

# FRBSF ECONOMIC LETTER

Number 2005-19, August 12, 2005

## Does Europe's Path to Monetary Union Provide Lessons for East Asia?

In 1999, eleven European countries adopted the euro as their common currency (Greece followed in 2001). This followed a long period of gradually tying their national currencies together more tightly by limiting exchange rate fluctuations among member countries, culminating in the European Monetary Union (EMU). The experience of Europe has raised the question as to whether countries in other regions of the world can and should follow a similar path towards adopting a common currency.

East Asia, with some of the most dynamically growing economies in the world, has long been considered a possible candidate for a regional monetary union. This *Economic Letter* addresses three questions that help frame the issue. First, is it desirable for East Asia to adopt a common currency like the euro? Second, does Europe's experience provide any lessons for East Asia about how to attain a common currency? Third, how does the economic integration path that East Asia is now following differ from the path Europe followed?

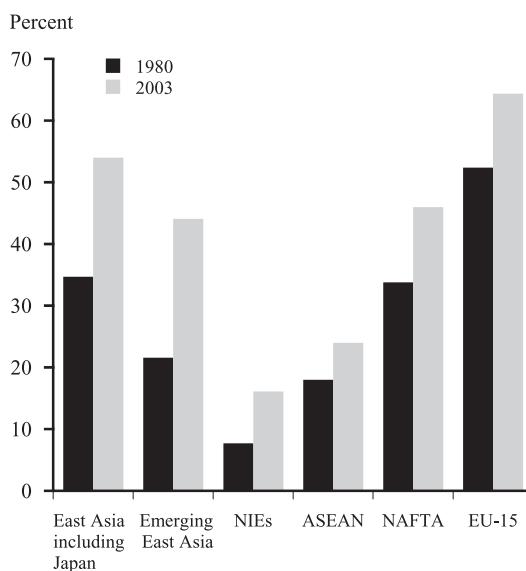
### Is a common currency desirable for East Asia?

Joining a monetary union can benefit a country's economy in a number of ways. First, it eliminates exchange rate risk with other monetary union members, which facilitates trade among them. Second, it makes price differences in member countries more transparent and, therefore, sharpens competition. Third, it may increase policy discipline; specifically, an individual country's central bank may become more credible in its commitment to price stability by delegating authority for monetary policy to a regional central bank. Related to this third benefit, however, is the principal *cost* of joining a monetary union—by delegating authority for monetary policy to a regional central bank, an individual country's central bank loses independent monetary policy control and, therefore, the ability to stabilize the economy when it is hit by a shock.

The benefits of joining a monetary union may outweigh the cost, depending on how great the cost is. Specifically, according to the so-called optimum currency theory, the cost, or the need for independent monetary policy control, is greater when member countries are exposed to different shocks and lesser when they are exposed to the same or similar shocks. One factor that reduces the likelihood of different shocks is high trade integration among member countries. Other considerations, such as high labor mobility and a system of intraregional fiscal transfers, also lessen the cost.

Does East Asia satisfy the criteria for a lesser cost to joining a monetary union? Much research has explored this question, and the empirical evidence suggests that this region does, more or less. For example, as Figure 1 shows, East Asian countries do trade a lot with each other. (Note: this figure is adapted from Kawai and Motonishi 2004.) By themselves, countries within the Association of

**Figure 1**  
Intraregional trade (as share of total trade)



Southeast Asia Nations (ASEAN), which includes Indonesia, Malaysia, Philippines, Thailand, and several other smaller countries, do not trade much with each other; likewise, by themselves, the countries within the Newly Industrialized Economies (NIE) grouping—Korea, Hong Kong, Taiwan, and Singapore—do not trade much with each other. But taking these emerging countries of East Asia together with China, about 40% of trade was intraregional in 2003, up from 20% in 1980. When Japan is included, more than 50% of trade is intraregional, up from about 35% in 1980. This is comparable to the more than 60% intraregional trade within the European Union (EU).

More supporting evidence for the plausibility of an East Asian currency area comes from looking at the correlation of demand and supply shocks. Kwack (2004) and Zhang et al. (2004) recently applied the Blanchard-Quah methodology to identify demand and supply shocks from movements in prices and output. They find evidence of high correlations of demand and supply shocks, although the correlations for Japan and China, the two largest countries in the region, are somewhat lower. Still, in general, the correlations are not much different from those across Europe in the early 1990s (see Bayoumi and Eichengreen 1994). (It should also be noted that these correlations are partly endogenous; that is, the adoption of a monetary union of itself can lead to more trade integration which, in turn, raises the cross-correlations.)

### **Does Europe's experience provide any lessons about how to get a common currency?**

Though East Asia has moved toward satisfying the optimal currency area criteria, the region remains very different from Europe in ways that make it difficult, if not impossible, to follow the European path. Four differences stand out.

