying some tendency towards keeping the different functions together in one currency. However, because of the multiplicity of currencies competing on the international platform, this tendency is weaker. The function of money as a medium of exchange shows a tendency towards concentration due to the intense international money markets. The stores of value show a tendency towards multiplicity due to risk-reducing diversification.

Considering the Cobb-Douglas utility function, the emergence of a vehicle currency is determined by the goods preferences of other countries. The more a country's good is desired, the higher its exports and the international demand for the domestic currency, the more liquid the respective foreign exchange markets, and the lower the related transaction costs.

There are three main factors that are considered to determine the importance of a currency in the international system: the use of the currency as a 'vehicle' currency, the

[3] For the sake of simplicity, I have restricted the example to three countries only.

use of the currency as a 'reserve' currency and whether the currency is held in international private portfolios.

Vehicle currency

One of the main factors in establishing a currency's international importance is its use in trade transactions i.e. its use as a vehicle currency. A vehicle currency is issued between the two participants in trade transactions. Theory states that exporters generally have a preference for home currency, however when no such preference is stated they generally choose a currency with a deep and liquid foreign exchange market and a high degree of acceptability. Theory also tells us that the use of a currency as a vehicle will lead to 'thick' externalities i.e. the more widely the currency is used for trade and invoicing, the longer it will continue to be used. In practice, world exports are disproportionately invoiced in the currencies of big exporters, with a clear majority (48%) of invoicing in US dollars. With the advent of the Euro in 1999, much has changed in the balance of global trade transactions. The Euro-zone now controls the highest share of world trade, 20.9%, above the 19.5% in the US.

According to the statistics for 1997, only 21% of exports were invoiced in Euro-zone currencies. If current trends continue, we could anticipate a large increase in the use of the Euro in international trade transactions. If we consider the 1:1.5 ratio of exports-to-invoicing for the Deutsche Mark and apply it to the single currency, we can expect it to become used in at least 40% of world exports. I would like to emphasize the potential expansion of the Euro as a vehicle currency.

Reserve currency

A reserve currency is one that is widely held in international central bank reserves. The dollar is currently the dominant reserve currency. According to the BIS statistics, figures for the end of 1997 show that 57% of global official foreign exchange reserves were held in dollars. Over the past twenty years the share of the dollar in official reserves has dropped by at least 13%.

Private Portfolios

Global private portfolios amounted to $7.5 trillion in 1995; of that amount more than half was denominated in US dollars. I am sure that there has been a shift in 2002 towards the Euro. As for the extent of this shift, it is almost impossible to estimate.

An example - Netherlands

Foreign exchange turnover in the Netherlands[4] this year has declined by 27% compared to 1998. This is the outcome of a survey held among large Dutch banks in April 2001. The decline constitutes a break away from a long-standing trend towards ever-higher turnovers. The daily turnover on the foreign exchange market is now USD 30 billion (down from USD 41 billion in 1998). The survey by DNB forms part of a broad global

[4] De Nederlandsche Bank NV, 9 October 2001

exploration held every three years under the aegis of the BIS.

The decline in foreign exchange turnover initiated from the Netherlands has several causes. The disappearance from foreign exchange of twelve European currencies has, of course, meant that the "cross-currency trading" between them also stopped. Also, part of the turnover before 1999 was generated by transactions between Euro currencies with the US dollar acting as "vehicle currency".

After the steep decline of the spot turnovers, foreign exchange swaps have become the largest market segment (71%). The most traded currency pair on the Dutch market is USD/EUR (60%). Second, with a share of almost 11%, comes the trade in USD/CHF, followed by transactions in USD/JPY (almost 8%).

I would like to mention in passing a brief history of international money. If we lay emphasis on the economies of scale in the use of money posited by many of the theories, we may possibly conceive of money as a natural monopoly, thus implying a strong tendency towards a single money (currency). Many fiscal and monetary theories imply the evolution of a single medium of exchange.

This inclination towards a single currency has been overstated many times. This has occurred in the descriptions of Sterling before the First World War and with the US dollar after the Second World War. I feel that there has never been a time wherein any currency has come close to being the single international currency (globally). Nevertheless there have been times when a few currencies temporarily dominated a major part of the globe. Many historians have described the chronology of this dominance of currencies. To begin with there was Byzantine gold *nomisma* (in the fifth-seventh centuries), followed by the Arab Dinar (*mancus* or *marabotin*, eighth-twelfth centuries), the Florentine *fiorino* (thirteenth-fourteenth centuries), the Venetian *ducato* (fifteenth century), the UK pound sterling (sixteenth century till the Second World War) and the US dollar (from the Second World War).

