

EMU: The End of the Beginning



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EMU: The end of the beginning

At midnight on December 31, 2001, for the first time in history, a currency that had not been debased through inflation had its legal tender status revoked, and was replaced by one that has had a rocky start and was only reluctantly accepted by most of its users. For 50 years, from its introduction in 1948, the German mark was one of the world's strongest currencies, and it was viewed as one of the great achievements of the postwar Bonn Republic. Its replacement by the euro marks a major milestone in European integration. On January 27, the mark was joined by the Dutch guilder, and on February 9 the Irish punt disappeared into history. The French franc will be a thing of the past after February 17, and by the end of this month all of the national legacy currencies of the 12-nation euro area (the Italian lira, the Spanish peseta, the Portuguese escudo, the Greek drachma—one of the world's oldest currencies—the Austrian schilling, the Finnish markka, and the Belgian and Luxembourg francs, which have long shared a monetary union of their own) will cease to be legal tender. From February 28, the only legal tender in most of Western Europe will be the euro.

The introduction of euro banknotes and coins, which began on January 1, 2002, has been successful beyond all expectations. The predictions of long lines at retail outlets and railway stations were not borne out, and the European public has embraced the new currency with an enthusiasm that surprised even its most ardent supporters. There were glitches, but they were few. The introduction of the notes and coins, far from marking the beginning of the end of European economic and monetary union (EMU) as some had expected, simply marks the end of the beginning.

The Scale of the Task

In 1950, when the French Foreign Minister Robert Schuman proposed the first steps toward greater integration between Germany and France, he noted that:

“Europe will not be made all at once, or according to a single plan. It will be built through concrete achievements which first create a *de facto* solidarity.”

These achievements were modest at first: sharing of sovereignty over coal and steel (the raw materials of industrial-age warfare), and later the creation of a common market. Over the years the ambitions of the integrationists have grown and so have their achievements: the creation of a single market for goods, labor and capital, the transformation of the European Economic Community into the European Union (EU) of today, expansion from six to 15 members, and now the completion of economic and monetary union. In less than five years we may see the EU expand to 25 members, and before the end of the decade the euro may well be the only currency used in all of Europe, and may even have made tentative steps into Asia.

The completion of the launch of EMU is a concrete achievement *par excellence*, and one that fundamentally alters the character of the European Union.

As you all know, the euro has been around for slightly more than three years. During that time the euro has not had a physical form, existing only as a unit of account, while the notes and coins of the legacy currencies continued to circulate as the medium of exchange.

You might well ask why the introduction of the notes and coins did not take place at the same time that monetary union was formally launched. A three-year transition period, though not specified in the Maastricht Treaty, was deemed necessary in part to allow sufficient time for the production of the new euro banknotes and coins. Approximately 15 billion euro banknotes (with a face value of about €635 billion) had to be produced to replace the banknotes of the legacy currencies. (Placed end to end, the banknotes would cover a distance of 1.9 million km, or five times the distance between the earth and the moon.) Likewise, some 50 billion euro coins (with a face value of about €15.75 billion) had to be produced over the past three years to be ready for the January 1 launch date. (If stacked on top of one another, the coins would reach a height of 78,870 km; the combined weight of the coins is approximately 250,000 tonnes.) For the sake of comparison, there were about 14 billion U.S. banknotes of all denominations in circulation as of September 30, 2001, with a face value of \$612 billion (about €680 billion at an exchange rate of €1 = \$0.90).

Once production of the notes and coins was nearly complete, there remained the formidable logistical challenge of distributing them to financial institutions and other businesses to facilitate a smooth transition. Likewise, the payments infrastructure (the 200,000 ATMs, the 3.5 million plus vending machines, etc.) had to be recalibrated to dispense and accept the new currency.

