OECD Economic Outlook

ECONOMICS

OECD

Volume 2001/2
No. 70, December

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OECD ECONOMIC OUTLOOK

70

DECEMBER 2001

OECD

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FOREWORD

This edition of the *OECD Economic Outlook* analyses prospective global and country-specific economic developments over the period 2002 to 2003 and discusses the economic policies required to return to sustained economic growth. The projections on which the policy assessments presented in this edition are based were finalised on 8 November 2001 and include a first evaluation of how the terrorist attacks in the United States may affect the world economy. A preliminary version of this edition was published on 20 November.

In addition, four special chapters provide in-depth analysis of important challenges:

– *Saving and investment: determinants and policy implications.* This chapter discusses whether recent saving and investment rates have diverged from levels consistent with long-term determinants. It also explores whether the imbalance between saving and investment, which has contributed to the large current account deficit in the United States, could lead to potentially disruptive adjustments. It concludes that a future narrowing of the gap between saving and investment is unlikely to come about without relative price changes, including nominal exchange rate adjustments.

– *Investment in human capital through post-compulsory education and training.* This chapter examines the benefits that arise from further education and training after the period of compulsory schooling. Such additional investment in human capital appears to yield better employment prospects and higher earnings capacity for individuals. The social benefits are also substantial, justifying the financial involvement of the government. However, students who benefit from publicly funded higher education tend to come from more affluent and educated backgrounds.

– *Cross-market effects of product and labour market policies.* This chapter explores how product market reforms affect labour markets, and how labour market policies affect product markets. Regulatory reforms in the product markets appear to have played a significant role in increasing total employment in some OECD countries. In contrast, strict labour-market regulations seem to influence innovations and R&D spending negatively and thus have a depressing impact on long-run economic growth.

– *Agricultural policy reform: the need for further progress.* This chapter assesses the costs and effectiveness of agricultural policies and reviews progress in policy reform. While a number of other policy objectives are not directly addressed, the cost of agricultural support policies to consumers and public budgets and the effects on international trade, developing countries and the environment are considered. The chapter concludes that continuing to reform agricultural support policies, as is being discussed within the WTO, should remain a priority.

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Conventional signs

$	US dollar	.	Decimal point
¥	Japanese yen	I, II	Calendar half-years
£	Pound sterling	Q1, Q4	Calendar quarters
€	Euro	Billion	Thousand million
mbd	Millions barrels per day	Trillion	Thousand billion
. .	Data not available	s.a.a.r.	Seasonally adjusted at annual rates
0	Nil or negligible	n.s.a.	Not seasonally adjusted
–	Irrelevant		

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Summary of projections[a]

Seasonally adjusted at annual rates

	2001	2002	2003	2001 I	2001 II	2002 I	2002 II	2003 I	2003 II
				Percentage changes from previous period					
Real GDP									
United States	1.1	0.7	3.8	1.2	-0.6	-0.1	3.8	3.8	3.8
Japan	-0.7	-1.0	0.8	0.1	-2.3	-0.9	0.2	0.9	1.1
Euro area[b]	1.6	1.4	3.0	1.8	0.4	1.4	2.7	3.1	3.2
European Union	1.7	1.5	2.9	1.9	0.7	1.4	2.5	3.0	3.1
Total OECD	1.0	1.0	3.2	1.1	-0.3	0.7	2.9	3.2	3.3
Real total domestic demand									
United States	1.1	0.7	3.9	1.0	-0.8	-0.1	4.0	3.8	3.8
Japan	-0.2	-1.6	0.2	1.0	-2.5	-1.6	-0.5	0.4	0.6
Euro area[b]	1.2	1.5	2.9	1.0	0.9	1.3	2.5	3.0	3.0
European Union	1.4	1.6	2.8	1.3	1.1	1.3	2.5	2.9	2.9
Total OECD	0.7	1.0	3.0	0.8	-0.4	0.7	3.0	3.0	3.1
				Per cent					
Inflation[c]									
United States	2.1	1.2	1.3	2.6	1.3	0.9	1.4	1.3	1.1
Japan	-1.6	-1.4	-1.6	-0.7	-2.6	-0.9	-1.4	-1.8	-1.5
Euro area[b]	2.5	2.1	1.6	2.9	2.6	2.0	1.8	1.6	1.7
European Union	2.5	2.2	1.8	2.8	2.6	2.1	1.9	1.7	1.8
OECD *less* Turkey	2.0	1.4	1.3	2.4	1.5	1.4	1.4	1.2	1.2
Total OECD	2.9	2.3	1.7	3.4	2.5	2.3	2.1	1.6	1.5
				Per cent of labour force					
Unemployment									
United States	4.8	6.2	6.0	4.4	5.2	6.2	6.3	6.1	5.9
Japan	5.0	5.5	5.4	4.8	5.2	5.4	5.6	5.5	5.4
Euro area[b]	8.5	8.9	8.8	8.3	8.7	8.8	9.0	8.9	8.6
European Union	7.8	8.1	8.0	7.6	7.9	8.1	8.2	8.1	8.0
Total OECD	6.5	7.2	7.0	6.3	6.7	7.1	7.2	7.1	6.9
				Per cent of GDP					
Current account balances									
United States	-4.1	-3.9	-4.0	-4.3	-3.8	-3.8	-3.9	-3.9	-4.1
Japan	2.1	2.9	3.5	2.0	2.2	2.8	3.1	3.4	3.7
Euro area[b]	0.0	0.3	0.4	0.0	0.1	0.3	0.4	0.4	0.4
European Union	-0.2	0.0	0.0	-0.1	-0.3	0.0	0.1	0.0	0.1
Total OECD	-1.2	-1.0	-1.0	-1.2	-1.0	-0.9	-0.9	-0.9	-0.9
				Per cent					
Short-term interest rates[d]									
United States	3.8	2.1	3.1	4.7	2.9	2.1	2.2	2.6	3.6
Japan	0.1	0.0	0.0	0.2	0.0	0.0	0.0	0.0	0.0
Euro area[b]	4.2	3.0	3.8	4.5	3.8	2.8	3.1	3.5	4.0
				Percentage changes from previous period					
World trade[e]	0.3	2.0	8.7	-2.1	-3.6	2.3	7.1	9.3	9.2

a) Assumptions underlying the projections include:
- no change in actual and announced fiscal policies;
- unchanged exchange rates 2 November 2001; in particular 1$ = 121.90 yen and 1.107 euros;
- the cut-off date for other information used in the compilation of the projections was 8 November 2001

b) Greece entered the euro area on the 1 January 2001. In order to present consistent projections for the euro area and to ensure comparability of the euro area data over time, Greece has been included in the calculation of the euro area throughout.

c) GDP deflator, percentage changes from previous period.

d) United States: 3-month eurodollars; Japan: 3 month CDs; euro area: 3-month interbank rates. See box on Policy and other assumptions underlying the projections.

e) Growth rate of the arithmetic average of world merchandise import and export volumes.

Source: OECD.

EDITORIAL

Growth in the OECD area has come to a virtual standstill but a rebound is projected from mid 2002…

The economic slowdown that started in the United States last year, and spilled over to other countries, has turned into a global economic downturn, which has left few countries or regions unscathed. Several factors brought growth in the OECD area to a virtual standstill by the middle of 2001, in particular the severe correction in the high-technology sector and the lagged impact of the rise in oil prices. At the end of the summer, some signs were beginning to emerge that the slump in the United States might be easing and that a return to moderate growth might be expected in early 2002, thanks in part to the resilience of household spending. The terrorist attacks of 11 September and the associated disturbances have, however, inflicted a severe shock to the world economy. OECD-wide output is now estimated to be contracting slightly in the second half of this year – for the first time in 20 years – and is projected to remain very weak in the first half of next year. Assuming that household and business confidence turn up from current low levels, a significant rebound in activity should take place in the second half of next year. On average, real GDP in the OECD area could grow by about 1 per cent in 2002 and 3 per cent in 2003. Area-wide unemployment is expected to continue to increase well into 2002, before retreating slightly. Inflation is projected to remain low, thanks in part to moderate oil prices.

... following a dissipation of uncertainty and supportive economic policies

For the recovery to occur, it is crucial that the sentiment of insecurity prevailing since September dissipates. Increased risk aversion is encouraging households and firms to become more cautious and postpone spending decisions. Assuming that there are no adverse economic effects from future political and military developments, uncertainty could fade during the first half of 2002. This gradual improvement in private-sector sentiment, in helping to restore an environment of "business-as-usual", should provide an important incentive to reverse the present contraction in production capacity and encourage firms to launch new fixed investment plans. By mid 2002, the effects of the large impulse already provided by monetary policy in many countries, and by fiscal policy in some, should also be felt. Furthermore, the recovery would be helped by the fall in oil prices.

The downward risks are substantial

In the current situation, projections of future economic developments are conditional on a crucial set of assumptions. A variety of adverse events could occur, including a further sharp fall in consumer and business confidence in OECD countries, lower imports from non-OECD economies, higher oil prices than their currently favourable level and unpredictable exchange-rate fluctuations. Overall, such events would tend to aggravate the present weakness and cast doubt on a speedy and robust rebound. Even though the current projections are subject to a high degree of risk, they nonetheless provide a useful discipline in identifying the crucial conditions required for the recovery. In that respect, they shed light on some possible alternative outcomes, and provide a framework to examine appropriate policy responses.

The US slowdown has been severe, but the rebound could be strong…

The United States economy has led the global weakening. In the second quarter of 2000, output was still growing at above 5 per cent, but growth then decelerated sharply, and it is estimated that the economy has now fallen into recession. Several forces have been at work, including the contractionary impact of the high-tech correction, the associated collapse in equity values, the adjustment of an inventory overhang

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and the lagged effects of earlier monetary policy tightening. The slowdown was anticipated, but its depth exceeded expectations, while the September terrorist attacks created a heightened state of uncertainty and risk aversion, which has led to further lowering of business investment, consumer demand and economic activity. With the fading of the main contractionary forces, demand and activity would rebound and the recovery could be strong and fully visible by the second half of 2002.

... with the support of monetary policy easing and a generous budgetary stimulus

The aggressive easing of monetary policy was rapid and timely, both before and after 11 September, and should contribute importantly to this revival. The Federal Reserve has cut its key policy rate by 450 basis points so far this year, bringing nominal (but not real) short-term rates to their lowest level since the early 1960s. Barring unplanned contingencies, the time may have come to observe whether signs will emerge that previous easing is having its expected effects. On the fiscal side, large-scale decisions have been made to cut taxes and to appropriate new spending. Besides the tax cuts legislated in the spring, the federal government implemented a package of $40 billion immediately following the terrorist attacks to provide emergency and military financing, and an additional $15 billion package was made available to support the airlines. In addition, the Administration and Congress are negotiating a new fiscal plan, and the projection assumes that measures amounting to $90 billion will be enacted, with disbursement in 2002 and 2003. If the objective of this new programme is to provide a short-term support to the recovery, the choice between the various tax cuts and extra spending options should be guided by the probability that they would indeed promptly add to domestic demand. This new initiative should be designed so as to avoid longer-term deleterious effects on the public finances. It should also, where feasible, contribute to bolstering the economy's supply potential.

In Europe, growth has slowed sharply, and this has been followed by lower short-term interest rates and weaker budget balances

Despite earlier expectations that the global downturn would affect Europe only marginally, GDP growth in the European Union has weakened considerably during 2001. Reflecting the sluggishness of trade, led by reduced demand of capital goods, export growth has contracted markedly and business investment has stopped increasing. The 11 September attacks aggravated this deterioration by eroding confidence. Against this background, the main policy interest rate of the European Central Bank has been lowered by 150 points and that of the Bank of England by 200 points since the start of the year. The balance of risks remains skewed to the downside, however, especially in the euro area. Should signs of additional slack appear in labour and product markets, as implied by the projections, a further easing in policy stance may become warranted. On the budgetary side, many governments face widening deficits in 2001 and 2002. This largely reflects the cyclical weakening of revenue and provides some conjunctural cushion. The scope for active fiscal policy support is limited, however, by the need to ensure fiscal sustainability in the medium term. The current episode illustrates the importance of generating fiscal surpluses during fast-growth periods, so that the resulting room for manoeuvre can be used following adverse shocks.

Reforms in labour and product markets would contribute to stronger potential growth

The return to sustainable growth in Europe would be facilitated by efforts to reform labour and product markets. More needs to be done, particularly in high unemployment countries, to reduce rigidities, encourage labour supply, lower structural unemployment and improve the entrepreneurial climate. Product markets are also still too segmented and financial markets not well integrated, including for banking services and insurance. The present economic sluggishness and the deterioration in the job market are likely to bring some pressure to reverse a number of achievements, however, in particular regarding the implementation of a more forceful competition policy. It would be important to resist such pressure, as increased

state subsidies would be difficult to phase out, advantages created for incumbents would be wasteful, and renewed rigidities would add to the risks to long-term growth.

Recovery in Japan is more distant, and macroeconomic policies have limited room for manoeuvre

The Japanese economy had entered a new period of weakness before the events of September, and the short-term outlook is one of further sluggishness. The economy has been affected by the reversals in the high-tech sector, which have spread to other parts of the economy. Deflation persists in the prices of goods and services, financial assets and land. In this context, traditional monetary policy has limited room for manoeuvre to provide support, as short-term rates are close to zero. The authorities have recently sought to add extra liquidity to the banking system, but nevertheless bank credit has continued to contract. Further action by the Bank of Japan could include a broadening of the range of assets it purchases, not excluding foreign assets. The scope for fiscal policy to support aggregate demand directly is also very limited. The government already has the highest gross public debt to GDP ratio among OECD countries, and discretionary fiscal actions are likely to be offset by higher household saving, due to increased concerns about long-term fiscal sustainability. In this regard, articulation of a clear strategy to strengthen the effectiveness of government spending and eventually restore sound public finances could underpin confidence and thus support demand.

Decisive structural reform would help restore sustainable growth, albeit with some short-term costs

The limited scope for traditional macroeconomic instruments is not a basis for inaction. On the contrary, a vigorous and comprehensive structural reform strategy is urgently needed to establish conditions for renewed growth. Priority should be given to the problem of non-performing bank loans, which may imply some macroeconomic costs in the short run, but is necessary to restore a healthy banking system and encourage corporate restructuring. Lack of action in this area would lead to further financial fragility and loss of credibility. Structural reforms outside the financial sector could also provide a temporary boost to demand by opening new market opportunities. In this respect, abolishing redundant urban planning regulations, as well as taxes that restrict real estate developments, should be seen as priorities. It is also important to reinforce competition policy, including that applying to utilities, where incumbent firms are inhibiting entry.

Keeping open and competitive markets will help limit the long-term negative repercussions from the 11 September terrorist attacks

Beyond the short-term outlook, the challenge is to address the long-term economic repercussions of the 11 September attacks. The terrorist actions have led to a sentiment of insecurity, a tightening of border controls and higher transaction costs for international trade. Insurance companies have raised their premiums, and in some cases cancelled policies deemed too risky. Firms may also have to incur additional costs to protect their premises, duplicate critical computer systems and increase inventory levels, which may adversely affect productivity and growth. In this environment, the increases in costs and the risks to trade openness will have to be assessed and monitored. It will also be important that governments sustain their commitment to an open global trading system, to free competition among industries and to strict limits on state interventions in cases of market failure. The recent agreement to maintain the process of reform and liberalisation of trade policies and to launch an expanded negotiating agenda is a timely expression of this commitment. All countries can gain from this, including developing countries who stand to benefit from a greater openness in agricultural and textile trade. Finally, it would be crucial to pursue the efforts made to increase the effectiveness of other anti-poverty policies.

November 15, 2001.

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I. GENERAL ASSESSMENT OF THE MACROECONOMIC SITUATION

Overview of the current situation and prospects

A more uncertain and sombre global outlook

The economic aftershocks of the 11 September attacks…

The 11 September terrorist attacks in the United States have inflicted a severe shock to the global economy, sharply reducing confidence of economic agents and creating considerable uncertainty about the outlook for global economic activity. The United States, the epicentre of the shock, stands to suffer most directly and immediately and is gauged to be already in recession. However, the other regions will also be affected and, in the immediate future, world economic growth will be reduced to levels not seen since the early 1980s.

… have accentuated the global downturn

The attacks came at a time when the world economy was already weak and slowing further in several regions, although there were also signs that the slowdown was bottoming out. Led by a downturn in the high-tech sector, output growth in the OECD area stagnated in the second quarter, and many emerging market economies, both in Asia and South America, experienced steep declines in output, China being a major exception. Overall, OECD-wide growth is now estimated in the last two quarters of 2001 to have been pushed into negative territory for the first time since 1982.