Gold as a medium of exchange

It would not be wrong to state that that gold is money. Gold is money because it fulfills, to an extent unmatched by any other physical commodity (Silver comes closest), all the pre-requisites of a unit of money. It was rare and prized long before the concept of "money" was ever discovered. It has many other unique uses, and always has had. But for nearly three thousand years (since the first gold coins were struck in Lydia in 700 BC[5]) gold's primary utility has been recognized as a medium of exchange.

The history of gold as money in modern coin form spans 2630 years, from 700 BC to about 1930 AD. The history of nothing but paper and base metal and silver coin in circulation spans about 40 years from 1930 to 1970. And the history of paper and base metal coin as "money", with no connection to gold (or silver) anywhere on earth also spans about 30 years from 1970 to date.

[5] Appendix 1 of this paper contains the history of Gold as money in brief.

To be more precise, silver coinage in circulation as money vanished from the world between 1963 and 1965. And on August 15, 1971, the world entered the first era in its history in which no circulating paper anywhere was redeemable in gold by anyone. On that date, U.S. President Richard Nixon "closed the gold window". This broke the last official tie between gold and a circulating currency - which also happened to be the world's "Reserve Currency" - the currency held by all other nations as the reserve behind their own currencies. The result has been the world financial system of our "modern" era - the "floating currency" system.

Gold can betreated as money because of the following properties:

- There's not enough of it!
- It doesn't allow for the "flexibility" so necessary for modern monetary policy to be utilized properly.
- It is too rigid to meet the often rapidly changing needs of business and trade.
- It would confer an inordinate and unacceptable amount of economic "power" upon those nations that are lucky enough to have large deposits within their borders.
- It would stifle "economic growth" by drastically interfering with and even curtailing the present finely tuned lending practices of Central and commercial banks.

"Power grows out of the barrel of a gun".
- Mao Tse Tung

Political power grows out of the ability to interfere in the voluntary interaction between individuals. In a society in any stage of advanced development, the way to do that has always been to gain control of what the society or nation uses as its money.

"There is no subtler, no surer means of overturning the existing basis of society than to debauch the currency. The process engages all the hidden forces of economic law on the side of destruction, and does it in a manner which not one man in a million is able to diagnose." [6]

Keynes was obviously a much subtler thinker than Mao; a gun is not a simple product. The ability to produce guns only comes in the later stages of the development of an advanced economy. But money is a prerequisite of that development starting at all. As has already been stated, progress towards an advanced economy is impossible without a functioning form of money.

Now, it is impossible to "debauch" gold itself. But debauching money is not difficult at all. Both the Greeks and the Romans "clipped" their gold and silver coinage - they began to mix more and more base metals with the gold and silver in their coins. Marco Polo

[6] John Maynard Keynes - The Economic Consequences of the Peace (1919)

brought to the West the first stories of paper money, introduced by Kublai Khan and made from the bark of the mulberry tree. Bankers, who were originally goldsmiths who stored gold for other people and charged a fee for their services, began to issue paper "receipts" for the gold. As these receipts became more widely acceptable in exchange, the idea of "paper money" was introduced. Of course, the bankers couldn't resist. They began to issue more "receipts" than they had gold with which to redeem them. And one of the first things that these bankers did with this "excess paper" was to lend it to Monarchs, and to early governments.

> The Congress shall have power ...to coin Money, regulate the Value thereof, and of foreign Coin, and fix the Standard of Weights and Measures."[7]

The hidden gold wars

In the early 1980s, when the world stock markets boomed everywhere simultaneously, the price of gold reached the $500 level twice. The first time was in early 1983, just as the global boom was getting started. The second time was at the end of 1987, two months after the infamous crash of October 1987. From $499 in December 1987, Gold fell throughout 1988 and dipped below the $400 level in January 1989. Gold has only ever regained the $400 for four very short periods since then[8].

