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Kingdom of the Netherlands - Netherlands: Selected Issues—Cyclically Advanced Euro-Area Economies: Consequences and Policy Options

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KINGDOM OF THE NETHERLANDS—NETHERLANDS

Selected Issues

Cyclically Advanced Euro-Area Economies: Consequences and Policy Options

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Approved by the European I Department

May 21, 2001

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CYCLICALLY ADVANCED EURO-AREA ECONOMIES: CONSEQUENCES AND POLICY OPTIONS

EXECUTIVE SUMMARY

This paper examines the experiences and policy options of five cyclically advanced euro-area countries (Finland, Ireland, the Netherlands, Portugal, and Spain). It is an updated and slightly revised version of SM/00/182, which was circulated to the Executive Board on July 27, 2000. It is being reissued in the form of a Selected Issues paper because this Article IV consultation marks the last of the consultations for the five countries discussed in the paper, and because the issues raised are central to the macroeconomic policy considerations in the Netherlands.

Although there are no exchange rate concerns, overheating is likely to engender growing imbalances which could result in an eventual "hard landing". The chapter emphasizes the difficulties in early detection of demand pressures, since prices are in large part set in the monetary area as a whole, asset price increases are difficult to interpret, and indirect measures (such as potential output and the NAIRU) are notoriously difficult to assess accurately. Fiscal policy is the obvious macroeconomic lever, particularly if the cyclical needs are aligned with medium-term requirements. However, discretionary fiscal policy suffers from long lags between the realization that action is needed and the effect on aggregate demand, and in very open economies the multiplier is likely to be very low. In any case, there would appear to be every reason to use full automatic stabilizers to dampen demand growth. Structural policy can play a role as well, particularly in helping to ensure that economic fluctuations are not unnecessarily costly by, for example, exercising vigilant supervision of financial institutions.

I. Introduction

1. In recent years, a number of euro-area economies—Finland, Ireland, the Netherlands, Portugal and Spain—have experienced substantial declines in unemployment rates (in some cases to historically very low levels) and real output growth exceeding the euro-area average, sometimes by a wide margin. In other respects, the macroeconomic situation varies from country to country. Some have experienced at least incipient inflationary pressures, but prices have been relatively stable in others. Some appear to have significantly exceeded their long-term potential output levels, while others (especially Finland and Spain) may not yet have done so, but are nevertheless more advanced in their cycles than is the euro-area core. In some, asset prices, especially for housing, have risen sharply, but not in others.

2. Despite this heterogeneity, there is a concern that euro-area monetary conditions may be too supportive for the five countries that are in a relatively cyclically advanced position especially relative to the needs of the larger countries in the area. This raises the issue of the appropriate policy response, which is complicated by uncertainties regarding the interpretation of cyclical indicators and, thus, of the degree of overheating. While the recent slowing of growth in the United States and of the euro-area as a whole will reduce over-heating pressures, this effect may be at least partly offset by the response of the European Central Bank. The unsettled issue is whether the differential effects of these developments would result in greater cyclical convergence between the overheating economies and the euro area.

3. To some degree, these issues echo the debate regarding "asynchronous shocks" that took place in the run up to the introduction of the euro. The extent to which the experiences of these five countries will ultimately provide more general lessons for euro-area countries remains an open question. The analysis presented in this paper presupposes business cycles in some countries being out of phase with the core. However, this situation may reflect teething problems of the new monetary union—slight exchange rate misalignments at the time of the introduction of the euro, for example—and it thus may not be repeated. Indeed, in some respects, monetary union reduces the risk of asynchronous business cycles: they cannot arise from differences in monetary policy across member countries, nor from shifts in the nominal exchange rate; and the Stability and Growth Pact limits the extent to which they might arise from differences in fiscal stance. That said, experience in longstanding monetary unions, notably the United States, shows that regional business cycles do recur.

4. This paper emphasizes the uncertainties and difficulties of assessing cyclical tensions and predicting how they might be resolved. It is typically the case that indicators of overheating point in somewhat different directions. Wage and price inflation are difficult to interpret, owing to confusion with once-off, but possibly lengthy, adjustments due, for example to exchange rate undervaluation at the moment of entry into monetary union, or productivity growth differentials. Indirect measures of inflationary pressures, such as the non-accelerating inflation rate of unemployment, or NAIRU, are notoriously subject to error. Other indirect indicators, such as asset prices and credit-aggregate growth, lend themselves to ambiguous interpretation. As a result of such uncertainty, policy advice may have to be cast

in careful, and even tentative, terms and, in any event, will depend on a close analysis of the conditions in specific countries and situations.

5. In the absence of national monetary policy, discretionary fiscal policy is the macroeconomic lever. Despite the well known drawbacks—notably long lags and, for most of the five countries discussed here, low multipliers due to the open nature of their economies—the fact that fiscal policy is the only aggregate demand instrument available strengthens the case for its use. This would be especially true in those countries with a requirement for further fiscal consolidation from a medium-term perspective, since buoyant economic conditions provide an ideal opportunity to accelerate the needed measures. Irrespective of the decision regarding discretionary fiscal policy, there is a strong case for allowing the full use of the automatic stabilizers; that is, to avoid any procyclicality in fiscal policy. Regarding structural policy, its role is to help to ensure that cyclical pressures do not become overly magnified, resulting in crises. However, the lags between implementation and economic impact are surely longer for structural than for fiscal policy. This observation implies that structural reforms are unlikely to be a suitable vehicle to deal with short-term cyclical tensions.

6. Section II surveys the situation of the five economies with business cycles that have been judged by the staff to be advanced relative to the core of the EMU. Section III examines some possible consequences of overheating in the context of EMU. Section IV considers in general terms how to assess the cyclical position of a small country in a monetary union. Section V examines policy alternatives to minimize the risks and consequences of overheating. Section VI provides some conclusions.

II. The Situation of the Five Cyclically Advanced Economies

7. In each of the five countries, the staff has assessed cyclical conditions in the context of the Article IV surveillance process. Recent staff assessment suggests that all remain close to or above potential, although activity has recently slowed and generally indicators point in different directions or may be interpreted as reflecting factors other than cyclical overheating.

8. For Finland, the economy appeared to be operating at a broadly neutral cyclical position and evidence of overheating had not yet appeared and capacity utilization remained below peaks of recent years. Although the economy-wide vacancy rate was below 1 percent of the labor force; generalized cost-push pressures were subdued. The shift toward the high tech sector—where capacity was fully used but also expanding rapidly—has probably boosted the average utilization rate at which capacity constraints become binding. Moreover, both the employment and participation rates, while on a rising trend in recent years, were well below their longer-term historical average, suggesting some room for further employment expansion before excessive wage pressures would be expected. On the other hand, labor shortages were growing in certain sectors, such as information technology and construction, and consumer price and core inflation, which had been broadly in line with the euro-area average in 1999, had picked up in 2000.

9. In Ireland, the economy continued to expand in 2000 at a rate far above those observed in the rest of the euro area and well in excess of trend growth. With real GDP

growing at an estimated rate of 10¾ percent in 2000, the sustained expansion was accompanied by signs that resource utilization reached high levels: the labor market tightened further as the unemployment rate fell to a record low of 3.9 percent; wages grew rapidly; and year-on-year inflation (measured by the HICP) peaked at 6 percent in November, substantially higher than in the euro area, although part of the increase reflected higher fuel prices and an increase in excise duties. Asset prices also rose rapidly, with house price inflation—fueled by both demographic factors and strong growth of property-related lending—remaining at about 20 percent during most of the year. The external current account shifted by more than 1 percentage point of GDP to a deficit of 0.8 percent of GDP. However, growth began to moderate in early 2001 under the influence of a global slowdown and the adverse effects of foot and mouth disease. Inflation on an HICP basis declined to 4.1 percent in March, although the constant tax national measure of inflation remained at 5.8 percent. Nevertheless, with output above trend, there are risks on the upside given the loose monetary conditions and the possibility that fiscal policy will add to domestic demand growth this year.