Even in benign political circumstances, global economic recovery may be delayed…

In these circumstances, the OECD growth outlook presented here depends on specific assumptions about the way economic aftershocks will play themselves out over the next two years. First, economic activity over the projection period is assumed to evolve in a politically benign environment, *i.e.* in which future political or military actions do not have significant negative effects on the overall economic climate. Second, lower confidence and heightened uncertainty are assumed to result in temporary "wait and see" attitudes among both consumers and businesses worldwide, delaying the expected economic recovery.

… but OECD growth could be fairly rapid by 2003

Against this background the macroeconomic policy response has been rapid and substantial, particularly in the United States. Assuming that the September attacks will remain a one-off event, and confidence rebuilds as uncertainty and insecurity wane, then expansionary monetary and fiscal policies, together with the impact of lower oil prices on real disposable incomes, should provide sufficient stimuli to foster a relatively strong recovery through the second half of 2002 and 2003, both in the United States and, to a lesser extent, in Europe. In contrast, the Japanese economy appears set to remain in recession through 2002, at least. Thus, OECD output growth may pick up in the course of 2002 and exceed 3 per cent in 2003 (Figure I.1). Rising overall unemployment during 2001-02 and widening output gaps will keep inflation low over the projection period.

There are exceptional risks

The risks and uncertainties are exceptional, as an important negative shock has been imposed upon a global economy already in a cyclical downturn. There are

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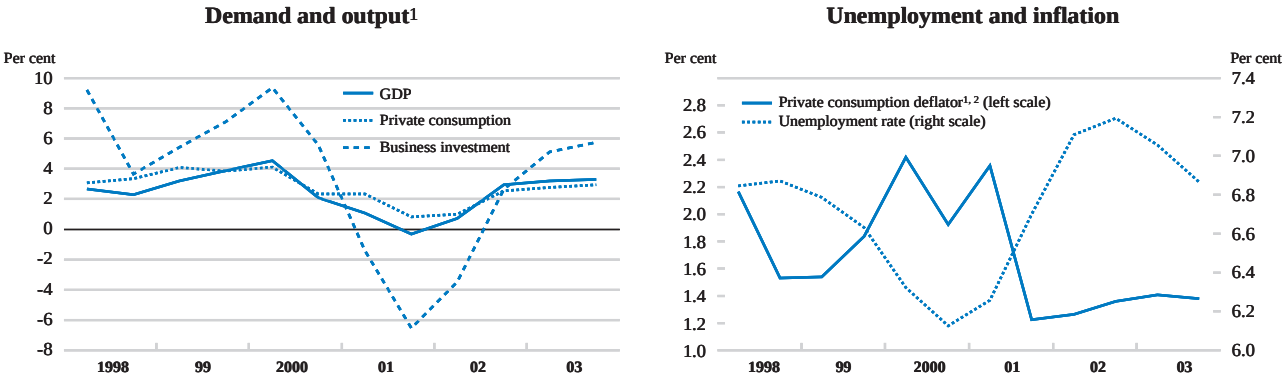
Figure I.1. **The outlook for the OECD area**



1. Percentage change over previous period, annual rate.
2. Total OECD less Turkey.
Source: OECD.

downside risks of a long drawn-out process, punctuated by setbacks, which could result in slow and uncertain growth patterns. But given that policies have eased so emphatically, there is also the possibility of a more rapid recovery. The dilemmas facing policy makers, of whether to increase the stimulus and when to withdraw it, are challenging. Moreover, the emphasis on stabilisation should not distract attention from the need to pursue structural reforms, and to address the consequences of the over-investment and over-indebtedness in some sectors.

The global setting and forces at work before the September attacks in the United States

The main forces at work are global

The economic downturn has been remarkably widespread across OECD and non-OECD economies, resulting from the global nature and scope of the underlying forces at work (see Box I.1).

– Oil prices soared during 1999 and 2000, reducing households' real income and spending, while increasing inflationary concerns in some countries.

– Monetary policies were tightened during late 1999 and in 2000 (in part in response to the oil price spike), most notably in the United States, but to some extent in Europe as well. The associated increases in the cost of borrowing acted to restrain business capital formation in particular.

– The high-tech bubble burst during 2000, with a steep decline in global information and communications technology (ICT) investments, and in worldwide exports and imports of these products, making for the sharpest deceleration of world trade since the first oil shock.

– Despite some rebound in the last couple of months, equity prices have fallen markedly since early 2000 as investors came to more sober assessments of high-tech firms' earnings potential and, more recently, in response to evidence of declines in corporate profit margins more generally.

– Steep declines in corporate profits and reduced profit expectations have deepened cuts in capital spending, notably in the United States but also elsewhere.

– Weakening final demand growth has also in many countries fuelled stock-building adjustments and cutbacks in new orders and production.

– Consumer confidence, though generally more resilient than business confidence, has been slipping in many countries, often in the face of rapidly accelerating and highly publicised layoffs and renewed increases in unemployment.

Some national factors are also at play…

While the major factors driving the current global slowdown are synchronised, the magnitude and precise timing of their effect on individual economies have depended both on trade structures and local conditions.

– Countries most heavily dependent on ICT exports experienced the most immediate and rapid weakening, including those in Asia, where the downturn largely reflects the high ICT share in exports of many of the region's economies.

– In Japan, the impact of falling ICT trade is superimposed upon home-grown economic weakness.

– In Europe, there have been adverse price and output effects in the agricultural and tourism sectors from the crisis in the beef industry.

– The impact of the oil price rise has differed according to energy dependence and whether price changes have been muted or amplified by exchange rate movements, and government energy tax responses.

– Difficulties in Turkey, as in many South-American economies, are largely local in nature, although problems in some emerging markets also reflect the fact that investors are globally becoming increasingly risk-averse, shifting capital towards safe havens elsewhere.

However, while differences in economic structure and policy response may affect the timing and amplitude of the effects on individual economies, global interdependence ensures that no country is immune from the slowdown in world trade.

… but the downturn has been highly synchronised

As a result, economic trends in the first half of 2001 have been more uniform, as well as generally weaker, than expected just a few months ago.

– The United States decelerated rapidly, albeit avoiding stagnation thanks to the resilience of household demand.

– Euro-area growth lost momentum as business investment and stockbuilding were cut back and the drag from net exports increased. Activity in the United Kingdom, though, remained relatively strong.

– Activity in Japan weakened with declines notably in net exports and residential investment.

– Many emerging market economies were in recession (Singapore and Chinese Taipei) or on the brink of it (Malaysia and Thailand). In Latin America, Argentina saw output contract and Brazil appeared likely to follow. Major exceptions to this picture of gloom were China, Russia and India, where growth was robust.

– A pronounced downturn in world trade growth went hand-in-hand with weaker economic activity area-wide, most markedly in the United States, Japan and other Asia-Pacific OECD countries (except Australia and New Zealand).

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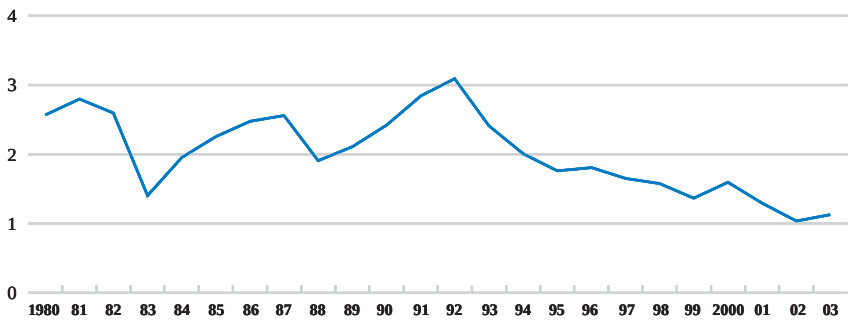
Box I.1. A more synchronised global cycle?

A synchronised downturn. One of the striking features of the ongoing downturn is its synchronised nature. In 2001, activity is estimated to be decelerating in virtually all OECD countries, and in most non-OECD countries as well. This contrasts with the early 1990s: the slowdown of the US economy in 1990-91 coincided with vigorous growth in what was to become the euro area and in Japan, and the subsequent US recovery paralleled an outright recession in the euro area and a sharp downturn in Japan. Looking at output gaps and at a broader set of OECD countries, the diagnosis is similar: output gaps tended to diverge significantly in the early 1990s but have recently declined in tandem (Figure). Does this greater synchronisation result from the nature of the shocks driving the slowdown or does it reflect faster and fuller transmission of national shocks in a context of heightened interdependence?

Output gap dispersion

Standard deviation of national output gaps, in percentage points of GDP



Source: OECD.

Common shocks. Over the past three decades, major downturns have often been associated with oil price hikes, which constitute adverse global supply shocks.[1] This holds for the current slowdown too, with oil prices expressed in current US dollars having tripled – from a very low base – in the course of 1999-2000. But in 1990-91, country-specific stimulatory factors were at work in the euro area (German unification) and in Japan (the tail end of an asset price bubble) which offset the impact of the oil price surge. No similarly powerful offsetting idiosyncratic forces were operating in the late 1990s. On the contrary, as emphasised in the main text, the cycle of the turn of the century has had a prominent common component in the form of the ICT boom and bust. Another although somewhat less widely shared component has been the tightening of monetary policy as the cycle approached its peak. More recently, the terrorist attacks in the United States imparted a major blow to confidence throughout OECD countries and beyond. In sum, the current rapprochement of national cycles does at least in part reflect the global nature of the underlying shocks. Future shocks, however, need not be equally broad-based.

The 11 September shock

The economic impact of the 11 September attacks has been substantial…

The fallout from the 11 September events has several dimensions. The initial destruction and disruption costs were concentrated in the United States and, abstracting from the human dimensions, largely confined to specific areas or sectors. The sectoral disruption has had significant international spillover effects in terms of transaction and transport costs, which could be long-lasting. But the most important immediate impact on the world economy at large stems from the plunge in confidence and heightened uncertainty which may affect global aggregate demand over a lengthy span of time.

… being initially largely sectoral…

The immediate impact of the attacks was the destruction of a significant part of the business infrastructure of lower Manhattan, entailing unprecedented insurance claims

Box I.1. **A more synchronised global cycle?** *(cont.)*

Smaller national cycles. Furthermore, the apparent reduction in the dispersion of national output gaps as measured by their cross-country standard deviation is potentially misleading. It partly reflects the diminishing amplitude of national cycles rather than their closer alignment. Over time, output volatility has been driven down by several factors, including: *i)* the gradual shift in the composition of value added from manufacturing to services, which typically display smaller cycles; *ii)* improved inventory management, thanks in part to the spreading of ICT, which has significantly reduced the traditionally very substantial pro-cyclical contribution of stock-building; *iii)* smoother consumption patterns, owing *inter alia* to financial liberalisation, which has facilitated intertemporal substitution; *iv)* and, possibly, better macroeconomic policy-making, in the form of better cyclical timing of monetary policy decisions and discretionary fiscal measures.[2]

Heightened interdependence. Even so, a number of deep-seated forces contribute to aligning national cycles more closely, especially but not exclusively within regions striving for deeper integration, such as the European Union and NAFTA. Over the long run, international trade is expanding faster than output, which tends to tighten cyclical interdependence.[3] The changing composition of trade flows, with a rising share of intra-firm trade, tends to increase the speed of the transmission of shocks across borders and may work in the same direction.[4] At the same time, financial-market linkages are strengthening, as reflected in growing non-resident portfolio and direct investment, the listing by more and more companies of their stock on exchanges in different countries, and the increasing correlation of stock market returns across countries, especially in the ICT sector. Concretely, this means for example that the cost of capital of European firms is more sensitive to the ups and downs of the US stock market than in the past, and that wealth effects are likely to be more simultaneous than heretofore. In all likelihood, greater economic integration has contributed to the synchronisation of the ongoing slowdown. And its investment-led nature may have magnified the speed at which it was transmitted via the trade channel.

Policy implications. One immediate implication of closer interdependence through trade and financial-market channels is that policy in one region may have to react more to shocks affecting another region. An example would be the impact on the euro area of a weakening of domestic demand in the United States, combined with a drop in US share prices, which is met by a cut in US short-term interest rates. The impact on activity and the need for monetary easing in the euro area are significantly higher if European share prices fall at the same time as those in the US. The overall spillover on euro area activity, and hence the required policy response, could be partly damped by bond market linkages, as long-term interest rates in the euro area tend to follow US long-term interest rates.[5] However, in broad terms, if national cycles are increasingly coincident and national shocks more easily become international ones, the volatility of global output rises, meaning that consistency between national economic policies will be more important than ever.

1. See for example Hamilton, J., "What is an oil shock?", NBER Working Paper 7755, 2000, who documents a non-linear relationship: oil price increases affect the economy whereas decreases do not, and increases following a long period of price stability have a bigger effect than those reversing earlier price declines (moreover, regression estimates suggest that the oil price movements caused by exogenous military conflicts matter most).
2. See Dalsgaard, T., J. Elmeskov and C-Y. Park, "Ongoing changes in the business cycle – evidence and causes", OECD, *mimeo*, 2001, available on www.oecd.org, who also point out that in some countries, but not in all, international trade has increasingly acted as a cyclical cushion, and Doyle, B., J. Faust and J. Gagnon, "Joint movements in G-7 output growth and the current slowdown", Federal Reserve Board, *mimeo*, 2001.
3. See for instance Frankel, J. and A. Rose, "The endogeneity of the optimum currency area criteria", *Economic Journal*, No. 449, 1998 and Clark, T. and E. van Wincoop, "Borders and Business Cycles", *Journal of International Economics*, forthcoming.
4. See Kose, A. and K. Yi, "International trade and business cycles: is vertical specialisation the missing link?", *American Economic Review*, Vol. 91, No. 2, 2001.
5. For a detailed simulation along these lines, see Dalsgaard *et al*. (*op. cit*.).

(for human and physical loss).[1] This was accompanied by significant but temporary disruption to economic activity. The financial sector suffered from severely impaired

1. Estimates of the eventual insurance bill go up to $50 billion, considerably more than the amount paid after hurricane Andrew in Louisiana and Florida in 1992, until now the insurance industry's most costly catastrophe ($19 billion). According to the US Bureau of Economic Analysis, the destruction of buildings and planes reduces net domestic product (*i.e.* GDP net of consumption of fixed capital) by $15.5 billion (0.7 per cent for the quarter, or 0.2 per cent for the year). The ensuing insurance and reinsurance claims are treated in such a way that they translate into a 0.2 per cent increase in the GDP deflator. In all this, measurement of real GDP is statistically not affected by the physical destruction of capital assets and associated insurance claims.

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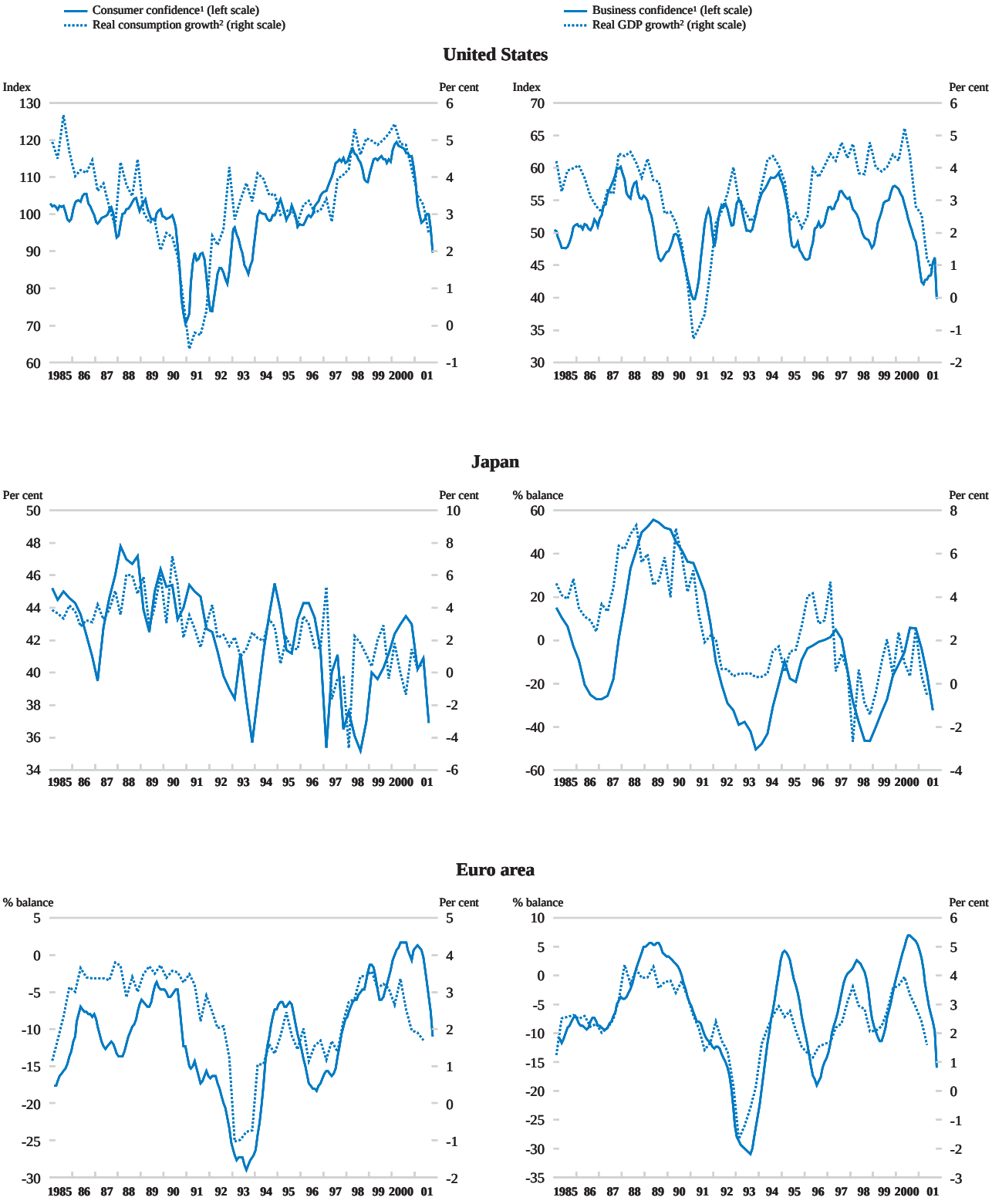
Figure I.2. **Confidence and economic activity**



1. 3-months moving averages for United States and euro area.
2. Year-on-year percentage changes.