But gold's history in the years since the 1987 crash till recently, is that, at all the actual crisis points, the gold price has not risen, it has fallen. The best single example of this phenomenon remains gold's performance on January 17, 1991, the day that the "air phase" of the Gulf war began. On that single day, the price of gold fell $30 from its previous close. In fact, it fell $40 from its intra-day high. Gold prices had been rising in the months leading up to the war. As soon as the war started, gold prices plummeted. The gold price has failed to respond to the fact that gold demand has exceeded the newly mined gold supply in every year since 1988. It has, consistently done the opposite of

[7] 1787 - The Constitution of the United States - Section 8. That is precisely what the Congress did. In 1792, the US dollar was fixed by law; at 24.75 grains or 0.05156 troy oz. of gold. In 1837, the coinage was reworked and the Dollar was defined at 25.8 grains of Gold "nine-tenths fine". That gives 20.67 Dollars to one troy oz. of Gold. That was the Dollar's "fixed value" (see the quote above) for 96 years from 1837 to 1933. January 31, 1934 - The day after the passage of the Act, President Roosevelt fixed the weight of the Dollar at 15.715 grains of Gold "nine-tenths fine". The Dollar was thereby devalued from $20.67 to one troy ounce of Gold to $35.00 to one troy ounce of Gold - or 40.94%. The Treasury, which had become the possessors of all the nation's Gold on the previous day, saw the value of their Gold holdings increase by $US 2.81 Billion. The Treasury now "owned" the Gold, and no one else inside the U.S. was allowed to own any Gold except by the express permission of the Treasury. The new ratio of $US 35 was adopted at Bretton Woods in July 1944. The U.S. Dollar was made the world's Reserve Currency and the IMF and World Bank established in 1947. The now international ratio of 35 U.S. Dollars to one troy ounce of Gold lasted until August 15, 1971.

[8] Gold traded as high as $422 in December 1989 - January 1990. It reached as high as $415 in the lead up to the Gulf war in August 1990. It reached $408 in August 1993. And finally, Gold reached a high close of $414 in February 1996.

what all of its previous history shows that it "should" do. An in-depth discussion of the reasons for the fore-mentioned is beyond the scope of this paper.

US dollar as international money

Let us go into more depth on the dollar's benign role of facilitating international exchange. Let us consider a world of **n** national currencies without official intervention ~~s~~ or foreign exchange targeting by governments. In organizing private inter-bank markets for foreign exchange, great savings can be made in transaction costs if just one national currency, the n^{th}, is chosen as the vehicle currency. Then all foreign exchange quotations, bids and offers — at all terms to maturity — can take place against this one vehicle currency. The number of active markets can be reduced from n(n-1)/2 to just (n-1). In a world of more than 150 plus national currencies, this is a tremendous economy of markets for the large commercial banks that make the foreign exchange market. The dollar's inter-bank role as the vehicle currency (being on one side of almost 90 percent of inter-bank transactions outside of Europe) allows banks to cover both their forward exchange and options exposures in much more liquid markets.

At longer term, international bond markets gain liquidity if just one, or no more than a small number, of fully convertible currencies denominate private or sovereign bond issues. Trade in primary commodities shows a stronger pattern of using a single national money as the main currency of invoice. Exports of homogeneous primary products such as oil, wheat, and copper all tend to be invoiced in dollars, with worldwide price formation in a centralized exchange. Spot trading, but particularly forward contracting, is concentrated at these centralized exchanges — which are usually in American cities such as Chicago and New York.[9]

In periods of reasonable confidence in American political and monetary policies, these dollar commodity prices are relatively immune to fluctuations in the dollar's exchange rate. In contrast, if any other country allows its exchange rate to fluctuate against the dollar, its domestic currency prices of primary commodities will vary in proportion– unless its trade is restricted.

Invoicing patterns for exports of manufactured goods are more complex. Major industrial countries with strong currencies tend to invoice their exports in their home currencies. Before European Monetary Union, more than 75 percent of German exports had been invoiced in marks, more than 50 percent of French exports invoiced in francs, and so on[10]. With the advent of the European Monetary Union, continental European countries have begun invoicing much of their net exports outside the European Union (EU) in Euros. However, because intra Latin American and intra East Asian trade is mainly invoiced in U.S. dollars, a substantial but as yet unknown fraction of EU industrial exports to these areas will also be dollar invoiced.