10. In the Netherlands, GDP growth in 2000 had been substantially above trend for four years running, although it is expected to fall to more sustainable rates in 2001. The unemployment rate had fallen to 2½ percent, vacancy rates were near record highs, and there was anecdotal evidence of widening labor shortages. Based on staff estimates, output was above potential and the unemployment rate below the NAIRU. House prices had been growing very rapidly, roughly 15 percent a year, and it had become increasingly difficult to argue that they had not risen above levels justified by fundamentals. Labor cost increases were accelerating gradually, reflecting increasing market pressure. As a result, competitiveness vis-à-vis the euro area was deteriorating. Headline inflation rose sharply, and by the second quarter of 2001 was the highest in the euro area. Underlying price inflation (that is, abstracting from the price increases induced by rising world oil prices and the increase in the VAT rate in January 2001) was in the 1 percent to 2 percent range, but appeared to be creeping up in early 2001. The current account surplus was substantial, and had narrowed only slightly.

11. Regarding Portugal, after seven years of fairly robust growth, increasing imbalances have emerged. Labor markets have tightened with the unemployment rate below 4 percent; and capacity utilization is at historically high levels. Wage growth has been well above the euro area average; since early 2000, HCPI inflation has also exceeded the area average. The external current account deficit has widened markedly reaching 8½ percent of GDP, fuelled by import growth and financed by interbank borrowing. After increasing rapidly, enterprise and household debt ratio to the banking system are now the highest in the euro area. Although signs of a slowdown in household credit have become evident in the first half of 2001, credit growth to non financial corporations remains robust and over 20 percent. The banking system is heavily exposed to the real estate sector; increases in real estate prices has been in the order of 8-9 percent in 1999–2000.

12. In Spain, the staff estimated that the output gap closed in 2000, although it was difficult to find conclusive evidence that the economy was facing labor or product market constraints and growth in 2001 was projected to slow to below potential. Rapid employment growth reflected to some extent reclassification of workers whose employment was

previously unregistered. The unemployment rate had fallen substantially, but it was still at about 13½ percent at end-2000, close to the estimated NAIRU. Capacity utilization in industry stood at 80.3 percent in the fourth quarter of 2000, a very high figure by historical standards. However, unit labor costs in manufacturing had risen only by about 2 percent in 2000, less than in the previous year. While underlying inflation accelerated throughout most of 2000 and into the current year. Credit to the private sector had increased significantly in recent years, but overall indebtedness remained moderate. Like some of the other rapidly growing countries, Spain entered Stage 3 of monetary union at a competitive exchange rate, and at least some of its higher inflation may represent be movement toward equilibrium price level convergence.

III. The Concern of Overheating

13. Figure 1 illustrates the situation of these five countries, and places them in context in the euro area, with regard to recent changes in four indicators: the unemployment rate, the growth in unit labor costs, the consumer price inflation rate, and the current account balance. These are only a handful of the many possible indicators, and they must be interpreted with care.[1] They have, however, been chosen with the following story in mind. Strong demand growth results in a tightening of labor markets and upward pressure on labor costs. Given the degree of economic integration in the euro area, and the fixed nominal exchange rate, rising costs weaken the competitive position of the tradable goods sector vis-à-vis the rest of the euro area, eroding the current account.[2] Because of international competition, price increases are likely to occur mainly in nontradables. Shrinking margins in the tradables sector may in the longer run result in a shift in resources into nontradable goods production. Moreover, demand pressures may be reflected in rapidly rising domestic asset prices, particularly real estate prices. This, in turn, may fuel sharp increases in financial market lending as the balance sheets of households and firms improve.

14. Decisions regarding monetary conditions in the euro area must be taken with reference to conditions in the area as a whole. As a result, monetary policy may have contributed to an exaggerated upswing and to more intense demand pressures in the cyclically advanced countries. Simulations using the Oxford Economic Forecasting (OEF) economic model[3] suggest that this effect is significant for these countries. Specifically, the

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[1] In Portugal, for example, unit labor costs rose by almost 3 percent from 1997–99, and the lower 1996–99 figure in the chart reflects in part a statistical break.

[2] The consequences of a deteriorating current account are not discussed in detail here. Another cross-country study being prepared by the staff analyzes the interpretation of the current account in the context of EMU, though not specifically with respect to the business cycle or the five cyclically advanced EMU economies.

[3] The OEF model is a mainstream economic model, situated in the middle ground between purely statistical models of the economy (e.g., vector auto regressions) and computable general equilibrium models. The model exhibits "Keynesian" features in the short run and neoclassical ones in the long run; that is, business cycles disappear over time as the

(continued)

model implies that a euro-wide increase in short-term rates of 1 percentage point for two years would lead to output declines in all five countries, with output in the second year of the rate hike typically being about ¾ to 1¼ percent lower than in the baseline (Table 1). As would be expected, the increase in interest rates leads to an appreciation of the exchange rate, but the current account balance improves only marginally in most countries, as the impact of the appreciation on exports is offset by lower demand for imports. Slower economic activity and appreciation of the euro lead to lower inflation.

Table 1. Selected Countries: Impact of a 100 bp Increase in Short-Term Interest Rates
(Percentage change from baseline in second year)

	GDP	Consumer price inflation	Current account (as percent of GDP)
France	-0.5	-0.3	0.1
Germany	-0.7	-0.4	0.0
Italy	-0.3	-0.4	-0.3
Finland	-0.7	-0.3	-0.1
Ireland	-1.2	-0.3	0.6
Netherlands	-0.8	-0.4	0.0
Portugal	-0.9	-0.9	0.2
Spain	-0.8	-0.4	0.4

Source: IMF staff calculations using the Oxford Economic Forecasting Model. Figures reported are the impact in the second year of a 100 basis point increase in euro-area short-term interest rates.

15. In addition to the effect of euro-area monetary conditions, there may also be destabilizing feedback mechanisms within each country. Higher asset prices tend to boost demand by increasing wealth, which may further push up house prices. The key factor is the size of the wealth effect, which is discussed below. Another feedback channel is the real interest rate. Since nominal interest rates are determined at the euro level, higher inflation in a cyclically advanced country implies lower real interest rates, and a boost to demand. The importance of this mechanism depends on the interest sensitivity of demand and the demand sensitivity of inflation. It also depends on the perception of economic agents regarding the higher inflation: at one extreme, if long-term interest rates are most important for demand, and if the inflation is perceived to be temporary, then there may be little effect of higher inflation on ex ante real interest rates as perceived by households and businesses.