Source: OECD, *Main Economic Indicators*.

telecommunication and trading capabilities, to which the Federal Reserve responded by supplying the necessary liquidity. Retail and durable goods sales plunged. Most severely affected were air traffic and tourism. The collapse of air travel has had knock-on effects on the aircraft producing industry, where lay-offs have already been announced. Concern about travel safety has also affected tourism and the hotel and leisure industry.

… but with negative short- and long-term growth effects

Apart from the initial demand and supply disruption, which will have affected US growth in the very short term, there are also consequences related to the loss of confidence, heightened insecurity and increased uncertainty. In the near term, the shock of 11 September has significantly raised the degree of uncertainty about the future, leading to a pronounced disengagement from future commitments affecting consumer and business spending. In the longer term, the supply-side effects range from the impact of enhanced security precautions on transport costs, to the delays and loss of flexibility in arranging business meetings, to more costly insurance, which will all interact to increase transaction costs and could reduce potential output growth.

Global economic aftershock effects and other forces at work

Lower confidence is compounding the negative effects of the slump in equity prices

With consumer spending typically accounting for about two-thirds of GDP, the fall in consumer confidence foreshadows a significant decline in global economic activity (Figure I.2).[2] Indeed, the sharp equity price declines following the September events (Figure I.3) created fears that the negative wealth effects of the ongoing stock market adjustment would be compounded, reducing consumer spending further, notably in the United States, where equity holdings account for almost half of all financial wealth. However, the overall decline was reversed within a month, although developments in sectoral indices have diverged: stocks in the most exposed sectors such as insurance and airlines lost half of their value, contrasting with a strong recovery in others, notably the communication sector. Nevertheless, towards mid-November, equity prices were generally 15 to 30 per cent below their level at the beginning of the year, often outweighing the wealth gains associated with still buoyant property prices.

Investors and consumers may defer spending

Taken together, losses in confidence, the decline in financial wealth and increased uncertainty about the economic climate could lead to a "wait and see" attitude among consumers and investors that could prevail well into the first half of next year. Such behaviour would be consistent with that observed in previous episodes, *e.g.* the Gulf war, where domestic spending suffered two to three quarters of decline. The real estate market could also weaken, so that the domestic demand support for activity evident earlier in the slowdown would erode.

Global ICT investment continues to contract

A continuing negative element in the global outlook is the ongoing contraction in the ICT sector. It is not clear that adjustment in this sector has yet run its full course. Indeed, sales of semi-conductors continue to fall in all major regions across the world (Figure I.4), as do shipments of personal computers. It is difficult to assess exactly what net impact the attacks will have on this sector. On the one

2. See Santero, T. and N. Westerlund, "Confidence indicators and their relationship to changes in economic activity", *OECD Economics Department Working Papers*, No. 170, 1996.

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Box I.2. Policy and other assumptions underlying the central projections

Fiscal policy assumptions are based on measures taken and stated policy intentions, where these are embodied in well-defined programmes.[1] In a number of countries, the fiscal stance, as measured by the changes in the structural budget balance, is to become expansionary over the projection period. In the United States, the measures taken in the aftermath of the terrorist attacks, including the OECD's assumption regarding the yet-to-be-legislated stimulus package, amount to around 1½ per cent of GDP. In Japan, a broadly neutral stance is projected for 2001, once account is taken of one-off revenue increases related to taxation of interest income on postal deposits, followed by a modest tightening in 2002 and 2003. In the European Union, several countries, notably Germany and France, are implementing tax cuts, while in the United Kingdom additional spending is programmed. Nevertheless, the fiscal stance, measured by the structural balance, will be broadly neutral during the projection period.

Policy-controlled interest rates are set in line with the stated objectives of the relevant monetary authorities with respect to inflation and, in some cases, to supporting activity or exchange rates. In the United States, the targeted federal funds rate has in 2001 been lowered in steps by 450 basis points, to its lowest level in four decades. It is assumed to remain at 2 per cent well into the second half of 2002 and would start to be raised gradually towards the end of 2002, to reach 3¾ per cent by the end of 2003. Maintenance of price stability over the medium term remains the primary objective of monetary policy in the euro area.[2] The main refinancing rate has been cut by 150 basis points since the start of 2001. The OECD projection of euro area core inflation is below 2 per cent and it is assumed that the refinancing rate will be cut by another 50 basis points by early 2002. It would start to move back up in the second half of 2002 and increase by a little more than one percentage point over the remainder of the projection period. In Japan, short-term interest rates should remain close to zero during the entire projection period.

The projections assume unchanged exchange rates from those prevailing on 2 November 2001; in particular, one US dollar equals ¥ 121.9 and € 1.107. For Turkey, the exchange rate is assumed to depreciate continuously but at less than the projected rate of inflation, such that roughly four fifths of the recent devaluation is offset in real terms.

Oil prices have recently fallen significantly below levels built into the projections finalised six months ago. World energy demand should fall off rather sharply with the global economic slowdown, and the OPEC production cuts earlier this year (amounting cumulatively to 3½ million barrels per day) may not prevent oil prices from remaining close to the lower range of the $22 to 28 OPEC price band through 2002. Non-oil commodity prices, after increasing in the first half of 2000, are now sharply weakening again on average and with lower growth in global economic activity prices should at best stabilise during first half of 2003.

The cut-off date for information used in the projections was 8 November 2001.

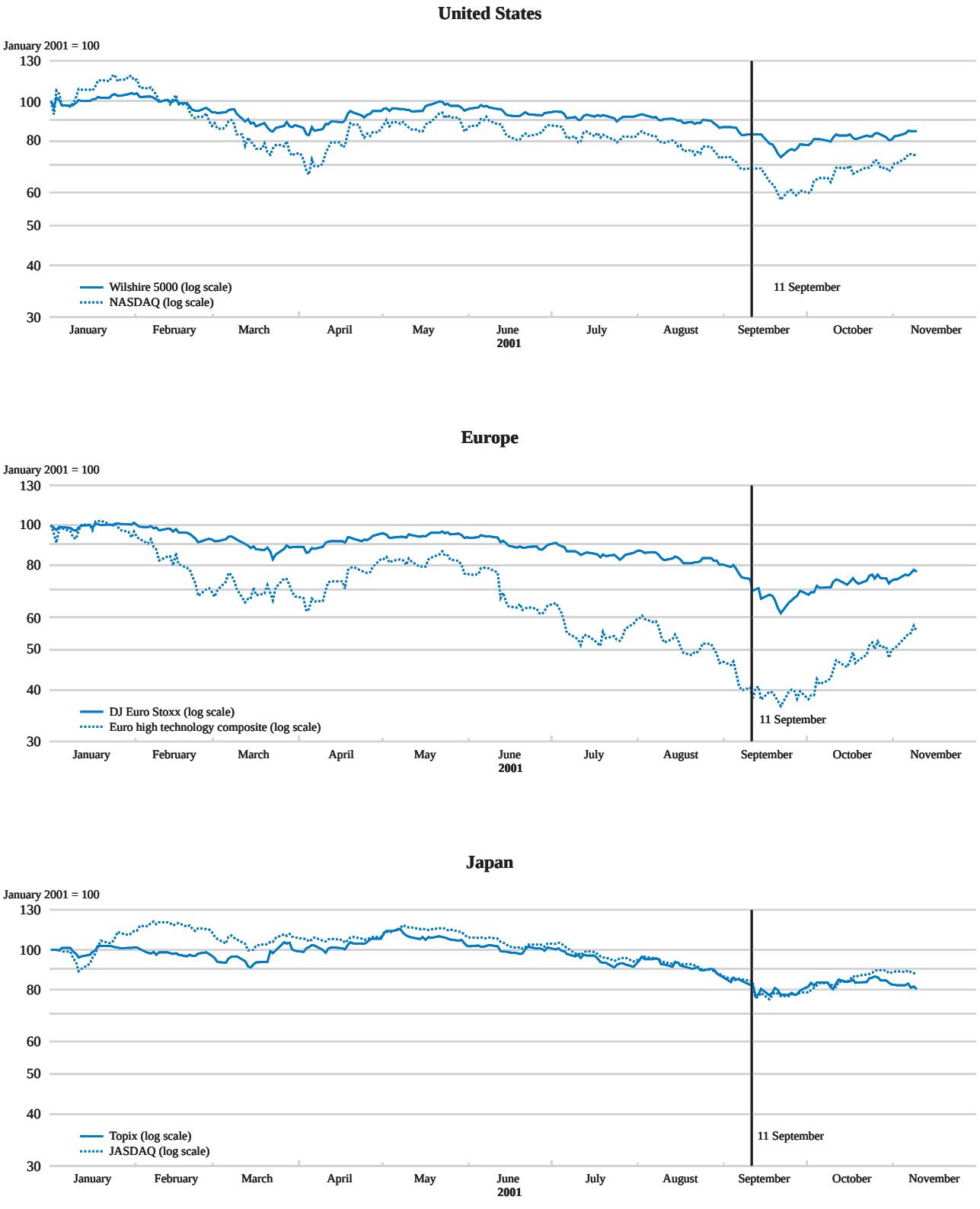
Oil and non-oil commodity prices

	1999	2000	2001	2002	2003
	Percentage changes				
OECD import oil price (cif)	37.3	62.1	–12.1	–12.6	16.3
Non-oil commodity prices[a]	–7.1	3.0	–5.8	–7.3	1.7
Memorandum item:					
OECD import oil price (cif, $/barrel)[b]	17.3	28.0	24.6	21.5	25.0

a) Total Hamburg commodity price index, excluding energy. OECD projections for 2001 to 2003.
b) The historical data for the OECD crude oil import prices are average cif unit prices as calculated by the International Energy Agency; that is, they include cost, insurance and freight but exclude import duties. OECD projections for 2001 to 2003.
Source: Hamburg Institute for Economic Research (HWWA), International Energy Agency and OECD.

1. Details of assumptions for individual countries are provided in the corresponding country notes.
2. Price stability is defined by the European Central Bank as an annual increase in the harmonised index of consumer prices below 2 per cent.

Figure I.3. **Equity market developments**



Source: Datastream.

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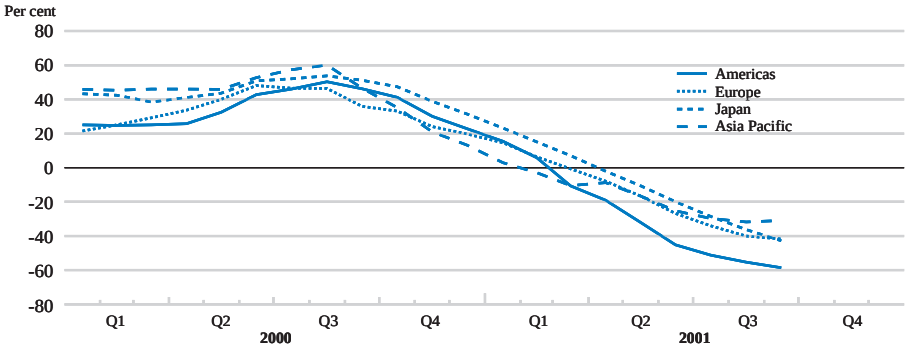
Figure I.4. **Semi-conductor sales continue to decline worldwide**

Sales, year-on-year percentage change



Source: Semi-conductor Industry Association.

hand, there will be a certain amount of replacement investment and electronic communication could substitute for travel; on the other hand, if overall investment remains sluggish, ICT investment is likely to be affected too.

Some building blocks for an emerging recovery

Monetary policy has eased and yield curves have steepened…

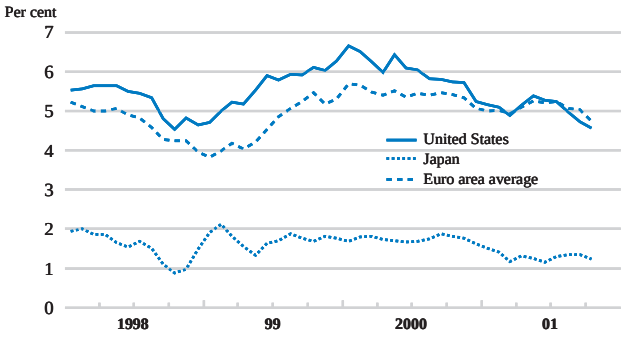
Macroeconomic policies are being actively adjusted to provide support for the world economy. Monetary policies have been eased across all the major OECD regions. In the United States, Canada and the United Kingdom, the key policy rate is at its lowest level in almost 40 years. Policy-controlled rates have also been reduced in the euro area, though not as aggressively. Ten-year government bond yields have fallen as well, though by less, and in early November stood around 4¼ per cent in both the euro area and the United States (Figure I.5). Furthermore, following the September attacks, investors switched out of equities and lower-grade bonds towards safer assets, putting further upward pressure on yield spreads. Corporate credit costs have thus not fully responded to monetary easing. Nevertheless, investors now face a higher incentive to shift out of low-risk cash and into riskier assets. As monetary easing succeeds in producing a trend in this direction, credit spreads should narrow. And as the recovery gets underway the yield curve will flatten, with some increase in money-market rates and a smaller rise in bond yields (see Box I.2).

… while fiscal easing has been more selective

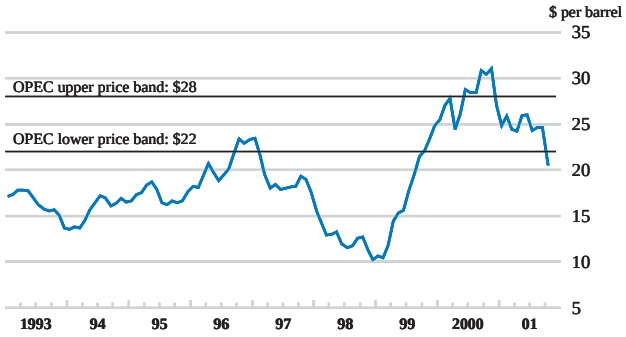
Fiscal policy for the OECD area as a whole, as measured in terms of the primary structural balance, is expected to provide stimulus to demand amounting to 1 per cent of GDP between 2000 and 2002 (Table I.1). This reflects measures to counter the recessionary effects of the September events, notably in the United States, already planned tax cuts (United States, Canada, Germany, France and Sweden) and increases in spending (United Kingdom). Following the front-loading of the new administration's tax cut in the United States, the emergency measures already appropriated and additional proposed tax cuts and spending increases could raise the two-year stimulus to around 2½ per cent of GDP. In Europe, fiscal measures have been much more limited, with responses generally confined to the operation of built-in stabilisers. In Japan, the scope for compensatory fiscal action is limited by the very high level of public debt.

Figure I.5. **Two factors supporting economic activity**

Long-term government bond yields



OECD oil import prices[1]



1. September to October 2001 data are OECD estimates.
Source: OECD, *Main Economic Indicators*.

Falling oil and raw materials prices should bolster real household incomes and corporate profits

Corporate profits and household disposable incomes should strengthen from lower oil and industrial raw material prices and thus assist a recovery of economic activity. After a spike to over $30 for a barrel of Brent crude, spot prices have fallen back sharply. In early October, they broke through the lower range of the $22 to $28 OPEC price band, as markets became more concerned about a global recession than about potential supply disruptions (Figure I.5). Nevertheless, in view of the many factors currently affecting oil prices – including recession fears, war risk premia, inventory demand and speculative activity – the OPEC cartel decided in the immediate aftermath of the September events to leave production targets unchanged.[3] Further production cut-backs may be implemented later on to limit overproduction and shore up prices, but it is assumed that such reductions will only keep oil prices at around the lower end of the OPEC price band (while they are currently a few dollars below) until world economic activity starts to recover. This should then entail some rise in oil prices to around the target level of $25 per barrel on average during 2003. Non-oil commodity prices, and in particular industrial raw material prices, are likely to show sustained falls in the early part of the projection period as the industrial recession deepens. This would be reversed as the economic recovery gathers momentum.