Latin American exports to Europe are dollar invoiced only if a higher proportion of their

[9] Although dollar-denominated commodity exchanges do exist in London and elsewhere.
[10] These illustrative ratios were dominated by intra-European trade

exports in that of primary products. Countries like Canada and Australia also find that the great bulk of their imports and exports are invoiced in U.S. dollars. In East Asia, another strong dollar area, the great bulk of foreign trade is invoiced in U.S. dollars even though Japan is the principal exporter to the region. So, in the absence of a purely international medium of exchange — such as gold in the 19th century (as fore-mentioned) — to facilitate a region's trade, one national money or regional one (if it exists) naturally tends to intermediate among a multitude of national monies. I believe that, if the U.S. dollar were not already playing this role, another (major) currency would replace it. But once established, the economies of scale for reducing transaction costs by having most participants in international commerce using the same intermediary currency is so great that only some cataclysmic financial event could displace it.

Other than the United States, which holds negligible official reserves in foreign currencies, the other industrial countries hold more than three-quarters of their official reserve in US dollars[11]. In the realm of worldwide primary commodity trade in oil, copper, wheat, and so on, there is no evidence yet of any switching away from dollar invoicing.

The dollar's continued monetary dominance may seem surprising given that Euro-land is now of an economic and financial size, particularly with its rapidly growing Euro-denominated bond market, comparable to the United States.

It is difficult to explain the persistence of the dollar as international money in the face of competition from other national monies such as the newly created Euro. A possible explanation is that international money is both necessary and a natural monopoly. In the absence of a purely non national international money such as gold, world financial and goods markets will naturally pick one national currency to be the inter-bank vehicle currency. Thus the vehicle currency will be the invoice currency of choice in international trade, the preferred official intervention currency and the principal official reserve asset.

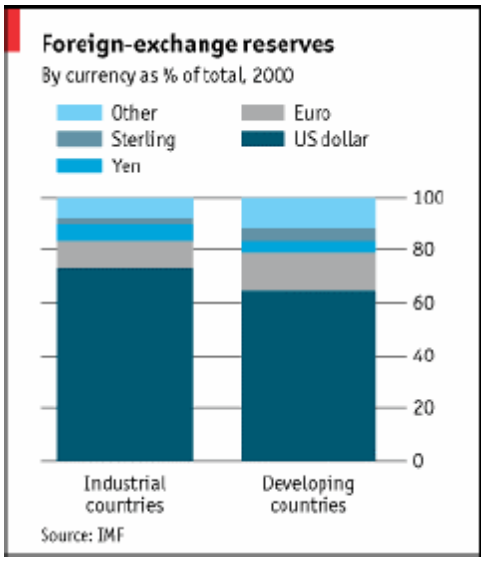
A second complementary role of international money is to provide a nominal anchor for the price levels of some or most of the other countries in the system. After the U.S. dollar had become generally accepted as the central facilitating currency in 1945, other countries naturally tended to peg their currencies to the dollar as the nominal anchor of their domestic price levels. And in the 1950s well into the 1960s, sufficient intra European exchange rate stability was achieved by the simple expedient of all the European countries pegging to the dollar under the cover of the old Bretton Woods par value system.

However, a fixed exchange rate regime is not feasible unless one currency serves as the nominal anchor or key currency around which the others can be pegged. So all the natural monopoly functions of a single international money—vehicle currency, unit of account, reserve asset, and so on—are reinforced if the value of central money is itself stable.

[11] Feb. 11, 2002 The Euro versus the Dollar: Resolving a Historical Puzzle Ronald McKinnon

The advent of the Euro occurred when the dollar standard had been reinforced by ongoing price stability in the United States. In these circumstances, the entrenched central role of the dollar in the world's money machine is simply too hard to displace by the arrival of new strong monies on the international scene. Although in the 1970s monetary instability in the United States provided the initial impetus to develop separate European money, the return to American monetary stability now prevents any significant erosion of the dollar's international role outside of Europe.