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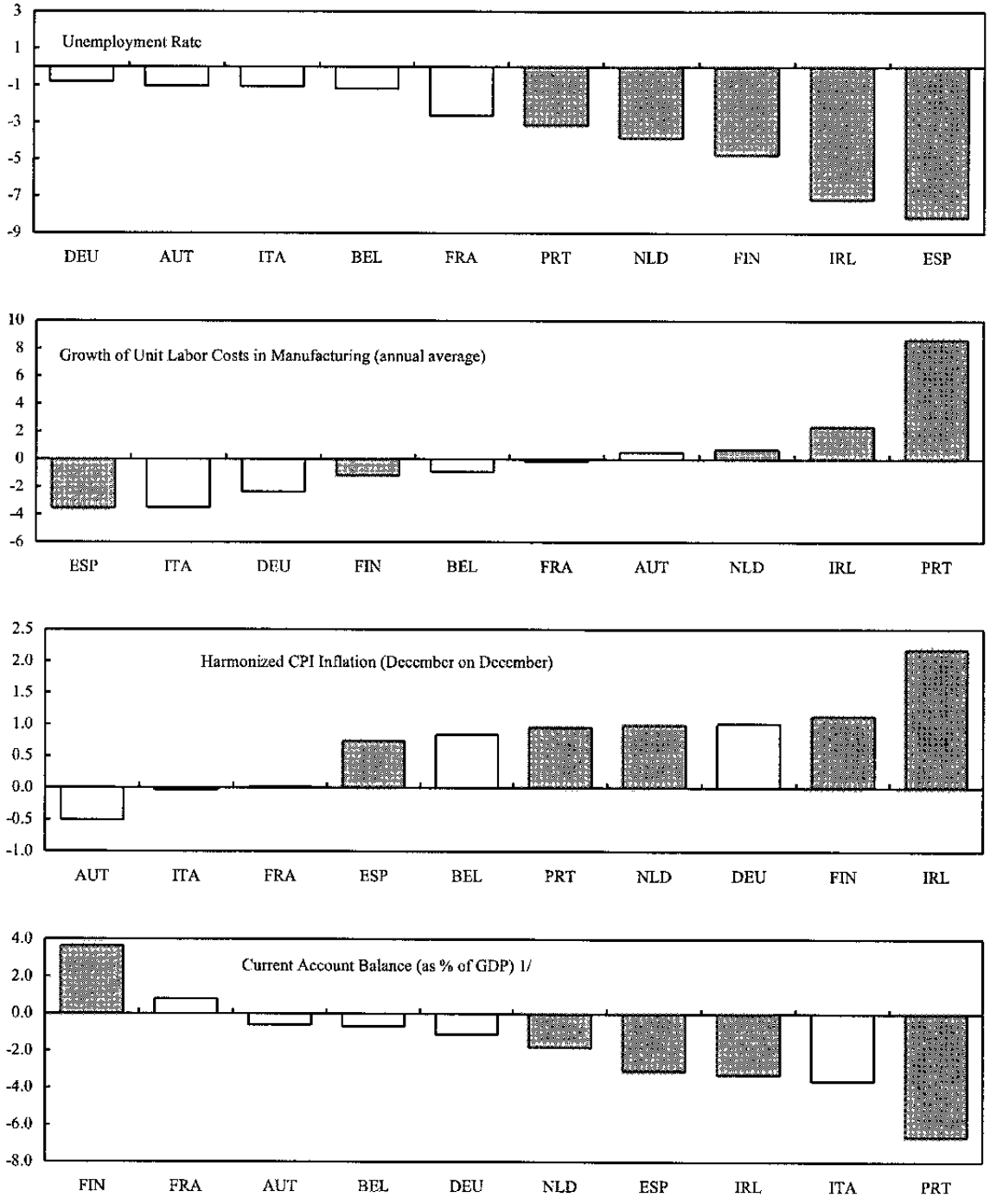
economies are assumed to return to an equilibrium position. The model has backward-looking expectations.

Figure 1. Euro Area: Selected Cyclical Indicators
(Change between 1996 to 2000, in percentage points)



Source: IMF, WEO and IFS.

1/ Data for Luxembourg are not shown. Current account for Belgium includes Luxembourg.

16. The economic adjustment to demand pressures sketched above need not be dramatic, and indeed may be muted by the monetary union itself. For example, the real exchange rate appreciation could come about through somewhat higher nominal wage growth in the overheating country relative to the euro area as a whole. This process would be much less abrupt than a typical adjustment of the nominal exchange rate that might arise in the event of a current account deterioration in a country that is not part of a monetary union. Pressure on the traded goods sector is thus likely to build only slowly. If the intersectoral shift is also gradual, then the associated investment costs are likely to be low. On the other hand, as the cycle and its effects reverse themselves, there will presumably be a resource shift back to traded goods (or, if not, the demand surge will have resulted in a permanent, and perhaps undesired, shift in production).

17. Another concern regarding overheating is the possibility of a "hard landing." First, there is a possibility that monetary conditions in the euro area might tighten in response to stronger growth in the core, just as the advanced countries move endogenously into the downward phase of their cycles. That is, for these countries, monetary conditions are both too expansionary now, and may prove to be too tight later on. The unwinding of cyclical imbalances could be aggravated by a number of other factors as well, implying a downturn that would be more pronounced than if monetary policy had been less accommodating early on. For example, the wage cycle provoked by current tight labor markets may be prolonged, with real wages rising even as output growth begins to fall.[4]

18. A mechanism that might result in a "hard landing" is asset prices being driven to unsustainable levels by high demand, from which there would be a severe and disruptive correction (see Box 1). Such a correction would cut household demand directly, and might also cause difficulties in the financial system. The potential for a substantial correction in asset prices to have adverse economic consequences is clear from recent historical episodes. In particular, declines in asset prices can weaken the capital position of the banking system and the balance sheets of borrowers, and in the past have triggered banking failures and expensive government bailouts. Bayoumi (1999) finds for Japan that the decline in asset values was a main factor accounting for the weak output growth in the 1990s. However, the primary impact occurred not directly (for example, through wealth effects) but rather indirectly through disruption of financial intermediation. Drees and Pazarbaşioğlu (1998) review the experience of the Nordic countries in the 1980s and early 1990s, where a collapse in real estate prices triggered a liquidity crunch in which even some viable firms were unable to obtain financing and bankruptcies rose to record levels.

[4] This mechanism played a role in the Dutch business cycle of the early 1980s, although wage bargaining mechanisms have changed substantially since then.

Box 1. Property Booms in the 1980s and 1990s

In recent years, Finland, Ireland, the Netherlands have experienced rapid and sustained house price increases. A key issue is how much of these increases are due to fundamentals—or, as in Finland and the Netherlands, to a recovery from an earlier cycle—and thus will prove sustainable, and how much are due to a bubble which will eventually collapse. This box examines past industrial country experience with property price booms: most notably the Nordic countries, the UK, Spain, and Japan, and within the United States, California, and the New England states. Altogether, there have been nearly 40 such episodes of sustained property price inflation among the industrial countries and US states in the last 20 years.[1] The experience in the United States, measured at the state level, may be particularly relevant for Euro-area countries, as it places a variety property market experiences within a common currency area. All of the episodes of the 1980s, both within the US and in other countries, ended with price falls, which were in some cases dramatic. In the 1990s, in contrast, many western US states and some Euro-area countries are currently experiencing, or have experienced, booms that so far have not collapsed.

The top panel in the Figure compares the annualized growth of house prices during the upswing (vertical axis), with the cumulative decline in prices four years after the boom ended. For reference, the growth of prices in the current booms in Finland, Ireland and the Netherlands are also marked on the vertical axis. The downward slope of the cloud of points indicates that rapid rates of increase tend to have been followed by larger subsequent declines. This suggests that property markets have tended to overshoot in boom periods, which is consistent with the presence of "bubbles." In particular, countries and regions experiencing booms comparable to Ireland's all suffered sizable price declines; excluding the extreme case of Finland's experience in the late 1980s and early 1990s, episodes characterized by an annual rate of increase of 14 percent or more in real terms suffered a loss on average over the next four years of over 40 percent of the cumulative price increase during the boom.

The second panel examines the U.S. regional experience more closely, and it confirms the pattern seen in the top panel. This experience effectively rules out differences in monetary policy as an explanation for the relationship between booms and subsequent corrections. Indeed, this tendency appears to hold even after accounting for regional differences in observed fundamentals such as mortgage rates, construction costs, and per-capita income and employment growth.[2] This evidence is also consistent with the view that property-price booms have had a significant "bubble" component.

The bottom panel in the Figure focuses on the booms in the 1990s which are either still underway or were not followed by sharp corrections. In comparing house price inflation in these episodes to the Euro-area countries, it is clear that house price increases in Ireland (but not Finland or the Netherlands) have been significantly higher than in all other episodes, in terms of both average (vertical axis) and cumulative (horizontal axis) increase.