It is unlikely that, large as these tasks were, they really required three years of preparation. After all, countries in Latin America seem to be able to introduce new currencies almost overnight, and, at least until recently, did so on a regular basis! Production of the euro banknotes began in 1999, and peaked at more than one billion banknotes a month in the summer and autumn of 2001. Production of coins began even earlier, shortly after the May 1998 summit meeting at which the decision was taken to proceed with monetary union. A more important reason for the three-year transition was to allow businesses and consumers time to familiarize themselves with the new currency before being forced to use it in all transactions.

Characteristics of the Notes and Coins

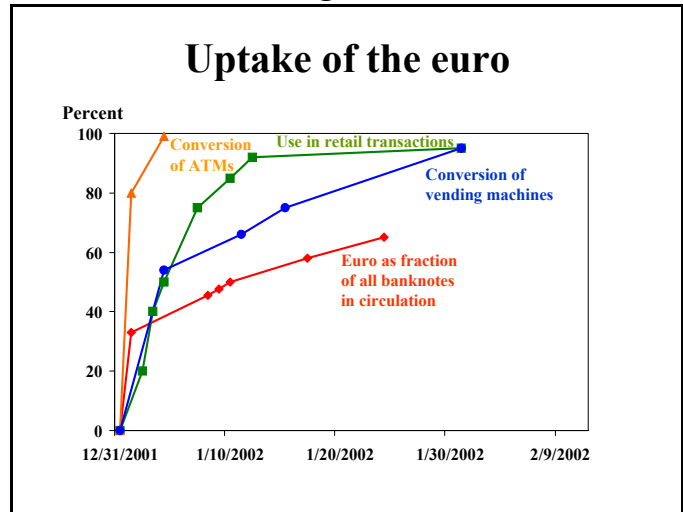
The denominational structure of the euro follows a standard 1-2-5 (or binary-decimal) pattern, with denominations of 1 cent, 2 cent and 5 cent, 10 cent, 20 cent and 50 cent, and so on up to 500 euro. The highest denomination coin is the €2 coin, and the lowest denomination note is the €5 note. Note that the definitional denomination, €1, is a coin.

The coins all have a common European side, while the reverse side carries national designs. Unlike the banknotes, which are issued by the ECB via the national central banks, the euro coins are issued by the national treasuries of the participating countries, subject to the approval of the ECB. Coins issued by national governments will be legal tender throughout the euro area.

Euro banknotes do not have any distinguishing national features, apart from a letter code at the beginning of the serial number to denote where the note was printed. The front sides of the notes all feature windows and gateways from different architectural styles (symbolizing openness), while the reverse side features bridges (signifying cooperation). (The seven periods represented are the classical [€5], Romanesque [€10], Gothic [€20], Renaissance [€50], baroque and rococo [€100], nineteenth century iron and glass [€200], and modern [€500]). Care was taken not to include the likeness of any actual window or bridge. Gone are the national heroes (monarchs, writers, artists and scientists) that graced the banknotes of the legacy currencies.

Uptake of the euro notes and coins by the general public proceeded somewhat quicker than expected (**Figure 1**). Banknotes had been distributed (or “frontloaded”) to financial institutions throughout the euro area as early as last September, and financial institutions in turn distributed (or “sub-frontloaded”) banknotes and coins to the retail sector and other cash businesses in the last months of 2001. Starter kits of euro coins were distributed to the general public in mid-December, and at midnight on December 31, 2001,

Figure 1



ATMs across the euro area started disbursing euro banknotes. Of the 200,000 or so ATMs in the euro area, more than 80 percent had been converted to issue euro on January 1, 2002; by January 3, the proportion was 97 percent. About half of the coin-operated vending machines in the euro area had been converted to accept euro on January 4, and by the end of January the proportion was close to 95 percent. The euro was being used in more than half of all retail transactions after only three business days, and exceeded the 90 percent mark by Saturday, January 12. The euro replacement ratio, which is the ratio of euro banknotes in circulation to the total of euro and national banknotes in circulation, hit the 50 percent mark on January 10, and was 65 percent on January 25.