First, East Asian economies have much less in common than European nations generally do in terms of income levels, stages of development, and economic structure. The implication is that achieving any monetary arrangement, including a common currency, is much more difficult in East Asia.

Second, East Asia is less economically self-contained than Europe. To be sure, as economies in East Asia have developed, intraregional trade has grown—from about 20%–30% of total exports in the 1980s to about 40%–50% in 2002. But about half of the intraregional trade is trade in raw materials and intermediate components that ultimately are exported outside of the region. For example, they trade chips and hard disks, but they sell the assem-

bled computers in the U.S. and Europe. So, indirectly and directly, East Asian countries still depend much more heavily on exports to countries outside the region. Thus, East Asia must be more concerned than Europe about exchange rate stability against currencies outside the region as well as within the region.

Third, the two regions differ in terms of interest in political integration. In Europe, a monetary union was achievable primarily because it was part of the larger process of political integration. Most European countries share a history of intellectual belief in the benefits of integration and political democracy. The experiences of World War I and II generated a desire to forge deeper political, as well as economic, links in order to prevent a recurrence of country conflicts. These political desires were indispensable for the success of the EMU in particular and the EU more generally. There is no apparent desire for political integration in East Asia, partly because of the great differences among those countries in terms of political systems, culture, and shared history. As a result of their own particular histories, East Asian countries remain particularly jealous of their sovereignty.

The fourth difference is that, in contrast to Europe, East Asian governments appear much more suspicious of strong supranational institutions. Early on, European countries were willing to contemplate compromises of national sovereignty to achieve the goal of greater integration. The European Coal and Steel Community was established way back in 1952 and was given significant power to close down segments of national steel industries. Later came the European Commission, the European Parliament (which has very considerable power to shape competition policies, social policies, and so on, for EU member states). All these institutions preceded establishment of the European Central Bank; they were indispensable to providing the popular support for delegating monetary decisions to a common central bank. In contrast, in East Asia, sovereignty concerns have left governments reluctant to delegate significant authority to supranational bodies, at least so far.

### **What path is East Asia following towards greater economic integration?**

It is not at all clear that East Asia is on a path to a common currency. But it is very clear that it is following a different path from Europe's.

First, in contrast to Europe, East Asia has not pursued formal trade liberalization as its first priority in integrating the region's economies. Europe

pursued formal trade liberalization, first through a customs union and free trade area, well before it focused on monetary cooperation. In East Asia, formal trade liberalization has been slower to materialize. Negotiated trade agreements generally involve only the smaller countries or bilateral agreements between a large country and a small country; no broad free trade agreements have been achieved among the largest countries in the region, Japan, Korea, Taiwan, and China.

A second key difference is the timing of liberalizing capital accounts. Most European countries did not fully liberalize capital flows until the late 1980s or very early 1990s, after their domestic financial markets were well developed and the integration process was well along. In contrast, many countries in East Asia (China is a notable exception), liberalized their capital accounts *before* their financial markets were well developed. This has heightened the region's vulnerability to destabilizing capital movements, which, if not the cause of the East Asia financial crisis, were at least factors that made it worse. Clearly, capital mobility makes it difficult to sustain either a single currency peg or a common basket currency peg, which some have advocated as a useful stepping stone to an East Asian monetary union.

Third, East Asia does not appear to have an obvious candidate for an internal anchor currency for a cooperative exchange rate arrangement. Most successful new currencies have been started on the back of an existing currency, establishing confidence in its convertibility, thus linking the old with the new. In the approach towards adoption of the euro, European exchange rates were tied to an internal anchor, the deutsche mark. But the choice of an internal currency anchor is not so clear in East Asia. The yen was an obvious candidate, but Japan's economic problems over the past decade and wide swings in the yen-dollar exchange rate have lessened its appeal. As for China, its currency is not convertible for capital account transactions and its financial system is not well developed. Moreover, East Asia's heavy dependence on exports outside the region implies that an external currency anchor now has more merits than an internal anchor.

### Conclusion

Asia's history and current circumstances—the differences among its countries, its dependence on

extra-regional trade, its political diversity, its lack of strong collective institutions, and its capital mobility—imply that exchange rate stabilization and monetary integration are unlikely in the near term. Nevertheless, East Asia is integrating through trade, even without an emphasis on formal trade liberalization agreements. Moreover, there is evidence of growing financial cooperation in the region, including the development of regional arrangements for providing liquidity during crises through bilateral foreign exchange swaps, regional economic surveillance discussions, and the development of regional bond markets. These kinds of cooperation do not yet require the same compromises of sovereignty that seem to preclude adopting a common East Asian exchange rate policy.

