

## Chapter 1: International Monetary Systems and the Euro

- a. Current currency regimes
  - b. EMS and Monetary Union
  - c. Euro and Optimal currency zones
- 
- a. Current currency regimes

The international monetary system in today's international finance arena is made up of currencies of individual countries, composite currencies, and the newly emergent single European currency, the Euro. These currencies are linked to one another on a canvas of different currency regimes. These currency regimes are classified by the International Monetary Fund (IMF) into eight categories for its 186 member countries (as of October 2001). These eight categories span a spectrum with rigidly fixed and independently floating currencies at its extremities. Four of these eight categories make up the current currency regimes in 163 member countries (as indicated in brackets below):

1. Managed floating with no preannounced path for the exchange rate (33)
2. Exchange arrangements with no separate legal tender (39)
3. Other conventional fixed peg arrangements (44)
4. Independent floating (47)

In the first, the monetary authority influences exchange rates through foreign exchange market intervention without specifying or precommitting to any preannounced exchange rate path (e.g., Algeria, Singapore, Jamaica, Kenya, and Norway). In the second, the currency of another country circulates as the sole legal tender (e.g., dollarization as in Panama since 1907, or more recently in Ecuador since the beginning of 2000) or the member belongs to a monetary or currency union where the same legal tender is shared by all members of the union (e.g., the Euro). In the third regime, the country pegs its currency (formally or de facto) at a fixed rate to a major currency (e.g., Nepal, Saudi Arabia, and Turkmenistan) or a basket of currencies (a composite) as in Kuwait, Morocco, and Vanuatu, where the exchange rate fluctuates within a narrow margin, or at most + or - 1% around a central rate. Finally, under independent floating the exchange rate is market determined, with foreign exchange market intervention aimed at stabilizing the exchange rate rather than establishing a level (e.g., India, Japan, New Zealand, Switzerland, and the USA).

The remaining minor four categories of the eight categories classified by the IMF are crawling pegs (4), exchange rates within crawling pegs (5), pegged exchange rates within horizontal bands (6), and currency board arrangements (8). In the case of the first two, either the currency is adjusted periodically in small amounts or maintained within certain fluctuation margins around a central rate that is adjusted periodically at a fixed, preannounced rate or in response to changes in selective quantitative indicators. Pegged exchange rates within horizontal bands allow the value of the currency to be maintained within margins of fluctuation around a formal or de facto fixed peg that are wider than + or - 1% around a central rate. Finally, currency board arrangements represent a monetary regime based on an implicit legislative commitment to exchange domestic currency for a specified foreign currency at a fixed exchange rate, combined with restrictions on the issuing authority to ensure the fulfillment of its legal obligation.

#### Currency regimes and currency crises

As globalization increases, the decade of the nineties has seen a progressive sequence of currency crises in emerging markets: the Mexican crisis [1994-95], the Asian crisis [1997], the Russian crisis [1998], the Brazilian crisis [1998-99], and finally the Argentinian crisis [2002]. Most of the policymakers' responses to these crises were based on an increase in the IMF's funding to bail out these economies. However, this bail out has often resulted in fueling these crises by creating a moral hazard in lending behavior. Failure of these economies to deliver on promised fiscal reforms also illustrates the low credibility of the conditionality the IMF imposes.

Some of the alternatives suggested for avoiding such currency crises follow:

- i) Currency controls: As Tobin suggested many years ago, other economists have advocated abandoning free capital movement by imposing some controls to insulate a nation's currency from speculative attacks [e.g., Malaysia]. While this may work over limited periods of time, for the long-term most developing countries benefit from foreign capital, and the know-how, discipline, and more efficient resource allocation that go with such capital flows.
- ii) Freely floating currency: Milton Friedman noted that with a freely floating currency, there has never been a currency crisis. This is because the floating rate absorbs the pressure built up in

countries that try fixing the exchange rate while pursuing an independent monetary policy. It is often argued that the Asian crisis did not spill over into Australia and New Zealand because they had floating exchange rates. Increased capital mobility pressures due to globalization have driven some countries [e.g., Turkey in early 2002] to a free-floating exchange rate.