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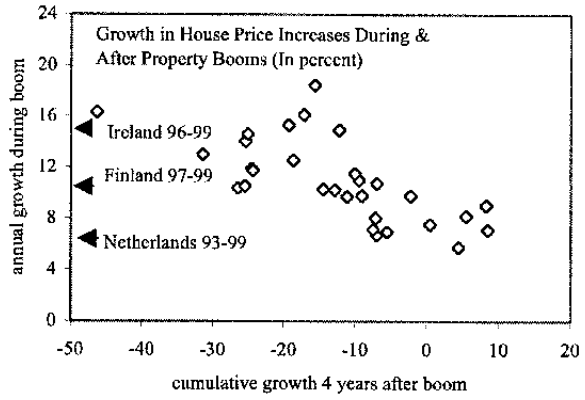
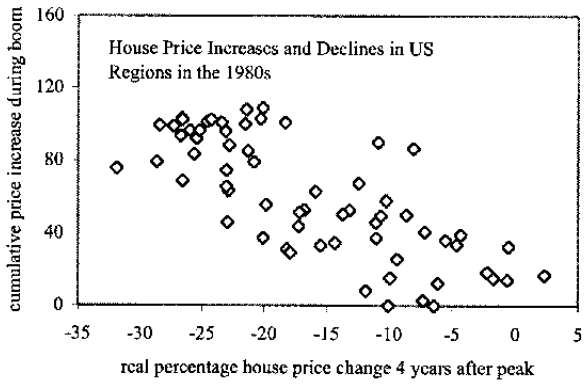
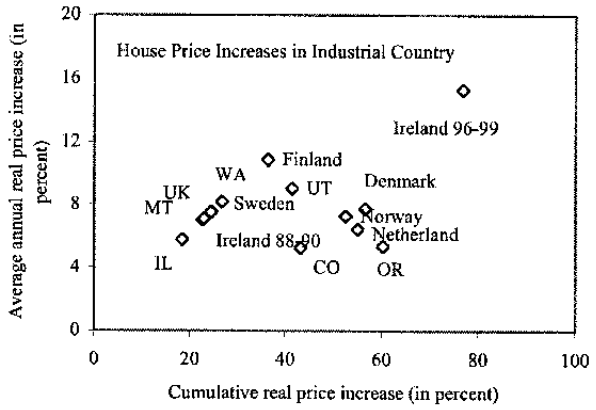
[1]See Selected Issues Paper "Ireland's Property Boom from an International Perspective" (SM/00/176).
[2]Matthew Higgins and Carol Ostler, "Asset Market Hangovers and Economic Growth: U.S. Housing Markets," in *The Role of Asset Prices in the Formulation of Monetary Policy*, BIS Conference Papers, Vol. 5, 1998.


Growth in House Price Increases During & After Property Booms (In percent)
annual growth during boom
cumulative growth 4 years after boom
Ireland 96-99
Finland 97-99
Netherlands 93-99
24
20
16
12
8
4
0
-50
-40
-30
-20
-10
0
10
20


House Price Increases and Declines in US Regions in the 1980s
cumulative price increase during boom
real percentage house price change 4 years after peak
160
120
80
40
0
-35
-30
-25
-20
-15
-10
-5
0
5


House Price Increases in Industrial Country
Average annual real price increase (in percent)
Cumulative real price increase (in percent)
Ireland 96-99
Finland
WA
UT
Denmark
UK
MT
Sweden
Norway
Netherland
Ireland 88-90
IL
CO
OR
20
16
12
8
4
0
0
20
40
60
80
100

IV. Indicators of Overheating

19. This section examines several indicators of overheating: the price and wage pressures that are likely to arise; the nature of capacity measures, such as the NAIRU; the role of asset prices; and the role of financial credit. In each case, these factors are assessed in terms of their value as indicators of the cyclical state of the economy. This issue are of interest because policy advice can be more decisive and better grounded to the extent the diagnosis of overheating is certain.

Inflation

20. The clearest sign of demand pressures would, of course, be rising inflation. However, there are a number of well known difficulties in interpreting inflation rates. The first stems from the idea that, due to policy lags and "momentum," once inflation is apparent it can persist for some time. So far, deviations of inflation from the euro average would appear to be well within what would normally be expected inside a monetary union (except perhaps in Ireland). Recent studies of longstanding monetary unions—the United States by Cecchetti et al., (1999) and Spain by Alberola and Marqués (1999)—suggest that in the long run there is price level convergence within the union, but also that significant inflation differentials among regions are frequent and can last for several years. This does not necessarily mean that these differentials are of no concern (there have been regional business cycles in both the United States and Spain), but rather that small differentials in inflation rates may be difficult to interpret.

21. Another difficulty arises from the possibility that inflation differentials may reflect productivity differences—the Balassa-Samuelson effect.[5] When productivity growth in the tradables sector exceeds that in the nontradables sector, prices of nontraded goods will tend to rise as firms producing these goods need to raise wages in excess of productivity gains in order to prevent workers from moving to the traded goods sector. Although the consumer price index will therefore rise, this reflects a real (relative price) phenomenon. The economy suffers no loss of competitiveness because product wages in the traded goods sector have not increased. Swagel (2000) quantifies the impact of the Balassa-Samuelson effect on consumer price inflation in European countries. For the period 1990–96, he finds it contributed about 1¼ percent annually to the inflation rate in Portugal and about ½ percent annually to that of the Netherlands. Finland, Ireland and Spain were not examined in that study, but the staff has detected Balassa-Samuelson effects in the first two.

22. Alberola-Ila and Tyrväinen (1998) estimate models of eight euro-area countries, using their parameter estimates to simulate the differences in national inflation rates that are consistent with the Balassa-Samuelson effect. They find that inflation rates could range from a low of 1.3 percent in Germany to a high of 3.1 percent in Belgium and Spain. Higher than average rates of inflation would be also be recorded in Finland, Italy, and the Netherlands. These differences in inflation arise from differences in productivity growth and wages, and—

[5] See Balassa (1964) and Samuelson (1964).

by virtue of the assumption of a uniform rate of increase in tradables goods prices across countries—are consistent with no loss of competitiveness relative to other euro-area countries.

23. Another factor clouding the interpretation of inflation differentials, and one that is specific to the current situation, is the possibility that some countries entered EMU at parity rates that were too low. Although equilibrium exchange rates are notoriously difficult to pin down, Finland, Ireland, the Netherlands, and Spain may be cases in point. If so, the equivalent of a real exchange rate appreciation would be required to restore equilibrium, and, with the nominal exchange rate fixed, this must come about through an increase in domestic prices and wages relative to those in the rest of the euro area. Thus, higher inflation in these countries would be a stabilizing—not destabilizing—phenomenon.

Labor and product market tensions

24. The adjustment to rising demand involves narrowing margins in labor and product markets. Although output rising above potential by no means implies an absolute brake on activity—"potential" is more akin to an average position over a long span of time—it does portend inflationary pressures, and therefore an assessment of the degree of slack is fundamental. An important indicator in this regard is the NAIRU, or equilibrium rate of unemployment (Figure 2). Of key policy importance is that the gap between the actual unemployment rate and the NAIRU is in principle a forward-looking indicator of inflation. Given lags in the formulation, implementation, and effect of macroeconomic policy, advance warning of inflationary pressures is key, giving policymakers an opportunity to short-circuit inflationary pressures before price growth takes off.

25. In practice, however, measures of the NAIRU itself are backward looking and subject to great uncertainty.[6] Although in part this reflects the usual statistical issues, additional problems arise because the NAIRU is not observable and must therefore be inferred indirectly, for example from the actual unemployment rate and through its relationship with inflation (McAdam and McMorrow, 1999). In view of these difficulties, estimated NAIRUs come with a large degree of uncertainty attached, and also may fail to capture important supply-side developments. Possible examples of such developments include the effects of monetary union itself, the effects of the collapse of the Soviet Union and the subsequent recovery in Finland, the factors behind the remarkable and sustained growth in Ireland, and the long period of structural reform in the Netherlands and, more recently, Spain. Failure to account for the impact of supply shocks on the NAIRU can produce very poor policy outcomes. For example, Gordon (1997) notes that following the series of negative supply shocks that hit the industrial countries in the 1970s, attempting to maintain the unemployment rate at the preshock NAIRU would have led to a permanent acceleration of inflation.