Finally, it must be acknowledged that the European Monetary Union and the adoption of the euro was a project that was fifty years in the making. In time, East Asia might also proceed along the same path, first with loose agreements to stabilize currencies, followed later by tighter agreements, and culminating ultimately in adoption of a common anchor—and, after that, maybe an East Asia dollar.

**Reuven Glick**  
Group Vice President, International Research

### References

[URL accessed August 2005.]

- Bayoumi, Tamim, and Barry Eichengreen. 1994. "One Money or Many? Analyzing the Prospects of Monetary Unification in Various Parts of the World." Princeton Studies in International Finance No. 76.
- Kawai, Masahiro, and Taizo Motonishi. 2004. "Is East Asia an Optimum Currency Area?" Paper delivered at the conference on Financial Interdependence and Exchange Rate Regimes in East Asia sponsored by the Japan Ministry of Finance Policy Research Institute, December 2-3, 2004. [http://www.mof.go.jp/english/soken/kiiep2005/kiiep2005\\_04.pdf](http://www.mof.go.jp/english/soken/kiiep2005/kiiep2005_04.pdf)
- Kwack, Sung Yeung. 2004. "An Optimum Currency Area in East Asia: Feasibility, Coordination, and Leadership." *Journal of Asian Economics* 15(1) (February) pp. 153-169.
- Zhang, Zhaoyong, Kiyotaka Sato, and Michael McAleer. 2004. "Is a Monetary Union Feasible for East Asia?" *Applied Economics* 36(10) (June) pp. 1031-1043.

ECONOMIC RESEARCH  
FEDERAL RESERVE BANK  
OF SAN FRANCISCO

PRESORTED  
STANDARD MAIL  
U.S. POSTAGE  
PAID  
PERMIT NO. 752  
San Francisco, Calif.

P.O. Box 7702  
San Francisco, CA 94120  
Address Service Requested

Printed on recycled paper  
with soybean inks



**Index to Recent Issues of *FRBSF Economic Letter***

DATE	NUMBER	TITLE	AUTHOR
12/17	04-37	Productivity Growth and the Retail Sector	Doms
12/24	04-38	After the Asian Financial Crisis: Can Rapid Credit Expansion ...	Valderrama
1/7	05-01	To Float or Not to Float? Exchange Rate Regimes and Shocks	Cavallo
1/21	05-02	Help-Wanted Advertising and Job Vacancies	Valletta
2/4	05-03	Emerging Markets and Macroeconomic Volatility: Conference Summary	Glick/Valderrama
2/18	05-04	Productivity and Inflation	Yellen
3/11	05-05	Gains in U.S. Productivity: Stopgap Measures or Lasting Change?	Daly/Furlong
4/8	05-06	Financial liberalization: How well has it worked for developing countries?	Aizenman
4/15	05-07	A Tale of Two Monetary Policies: Korea and Japan	Cargill
4/29	05-08	The Long-term Interest Rate Conundrum: Not Unraveled Yet?	Wu
5/20	05-09	Can Monetary Policy Influence Long-term Interest Rates?	Jordà
5/27	05-10	More Life vs. More Goods: Explaining Rising Health Expenditures	Jones
6/3	05-11	Are State R&D Tax Credits Constitutional? An Economic Perspective	Wilson
6/10	05-12	Fiscal and Monetary Policy: Conference Summary	Dennis/Williams
6/17	05-13	IT Investment: Will the Glory Days Ever Return?	Doms
6/24	05-14	Stress Tests: Useful Complements to Financial Risk Models	Lopez
7/15	05-15	Age and Education Effects on the Unemployment Rate	Valletta/Hodges
7/22	05-16	Understanding the Twin Deficits: New Approaches, New Results	Cavallo
7/29	05-17	What If Foreign Governments Diversified Their Reserves?	Valderrama
8/5	05-18	Monetary Policy and Asset Price Bubbles	Rudebusch

Opinions expressed in the *Economic Letter* do not necessarily reflect the views of the management of the Federal Reserve Bank of San Francisco or of the Board of Governors of the Federal Reserve System. This publication is edited by Judith Goff, with the assistance of Anita Todd. Permission to reprint portions of articles or whole articles must be obtained in writing. Permission to photocopy is unrestricted. Please send editorial comments and requests for subscriptions, back copies, address changes, and reprint permission to: Public Information Department, Federal Reserve Bank of San Francisco, P.O. Box 7702, San Francisco, CA 94120, phone (415) 974-2163, fax (415) 974-3341, e-mail [sf.pubs@sf.frb.org](mailto:sf.pubs@sf.frb.org). **The *Economic Letter* and other publications and information are available on our website, <http://www.frbsf.org>.**