Confidence should recover in 2002

Some idea about when and by how much confidence will turn around may be obtained by examining past shocks. Even if, as observed, the circumstances are quite different in many respects, it is assumed that confidence measures will follow a pattern broadly similar to the one observed in the United States during the Gulf war recession, so that they recover by the second half of 2002 (Figure I.6). A scenario where uncertainty and insecurity dissipate slowly appears much more plausible, in the current circumstances, than one based on sudden recovery.

World trade should rebound in the latter part of 2002

Following the slump during 2001 and with demand picking up, world trade is expected to rebound strongly in the latter part of 2002 (Table I.2), consistent with a recovery of spending on ICT goods and a strengthening pull from US imports from

3. Previously, OPEC had cut its target production on three occasions in 2001 by a cumulative 3½ million barrels per day or about 10 per cent of its sustainable production capacity in order to stabilise prices around the desired $25 level.

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Table I.1. **General government financial balances**[a]

Per cent of GDP / Potential GDP

	2000	2001	2002	2003
United States				
Actual balance	1.7	0.6	-1.1	-0.6
Structural balance	1.3	0.7	-0.5	-0.2
Primary structural balance	4.0	3.1	1.5	1.7
Japan				
Actual balance	-6.6 [b]	-6.4[b]	-6.7	-6.6
Structural balance	-6.5 [b]	-5.8[b]	-5.7	-5.5
Primary structural balance	-5.2 [b]	-4.5[b]	-4.4	-4.2
Euro area[c]				
Actual balance	0.2	-1.2	-1.3	-0.9
Structural balance	-0.9	-0.9	-0.6	-0.5
Primary structural balance	2.7	2.5	2.6	2.7
European Union[c]				
Actual balance	0.6	-0.7	-1.0	-0.8
Structural balance	-0.3	-0.5	-0.3	-0.4
Primary structural balance	3.1	2.7	2.6	2.5
OECD[c]				
Actual balance	0.2	-0.7	-1.6	-1.3
Structural balance	-0.5	-0.7	-1.1	-1.0
Primary structural balance	2.2	1.8	1.2	1.2

a) Actual balances are as a per cent of nominal GDP. Structural balances are as a per cent of potential GDP. The structural balance excludes one-off revenues from the sale of mobile telephone licences. The primary structural balance is the structural balance less net debt interest payments.
b) Includes deferred tax payments on postal saving accounts amounting to 0.8 and 0.9 per cent of GDP in 2000 and 2001 respectively.
c) Total OECD figures for the actual balance exclude Mexico and Turkey and those for the structural balance further exclude the Czech Republic, Hungary, Korea, Luxembourg, Switzerland and Poland.
Source: OECD.

mid-2002 onwards, which should entail an important external stimulus to the countries specialised in ICT production (Figure I.7).

The recovery path differs across countries

Activity in the OECD area is expected to start growing again around the middle of next year, when a sentiment that "business is back to normal" may again prevail. The expansionary stance of monetary policy, supported in a number of countries by fiscal policy, will then begin to be fully felt. OECD-wide growth would thus pick up to perhaps over 3 per cent in 2003 (Table I.3), though with marked differences in recovery paths across countries.

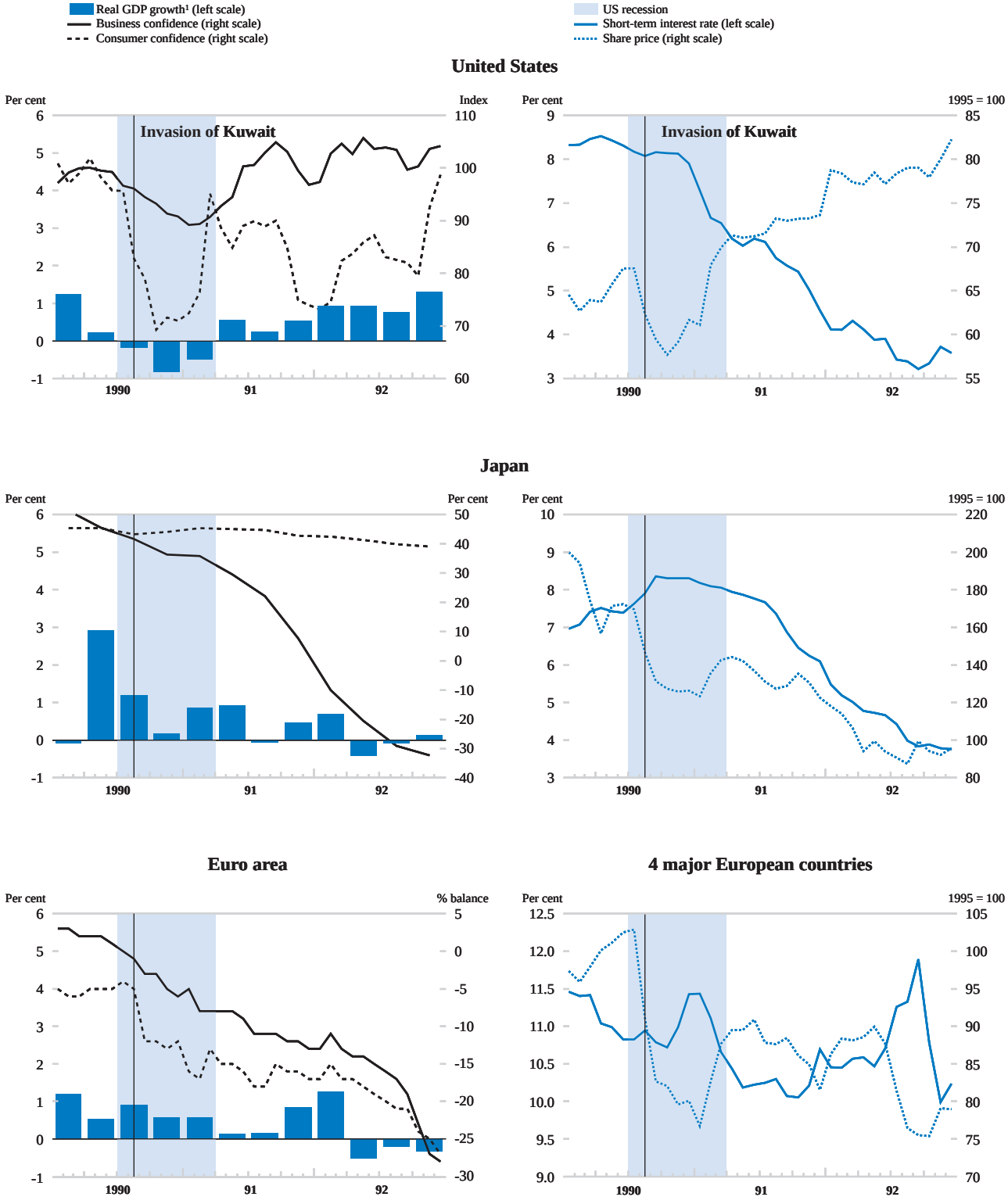
A delayed but subsequently strong US recovery is expected…

The rebound of the US economy is expected to be quite strong, reflecting aggressive policy easing, the depth of the preceding downturn and strong potential growth.[4] Apart from the return to "business as usual", the main stimuli to growth should come from the improvement in confidence, as the labour market and profits stabilise, and the impulse from monetary and fiscal policy. In addition, the current slowdown will have helped work down any investment overhang. GDP may be growing at a rate of 3¾ per cent at the end of the projection period, well above potential.

4. US recessions are generally short-lived – lasting between 6 and 16 months, with an average of 11 months.

Figure I.6. **The Gulf crisis**

August 1990 – February 1991



1. Percentage change from previous period.

Source: OECD.

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Table I.2. **World trade summary**

Percentage changes

	2000	2001	2002	2003
Merchandise trade volume				
World trade[a]	12.8	0.3	2.0	8.7
of which: Manufactures	14.2	-0.4	1.5	9.1
OECD exports	11.9	-0.3	1.4	8.0
OECD imports	11.9	-0.5	1.0	7.4
Non-OECD exports	15.1	0.8	3.3	11.1
Non-OECD imports	16.1	4.2	4.9	12.1
Memorandum items				
Intra-OECD trade[b]	11.2	-1.1	0.2	6.7
OECD exports to non-OECD	15.6	3.6	5.7	11.7
OECD imports from non-OECD	13.7	0.6	4.2	10.5
Trade prices				
OECD exports[c]	-3.7	-1.5	0.0	1.4
OECD imports[c]	-0.9	-2.1	-0.7	1.7
OECD terms-of-trade with rest of the world[d]	-6.9	1.4	2.9	-0.8

Note: Regional aggregates include intra-regional trade.
a) Growth rates of the arithmetic average of world import volumes and world export volumes.
b) Arithmetic average of the intra-OECD import and export volumes implied by the total OECD trade volumes and the estimated trade flows between the OECD and the non-OECD areas based on the 1995 structure of trade values.
c) Average unit values in US$.
d) The OECD terms of trade are calculated as the ratio of OECD export to OECD import prices, excluding intra-OECD trade.
Source: OECD.

… while Japan appears set to remain mired in recession…

The short-term growth outlook for Japan remains sluggish. The recession is set to last well into 2002, before a modest recovery gets under way. With the United States in recession and the Asian region slowing, if not in outright recession, the Japanese economy will not get much near-term stimulus from international trade. Domestic corporate investment will continue to decline. Private consumption will remain the only stabilising element. The vast amounts of bad loans in the financial sector and the poor performance of the stock market are continuing to be major sources of weakness. The main stimulus to growth may come as Japan's export markets start to expand again later in the projection period, and economic activity may register a modest increase in 2003, as business

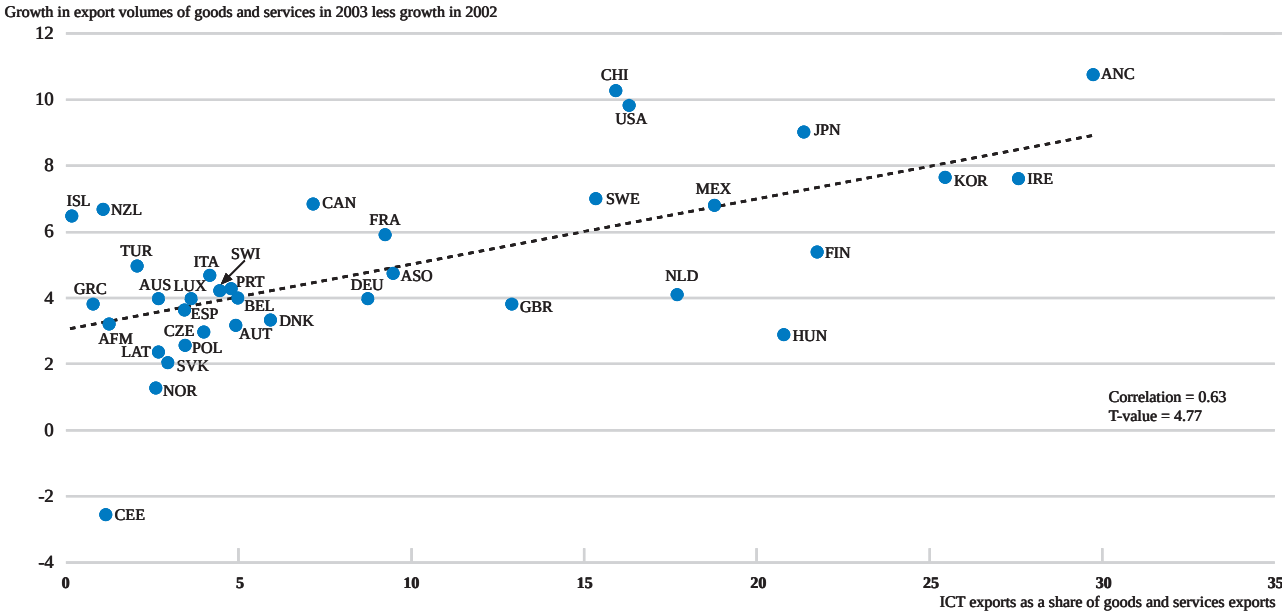
Table I.3. **GDP growth**

Percentage changes

	2000	2001	2002	2003
United States	4.1	1.1	0.7	3.8
Japan	1.5	-0.7	-1.0	0.8
Euro area[a]	3.5	1.6	1.4	3.0
European Union	3.3	1.7	1.5	2.9
Total OECD	3.7	1.0	1.0	3.2

a) Greece entered the euro area on 1 January 2001. In order to ensure comparability of the euro area data over time, Greece has been included in the calculation of the euro area throughout.
Source: OECD.

Figure I.7. **The strength of exports in 2003 and exposure to ICT**



Note: ANC: Dynamic Asia, ASO: Other Asia, LAT: Latin America, AFM: Africa and Middle-East, CEE: Central and Eastern Europe.
Source: OECD.

investment turns around moderately. After two years of outright decline, real GDP may increase by a meagre 1 per cent in 2003.

… and a shallow recovery may unfold in the euro area

Growth may pick up less vigorously in the European Union (EU) than in the United States, reflecting a milder downturn and a smaller policy stimulus in the euro area. It is projected to increase to around 3 per cent in 2003, reflecting the pull from rising US imports and a recovery of business investment. Countries specialised in high-tech manufacturing should get a boost from the turnaround in the global ICT cycle (Finland and Ireland). Growth patterns within the area will remain differentiated, however. Germany is projected, with Finland, to experience the slowest growth in 2001, but could join France and Italy in achieving 2½ to 3 per cent growth in 2003. In some smaller countries such as Greece, Ireland, Luxembourg and Spain, the pace of recovery is expected to be above average.

Elsewhere in the OECD growth prospects are uneven

Given the importance of their cross-border trade, Canada and Mexico are strongly influenced by developments in the United States. For both countries, after near-stagnation in 2002, growth is expected to pick up briskly in 2003. The United Kingdom is expected to experience a lull, as foreign and domestic demand slow, but activity is being supported by easier monetary and fiscal policy, so that the magnitude of the slowdown is limited. More subdued growth will be recorded in a number of smaller countries such as Denmark, Iceland, Norway and Switzerland, for a variety of reasons which include slow export market growth and specific domestic factors affecting confidence. Turkey is a special case, given the crisis it has been experiencing for some time now. In central Europe, some of the OECD Member countries applying for EU membership have been generating their own growth

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momentum for some time, in part financed by foreign direct investment (Czech Republic and Hungary, and Poland to a lesser extent). While economic activity slows in these countries as it will in their main European trading partners, the downturn may well be less pronounced than elsewhere.

Inflation concerns should recede…

Slow area-wide growth in 2001 and 2002 combined with projected oil and commodity prices should ensure that inflation comes down in the OECD area over the coming two years, to about 1½ per cent (Table I.4). Inflation would thus be below 2 per cent in the United States and in Europe, and still in negative territory in Japan.

Table I.4. **Unemployment, output gaps and inflation**

	2000	2001	2002	2003
	Per cent			
Employment growth				
United States	1.3	-0.1	-0.6	1.4
Japan	-0.2	-0.4	-0.8	-0.1
Euro area[a]	2.1	1.1	0.3	0.9
European Union	1.9	1.1	0.3	0.8
Total OECD	1.2	0.2	0.0	1.1
	Percentage of labour force			
Unemployment rate				
United States	4.0	4.8	6.2	6.0
Japan	4.7	5.0	5.5	5.4
Euro area[a]	8.9	8.5	8.9	8.8
European Union	8.1	7.8	8.1	8.0
Total OECD	6.2	6.5	7.2	7.0
	Millions			
Unemployment levels				
United States	5.7	6.8	8.9	8.7
Japan	3.2	3.4	3.7	3.7
Euro area[a]	12.2	11.8	12.5	12.3
European Union	14.2	13.7	14.4	14.3
Total OECD	31.8	33.3	37.0	36.3
	Per cent			
Output gaps[b]				
United States	1.9	-0.5	-2.6	-1.8
Japan	-0.6	-2.3	-3.9	-4.0
Euro area[a]	0.2	-0.5	-1.4	-0.8
European Union	0.1	-0.5	-1.3	-0.7
Total OECD	0.8	-0.8	-2.2	-1.6
Inflation[c]				
United States	2.3	2.1	1.2	1.3
Japan	-1.6	-1.6	-1.4	-1.6
Euro area[a]	1.3	2.5	2.1	1.6
European Union	1.5	2.5	2.2	1.8
Total OECD *less* Turkey	1.8	2.0	1.4	1.3
Total OECD	2.6	2.9	2.3	1.7

a) Greece entered the euro area on 1 January 2001. In order to ensure comparability of the euro area data over time, Greece has been included in the calculation of the euro area throughout.
b) Per cent of potential GDP.
c) Percentage change from previous period.
Source: OECD.