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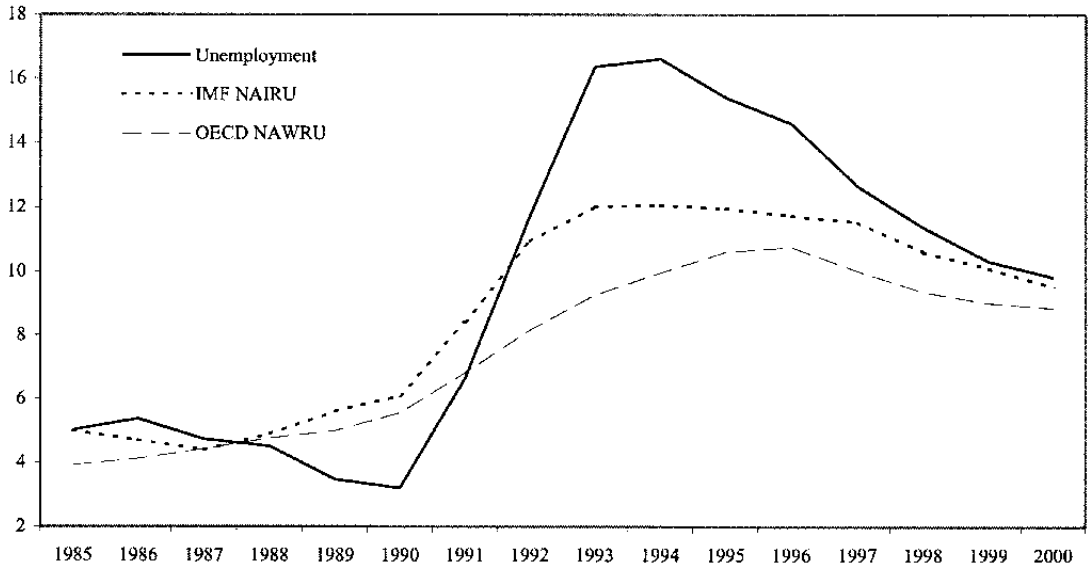
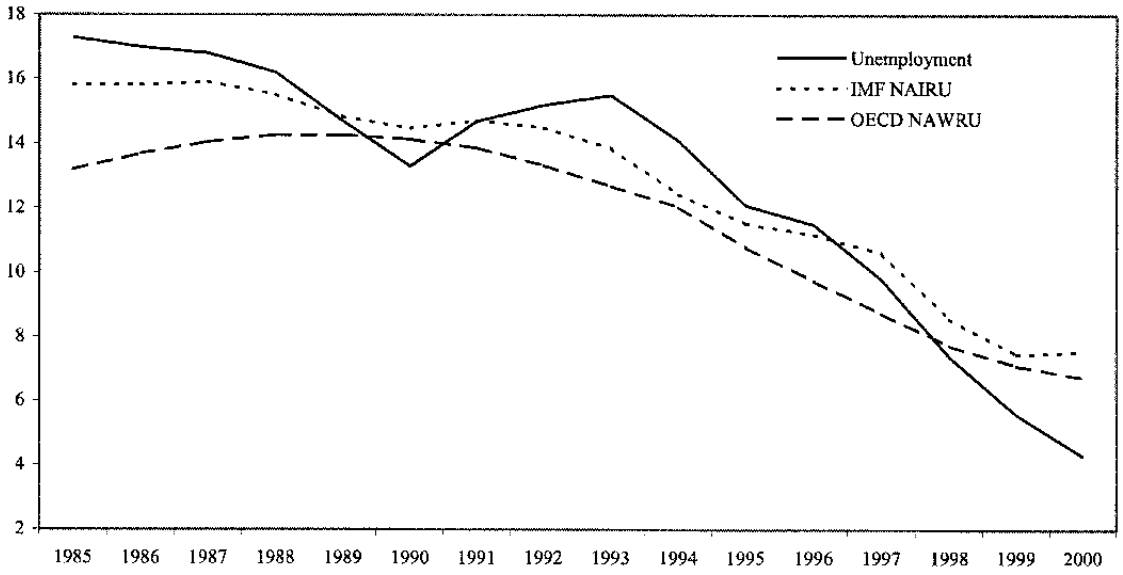
[6] The points made in this discussion also hold for other capacity measures, such as potential output or the normal rate of capacity utilization, that are unobservable.

Figure 2. Cyclically Advanced Euro Countries: Actual and Natural Unemployment Rates
(In percent)

Finland



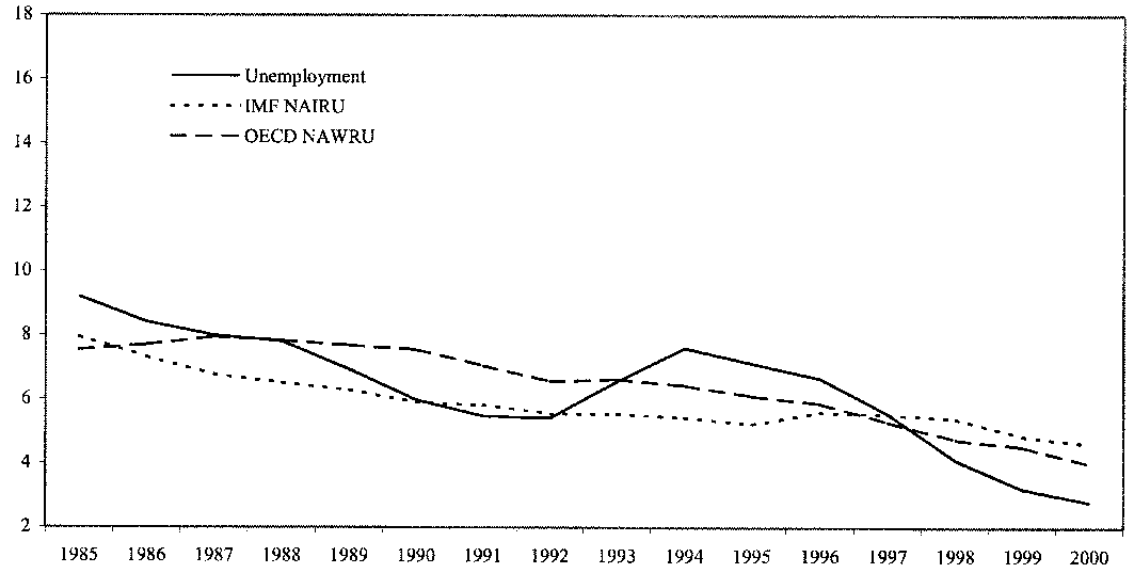
Ireland



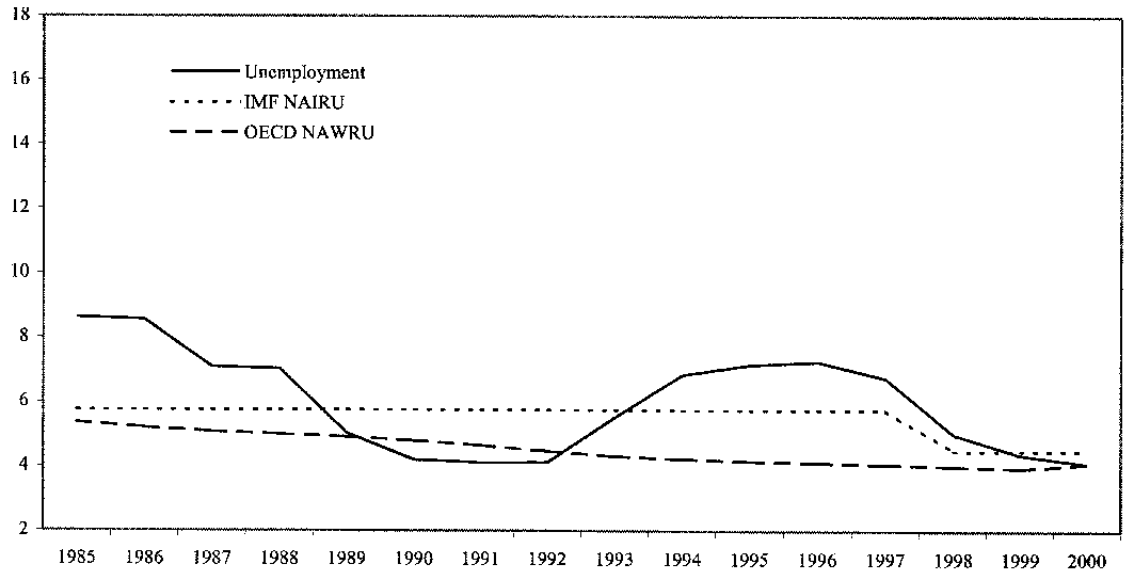
Source: WEO and OECD Analytical Database