Figure 1 – Foreign exchange reserves



The Euro

The Euro represents one of the major achievements in modern European economic history. "As investor confidence grows and as more European Union member states join the Euro area, the Euro's role as an international currency is destined to gain in importance."[12]

On 1 January 1999, Europe was host to one of the most important events in economic history: eleven of the fifteen EU member states formed an Economic and Monetary Union (EMU) and adopted the Euro as their single currency. This development has led to a fundamental transformation of today's global economic landscape. The impact of the Euro on the global economy is also of paramount importance. The following paragraphs of this paper will take a global perspective in attempting to assess the impact of Europe's single currency on the international monetary system. It will attempt to address the question of whether the Euro can be expected to become a major international currency and what benefits could be derived from this status.

Is international currency status is important?

[12] Christian Noyer, vice president of the European Central Bank

> "It is clear that a position of global monetary supremacy offers substantial political benefits. Since World War II, global monetary affairs have been dominated by the American dollar. I feel that this has allowed the US to insulate its policy-making process from outside influences. It has also enabled them to pursue foreign policy objectives with increased clout and fewer constraints. There are economic gains too. If a currency is held internationally, the issuer will benefit from *seignorage* gains. This refers essentially to the gains made by governments from printing money. *Seignorage* can also be derived from a liquidity discount on short-term government debt. High international demand for a currency has the effect of reducing the real yields that the government has to pay on its debt, thus providing that government with *seignorage* gains. The total gains from *seignorage* are of the order of 0.2 or 0.3% of GDP. However the benefits of becoming a major world currency cannot be quantified purely in terms of economic profit. Should the Euro become a powerful currency, the Eurozone will benefit from boosted economic and political credibility."[13]

Many economists on both sides of the Atlantic opined that the Euro made trade a new game. They thanked the US dollar's role as reserve currency in world financial markets. "The U.S. has been able to do what no other country can — consistently import more goods than it exports.... The U.S. owes some $5 trillion to dollar holders abroad, thanks to three decades of trade deficits."[14]

It just isn't true that America's ability to import more than it exports is unique. Since 1980 the U.S. current-account deficit (which includes services and investment income as well as goods) has averaged 1.5% of GDP. That's about the same as Britain's average, less than Canada's 2.2%, and nothing like Australia's 4.2%. These countries paid for their excess imports the same way as the US did: by selling foreigners stocks, bonds, real estate, and so on. The only difference is that because their deficits were bigger, their debts are also bigger as a share of GDP. The US deficits are not that large (on a net basis). The US owes foreigners about $5 trillion, while the foreigners owe the US more than $4 trillion; the difference is about $800 billion (approximately 10% of the US GDP).

Most of the international role of the dollar comes from its use as a "unit of account" — the measuring stick for international business. When an Indian refiner buys Kuwaiti oil, say, the contracts are in dollars (currency of a third country). But the US debts are in their own currency — the US dollar. Where the U.S. does get a significant free ride is from the willingness of foreigners to accept US dollars. Foreigners hold more than $200 billion of American money. It may not be wrong to say that the US dollar is the world's premier medium of illicit exchange. Every year the U.S. ships foreigners $15 billion in cash (approximately 0.2% of GDP), in return for real goods and services.

[13] Marc Feustel – Junior Sophister
[14] Paul Krugman

EU and US agriculture trade

I have argued in my paper[15] that the gross value of agriculture commodities produced by a country affects its foreign exchange rate. I would like to proceed a step further by proposing that the currency's exchange rate refers to its international standing. This logically implies that the agricultural sector of an economy also contributes to the 'strength' of a currency.

"Access to European markets is important to American farmers, and I'm pleased we've been able to resolve this issue and keep our grain exports flowing. This agreement is a good example of how the EU and the United States can find common ground by working cooperatively."[16]

Prior to the advent of the Euro, most of the intra-European trade had the US dollar on one side of their transactions. Subsequent to the introduction of the single currency — the Euro — all intra-European invoicing is being prepared in Euros.

The table below provides the details of the US agriculture trade for the fiscal years 2000 and 2001.