… and unemployment may rise again, before stabilising in 2003

The steady, seven-year long decline in OECD unemployment is projected to come to an end. During 2001-02 the number of unemployed persons in the OECD area will increase to 37 million and will not decline much in 2003. The US unemployment rate is projected to rise to over 6 per cent during 2002, somewhat above the estimated level of structural unemployment. In Japan, it may rise to a historical peak of 5.5 per cent in 2002 before inching down in 2003. It would be even higher without significant labour-force shrinkage. In the European Union, it may edge up in the short term and decline only marginally in 2003.

Regional current account imbalances remain

The stubbornly high US current account deficit is projected to remain unchanged at around 4 per cent of GDP, reflecting slower export market growth, combined with a persistently strong dollar (Table I.5). The Japanese current account surplus is set to decline to around 2 per cent of GDP in 2001 (the lowest level in a decade), affected in particular by faltering demand in many neighbouring economies. It is expected to rise again as exports revive with the stronger pull from the United States and from the Asian region. The EU current account remains close to balance over the projection period.

Outside the OECD area, growth is slowing as well, though it remains robust in China and Russia

Outside the OECD area, the economic situation in Dynamic Asia countries has worsened with the intensification of the world-wide downturn in ICT investment and there is little prospect of a recovery before the second half of 2002. China, which is much less exposed to ICT markets, has maintained strong growth momentum thanks to robust domestic demand. Growth is likely to moderate through 2002, however, in the wake of the broader slump in world demand, and due to a temporary drop in foreign direct investment. The Russian economy, which has been insulated from the

Table I.5. **Current account balances**

	2000	2001	2002	2003
		Per cent of GDP		
United States	-4.5	-4.1	-3.9	-4.0
Japan	2.5	2.1	2.9	3.5
Euro area[a]	-0.2	0.0	0.3	0.4
European Union	-0.4	-0.2	0.0	0.0
OECD	-1.3	-1.2	-1.0	-1.0
		Billion of dollars		
United States	-444.7	-413.6	-404.1	-438.0
Japan	116.7	86.8	117.7	140.5
Euro area[a]	-10.4	1.9	22.1	27.1
European Union	-27.8	-13.6	1.0	3.0
OECD	-335.9	-295.0	-255.5	-261.8
Memorandum items:				
Dynamic Asia[b]	75.0	76.6	77.9	75.4
China and other non-OECD Asia	9.5	-2.1	-10.8	-12.3
Latin America	-29.1	-40.3	-44.5	-43.2
Africa, Middle East	61.8	27.1	-17.2	-7.6
Former Soviet Union, Central and Eastern Europe	42.9	29.9	21.8	19.4
World	-175.9	-203.8	-228.3	-230.1

a) Greece entered the euro area on 1 January 2001. In order to ensure comparability of the euro area data over time, Greece has been included in the calculation of the euro area throughout.
b) Chinese Taipei; Hong Kong, China; Indonesia; Malaysia; the Philippines; Singapore and Thailand.
Source: OECD.

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global slowdown so far, due to its low exposure to ICT and large current account surplus, is projected to decelerate somewhat in 2002 and 2003 as the pace of growth of its energy exports remains weak. South America is being affected by lower trade growth and sluggish capital flows. The slowdown in Brazil has been aggravated by domestic factors and by the contagion from fears of a debt default in Argentina.

Quantifying risks

The risks are on the downside, with possibly significant departures from the central scenario:

The central scenario depicted in this *OECD Economic Outlook* is to be seen as the most likely outcome projected under the technical assumptions spelled out in Box I.2 and given the information available as of early November 2001. However, the distribution of risks surrounding the central scenario would seem to be preponderantly on the downside. This high degree of uncertainty provokes questions about the impact of significant departures from the path embedded in the central scenario for a number of key variables. The stylised shocks considered below have been quantified based on simulations of the OECD's international macroeconometric model, INTERLINK. As explained in the appendix, it is meant to capture the shape and size of a number of actual past shocks, although the 11 September shock has no direct precedent. The focus is on the United States, the euro area and Japan, which jointly account for 77 per cent of OECD-wide GDP.

- ***A deeper slump in consumption and investment***

The central scenario embodies a sizeable deceleration in final domestic demand, but compared with past downturns, consumption is projected to remain rather more resilient and except for Japan fixed investment holds up better. In this light, and assuming unchanged nominal interest and exchange rates as well as constant real government spending, a temporary additional 1 per cent decline in consumption OECD-wide coupled with a temporary 2 per cent further weakening in fixed investment have been simulated. This would cut around one percentage point off GDP growth in 2002 in each of the main OECD regions.

- ***Stalling non-OECD import demand***

The OECD area exports of goods to the rest of the world amount to 4 per cent of OECD-wide GDP. In the central scenario, they are projected to rebound quite vigorously following the very abrupt slowdown in 2001. However, on two occasions during the last two decades, namely in the early 1980s and during the Asia crisis of the late 1990s, the volume of non-OECD imports essentially stalled. Under the same technical assumptions as above about interest rates, exchange rates and government spending, a reoccurrence of such weakness in 2002-03 has been simulated. The negative impact on output growth would range from 0.3 per cent in the United States to 0.6 per cent in the more exposed euro area in 2002. The impact would be more than twice as large in 2003, reflecting second-round effects.

- ***A shock to oil prices***

Oil prices are assumed to remain subdued in the central scenario. While they have declined since 11 September, past crises suggest that an upward jump cannot be ruled out. Assuming unchanged nominal exchange rates and real government spending, and a one-for-one adjustment in nominal interest rates to the change in inflation, a permanent $10 increase in the price of a barrel of oil (*i.e.* an oil price path 40 to 50 per cent above the central scenario) has been simulated. This would amount to a sizeable adverse supply and terms-of-trade shock. In line with their respective dependence on net oil imports, activity would be hurt twice as hard in Japan (0.4 per cent) as in the United States, with the euro area in between. Inflation would rise by up to ½ percentage point, notwithstanding increased slack. Over time, however, the initial output loss would be clawed back *via* higher exports to oil producing countries.

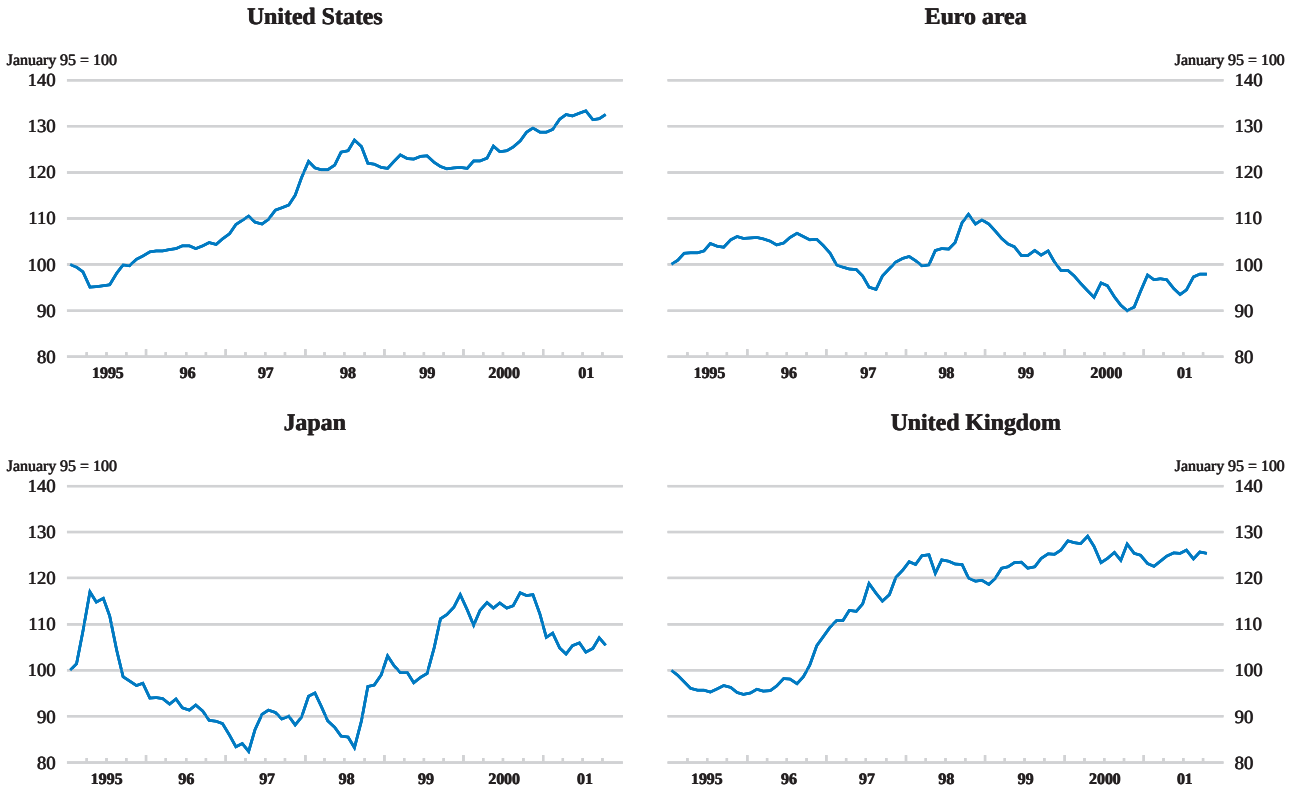
• ***A realignment of exchange rates***

The central scenario rests on an assumption of unchanged nominal exchange rates. These have not changed much in the course of 2001 (Figure I.8). But given the present constellation of current account positions an exchange rate realignment cannot be ruled out. The simulation reported here assesses the impact of a 10 per cent depreciation of the US dollar in nominal effective terms, caused by an enduring shift in market sentiment,[5] with nominal interest rates and real government spending held constant. By boosting US exports, this realignment would add 0.7 percentage point to GDP growth in the United States in 2002, and subtract almost as much from euro area activity. Over time, the impact on inflation would gradually restore competitiveness positions, but in the meantime current account positions would have converged somewhat.

Shocks can be mitigated to some extent by monetary…

The technical assumption of unchanged nominal interest rates relative to the central scenario sits oddly with central banks' observed behaviour in 2001. A simulation has been run of a 100 basis points cut in short and long-term interest rates across OECD countries except in Japan *vis-à-vis* what has been incorporated into the central scenario, assuming constant nominal exchange rates and real government

Figure I.8. **Nominal effective exchange rate developments**[1]



1. An increase denotes appreciation and vice versa.
Source: OECD.

5. In practice, it could be brought about by very different combinations of bilateral exchange rate realignments. For the purposes of this exercise, a uniform weakening is assumed.

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spending. Activity would be boosted in all regions, including in Japan, on account of the global multiplier effects. The largest impact would occur in the euro area. Inflation would barely inch up in 2002 and only marginally more in 2003. The monetary fillip would be considerable: it would suffice to offset the impact of a hypothetical stagnation in non-OECD import demand. In the case of the euro area, it would be large enough to compensate for a 10 per cent effective depreciation of the US dollar.

… and fiscal policy

While experience suggests that for a number of reasons fiscal fine-tuning should generally be avoided, recent developments prompt the question of the impact of durable increases in government consumption and of tax cuts. Earlier INTERLINK simulations assuming constant nominal exchange rates and real interest rates suggest that a one per cent of GDP boost to government non-wage consumption adds around one percentage point to GDP growth in the United States in the short run, and that there is a significant spillover on activity in the other regions.[6] In fact, from a global perspective, the overall stimulus is greatest when the impulse stems from the United States. The near-term impact on real GDP of a personal income tax cut is barely half as large as households save part of the extra disposable income. Both types of fiscal measures lead to a deterioration in the US current account and push up domestic inflation.

The real world is more complicated

Real-world shocks will probably not coincide with any of the above stylised ones. More likely would be a combination of shocks of different sizes and signs. While the ready-reckoners described above can be rescaled accordingly to gauge the quantitative impact of observed or hypothesised disturbances, it should be borne in mind that the relationships embedded in the model are not perfectly linear, and may be even less so in reality. For example, oil price increases may affect the economy more than decreases, and increases following a long period of price stability may have a bigger effect than those reversing earlier price declines. Moreover, not only are systemic risks not considered in the simulations, but the examined shocks are not necessarily additive: for example, a domestic demand contraction induced by a drop in confidence would endogenously lead to lower non-OECD demand, via the impact on the income of the OECD's trading partners, to weaker oil prices and possibly to exchange rate movements.

Policy requirements

Policies have moved swiftly but must remain forward-looking

In response to the global slowdown and to the 11 September shock, the stance of macroeconomic policy has been distinctly loosened virtually everywhere. The speed and breadth of the policy reaction has differed across OECD countries, however, partly reflecting uneven room for manoeuvre. Moreover, if the recovery were to be delayed by only one quarter, growth for the year 2002 as a whole would be significantly lower than the projected 0.7 per cent for the United States and 1.0 per cent OECD-wide. In light of the downward risks surrounding the near-term outlook, the Federal Reserve and the Eurosystem may need to cut interest rates more than assumed in the central scenario or to wait longer before starting to move them back up. Looking ahead beyond the current recession phase, however, a key question is how much and how fast to withdraw the stimulus, the challenge being not to

6. See Dalsgaard, T., C. André and P. Richardson, "Standard shocks in the OECD INTERLINK model", *OECD Economics Department Working Papers*, No. 306, 2001.

impede the recovery while avoiding the kind of inflation upsurge witnessed on various past occasions.

How much room is there for further monetary policy action?

Monetary policy has been eased considerably almost everywhere…

Faced with a synchronised slowdown in activity, most central banks had started to cut short-term policy interest rates by spring 2001. By 11 September, some outside continental Europe had already reduced them considerably, most prominently in the United States (Table I.6). Immediately after the 11 September attacks, massive injections of liquidity were undertaken by the US Federal Reserve, the Eurosystem and the Bank of Japan, in order to safeguard the smooth functioning of markets and the stability of the financial system. For this purpose, temporary swap lines were also set up between some of the major central banks. In the event, transactions and settlements took place without any systemic disruption, notwithstanding the four-day closure of US exchanges. During the following weeks, many central banks in the OECD as well as elsewhere cut their policy rates one or several times. In addition, prudential norms applicable to financial institutions were temporarily relaxed in a number of countries.

… and credit conditions are very lenient

Broad money growth in the largest economies has been strong and rising since the start of 2001, while money-market interest rates are already very low and have fallen very rapidly. However, notwithstanding the prompt and forceful action on the part of central banks, and the historically low level of short-term interest rates,

Table I.6. **Monetary policy action since the start of 2001**

	Official interest rate	Cumulative change since		Level as of 9 November 2001	*Memorandum item:*
		Start of the year	11 September		*Trough during 1996-2000*[b]
		Basis points		*Per cent*	
United States	Intended federal funds rate	-450	-150	2.00	4.50
Euro area	Minimum two-week refinance rate	-150	-100	3.25	2.50
Japan	Uncollateralised overnight call rate	-25	-1	0.00	0.08
United Kingdom	Repo rate	-200	-100	4.00	5.00
Canada	Target overnight money market rate	-300	-125	2.75	3.00
Australia	Target overnight money market rate	-175	-25	4.50	4.75
New Zealand	Official cash rate	-125	-50	5.25	4.50
Denmark	Nationalbank's lending rate	-180	-105	3.60	2.90
Norway	Overnight deposit rate	0	0	7.00	3.25
Sweden	Repo rate	-25	-50	3.75	2.90
Iceland	Repo rate	-50	0	10.90	6.50
Switzerland	Mid-point of target range for 3-month CHF	-125	-100	2.25	0.50
Czech Republic	Two-week repo rate	0	0	5.25	5.25
Hungary	Two-week repo rate	-100	-25	10.75	10.75
Poland	28-day intervention rate	-600	-150	13.00	13.00
Slovak Republic	Two-week repo rate	-25	0	7.75	8.00
Korea	Target overnight call rate	-125	-50	4.00	4.75
Mexico[a]	Funding rate	-1070	-85	8.09	12.75

a) One-day repo and outright operations with certificates of deposit, bank notes and bankers' acceptances
b) From March 1999 for New Zealand, May 2000 for the Slovak Republic and March 1998 for Mexico; discount rate for Switzerland.
Source : National central banks.