I noted at the outset that some of the legacy currencies have already lost their legal tender status, and all will have ceased to be legal tender by the end of this month. Following the end of legal tender status, there will be a period during which the legacy currencies can be redeemed at national central banks. However, only four countries (Austria, Germany, Ireland, and Spain) will redeem national coins and banknotes indefinitely. Belgium and Luxembourg will redeem old banknotes indefinitely, but will cease to redeem coins at the end of 2004. The Netherlands will redeem notes until 2032, but will cease redeeming coins in 2007. The other countries have set various cutoff dates for redemption of notes, with the soonest being 10 years from now. Table 1 gives the complete details.

A common fear among European consumers in the run-up to the introduction of the euro notes and coins was that businesses would take advantage of the cash changeover to raise prices “surreptitiously.” And indeed, the most recent data on inflation in the euro area suggests that there may be something to this. The flash (or advance) estimate of euro area inflation for January is 2.5 percent, up from 2.1 percent in December.

Usually when a new currency is introduced, it is a conversion rate that makes the new currency some convenient decimal multiple of the old currency. The last time such a reform was undertaken in Europe was in France on January 1, 1960, when the old franc was replaced by the new “heavy” franc at a rate of 1 new franc = 100 old francs. When the introduction of a new currency simply entails the dropping of a few zeros, it is relatively easy for shoppers and businesses to familiarize themselves with the new currency.

Table 1

Key dates in the withdrawal of legacy currencies			
	End of legal tender	Exchange at banks after end of legal tender	Redemption at central bank after end of legal tender
Austria	February 28, 2002	To be decided individually by banks after February 28, 2002	Indefinitely
Belgium	February 28, 2002	December 31, 2002	Notes: Indefinitely Coins: End 2004
Finland	February 28, 2002	To be decided individually by banks	February 29, 2012
France	February 17, 2002	June 30, 2002	Notes: February 17, 2012 Coins: February 17, 2005
Germany	December 31, 2001	At least until February 28, 2002	Indefinitely
Greece	February 28, 2002	Positive (to be decided individually by banks)	Notes: March 1, 2012 Coins: March 1, 2004
Ireland	February 9, 2002	For a period not yet specified	Indefinitely
Italy	February 28, 2002	Banks to decide in February 2002	March 1, 2012
Luxembourg	February 28, 2002	June 30, 2002	Notes: Indefinitely Coins: end-2004
Netherlands	January 27, 2002	December 31, 2002	Notes: January 1, 2032 Coins: January 1, 2007
Portugal	February 28, 2002	June 30, 2002	Notes: December 30, 2022 Coins: December 30, 2002
Spain	February 28, 2002	June 30, 2002	Indefinitely

However, the irrevocable exchange rates between the euro and the legacy national currencies are not even close to being simple multiples. One euro is equal to 1.95583 German marks, 6.55957 French francs, 0.787564 Irish punts and so on. Hence the fear that retailers will take advantage of confusion on the part of consumers during the cash changeover to round prices up. I've heard anecdotal evidence that the price of a pint of Guinness in Dublin is now €3.15, instead of the €3.11 it should be if converted at the fixed exchange rate. However, I've also discovered that the cost of a one-way subway ticket from the Frankfurt airport to downtown Frankfurt is now €3.10, instead of the €3.12 it would have cost if the old fare was converted at the fixed exchange rate.

Standard economic theory tells us that currency reforms of this sort ought not lead to any significant change in the price level, up or down. For every example of a price that is rounded up, there is sure to be a less well-publicized example of a price that is rounded down. The European Commission argues that the January increase is in line with what would have been expected on the basis of existing seasonal patterns, recent price behavior and an increase in fuel costs in January.

And Now?

Going forward, there are many open questions. Three of the biggest are:

- How soon will the countries that are currently members of the EU but not members of EMU (the so-called "pre-ins") adopt the single currency?
- How soon will the euro be adopted by the countries of Central and Eastern Europe?
- Will the euro displace the dollar as the world's premium international currency?