Figure 2 (cont). Cyclically Advanced Euro Countries: Actual and Natural Unemployment Rates
(In percent)

Netherlands

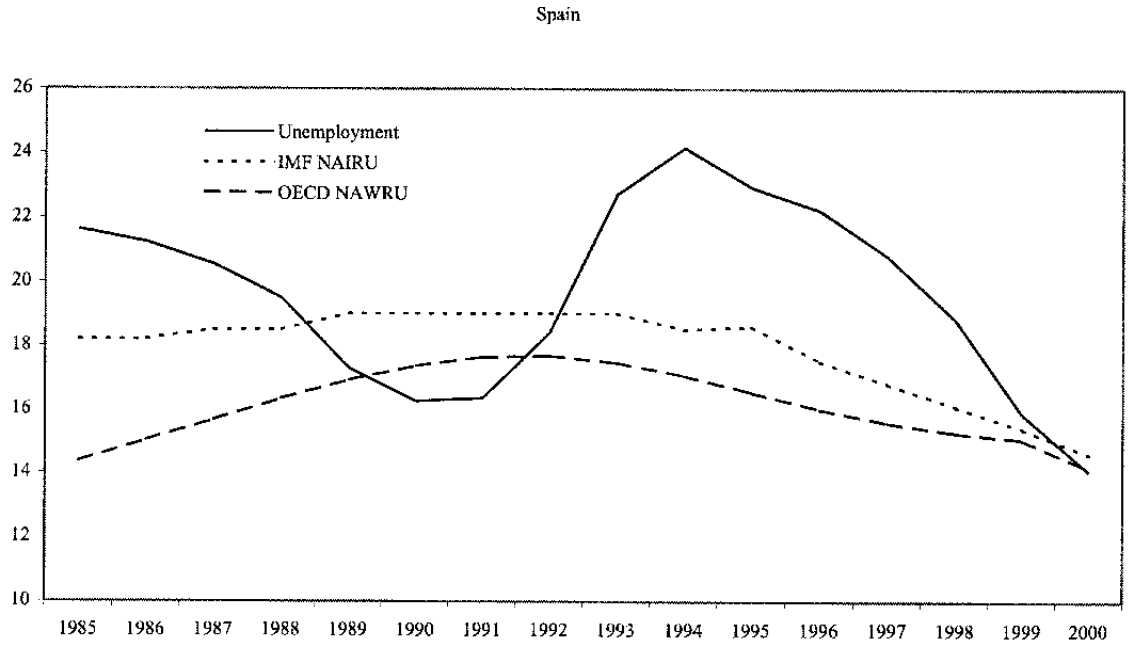


Portugal



Source: WEO and OECD Analytical Database

Figure 2 (cont). Cyclically Advanced Euro Countries: Actual and Natural Unemployment Rates
(In percent)



Source: WEO and OECD Analytical Database.

26. Simulations were conducted using the OEF model to get an indication of the sensitivity of inflation to changes in the gap between unemployment and the NAIRU. Table 2 reports the impact on inflation of a 1 percentage point increase in the NAIRU (relative to the baseline) in each country, which persists for two years.[7] Monetary policy in the OEF operates via a Taylor rule, and the narrowing of the unemployment gap therefore induces an increase in short-term interest rates in the euro area of 100 basis points in 2000 and 2001. The changes in inflation reported in Table 6 therefore combine the impact of the rise in the NAIRU and the second round effects of the accompanying monetary policy response. It is difficult to make comparisons across countries, because the changes in the NAIRU are not uniformly scaled: a 1 percentage point rise in the NAIRU is more dramatic in Germany, for example, where the OEF assumes a NAIRU of 8.8 percent in 2000, than in Spain, where the OEF uses a NAIRU of 16.6 percent.[8] In addition, the results for Italy are clearly anomalous.

Table 2. Selected Countries: Inflationary Impact
of 1 Percent Increase in NAIRU
(Annual difference in CPI inflation relative to baseline)

	Year t	Year t+1	Year t+2	Year t+3	Year t+4
France	0.2	0.5	0.4	0.4	0.4
Germany	0.1	0.6	0.9	0.4	-0.1
Italy	0.7	0.2	-0.9	0.2	0.6
Finland	0.1	0.2	0.1	0.1	0.1
Netherlands	0.1	0.3	0.3	0.4	0.4
Spain	0.1	0.2	0.2	0.1	0.1

Source: IMF staff calculations using the Oxford Economic Forecasting Model.
Figures reported are the annual impact on consumer price inflation (relative to baseline) of a 1 percentage point increase in the NAIRU in years t and t+1.

27. Measurement issues aside, it is clear that the NAIRU (or other capacity measures) cannot be interpreted as an absolute limit on output. Capacity constraints could be eased, at least temporarily, by an expansion of the domestic labor supply or international labor mobility. In other words, tight labor markets could lure individuals who were previously out of the labor market to seek employment, and could encourage inward migration by workers who live in regions where labor markets have greater slack. An important issue is, therefore, the short-run elasticity of labor supply in response to tightening labor-market conditions. The

[7] The OEF model does not contain NAIRUs for Ireland and Portugal, and these countries were therefore not included in the simulation.

[8] These values are somewhat lower than those estimated by Staiger and others (1997) for the United States, who find that a 1 percent decline in the output gap leads to an increase in the inflation rate of 0.9 percent in the first year and 0.6 percent in the second. However, their results are based on unchanged monetary policy.

possible response in the domestic labor market is likely to be limited by the rigidities that have in many European countries blunted the incentives to take a job or hire new employees. This issue needs to be assessed, however, in the context of country-specific conditions. To cite one example, the reform program begun more than a decade ago in the Netherlands has greatly strengthened labor market performance (see Watson, et al., 1999 for an extensive discussion). Similarly, labor supply has been elastic in Ireland, reflecting migration and recent increases in female participation. Nevertheless, labor mobility is generally judged to be relatively low in Europe. For example, Eichengreen (1993) finds labor mobility within France or Germany to be only about a third of that within the United States, and mobility is likely to be even lower across than within European countries. Blanchard and Katz (1992) find that in the United States more than half of the adjustment of labor markets in the first year following a shock is in the form of migration, while Decressin and Fatas (1995) find (using a similar methodology) that migration plays only a small role in the EU.

Asset prices

28. Rapid rises in asset prices, as have occurred in some of the five cyclically advanced economies, would be suggestive of excessive demand pressures to the extent they are not justified by fundamentals (Table 3). There are two issues to consider: the consequences of a significant asset price correction, including the possibility of the bursting of an asset price bubble, which could have damaging macroeconomic consequences; and the influence of asset prices on aggregate demand, which if large would increase the danger of a destabilizing feedback cycle.

Table 3. Asset Prices in Selected Euro-Area Countries
(Increase between end-1997 and end-2000, in percent)

	Share prices[1]	House prices[2]
Finland	319.6	14
Ireland	41.2	39
Netherlands	51.8	28
Portugal	30.4	..
Spain	39.2	13

Source: OECD 1999-2000 Annual Review—Spain; WEFA Intline database; and IMF *International Financial Statistics.*

[1]Data from IMF *International Financial Statistics* (except Portugal, which is from WEFA).

[2]To June 1999; data from OECD 1999–2000 Annual Review—Spain.