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Box I.3. Implications of the 2001 NIPA revision for potential output

The 2001 annual revision to the US National Income and Product Accounts (NIPA) provided new information on a range of important topics, especially the performance of productivity and the shifts in profitability and labour income during the latter years of the longest expansion in US history. The revision, released in July 2001, incorporated newly available and more comprehensive source data, as well as improved estimation methodologies.

Still-strong but slower growth. From one perspective, the picture of the US economy over the 1998-2000 period covered by the revised estimates is similar to that provided by the previously published data: the US economy grew strongly, led by business investment, and enjoyed low inflation. However, GDP growth was revised down significantly for 2000, to 4.1 per cent, *i.e.* 0.9 percentage point below the previous estimate (Table below, line 1). For 1998-2000, average annual GDP growth was revised down to 4.2 per cent, from 4.7 per cent. About half of this downward revision was concentrated in investment in equipment and software (line 2), leading to a notable cut in the estimate of growth in the capital stock for the business sector (line 3). It is essentially software investment which has been revised downwards.

A tighter labour market. While the level of GDP was revised down by almost 1 per cent in 2000, the level of gross domestic income was revised down by only ½ per cent (line 4). Among the components of income in 2000, the growth of compensation of employees was revised up 1.2 percentage points and the growth of corporate profits down 4.3 percentage points, pushing the level of compensation up by 1.4 per cent and the level of profits down by 7.4 per cent. This suggests that the tight labour market placed more upward pressure on compensation levels and unit labour costs than previously thought. The additional compensation boosted the personal saving rate in 2000 to 1 per cent, up from the -0.1 per cent previously estimated. The revision to compensation likely reflected the increased use of flexible forms of remuneration in the late 1990s, especially stock options. The role of increased flexibility in compensation in the downward direction will face a test this year, as corporate profitability has worsened with the slowing in the economy.

Implications for potential growth. One important implication of the revision is its effect on estimates of the potential growth rate of the economy. One gauge of potential growth – used in the OECD estimates – is derived from the growth rate of the net capital stock, estimates of potential labour input (*i.e.* labour input consistent with labour force participation and unemployment rates at equilibrium levels), and trend growth in total factor productivity. This approach is often termed a production function or growth-accounting approach to potential output. As growth in output and the capital stock were revised down, the new estimates of potential output growth in 1998-2000 are now somewhat lower as well (line 7). The downward revision to the contribution of the growth in the capital stock in 2000 is particularly large, reflecting the cumulative effect of the new investment figures discussed above (line 8). However, the estimates of potential growth remain quite robust by the standards of recent historical experience, suggesting that the "new economy" of the late 1990s, while less dynamic than some optimists may have believed, was indeed one of rapid potential growth. Looking forward, the weak pace of investment projected for 2001 and 2002, and the associated weak growth in the capital stock through 2003, generates a slowing in estimated potential growth over the projection period, to around 3 per cent. However, potential growth should pick up once the investment recovery takes root, and the long-run pace of potential growth probably remains in excess of 3 per cent per year.

Contribution of ICT industries. One aspect of the new economy that will need to be reassessed at a later stage is the contribution of ICT industries to the potential growth rate of the economy. The annual revision to the NIPAs lowered somewhat the level of investment in computers and communications equipment. Whether these downward revisions lead to a downward revision of the importance of these industries in aggregate value added will only become clear when new data on the composition of GDP by industry become available. The share of these industries in value added and the share of the products produced by these industries in aggregate capital input can affect significantly estimates of the potential growth rate of the economy, because technological progress in these industries has been particularly rapid. The potential growth rate of the economy in the future is therefore importantly related to the degree to which the recent cyclical slowing in investment in ICT is followed by a return to robust investment in such capital goods.

market participants continue to expect some further easing, including in the United States. Indeed, there may remain some room to cut rates if some of the aforementioned downside risks materialise and if it turns out that the monetary stimulus already in place does not suffice to counter them.

The full impact of US interest rates cuts has yet to come through

Monetary policy has moved most dramatically in the United States, with a cumulative cut of 450 basis points, to 2 per cent, of which 150 have occurred after 11 September. In real terms, short market rates have declined more than in the last recession and have been fast approaching zero. A considerable monetary impulse has thus been delivered already, even if it has been offset in part by the concomitant restrictive influence stemming from stock market weakening and a

Box I.3. **Implications of the 2001 NIPA revision for potential output** *(cont.)*

A more cyclical capital stock. ICT assets tend to depreciate more rapidly than other components of the capital stock. As their share is rising, the total net capital stock may start to move more closely in tandem with the cycle in economic activity. By implication, production-function based estimates of potential output that incorporate estimates of the actual capital stock will tend to become more cyclically sensitive. Compared with a hypothetical measure of potential output which would be based on a smoother estimate of trend capital stock, the measure used by the OECD points to a smaller gap between observed and potential output. When used to adjust fiscal balances for cyclical developments, the OECD measure of potential therefore indicates greater improvement in the structural fiscal position in good times, and more of a deterioration in bad times, than the alternative measure would. It would be difficult, however, to empirically establish such a measure.

2001 NIPA revisions

Per cent change from previous period

	1998	1999	2000
GDP and related measures			
1. Real GDP	4.3	4.1	4.1
Previous	4.4	4.2	5.0
2. Private investment in equipment and software	14.6	11.8	11.1
Previous	15.0	14.1	13.7
3. Capital stock – business sector	4.0	4.0	4.2
Previous	4.0	4.4	4.9
Gross domestic income and related measures			
4. GDI	6.3	6.0	7.1
Previous	6.4	6.3	7.2
5. Compensation of employees	7.3	6.4	7.6
Previous	7.2	6.3	6.4
6. Corporate profits[a]	–6.8	6.1	6.2
Previous	–2.3	5.0	10.5
Potential GDP and related measures[b]			
7. Potential GDP	3.6	3.7	3.7
Previous	3.7	4.0	4.0
8. Contribution of capital stock	1.3	1.3	1.3
Previous	1.3	1.4	1.6

a) Corporate profits with inventory valuation adjustment and capital consumption allowance.
b) OECD estimates.

persistently strong exchange rate. Evidently, monetary easing has helped bring down mortgage rates and encouraged the refinancing of housing loans, thereby sustaining household consumption through the summer of 2001. Cutting interest rates further is an option if the economy remains weak, but the fact that the full impact has not yet been seen, owing to the usual lags, argues for a pause in interest rate reductions. The case for such a standstill is reinforced by the fact that the amount of spare capacity is rather uncertain. Indeed, the national accounts revisions published in July 2001 implied substantially lower potential output estimates (Box I.3).[7]

7. One reason why monetary policy was overly loose in the 1970s may have been that the output gap was overestimated at the time, see Orphanides, A., "Activist stabilization policy and inflation: the Taylor rule in the 1970s", Board of Governors of the Federal Reserve System, Finance and Economics Discussion Series, Staff Working Paper, No. 2000-13, 2000. The same holds for the United Kingdom, see Nelson, E. and K. Nikolov, "A real-time output gap series for the United Kingdom, 1965-2000: construction, analysis, and implications for inflation", CEPR Discussion Paper No. 2999, 2001.

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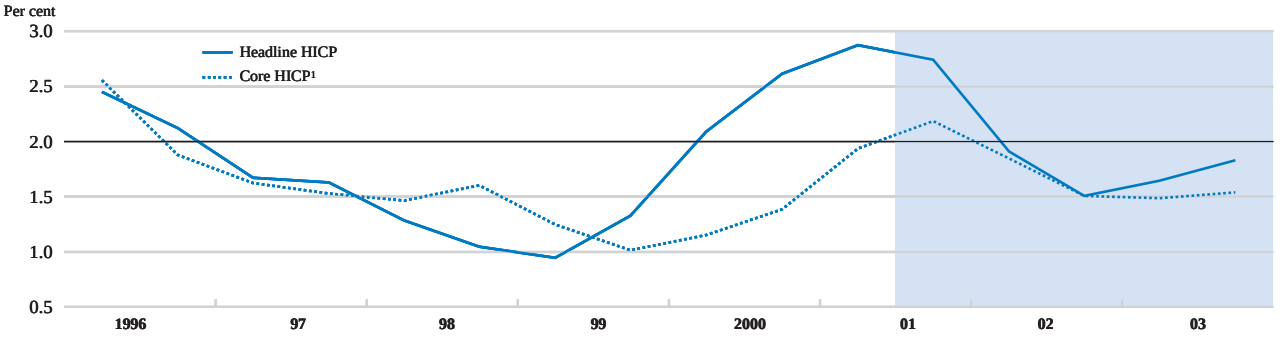
Figure I.9. **The euro area: headline and core inflation**

Year-on-year change in the harmonised index of consumer prices (HICP)



1. HICP excluding food, energy, tobacco and alcohol.
Source: OECD.

Interest rates have fallen less in Europe…

Central banks in Europe have cut interest rates, albeit less aggressively. Notwithstanding a still buoyant housing market, the Bank of England cut its repo rate by a cumulative 200 basis points, bringing it down to 4 per cent, a level not seen since the 1950s. The Eurosystem has lowered its minimum refinance rate by 150 basis points in total, of which 100 post-11 September, to 3¼ per cent. Its reluctance to move earlier and lower is partly related to the fact that up to mid-2001, it expected resilient growth in the euro area, and that headline inflation veered up during the first half of 2001, peaking at 3.4 per cent for the headline harmonised index of consumer prices (HICP), while core inflation crept up to around 2 per cent by mid-year (Figure I.9).

… and there is scope to ease

The balance of risks clearly shifted during the third quarter of 2001. As recognised by the Eurosystem in the course of the summer, the output gap appears to have widened rather than narrowed in 2001, and is no longer expected to be closed in the near term (Table I.7). At the same time, the effective exchange rate of the euro firmed, oil prices stabilised and the earlier upward shock to food prices began to unwind, contributing to a decline in headline inflation, the pace of which may, however, be influenced at the margin by the advent of euro notes and coins (Box I.4). Also, wage moderation continued to prevail, although information on this front tends to lag and forthcoming wage rounds may need to avoid a real wage catch-up following a protracted period of higher-than-anticipated inflation. Lastly, rapid if ill-measured broad money growth partly captures substitution from equity holdings into more liquid and less risky assets as well as the flatness of the yield curve. Nominal short-term interest rates are still well above 1999 levels and 125 basis points above corresponding US rates, and core inflation as measured by the HICP excluding food and energy is projected to fall below 2 per cent in 2002. Therefore, if conditions were to deteriorate, and even more so if the euro were to appreciate substantially, there would remain room for easing by more than the 50 basis points foreseen in the central projection. In such circumstances, the return to a more neutral interest rate level, foreseen for 2003, could also be postponed.

The nominal interest rate floor still constrains monetary policy in Japan

Since the mid-1990s, nominal short-term interest rates have remained below one per cent in Japan, with almost uninterruptedly negative core inflation, while land and stock prices have been on a downward trend for over a decade. Given the narrow room for manoeuvre on interest rates, the Bank of Japan announced in March 2001

Table I.7. **Euro area: summary of projections**

	1999 current prices		2000	2001	2002	2003
	Billion euro	Per cent of GDP	Percentage changes, volume			
Private consumption	3581.6	57.3	2.6	1.9	1.7	2.7
Government consumption	1247.3	19.9	2.0	1.6	1.5	1.5
Gross fixed capital formation	1310.9	21.0	4.5	0.6	0.7	3.8
Residential	363.3	5.8	0.8	-1.9	0.0	2.1
Business	790.8	12.6	6.7	1.3	0.7	4.8
Government	156.8	2.5	1.9	2.7	2.4	2.5
Final domestic demand	6139.7	98.2	2.9	1.6	1.5	2.7
Stockbuilding [a]	20.2	0.3	0.0	-0.4	0.1	0.2
Total domestic demand	6160.0	98.5	2.9	1.2	1.5	2.9
Net exports [a]	95.5	1.5	0.6	0.4	0.0	0.2
GDP at constant prices			3.5	1.6	1.4	3.0
GDP at current prices	6255.4	100.0	4.8	4.1	3.6	4.7
Memorandum items						
Private consumption deflator			2.1	2.5	1.6	1.7
Total employment			2.1	1.1	0.3	0.9
Unemployment rate			8.9	8.5	8.9	8.8
General government financial balance [b]			0.2	-1.2	-1.3	-0.9
Current account balance [b]			-0.2	0.0	0.3	0.4
Output gap [c]			0.2	-0.5	-1.4	-0.8

Note: Greece entered the euro area on 1 January 2001. In order to ensure comparability of the euro area data over time, Greece has been included in the calculation of the euro area throughout.
a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of GDP.
c) As a percentage of potential GDP.
Source: OECD.

that it would seek to ease the policy stance by expanding banks' current accounts at the central bank, in part through outright purchases of government bonds, and this until core consumer price inflation became durably positive. In August, the targeted outstanding balance of current accounts held at the Bank was raised by 20 per cent to ¥ 6 trillion and Bank purchases of government bonds were stepped up. In the wake of the 11 September attacks, and with mid-period reporting by banks due at the end of the month, the Bank reduced the official discount rate to 0.10 per cent, and temporarily removed any upper limit for reserve money. At the same time, the Japanese authorities intervened on the foreign exchange market, selling over $25 billion worth of national currency in the second half of September. Despite these actions, bank credit has continued to contract even after allowance is made for debt write-offs. However, there are no indications of a credit crunch, as good borrowers continue to deleverage and to finance investment from cash flow.

Could inflation targeting overcome the present liquidity trap?

Against this background, questions arise as to how the Bank of Japan could ensure monetary policy has the desired impact on demand. Its current operational target – current accounts held by the banking sector at the central bank – appears to affect only the excess reserves of the commercial banks, not their lending. The central bank could expand its balance sheet in various ways – by buying foreign assets or private-sector debt on top of government debt – but apart from the impact on the exchange rate, the monetary transmission mechanism to private activity is likely to

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Box I.4. The macroeconomics of the advent of euro cash

The transition from legacy currency banknotes and coins to euro cash is obviously a logistical challenge. It may also have a number of macroeconomic implications. The possible macroeconomic implications of the changeover matter for the setting of policy. The profile of spending and of prices may be affected, as may be some of the monetary aggregates. The exchange rate could also be influenced by the advent of euro cash. Furthermore, there is a possible albeit relatively small net fiscal impact.

Logistics. The logistics of the changeover are complex and costly. Some 10 billion notes and several hundred thousands tonnes of coins, most of which have now been produced, have to be put into circulation within the first few weeks of 2002. The implied safe storage and transportation needs are considerable. So is the work required to convert cash registers, cash-operating vending machines and automatic tellers. Coping with the physical retrieval of old monies and injection of new notes and coins will be difficult in places. Combating counterfeiting is yet another demanding task, notwithstanding the high technical quality of the new notes and coins. With a view to smooth the transition, the European and national authorities have stepped up information campaigns and the delivery of euro-denominated cash to professional target groups has started.

Timing of spending. Anticipating possible bottlenecks and disruptions in early 2002, households may be tempted to frontload part of the spending that would otherwise have taken place then, boosting private consumption in late 2001 and reducing spending in the first months of 2002. In addition, private consumption, notably on durables, may be increased in 2001 as individuals spend legacy currency cash earned illegally or undeclared to the tax authorities. There seems to be some evidence that this is the case for luxury cars in particular.

Monetary aggregates. Cash in circulation has been declining sharply in the course of 2001, particularly as regards large denomination banknotes. Precautionary early spending probably translates into temporary substitution within M3 – the broad money aggregate closely monitored by the ECB as its first policy "pillar" – rather than into changes in the growth rate of M3.[1] But legacy currency cash circulating abroad, particularly in Eastern Europe, may also return to national central bank vaults after conversion into non-euro area currency, decreasing M3.[2] The same holds for currency circulating domestically in the shadow economy. Following the changeover, in contrast, the demand for cash may rise, with a reversal of the aforementioned substitution effect plus perhaps M3-augmenting demand for large-denomination notes. To the extent that the latter would remain abroad, however, the associated increase in the money stock should be discounted for monetary policy purposes. Possibly offsetting the increase in cash demand might be a change in payment habits accelerated by the changeover which would see more extensive use of payment cards (which are not used as much in the euro area as in the United States), as well as a vanishing need for those who regularly spend in more than one euro area country (including border area residents) to hold two or more national currencies.

Exchange rate effects. The reflux of legacy currency cash ahead of the introduction of cash euros has been pointed to as a factor contributing to the euro's persisting weakness on the foreign exchange markets.[3] The reversal of these flows in 2002 would work towards euro appreciation. The exchange rate may also be influenced, at least temporarily, by the effectiveness or otherwise with which the changeover takes place.