Of the 15 current members of the EU, only three, the UK, Sweden and Denmark, do not at present participate in the single currency. Of the three, the UK is clearly the most important, both from a European perspective and from a U.S. perspective. The UK has one of the largest economies in Europe, and London is by far the most important financial center in Europe. From a U.S. perspective, the UK has long been the most important gateway to Europe for many U.S. firms. The bulk of U.S. investment in the EU is in the UK, and the UK is the source of most European investment in the United States.

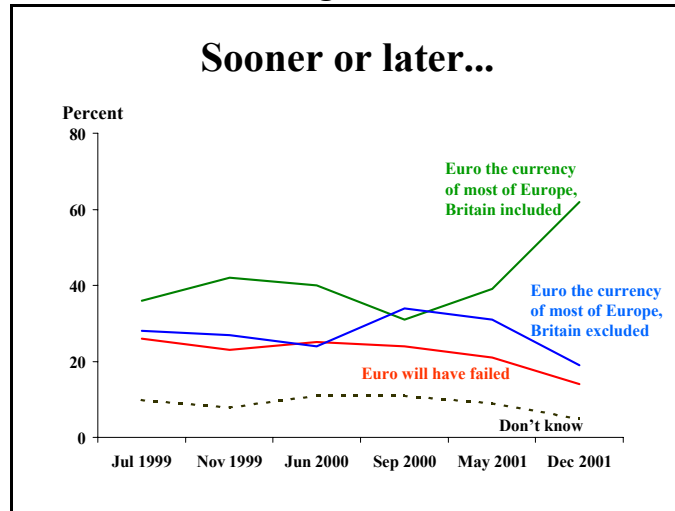
The UK has long had an ambivalent relationship with the EU and has tended to be skeptical about the efforts of continental politicians to forge stronger ties between the countries of Europe. One recent writer has characterized Britain's often troubled relationship with Europe as a struggle "...to reconcile a past she could not forget with the future she could not avoid."

The single currency has been a divisive issue in British politics for the past decade, and remains so. Hostility to EMU on the part of the UK and Denmark was significant enough that both negotiated opt-out clauses to the treaty governing monetary union. However many members of the current Labor government, including Prime Minister Blair, are enthusiastic about taking the UK into EMU, possibly some time soon. Europhiles are hoping that the process of "euro creep" will lower the resistance of many voters to the single currency and generate consent through familiarity. Many leading UK retailers have announced that they will take euro, and

some components of the payments infrastructure (vending machines, etc.) will be calibrated to accept euro. Furthermore, many large multinational businesses operating in the UK are requiring that their suppliers invoice them in euro.

And there is some evidence that the electorate is slowly coming around to the view that the UK will probably be a member of the euro area, sooner or later. Last December nearly two-thirds of British voters agreed with the statement that the euro was likely to be the currency of most of Europe within the next 10 years, Britain included (**Figure 2**). Opinion polls taken since the cash changeover confirm that public sentiment is becoming less hostile.