- iii) Fixed exchange rate: There are three possible ways devised to fix an exchange rate in today's floating exchange rate environment [characterized by just 80 out of the 186 IMF member countries] - currency board, dollarization, or a monetary union. In all three cases, the fixed exchange rate system is made viable by surrendering monetary independence to a foreign / single central bank: the Federal Reserve for countries that dollarize, as well as countries such as Argentina and Hong Kong that have dollar-based currency boards [as the de facto central bank], and the European Central Bank for countries using the Euro. Increased capital mobility pressures due to globalization have driven some countries [e.g., Argentina with a currency board (1991 - 2001) and Ecuador with dollarization in early 2002] to a fixed rate regime. Monetary union is best exemplified by the Euro countries.

An ideal currency would be characterized by three attributes: a fixed value (exchange rate stability), convertibility (full financial integration), and an independent monetary policy (monetary independence). Using any of the alternatives for avoiding currency crises suggested in the earlier paragraphs, entails sacrificing one of these three attributes. This is why Jeffrey Frankel refers to the three attributes of an ideal currency as the Impossible Trinity [Source: "The international financial architecture", Jeffrey A. Frankel, Brookings Policy Brief #51, June 1999].

#### b. EMS and Monetary Union

The European Monetary System (EMS) originally proposed by the German Chancellor Helmut Schmidt, was formally launched in March 1979. The main goals of the EMS were:

- i) Establishing a zone of monetary stability in Europe
- ii) Coordinating exchange rate policies vis-à-vis the non-EMS currencies.
- iii) Paving the way for the European Monetary Union.

Brief background: The Smithsonian Agreement was signed in December 1971, towards the end of the Bretton Woods era of pegged exchange rates [as against the fixed exchange rate alternatives discussed above], to expand the band of exchange rate movements from the original plus or minus 1 percent to plus or minus 2.25 percent. However, members of the European Economic Community (EEC) decided on a narrower band of plus or minus 1.125 percent for their currencies. This scaled-down, European version of the declining, Bretton Woods pegged exchange rate system was dubbed the 'snake', derived from the way EEC currencies moved together closely within the wider band permitted by the Smithsonian Agreement for other currencies like the US dollar. The EEC countries adopted the 'snake' in the belief that stable exchange rates among the EEC countries were essential for promoting intra-EEC trade and ultimate economic integration. The 'snake' system was replaced by the EMS in 1979.

Note: In a fixed rate system, there is loss of monetary independence. This loss of monetary independence is the fundamental difference between a truly fixed-rate system and a pegged rate system like Bretton Woods. In a fixed rate system, the money supply adjusts to the balance of payments. If there is a balance of payments deficit, the supply of currency falls; with a surplus, it rises. With a pegged-rate system, governments can temporarily avoid allowing their money supply to adjust to a balance-of-payments deficit by borrowing from abroad or reducing their foreign exchange reserves to maintain the pegged rate. The pegged rate system calls for monetary and fiscal coordination. With persistent deficit fueled by excessive growth of the money supply, such coordination is extremely difficult to sustain. No wonder the Bretton Woods system, in spite of the Smithsonian Agreement, collapsed.

The two main instruments of the EMS were the European Currency Unit (ECU) and the Exchange Rate Mechanism (ERM):

1. The ECU is a composite currency (or 'basket currency') constructed as a weighted average of the currencies of member countries of the European Union (EU). The weights were based on each currency's relative GNP and share in intra-EU trade. The ECU served as the accounting unit of the EMS and was an essential component of the ERM.

2. The ERM refers to the process adopted by the EMS member countries to manage their exchange rates. The ERM was based on a 'parity grid' system, which was a system of par values among ERM currencies. The par values in the parity grid were computed by defining the par values of each of the EMS currencies in terms of the ECU. These par values were called ECU central rates. The entire parity grid could be computed by referring to the ECU central rates set by the European Commission.