Inflation. The fear has also been expressed that enterprises and retailers may use the changeover as an opportunity for rounding prices upwards, which would temporarily push up inflation. In fact, there is anecdotal evidence that some firms have done so already,[4] and European and national authorities have invited citizens and consumer organisations to be particularly vigilant. Competition is fierce in many sectors, however, limiting the scope for such behaviour and even putting pressure on sellers to round downwards. Moreover, many euro area governments have committed to neutral or consumer-friendly rounding for those prices and fees they control. And analogous past conversions – such as the decimalisation in the United Kingdom in 1971 – suggest that the net effect of rounding is likely to be very small.

Fiscal impact. On the fiscal side, the changeover will entail the realisation of a windfall gain for national Treasuries, since a portion of the legacy currency currently in circulation will fail to be returned.This has lead to calls by retailers, banks and vending machine operators to be compensated for the costs of the changeover. But standing against this windfall gain is the cost of the production of the new notes and coins and that of the destruction of legacy monies.

In sum, the ultimate macroeconomic impact of the changeover is likely to be hard to gauge even with the benefit of hindsight, and *a fortiori* beforehand. It is clear, however, that the introduction of cash euros amplifies the statistical noise surrounding M3 (which for other reasons will have been redefined twice within one year). More generally, the possible short-term disruptions and the ensuing temporary costs should be set against the permanent gains associated with lower transaction costs and greater price transparency in the euro area.

1. It should also be noted that currency in circulation represented only 6.9 per cent of M3 at the beginning of 2001.
2. In the mid-1990s, as much as 30 to 40 per cent of the deutschemarks in circulation were held abroad, see Seitz, F., "The circulation of deutschemark abroad", Discussion Paper No. 1/95, Deutsche Bundesbank, 1995.
3. See Sinn, H.-W. and F. Westermann, "Why has the euro been falling?", CESifo Working Paper, No. 493, 2001.
4. However, significant price increases may have received a disproportionate measure of publicity.

be weak. Proposals for escaping from the current liquidity trap tend to centre on an inflation targeting framework.[8] A temporary price-level objective would be set and pursued by driving down the value of the yen. Since the Japanese economy is large and fairly closed, the envisaged depreciation would be considerable, calling for international acquiescence. But assuming this were forthcoming, inflation expectations would rise and both domestic spending and exports would be spurred by the lower real interest rate and real exchange rate. In addition, the unanticipated rise in inflation would alleviate the debt burdens of the Government and banks.

The exchange rate is key

How credible would a very explicit policy shift along these lines be? Expectations of deflation and of a strong exchange rate are deeply rooted. Moreover, Japan is a large net creditor and repatriation of funds might make depreciation difficult: one force that has recently worked to strengthen the yen, and which interventions on the foreign exchange market might not be able to fully offset, has been the capital repatriation behaviour of the domestic Japanese banks aimed at shoring up their balance sheets, which have further deteriorated as stock markets collapsed (Box I.5). In sum, a shift to an inflation target with an explicit commitment to a time frame may not bring much over what is already in place. What is needed is to push the current framework to its limits, *via* unsterilised exchange rate intervention. Domestic assets could also be bought, but the danger would be of artificially pushing up land and equity prices, which are now closer in line with cash flows.

What is the scope for fiscal action?

Fiscal policy is cushioning the slowdown

Against the backdrop of an aggressive monetary response but limited further scope for easing, the question arises whether fiscal policy could also be used to limit the extent of the slowdown. For most countries, headline fiscal balances are now projected to deteriorate, largely reflecting the downturn in activity, but also in many countries as a result of stimulatory discretionary measures. This marks an inflexion in fiscal trends, following the sustained consolidation efforts witnessed during the 1990s, in particular in the United States and in Europe. To some extent, the loosening of the fiscal stance was built in well before the slowdown became obvious, not least in the form of tax cuts. With the benefit of hindsight, their timing appears fortuitously anti-cyclical. But going forward, conventionally-measured fiscal positions in a number of advanced market economies preclude such a policy course (Figure I.10), as do the impending spending pressures associated with ageing.[9] There is also very limited scope, if at all, for fiscal activism in the OECD's European emerging market economies, where a gaping fiscal deficit is often coupled with a large current account one (Table I.8).[10] In contrast, in Korea as well as in a number of non-OECD Asian economies, there is more room for a discretionary stimulus, and

8. Recent contributions to the debate include Bank of Japan, *On Price Stability*, Tokyo, 2000; Svensson, L., "The zero bound in an open economy: a foolproof way of escaping from a liquidity trap", *Monetary and Economic Studies*, Vol. 19, No. S-1, 2001; Hunt, B. and D. Laxton, "The zero bound on nominal interest rates and its implications for monetary policy in Japan", IMF Working Paper, forthcoming; and the forthcoming *OECD Economic Survey of Japan*.
9. See, for example, Chapter IV in *OECD Economic Outlook*, No. 69, and Dang, T.-T., P. Antolin and H. Oxley, "Fiscal implications of ageing: projections of age-related spending", *OECD Economics Department Working Papers*, No. 305, 2001.
10. See Chapter IV, which notes the implied vulnerability to shifts in market sentiment.

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Box I.5. **Bad loans in Japan**

The Japanese Government is rightly stressing the need for banks finally to dispose of their bad loans, so as to restore the functioning of credit mechanisms and facilitate resource reallocation. In the absence of decisive progress on this front, effectively bankrupt companies, supported by the rollover of loans at minimal interest rates, will continue to cut prices to remain in business and the economy is unlikely to emerge from a slow growth, deflationary, trap.

Extent of the problem. Many estimates for impaired loans have been cited, which differ in definition and institutional coverage. The official objective set in Spring 2001 was for the major banks to write off existing bad loans over the next two years, and new ones over the three years after they are incurred. The problem, however, extends more widely through the financial system, with regional banks and credit unions/co-operatives often in an even weaker position than the major banks.[1] As of end-March 2001, bad loans are officially estimated to total ¥ 11.7 trillion at the major banks and ¥ 31.2 trillion at all deposit-taking institutions. Bad loans cover two bottom categories of loans, *i.e.* to firms "in danger of bankruptcy" and "bankrupt" (or effectively so). On a wider definition including one category above, namely "in need of special attention", the figures referred to as non-performing loans (NPLs) are ¥ 18 trillion for the major banks and ¥ 44.5 trillion for all deposit-taking institutions.

Bad loan estimates have, thus far, been calculated from the self-assessment of loan quality by banks, based on delinquency criteria.[2] New measures were announced in July and September 2001, by which major banks have been required to conduct internal rating reviews, which reflect market indicators such as credit ratings and stock prices on a timely basis and to take account of recent trends in loan losses and bankruptcy. The frequency of inspections is to increase and the Financial Services Agency (FSA) will focus on specific debtors. Loans to big clients who suffered declines in their market indicators are to be subjected to special scrutiny, and banks will be required to provision in a more forward-looking way. This tighter form of inspection is likely to result in further increases in NPLs. The potential amount of such loans is large, as suggested by various private sector estimates. With nominal interest rates so very low, the fact that a company remains current on its debt service says little about its actual capacity to repay. The pattern of financial statements of listed companies shows that with a bunching of financially poorly performing companies loan quality is extremely sensitive to a change in interest rates. Estimates based upon a simple extrapolation from financial statistics covering large firms indicate that a small increase in lending rates, to reflect borrowers' risks more accurately, could imply a total of ¥ 170 trillion in bad loans and ¥ 237 trillion in NPLs.[3]

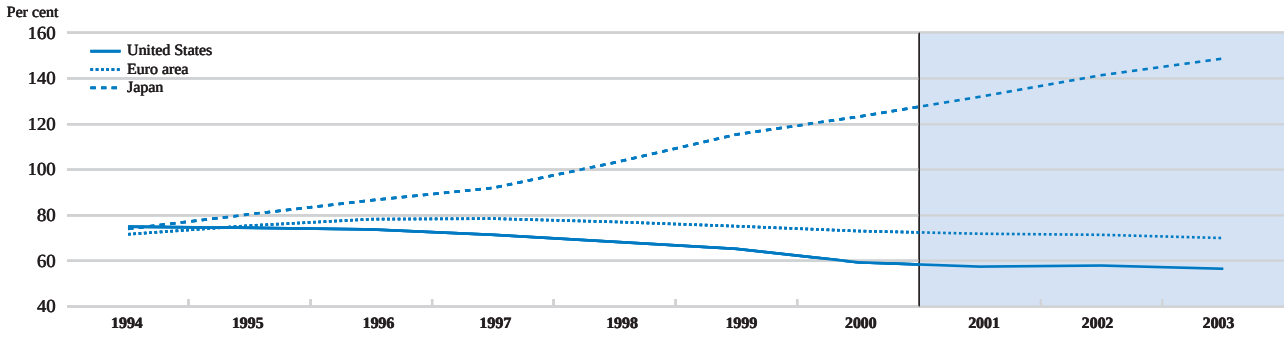
Weak bank balance sheets. At the same time, bank profits will be influenced by the application of new mark-to-market rules. Banks are to report full-year profits from March 2002 on this basis, which will be very painful if stock prices remain depressed. If they fail to pay dividends on preferred shares held by the Government, voting rights will become attached to these shares, and they may be converted to normal voting stock. Low demand for loans and ample liquidity have turned banks into major investors in government bonds. The latter carry a zero risk under the rules established by the Bank for International Settlements (BIS) but with long-term rates at historical lows, the associated interest rate risk is skewed and significant. The banks' exposure in this respect is in fact even larger, due to large amounts of off-balance interest-rate swaps. The implications of all this are that weaknesses in bank balance sheets will be further exposed and that, depending on the extent of systemic risk, an additional injection of public funds may be unavoidable.

Speeding up the adjustment process. The Resolution and Collection Corporation (RCC) is being asked to step up purchases of doubtful loans from banks, and to this end the scope of its operations has been broadened. At present the RCC only purchases loans at a severe discount, which makes selling unattractive for the banks except where the loans are uncollateralised. However, while it will now be able to pay "fair value", the actual price which can be offered by the RCC remains to be defined. Indirect recapitalisation via the take-over of NPLs at artificially high prices would give banks the wrong incentives, by appearing to rescue incumbent management and shareholders. The RCC should aggressively auction the loans it acquires. It should also refrain from becoming directly involved in corporate workouts (in which it has no expertise, having essentially been a debt-collection agency until now). Funds are to be set up to buy shares of enterprises which have been involved in their exchanging debt for equity, in an effort to push through their restructuring. A code for debt forgiveness has been agreed, which should facilitate private workouts while introducing financial discipline and transparency.

Reducing banking capacity. In addition, the authorities need to enforce a reduction in banking capacity and costs by using the restructuring agreements they have with recapitalised banks. In this regard, the capping in March 2002 of the universal deposit guarantee will put weak banks under pressure. Moreover, the authorities are reconsidering the role of the state-owned postal savings system and housing loan corporation, which distort competition and, by providing *de facto* subsidised credit, reduce profitability in the banking sector. The postal savings system benefits from a state guarantee on all deposits and pays neither premiums for the guarantee nor taxes. It is encouraging that options including privatisation of these two institutions are being explored by the Government.

1. Concerns have also been raised about life insurance companies, see Box I.3 in the previous *OECD Economic Outlook*.
2. An examination of the classification of debts on the eve of bankruptcy filing showed that only 30 per cent of them had been classified as high risk, effectively bankrupt or bankrupt. See the forthcoming *OECD Economic Survey of Japan*, Paris.
3. See Goldman Sachs, "Totally rethinking Japanese asset quality", July 2001.

Figure I.10. **Gross public debt ratios**



Source: OECD.

supplementary budgets have been introduced. The risk should be avoided, however, that this would slow down much-needed corporate restructuring. In Mexico, a near-zero public sector balance continues to be targeted, which although imparting a pro-cyclical bias to fiscal policy has been welcomed by markets.

The fiscal stance is shifting in the United States…

The ongoing shift in fiscal stance is perhaps most conspicuous in the United States. Whereas the previous *OECD Economic Outlook* envisaged broadly unchanged cyclically-adjusted net lending between 2000 and 2002 – notwithstanding

Table I.8. **Fiscal and current account balances in emerging OECD economies**

In per cent of GDP

	2000	2001		2002		2003
	Actual	Projected	EO69	Projected	EO69	Projected
General government financial balance						
Czech Republic	-5.5	-6.0	-7.5	-9.3	-7.5	-5.8
Hungary	-3.0	-4.9	-4.0	-4.8	-4.4	-4.5
Korea[a]	1.3	-0.1	0.0	-0.5	0.0	0.0
Mexico[b]	-1.1	-0.7	-0.7	-0.7	-0.5	-0.5
Poland	-2.2	-4.4	-2.5	-4.9	-2.2	-4.9
Slovak Republic[c]	-3.5	-3.9	..	-3.4	..	-2.9
Turkey[d]	-10.3	-17.4[e]	-15.0[f]	..	-10.5[f]	..
Current account balance						
Czech Republic	-4.5	-5.1	-5.2	-4.8	-5.5	-5.4
Hungary	-3.3	-2.9	-3.7	-2.4	-4.3	-2.3
Korea	2.4	2.2	2.7	2.3	2.7	2.6
Mexico	-3.2	-3.0	-3.6	-3.3	-4.0	-3.5
Poland	-7.5	-6.2	-6.2	-5.7	-5.7	-5.7
Slovak Republic	-3.8	-7.8	-4.3	-8.0	-5.1	-8.4
Turkey	-4.9	2.4	-1.9	2.1	-0.5	2.2

a) Consolidated central government balance.
b) Public sector, including PEMEX and other public enterprises.
c) July 2001 IMF staff projection, excluding privatisation proceeds and guarantees.
d) In per cent of GNP, central government.
e) OECD projection.
f) Letter of Intent to the IMF, 3 May 2001.

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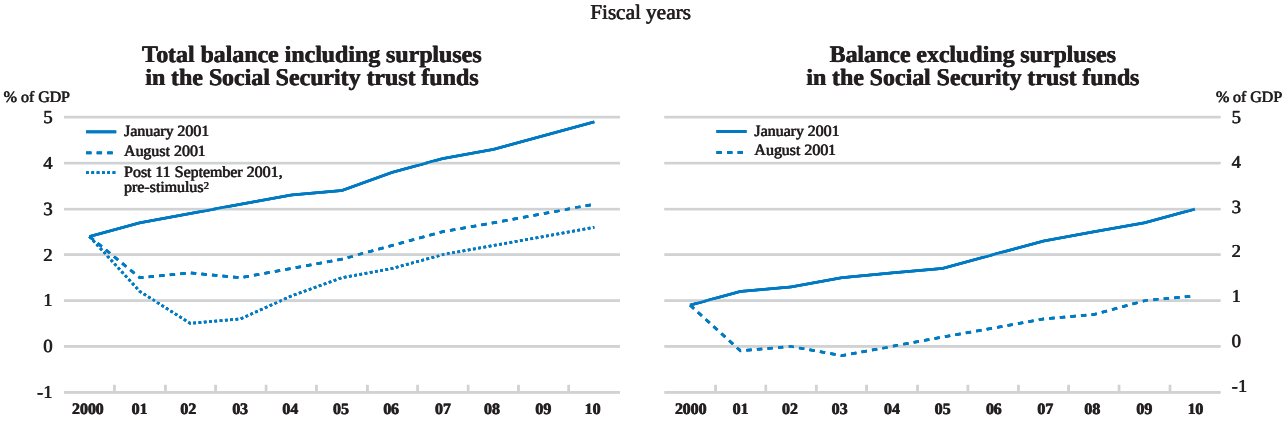
the implementation of a major programme of tax cuts – a sizeable loosening is now projected over this period, by 1¾ percentage points of GDP. The deterioration in the fiscal balance partly reflects the larger-than-expected downturn through the summer of 2001, which translated into major downward revisions of official US budget forecasts (Figure I.11).[11] But it mainly results from measures taken following the 11 September attacks, including emergency funding for the affected areas and sectors, as well as broader new commitments. In the immediate aftermath of the attacks, a $40 billion package was enacted by Congress, of which half was allocated for national security. Shortly thereafter, $5 billion in direct cash aid was granted to US airline companies plus $10 billion in loan guarantees.[12] A number of further measures are being discussed, which in the central projection are assumed to total $90 billion over 2002-03.

… and further tax cuts are being mooted

Under consideration are a variety tax cuts and spending proposals, including the accelerated phasing in of the pre-existing tax-cut programme, a cut in the corporate income tax and/or in the capital gains tax, a temporary investment tax credit, more generous depreciation allowances and/or expensing provisions for investment. Income tax rebates are also being contemplated, targeted on moderate-income taxpayers, as well as a temporary sales tax rebate. Furthermore, an extension of unemployment benefit duration by 13 weeks beyond the normal 26 weeks, as well as federal block grants to states to allow them to offer health coverage and job training for laid-off workers are envisaged. To the extent that a short-run fiscal stimulus was the main criterion, the choice between these options should be guided by the

Figure I.11. **United States: the projected budget surplus**[1]



1. The figure does not show the projection for 2011 because of the uncertainty about the fate of the sunset clauses in the tax law.
2. Includes $40 billion in emergency spending and the estimated cost of the assistance to airlines, but not any subsequent stimulus package.