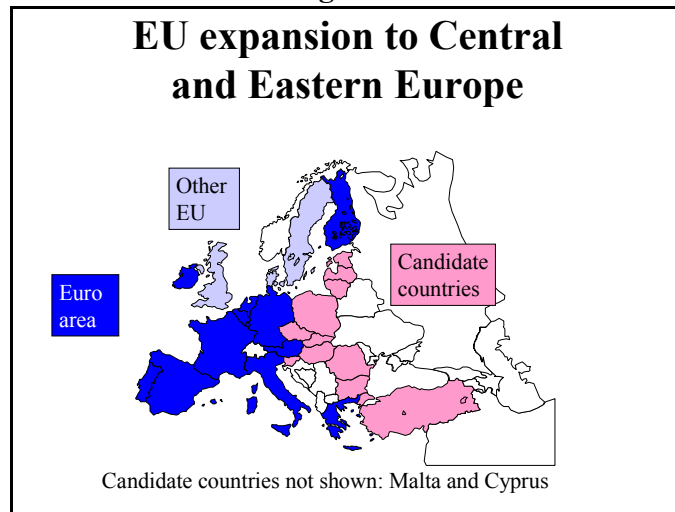
Figure 2



The Spread to the East

No fewer than 13 Central and Eastern European countries are in the process of negotiating membership of the EU. The degree of preparedness of the countries differs, but there is a very real possibility that the EU could undergo a “big bang” expansion as early as 2004 that would admit up to 10 of these countries (all except Bulgaria, Romania and Turkey) (**Figure 3**). At present the euro is used by some of these countries through either a currency board type arrangement (in Bulgaria, Estonia), as part of a basket of currencies to which the currency is pegged (in Cyprus, Latvia, Malta) or as an alternative medium of exchange (in the form of D-mark notes and coins and to a lesser extent Austrian schillings). On February 2, Lithuania switched from pegging its currency (the litas) to the dollar to a currency board arrangement backed by euro.

Figure 3



The countries of Central and Eastern Europe must first become members of the EU before they can become members of EMU. Even in the absence of EU membership, there is nothing to stop these countries adopting the euro by simply “euroizing” their economies. However, the European Commission and the ECB are not enthusiastic about candidate countries taking this course, and I would be surprised if any of them did in fact do so.

After joining the EU, the accession countries will still have to meet the Maastricht criteria for EMU membership. While some of the countries fare surprisingly well in terms of some of the criteria, they are all still some way from satisfying all of the criteria. However, you should keep in mind that in many ways they are not in appreciably worse positions than many of the current members of EMU were 10 years ago, when the single-currency project was launched.

Expansion of the euro area to include the three EU states that are not currently members and all 13 of the candidate countries would add about 248 million people to the euro area, making its total population about 550 million. The enlarged euro area would account for about 42 percent of world output, somewhat more than the 38 percent currently accounted for by the United States.

Would an enlarged EU make it more likely that the euro might some day displace the dollar as the world's most important international currency? The euro is already the world's second most important currency, playing a role in international finance far greater than that of any legacy currency. The international role of the euro will only grow over time, as more countries join the euro area and central banks shift more of their reserves into euro. However, the dollar will continue to realize the benefits of incumbency for some time to come. And there are reasons to believe that the benefits from being the world's number one currency, while real, are a lot smaller than commonly thought.

Concluding Observations

There is an apocryphal story to the effect that when the initial negotiations for the European Economic Community were taking place, the British delegate made the confident assertion, "Gentlemen, you are trying to negotiate something you will never be able to negotiate. But if negotiated, it will not be ratified. And if ratified, it will not work." At a session on the euro at the recent meetings of the American Economic Association, a senior ECB official took some delight in reminding his audience of this remark and of the similar skepticism expressed by many North Americans that EMU would ever come to pass.

The introduction of the euro notes and coins was a great success and completes the transition to economic and monetary union. The fact that the euro now has a physical form will make it all the more real to the average citizen, and may begin to foster the sort of European identity that was among the goals of the currency's architects. The introduction of the notes and coins also makes EMU just that bit more difficult to reverse, not that there is any provision for exit in the governing Treaty.

I would not be surprised if the success of the cash changeover prompts the "pre-ins" to join EMU sooner rather than later. I would also not be surprised to see greater use of the euro in the so-called accession countries, and the emergence before the end of this decade of a single currency area in Europe larger than the dollar area in the Americas. The concerns that some have expressed about the feasibility of the 12 current members of the euro area successfully sharing a common currency were not changed by the introduction of the physical notes and coins, and would apply with even greater force to the enlarged euro area. However, I remain optimistic that EMU will endure and prosper, and will contribute to a revival of growth in Europe over the next decade.