To enable the European Monetary Union (EMU), the member countries agreed to closely coordinate their fiscal, monetary, and exchange rate policies and achieve a convergence of their economies. Specifically, each member country agreed to keep the ratio of government budget deficits to gross domestic product (GDP) below 3 percent, keep gross public debts below 60 percent of GDP, maintain long-term interest rates at no more than 2% above the average for the three members with the lowest interest rates, achieve a high degree of price stability, and maintain its currency within the prescribed ranges of the ERM.

The EMU is a single currency area, informally also known as the Euro zone, within the European Common Market in which people, goods, services, and capital are supposed to move without restrictions. Beginning with the Treaty of Rome in 1957, continuing with the Single European Act of 1987, then the Maastricht Treaty of 1991-92, and the Treaty of Amsterdam in 1997, a core set of European countries have worked steadily toward integrating themselves into one larger, more efficient, domestic market. Even then, the use of different currencies required that consumers and corporations treat the individual markets separately. Currency risk of cross-border commerce still persisted. The creation of a single currency is designed to move beyond these vestiges of separated markets.

### c. Euro and Optimal currency zones

The 15 members of the European Union are also members of the EMS. This group has tried to form an island of fixed exchange rates in a sea of major floating currencies. Since the EMS members have significant trade with each other, they perceive significant benefits in their daily interaction with each other with fixed exchange rates.

Introduction of the Euro into the international financial markets helps these member countries in at least three different ways: i) countries in the Euro zone enjoy lower transaction costs; ii) currency risks and costs related to exchange rate uncertainty are reduced; iii) all consumers and businesses both inside and outside the Euro zone enjoy price transparency and increased price-based competition. Member EMS countries that have not joined the Euro yet, have been weighing the pros and cons of doing so.

The UK feels the Euro will increasingly infringe on its sovereignty and has so far decided not to participate. Sweden does not see significant benefits from EU membership as one of its newest members and so has not joined. Denmark, like the UK and Sweden, has a strong political element which is highly nationalistic, and has also stayed away.

Monetary policy for the EMU is conducted by the European Central Bank (ECB), which has the major responsibility of safeguarding the stability of the Euro. Stability is achieved by protecting the currency's purchasing power which can quickly erode with inflation. The ECB, which has been modeled after the Federal Reserve System in the US or the Bundesbank in Germany, will target inflation so as to reduce the probability of undermining the Euro.

The idea of optimum currency areas emerges from the trade-off between the gains and losses implicit in too large or too small unit currency areas. In other words, such an optimum currency area trades off the lower transaction costs associated with a single currency against its greater vulnerability to economic shocks. It is difficult to assess how large or small such an optimum currency area should be. Some economists argue that Europe would be better with four or five different regional currencies than only one. Similarly, some others have argued that the US too might do better with several regional currencies to cushion shocks such as the ones in the Midwest and the Southwest during the 1980s and the Northeast and California in the 1990s.

However, the experience with floating exchange rates since the 1970s will encourage second thoughts among the proponents of that system. On the other hand, economic flexibility, especially of labor markets is critical to costs associated with currency union. Such flexibility can be attained through further deregulation, privatization, freer trade, labor market and social welfare reform, as well as a reduction in economic controls, state subsidies, and business regulations. If these changes do not occur in a sizable single currency area such as the Euro zone or the US for that

matter, monetary union will intensify economic shocks because their effects can no longer be mitigated by exchange rate adjustments.

Economic flexibility in labor markets is essential, else, monetary union can impose high costs when wages and prices are inflexible. Take the case of global demand for French goods: if it falls sharply, French goods must be made cheaper and new, efficient industries must replace old, inefficient industries. One way out is to reduce wages which cannot be done quickly. Eventually, higher unemployment forces lower wages, but the social and economic costs of the process are high. In contrast to lowering wages by 10%, a depreciation of the French franc would have achieved the change quickly and effortlessly.

On the other hand, if the demand for French goods rises sharply, it would lead to inflation unless the French franc is allowed to appreciate. That is, currency changes can substitute for periodic phases of inflation and deflation as illustrated by these demand changes in the upward or downward direction, respectively. Now that France has entered the Euro zone, it no longer has the option of changing its exchange rate to face such demand shocks effectively.