29. The focus here is on house prices, which have been growing rapidly in some of the five cyclically advanced countries and which are an important component of household wealth. The extent to which the level of house prices has risen more than warranted by fundamentals—that is, the possibility of a bubble—is of course very difficult to determine, and judgments are therefore very uncertain. Relatively little is known about the effects of fundamentals, and increases may also reflect particular factors that can be difficult to

quantify. Examples of the latter might be a catch-up following a previous crash, as occurred in the Finland and the Netherlands, or demographic factor and a large increase in incomes, such as in Ireland. Nevertheless, it is possible to relate house prices to a set of fundamentals (such as interest rates, inflation, GDP or household disposable incomes) and interpret a large, positive current-period residual as a sign of a bubble. This exercise was recently conducted for the World Economic Outlook (May 2000). In summary, the results were that property markets were overvalued in Ireland and, to a lesser extent, Spain and Portugal, but not in Finland or the Netherlands (Figure 3).

30. The effect of rising asset prices on aggregate demand is the subject of some uncertainty, but clearly the larger the effect the greater concern that an asset price boom may be supporting an unsustainable level of aggregate demand growth. Much work has been done on equity prices, and the positive link between these and economic growth is now well established.[9] The direction of causality between growth and equity prices is uncertain, however, and stock prices may not drive output growth but rather be driven by it (Morck, et al., 1990, and Mauro, 2000). And in the EU, at least, equity prices appear to have little effect on consumption or investment, perhaps because they tend to form a small fraction of household portfolios (although the rise in the Finnish stock market increased household wealth by 40 percent between end-1998 and end-1999) and equity markets in these countries do not necessarily reflect domestic activity (the markets in Finland and the Netherlands, for example are dominated by multinationals).[10] Simulations with the OEF model generally support the view of weak wealth effects from stock prices (Table 4).

Table 4. Selected Countries: Impact of a 10 Percent Decline in Stock Prices
(Maximum change in variable relative to baseline scenario, in percent)

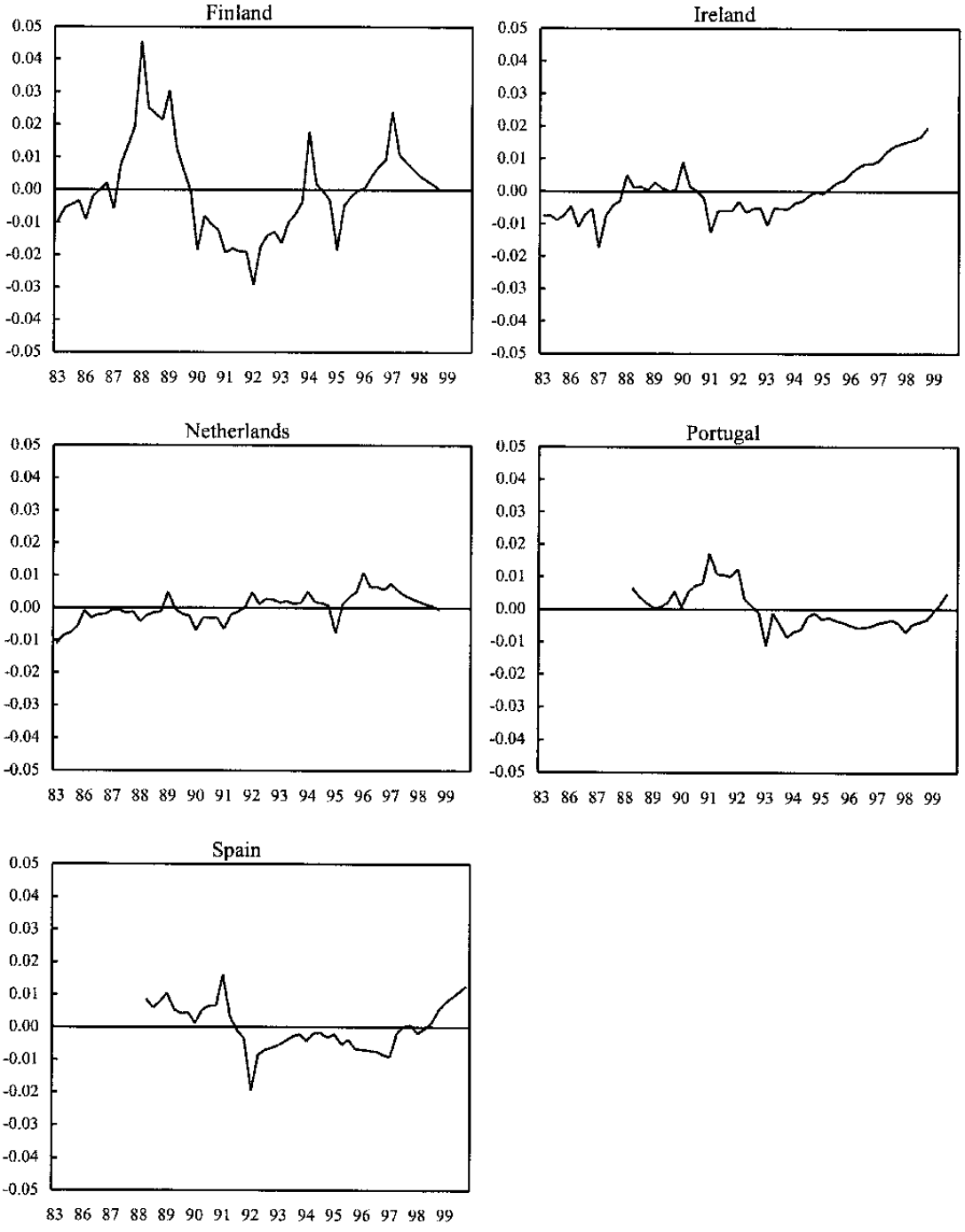
	Drop in own country index only		Drop in all countries' Indices	
	Consumer spending	GDP	Consumer spending	GDP
France	-0.3	-0.1	-0.2	-0.1
Germany	-0.3	-0.1	-0.2	-0.1
Italy	-0.2	-0.1	-0.3	-0.1
United States	-0.4	-0.2	-0.4	-0.3

Source: IMF staff calculations using Oxford Economic Forecasting model.

[9] On equity prices, see: Fischer and Merton (1984), Barro (1990), Fama (1990), and Schwert (1990) for the United States; and Mullins and Wadhwani (1989), Asprem (1989), and Wasserfallen (1989 and 1990) for Europe.

[10] On consumption, see Jaillet and Sicsic (1998), and Capel and Houben (1998). On investment, see Mullins and Wadhwani (1989), and Capel and Houben (1998).

Figure 3. Cyclically Advanced Euro Countries: Residuals from Property Price Regressions



Source: WEO.

31. House prices (unlike equity prices) have not been closely related to economic activity. Regressions of real GDP on a constant and lagged real property prices for a set of 17 OECD countries undertaken for the WEO found that only in the case of Japan were property prices a leading indicator of real GDP growth. Nevertheless, Higgins and Osler (1997) found that house prices are positively related to housing investment, and Capel and Houben (1998) report that the Dutch Central Bank's macroeconomic model calculates that a 10 percent decline in housing prices leads to a decline in consumption of 0.1 percent in the first year and a cumulative 0.8 percent after four years. About half of this long-run impact is accounted for by direct wealth effects and the other half by indirect effects through higher unemployment and greater wage moderation. In line with these results, the Dutch authorities argue that house price increases added ¾ of 1 percentage point to annual GDP growth in the last three years.