Table 1 – US agriculture exports[17]

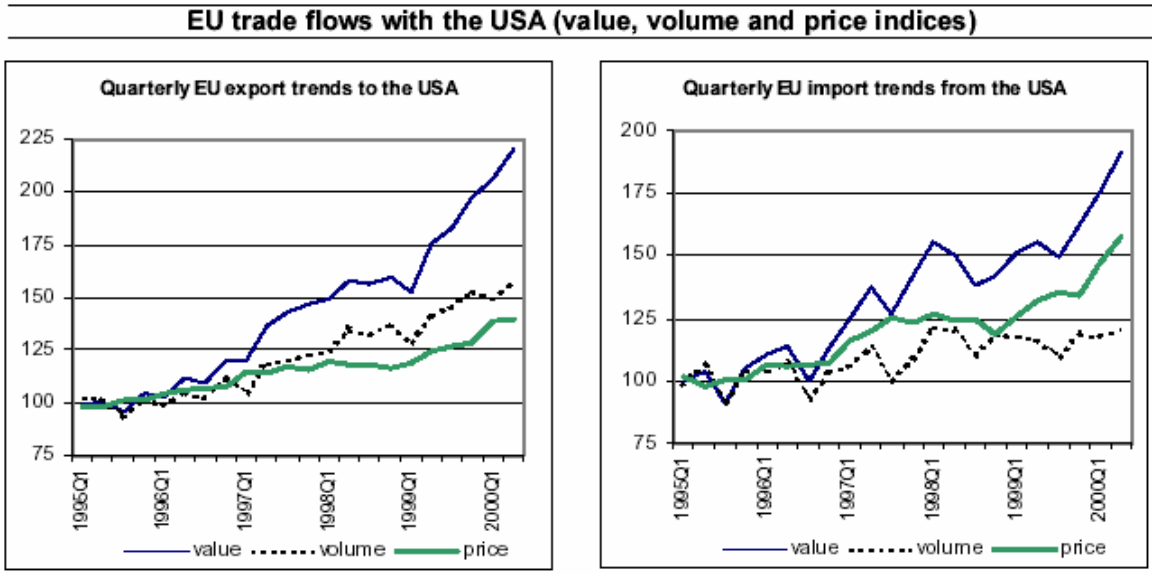
Commodity	FY 2000	FY 2001	Change
	USD million	USD million	Percentage
Coarse Grain	5283	5230	-1
Soybeans	5072	5106	1
Wheat	3398	3256	-4
Cotton	1829	2094	14
Tobacco	1227	1181	-4
Rice	909	782	-14
Pulses	240	251	5
Peanuts	237	135	-43
Other	378	424	12
Total	**18573**	**18458**	**-1**

[15] Impact of agriculture on exchange rates, 2002.
[16] Robert B. Zoellick U.S. Trade Representative
[17] Note: Fiscal years are October-September. All numbers are rounded from original data

Recently the United States and the European Commission (EC) have reached an agreement maintaining the current import system for almost all wheat and feed grains from the United States (known as the margin of preference). This has averted a situation that could have restricted more than $400 million worth of U.S. grain exports to the European Union (EU).

I am of the opinion that the value (in currency terms) of US agri-exports to the EU has a role in the US dollar depreciation in the year 2002. A detailed discussion on the same is beyond the scope of this paper.

Table 2 – EU trade flows



Currency internationalization!

Why does a currency become international? What are the pros and cons of having a currency as international currency? These questions are answered in brief below.

- Vehicle currency

Invoicing

Trade tends to be invoiced in the exporter's currency. However, this is not a general rule and in particular does not hold for small countries. The dollar plays a dominant role: the world dollar invoice is 3-4 times the US share of world trade. For Germany it is 1.4 times.

Transaction costs

The cost of exchanging currencies may differ for different currencies. These different costs may derive from economies of scale and they may facilitate triangular currency trading.

Foreign exchange reserves

Currency competition – Survival of the fittest

Central banks want to maintain stability of exchange rate with those currencies that are mostly used for international trade. Consequently, they intervene and keep these currencies.

- Store of value and portfolio diversification

Country size

Size matters because there is limited portfolio diversification and investors invest in few foreign denominated assets, in particular in those assets that are denominated in currencies that have the highest degree of world-class status (reputation). Size is a necessary condition for a currency to achieve the world-class status.

Market effects

The existence of a wide and deep financial market in which assets are traded facilitates the investment in these assets.

- Macroeconomic stability

Stability in terms of inflation and exchange rates affects the use of a currency in international portfolios.

- Synergies and inertia

An already widely used currency accumulates the characteristics that make it even more attractive internationally.