Credit growth

32. A final indicator to consider is credit growth. Bank credit to households has increased dramatically in recent years in some of the more rapidly growing economies of the euro area, expanding at a rate of more than 50 percent in Portugal, more than 40 percent in Ireland (to the entire private sector), and more than 30 percent in Spain in the period end-1997 to June 1999 (Table 5). Figures of these magnitudes certainly suggest the possibility of high and unsustainable domestic demand growth. On the other hand, the convergence process leading up to Stage III of monetary union resulted in a sharp decline in real interest rates in countries like Spain and Portugal, where credit growth in the past had been constrained by very high real interest rates. Thus, strong growth in household credit could be interpreted as a natural adjustment in these countries. Indeed, despite rapid credit growth, private sector indebtedness to the banking sector in Ireland, Portugal and Spain remains below levels in the United Kingdom and Germany and is similar to that in France.[11]

Table 5. Selected Countries: Bank Lending to the Private Sector, 1994–2000
(In percentage of GDP)

	1994	1999	2000
Finland	69.0	53.5	...
France	87.9	78.6	83.8
Germany	101.7	117.4	120.3
Ireland	45.2	104.7	...
Netherlands	91.9	129.3	...
Portugal	64.1	121.7	...
Spain	77.7	92.9	...
United Kingdom	110.1	122.8	134.1

Source: IMF *International Financial Statistics*.

[11] However, in Portugal bank lending picked up sharply in 1999.

V. Policy Options

33. This section turns to the policy responses to a perceived risk of overheating. Fiscal policy is the obvious macroeconomic tool for reducing the amplitude of the cycle. Indeed, the active use of fiscal policy may be particularly important in a monetary union in view of the possibly perverse effects of the monetary stance on those countries that are out of phase with the core. In addition, there are an array of structural policies that could be considered. Some might immediately affect demand, others would expand productive capacity, and still others would help to limit the potential costs in the downturn phase of the cycle.

34. In the absence of national monetary policy, fiscal policy is the only macroeconomic policy available to deal with country-specific cyclical issues. To get a sense of the amount of fiscal consolidation that would be required to slow output growth in the potentially overheating economies, simulations were conducted using the OEF model. Table 6 reports the impact on output and the current account of a simulated decline in government consumption of 1 percent of GDP. While the simulated effect on aggregate demand varies slightly across countries, with fiscal policy having a relatively larger impact on demand in the Netherlands and Spain than elsewhere, in every case the fiscal multiplier is less than unity. These low multipliers reflect, of course, the small and open nature of the five economies, which implies that a significant portion of the negative impulse leaks out of the domestic economy through the current account.[12] These results do not imply that fiscal policy is powerless to restrain demand, but rather that the open nature of these countries means that significant and sustained contractionary fiscal policy might be necessary. Likewise, a large positive fiscal impulse would be required to "jump-start" these economies in the event of a downturn.

35. More generally, discretionary fiscal policy is subject to the well-known drawback that its effects may manifest themselves late, owing to various lags in the policy process, and could therefore be destabilizing. This problem might be especially acute in view of the possibility, raised above, that the monetary stance could become restrictive as the cyclically advanced economies are entering a downturn. A fiscal contraction that occurred too late would be one more factor aggravating a downturn. To put the same point differently, the timing of discretionary fiscal policy might be especially complicated in the current circumstances, as it would depend not only on national cyclical conditions, but also on conditions in the euro-area core and the response of the ECB.

36. The cyclical effectiveness of a discretionary fiscal contraction should also be viewed in the context of the longer-term structural fiscal position. Countries that still need to make progress on medium-term structural fiscal goals should take advantage of strong demand conditions to move rapidly towards their desired medium-term objectives, seizing on the complementarity of short- and medium-term policies. For countries with fiscal deficits at, or below, medium-term requirements, however, the situation is rather more complicated, as a

[12] On the other hand, in the monetary union the effects of a fiscal contraction on aggregate demand will not be reduced by endogenous declines in interest and exchange rates.

discretionary fiscal contraction would imply moving away from the desirable medium-term position. Such a policy could be difficult to sell politically.

Table 6. Selected Countries: Impact of a 1 Percent of GDP Decline in Public Consumption
(Average annual change relative to baseline as a percentage of baseline GDP)

	Change in output	Change in the current account
Finland	-0.6	0.7
Ireland	-0.6	0.6
Netherlands	-0.9	0.3
Portugal	-0.7	0.5
Spain	-0.9	0.6

Source:IMF staff calculations using the Oxford Economic Forecasting model. Figures reported are the average annual impact relative to baseline of a cut in government consumption expenditure equal to 1 percent of GDP.

37. Finally, there would appear to be little reason not to allow the full operation of the automatic stabilizers, at least so long as there is no risk of breaching the Maastricht deficit ceiling.[13] Of course, they can only attenuate, and not fully offset, the effects of demand shocks. In the case of the potentially overheating economies, this means that even if fiscal policy is not actively contractionary, it ought at least to be cyclically neutral and thus avoid contributing to demand pressures.

38. Another set of policies that might be deployed in the event of overheating is structural policy. In some cases, structural reforms could have an important fiscal component. An example would be an aspect of the tax code—such as the deductions for mortgage interest available in the Netherlands—that might be contributing to asset price growth. However, the use of structural policy to address excessive aggregate demand growth suffers from at least two drawbacks. First, structural reforms often take a substantial amount of time to work. Consider labor market reform. Though measures in this area are needed in most European countries to expand employment and aggregate supply, it seems unlikely that their effects would be felt in the next year or two, when demand pressures may become severe. Second, the effects of structural reforms on aggregate demand are likely to be particularly uncertain. For example, eliminating mortgage interest deductibility in the Netherlands may well cut housing prices, but if not done carefully it could also induce undesirable market disruption.

[13] See van den Noord (2000) for a comprehensive discussion of automatic stabilizers. His results suggest little relationship between the effectiveness of automatic stabilizers (the ratio of stabilized to unstabilized output) and openness: Finland, for example, is judged to have powerful stabilizers.

39. Structural policies can, however, play and important role in ensuring that cyclical fluctuations do not develop into unnecessarily costly episodes. Such policies would not seek to manage aggregate demand directly but would instead try to ensure that the potentially damaging effects of overheating on labor and financial markets do not materialize. For example, during a boom, supervisors need to ensure that credit quality is not unduly eroded. In the particular situation of high and climbing asset prices, the banking system needs to be able to weather a significant correction without sharply cutting credit availability. Similarly, concerns about rigidities in labor markets are best addressed directly. Policies that support greater wage flexibility and dispersion and greater mobility of labor across sectors and borders are likely to smooth the adjustment process, both in a boom and during any subsequent downturn. Finally, measures to increase competition in the non-traded sector, particularly services, would help to reduce adjustment costs. All these reforms have the further advantage of being desirable in their own right, regardless of demand conditions.

VI. Conclusions

40. In summary, while the advent of the single currency has generated many advantages for the smaller economies of the euro area, it has raised the possibility that both the amplitude and the duration of cycles in these countries will prove greater than in the past. This is the case not only because monetary policy can no longer be counted on to contribute to a smoothing of the cycle, and may even be procyclical, but also because very rapid growth (fueled in part by accommodative monetary conditions) could be sowing the seeds of future difficulties in asset and financial markets. The difficulties of determining cyclical conditions—the degree of overheating—are substantial. Clearly, close analysis of each country's situation is needed, although even then it has been the case that, for most countries, indicators have been to some extent ambiguous.

41. In the absence of country-specific monetary instruments, discretionary fiscal policy is the only macroeconomic instrument available for influencing aggregate demand in the short run. Its effectiveness may, however, be weakened both by uncertainties about the need for action combined with the usual policy lags and low multipliers. Nevertheless, depending on the particular situation, demand pressures and economic dangers may be sufficiently clear that an appreciable discretionary fiscal contraction is called for. In any case, it is clear that cyclically advanced countries should allow full operation of the automatic stabilizers, so that fiscal policy does not contribute to demand pressures. In addition, and again depending on the country, a business cycle boom may provide ideal conditions to move decisively to a desirable medium-term fiscal position with little risk to growth. Finally, there is ample scope throughout the euro area for structural measures to address directly some of the potentially adverse effects of overheating on labor and financial markets. Given the likely lags between the implementation of structural policies and the benefits in terms of improved economic performance, the time to act is now, while it is still possible to debate whether overheating pressures have emerged, rather than after their presence has become indisputable.

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