Pros and cons of a world currency

- Transaction costs

Traveling abroad is easier when the national currency is widely recognized and accepted. Payments can be direct rather than triangular. For example, a European tourist going to India changes his currency in dollars and then uses them to purchase Indian items. If the Euro becomes commonly accepted in India, then the intermediate exchange with dollars will not be necessary. The increase in the market's size reduces transaction costs. The reduction in transaction costs has an indirect effect on trade of goods and financial instruments. For example, to compete with Boeing, Airbus must sell in dollars. But most of its costs are in European currencies. The expansion of the Euro may change this situation.

- *Seigniorage*

It accrues when currency is produced at virtually zero cost and it is exchanged for goods and services provided by the private sector. *Seigniorage* is the value of the goods and services purchased with the newly issued currency. For example, currently, the rest of the world holds 250 billion US dollars, equivalent to 3.3 percent of the US GDP. This is a cheap way to finance government deficits, as the currency does not pay any interest. The annual US *seigniorage* is estimated at 0.2 percent per year.

- Money demand instability

Demand for international currency may be quite volatile. The demand of non-residents is potentially unstable as the motivation to hold foreign currency is not only motivated by transaction purposes as it is for residents. Because of the potential instability of foreign holdings, Germany and Japan have tried to discourage an international role for their currencies.

Conclusion

> 'A remarkable movement is going on in the world towards a uniformity of coinage between different nations… Ultimately the world will see one *code de commerce*, and one money as the symbol of it. We are, as yet, very distant from so perfect an age.'[18]

- In conclusion I feel that, in the long-term, we shall witness the emergence of a single currency.
- Gold will always serve as a 'savior of last resort' option for investors.
- We are witnessing a period of transition, with the US dollar on one side and the Euro on the other. It is very difficult to predict a clear winner between these currencies.
- International trade will serve as one of the main indicators of currency domination. And specifically, trade in the agricultural sector will, in the medium and long-term, serve as a major indicator for currency domination.

Appendix 1 – History of gold as money

330 BC: A gold stater weighing 8.2 grams (0.2637 troy oz.) from the time of Alexander The Great of Macedon (died 323 BC). The portrait is not of Alexander, but of Athena, Greek Goddess of Wisdom. The coin was struck at the mint a *sardeis* - where they did beautiful work. This coin is more than 2,300 years old!

70 AD: A Roman *aureus* weighing 7.2 grams (0.2315 troy oz.) from the time of the Emperor Vespasian. The head on the coin is of *Domitian*, one of Vespasian's supreme legion commanders. Minted at the start of the great age of the Roman Empire - 75 to 180 AD.

440 AD: A Roman *solidus* weighing 4.7 grams (0.1511 troy oz.) from the waning days of the Western Empire. Note the crudity of the stamping compared to earlier coins, especially the Greek coin. This was the Roman Empire's last gasp before the final collapse

690 AD: A "*Bezant*", minted in the East Roman (or *Byzantine*) Empire. The *Bezant* remained pure and unadulterated for almost 800 years, making it the longest lasting

[18] Walter Bagehot, 1868

example of sound money in history. This particular coin is reputed to be the first to portray Christ.

1794 AD: A Golden Guinea - 21 shillings. This one is from the reign of George III. In 1717, Sir Isaac Newton, as Master of the Mint, fixed the weight of the Guinea at 129.4 grains (0.2461 troy oz.) of gold. With the exception of two short wartime periods, that weight was the unvarying benchmark for British circulating coinage and currency until 1931.

1899 AD: The St. George & The Dragon Sovereign - 20 shillings. The British Sovereign was first struck in 1489, during the Reign of Henry VIII. These coins, which contain 0.2354 troy oz. of gold, circulated under various names for nearly 450 years. They are still in demand today as a quasi "bullion coin" - they're worth a lot more than "20 shillings"!

1907 AD: The magnificent "St Gaudens" U.S. $20 gold piece - the "Double Eagle" - widely regarded as the most beautiful gold coin ever struck. From 1837 to 1934, one US dollar was fixed at 23.22 grains of Gold. This coin therefore contains 464.4 grains or 0.9675 troy oz. of Gold. The St. Gaudens was in general circulation in the U.S. from 1907 to 1933.

2000 AD: The "Millennium Sovereign". In sharp distinction to all the coins above, this coin is not meant to circulate as money. It is a "bullion coin". The original sovereigns were equivalent to 20 shillings, or one pound. This coin sells for 65 pounds - or 57 pounds each in lots of 100.

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