Source: Congressional Budget Office, January and August 2001 *Budget and Economic Outlook*, and September *Monthly Budget Review;* House and Senate Budget Committee, *Revised Budgetary Outlook and Principles for Economic Stimulus,* 4 October.

11. The Congressional Budget Office (CBO) estimates that federal revenue in FY 2001 was lower than in FY 2000, which would be the first year-to-year decrease since the early 1980s. Reasons other than the unanticipated slowdown include changes in the timing of tax payments. See *Monthly Budget Review*, 26 September 2001.
12. Partly to contain demands for help from other sectors and from airlines that do not really need them or whose financial problems are unrelated to the 11 September attacks, these loan guarantees do not come free: recipients may be required to give the Government buy options on their stock.

probability that they would indeed promptly add to demand. Some of the proposed tax cuts are of a permanent nature and therefore quite costly in the long run, while they might fail to induce extra spending in the near future. Others are more clearly of a temporary kind, but may still prove relatively ineffective, translating mainly into higher corporate or household saving.

Tax changes should be strictly temporary or matched by spending cuts

Bearing in mind that fiscal policy is less flexible than monetary policy and that tax-rate changes made for short-term reasons usually have long-term budget consequences, it is important that the size and composition of the fiscal stimulus package not jeopardise long-run fiscal discipline. If tax cuts are made, they should either be expressly temporary or matched by medium-term expenditure cuts. The recent national accounts data revisions are a reminder that an apparently robust fiscal situation may be less sound than it appears, while the experience of the 1980s illustrates how difficult it is to correct a deterioration once it occurs. Pulling the fiscal lever too forcefully would add to the monetary boost in the short run, but hamper the eventual effectiveness of monetary policy by pushing up credit costs.

The automatic stabilisers are at work in Europe…

Several governments in the euro area had already publicly warned around mid-2001 that, owing in particular to the unanticipated extent of the slowdown, fiscal performance in 2001 was unlikely to match the targets set in their national stability programmes (Table I.9). In the aftermath of the 11 September attacks, meeting the corresponding nominal deficit objectives has become even more difficult. The same holds for the 2002 budgets. Past consolidation efforts have put euro area members in

Table I.9. **Fiscal balances in Europe: projected outcomes versus targets**

General government, in per cent of GDP [a]

	2000	2001		2002		2003	
	Actual[b]	Projected	Programmed	Projected	Programmed	Projected	Programmed
Austria	-1.5	0.0	-0.8	-0.4	0.0	0.1	0.0
Belgium	0.1	0.0	0.2	0.0	0.3	0.2	0.5
Finland	6.9	3.7	4.7	1.9	4.4	2.1	4.5
France	-1.3	-1.5	-1.0	-1.8	-0.6	-1.4	-0.4
Germany	-1.3	-2.5	-1.5	-2.5	-1.0	-1.8	-0.5
Greece	-1.1	0.2	0.5	0.6	1.5	1.3	2.0
Ireland	4.5	3.2	4.3	2.2	3.8	1.9	4.6
Italy	-1.5	-1.4	-0.8	-1.1	-0.5	-1.1	0.0
Luxembourg	6.1	5.3	2.6	3.2	2.5	2.9	2.5
Netherlands	1.5	1.1	0.7	0.6	0.3	0.7	0.3
Portugal	-1.8	-1.7	-1.1	-1.5	-0.7	-1.4	-0.3
Spain	-0.4	0.0	0.0	-0.4	0.2	0.0	0.3
Euro area	-0.8	-1.2	-0.6	-1.3	-0.3	-0.9	0.1
Denmark	2.8	2.0	2.8	1.4	2.6	1.7	2.6
Sweden	4.1	3.8	3.5	1.6	2.0	1.8	2.0
United Kingdom[c]	1.9	1.1	0.6	0.0	-0.1	-0.7	-0.9

a) Excludes UMTS receipts.
b) September 2001 notification to the European Commission.
c) On a financial year basis (year t stands for FY t/t+1).
Source: National stability and convergence programmes (third vintage), Eurostat and OECD.

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a position to let the automatic stabilisers function to some extent. But the scope for them to act as conjunctural cushions is determined by the degree of consolidation achieved in the upturn and is curtailed in some countries by still very high public debt ratios and/or underlying deficits that remain uncomfortably far from the "close to balance or in surplus" position required to ensure fiscal sustainability over the medium run. As for the possibility of discretionary action, since short-term interest rates have come down significantly, and with earlier commitments to cut certain taxes to come into effect in 2002 and 2003, the overall stance of macroeconomic policy does appear to be mildly easing. A significant additional discretionary push is generally undesirable, not least because of implementation lags, which might render it pro-cyclical.

… but spending pressures need to be resisted

Most importantly, it remains essential to resist spending pressures and to meet specific medium-term objectives where these have been spelled out for outlays. Chronic overruns in areas such as health care spending – notably in France, Italy and Portugal – call for fundamental policy changes to contain them. Unforeseen new spending has been necessary in the wake of the 11 September attacks, in particular to enhance security. In some countries, this is to be financed by tax increases, particularly in Germany, where the fiscal deficit is projected to come close to 3 per cent of GDP.[13] In others, such extra spending may *de facto* be offset by restraining other categories of outlays, and this, indeed, should be the preferred option.

Aid to airlines should be temporary and not distort competition nor delay restructuring

There are also pressures for other types of new spending commitments, notably for public aid to the airlines. The European Commission considers that emergency aid to compensate for the losses resulting directly from the four-day closure of US airspace is permissible and that the cost of reinforcing security must be borne by Member States. The Commission is to examine the assumption of the additional costs of insurance by Member States for a limited time, provided this does not place airlines in a more favourable position than prior to the withdrawal of their insurance cover. It is important that any aid not reverse the slow but genuine progress made in the 1990s in bringing down state aid and reducing competition distortions. Moreover, with some European airlines bankrupt or on the verge or bankruptcy, overdue restructuring of this sector should not be delayed as a result, rather the contrary.

In Japan, the immediate priority is to contain new borrowing…

Years of massive and ill-directed fiscal pump-priming have failed to prevent the Japanese economy from slipping into recession once again, and have saddled it with the highest gross public debt-to-GDP ratio among OECD countries. Just to stabilise the debt ratio at 180 per cent of GDP (from around 130 per cent at present) would require a consolidation during the current decade of over 10 percentage points of GDP.[14] The required adjustment would be even more drastic if additional financial support were needed for the cleaning up of bank balance sheets. In the absence of a foreseeable inflexion of the debt path, Japanese government bonds may be downgraded further by rating agencies, which would increase the associated risk premium and worsen the debt dynamics. In the shorter run, the emphasis should be on cutting expenditure, in particular as regards public works and subsidies to public corporations. This would be facilitated if the tendering system, which is prone to bid-

13. Unless there are exceptional circumstances, the Stability and Growth Pact foresees sanctions when the deficit durably crosses that threshold.
14. This is assuming nominal GDP growth of 1 per cent and nominal interest rates of 2 per cent. See the forthcoming *OECD Economic Survey of Japan*.

rigging, were changed, and if earmarking of some revenues for special purposes, such as road building, were abolished. Tangible progress with pension- and health-system reforms is also needed to dispel the perception that they are unsustainable, which tends to push up precautionary household saving.

… while refocusing public spending

A small supplementary budget has been presented to Parliament and the Government has committed itself to cap new borrowing at the central level at ¥ 30 trillion in the next fiscal year. Even if provision is made for the expected weakness in tax revenue, a fiscal tightening of some half a percentage point of GDP will be required, a small step in view of the necessary medium-term adjustment, but an important signal against the background of a prolonged deterioration in the public finances. The supplementary budget incorporates measures to complement the Government's structural reform plans, especially by increasing support for the unemployed. Pressures are rising for a second supplementary budget to include traditional public works top-ups. This needs to be firmly resisted, since it would undermine the Government's new fiscal strategy in its very first year.

Shifting the macroeconomic policy stance back towards neutral

Maintaining a medium-term policy focus…

Given the lags associated with monetary and fiscal policy, a crucial issue going forward is when and at what pace the macroeconomic policy stimulus should start to be withdrawn. On some past occasions, notably following the October 1987 stock market crash, the excess liquidity injected *via* a stimulatory monetary policy failed to be drained early enough. Taking a medium-term view, monetary policy should not go so far as to reflate the economy to previous, potentially inflationary levels, which would jeopardise the sustainability of the recovery.

… with symmetrical use of automatic stabilisers…

In the context of the impending upturn, EU countries should not relax the medium-term nominal net lending targets enshrined in their earlier stability and convergence programmes. Unlike during the last upturn, they will also need to let the automatic stabilisers work in full on the way up, paying for tax cuts by expenditure restraint. Reinvigorating structural reforms, which in some places have lost momentum, would allow for a higher economic speed limit and thereby make it easier to cope with this challenge.

… is essential for non-inflationary growth

Where discretionary fiscal action has been taken, as in the United States, the fiscal situation calls for a timely removal of any stimulatory measures in order to ensure that deficits do not become entrenched, as they did after the tax and spending boost of the early 1980s. Indeed, the subsequent retrenchment in the US federal budget position was instrumental in freeing the capital needed to finance the ensuing investment and productivity increase of the 1990s. Private investment having now fallen and net saving increased, there is a role for government dissaving to maintain aggregate demand. But this should not be allowed to crowd out investment in the upturn. Moreover, even with the savings generated by an improved fiscal position, the United States entered the recession and will enter the next expansion with a current account deficit of some 4 per cent of GDP. Any increase in that deficit associated with public-sector borrowing could be severely destabilising, with adverse effects on global long-term interest rates.

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Economic openness and structural reforms

Keeping open and flexible markets will facilitate adjustment

Looking through the current cyclical downturn, the challenge is how to ensure that OECD economies resume vigorous and sustainable growth. There are three strategic considerations: *i)* how the disruption, heightened insecurity and higher transaction costs affect the supply-side potential of OECD economies and hence future living standards; *ii)* the degree to which flexible and properly regulated markets can help economies cope with a more insecure world; and *iii)* the required policy responses. At issue is the need to maintain the openness of the global economy in a climate where improving security should not be allowed to lead to stifling re-regulation. A reinvigorated resolve to strengthen the design and implementation of longer-run structural reforms would help bolster confidence.

Longer-term growth potential in a changed environment

The volume and composition of demand have been affected in the short run

As noted, the 11 September attacks adversely affected demand and supply in the short run. The economic reverberations of the campaign in Afghanistan and of the recent bio-terrorist aggressions are unpredictable but risks have clearly increased, as evidenced in higher spreads on emerging market bonds and, in some cases, outright withdrawal of insurance coverage. Capital accumulation will decline, as investment decisions are postponed, and this will be associated with a shift towards different types of investment, including rebuilding and provision of security. Adjustment costs will tend temporarily to reduce the productivity of the capital stock.

Heightened insecurity pushes up insurance costs and government spending

The attacks also have longer-run implications for supply potential. A number of insurance companies have recently announced major price increases, which are likely to be permanent depending on how much governments will underwrite security risks. Some firms will decide to bear the new risks themselves rather than to take out extra insurance, but this might show up in a higher cost of external finance, to the extent that the greater reliance on self-insurance is perceived as such. At the same time, security costs are rising. Critical computer systems need to be backed up more systematically, involving more duplication. More frequent and thorough checks at airports and elsewhere will be costly. And military outlays will increase, in a partial reversal of the post-Cold War peace dividend enjoyed during the 1990s.[15] Directly or indirectly, the extra insurance and security costs will fall upon households as consumers, shareholders or taxpayers. All else equal – assuming also no offsetting cuts in public spending – this would point to a higher level of government spending and taxation, and a lower level of potential output.

Greater uncertainty may force inventory levels up

Higher uncertainty about the timely delivery of inputs, in an environment where interruptions somewhere along the supply chain could become more frequent, may force firms to maintain larger inventories, at least until contracts have been rewritten and sequencing of operations redesigned.[16] This would partly reverse the trend towards leaner inventories, which could imply a loss in speed and flexibility, reducing the level of productivity, and have implications for the shape of the business cycle (Box I.1).

15. Defence spending accounted for 2.9 per cent of GDP in FY 2001 in the United States, half the ratio in the 1980s. It is set to rise to around 3.4 per cent of GDP in FY 2002.
16. The computer manufacturer Dell for example has announced that it would move from a three-day to a seven-day inventory policy.

The shift in relative costs may alter long-run international trade and investment patterns…

Higher security and insurance costs make transport more expensive and lower the relative cost of domestic production. At the margin, this would reduce outsourcing abroad and the foreign direct investment flows that go with it. But it could also make direct investment abroad more attractive than trade to penetrate foreign markets, with the opposite effect. Security and insurance costs do not account for a large share of total expenses. For example, in the case of passenger and cargo carriers, insurance costs represented only 0.4 per cent of total operating expenses in early 2001, according to the Air Transport Association. Even so, if foreign and domestically-produced goods are sufficiently close substitutes in production or consumption, a sharp increase in these and other transport-related transactions costs, in the context of a more uncertain environment, could have a more-than-proportional negative impact on trade and capital flow patterns, which could become more inward-looking.[17]

… with sectoral consequences

Furthermore, if the effect on the costs of different modes of transport is not uniform, there will be shifts amongst them as well as changes in the direction and composition of trade flows,[18] with attendant sectoral consequences. For example, one important effect of relative price changes, allied to changing attitudes of consumers with respect to transport safety, could be a shift from longer-distance, air-based tourism to destinations reached by land. OECD projections already include such an effect as far as intra-European destinations are concerned.

Market-driven responses will bring adaptation…

The above sectoral shifts would constitute a market-driven response to an unforeseen shift in relative prices, akin to the one associated with a long-lasting oil price shock. There may be a permanent effect on the level of productivity and incomes, but for the most part, it would not necessarily imply lastingly lower productivity growth. More protracted growth effects could, however, occur to the extent that the process of innovation and diffusion were to be hampered by reduced trade, travel or direct investment as well as by the diversion of R&D funding towards security.

… provided open markets are maintained…

While, in the short term, some of the affected sectors have required government support to prevent dislocation, a danger lies in the possible persistence of an active and interventionist policy response. In particular, governments should avoid:

- Turning short-term aid to affected industries into permanent, competition-distorting assistance, which impedes necessary restructuring.
- Introducing excessive new regulations which undermine the efficiency of markets.
- Introducing obstacles to the normal mobility of factors of production, labour and capital.
- Giving way to protectionist pressures, which tend to intensify during cyclical downturns and in the face of sizeable trade deficits.[19]

17. The costs of trade can have non-linear effects on openness, see Obstfeld, M. and K. Rogoff, "The six major puzzles in international macroeconomics: is there a common cause?", *NBER Macroeconomics Annual 2000*, MIT Press, 2001.
18. In past decades, the share of trade transported via air rose sharply as the cost thereof fell relative to ocean transport, facilitating trade in time-sensitive goods. See Hummels, D., "Towards a geography of trade costs" and "Have international transportation costs declined?", University of Chicago, *mimeo*, 1999.
19. Particularly sectoral and bilateral ones: the number of initiations of anti-dumping investigations rose by 44 per cent in the year to the first half of 2001, with much of the increase in the steel sector.

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… and even reinforced

Indeed, the new round of multilateral trade negotiations should be as far-reaching as possible. The welfare gains to be reaped from the elimination of the trade barriers remaining after the Uruguay Round are substantial.[20] Full liberalisation of trade in services would yield even larger benefits at the global level, reflecting the weight of these sectors and the significant trade barriers still present in services. Openness to trade – when combined with sound macroeconomic management and institutional development – boosts growth and helps reduce poverty in developing countries.[21] In this respect, China's accession to the World Trade Organisation will ultimately contribute to raising living standards in that country as well as in its trading partners. More generally, it is important that the international community does not retreat on its progress towards a more open world.

Progress towards better global governance needs to be consolidated…

Against the same backdrop, the greater attention being paid since the mid-1990s to strengthening the current system of "global governance" is welcome. International standards are being promoted for improved transparency and wider dissemination of information, for good corporate governance, accounting and audit, as well as for financial supervision. Also, in the context of the fight against money laundering, it has recently been decided to expand the role of the OECD's Financial Action Task Force to explicitly encompass the financing of terrorism. These governance improvements should help to bolster international investor confidence and bring about a better longer-term global allocation of resources.

… with more attention to effective development assistance

Progress towards a more open world would be further facilitated by the recognition that large groups of people have been left behind and have not enjoyed improvements in living standards. Indeed, in the aftermath of the current slowdown, it will be more important than ever to enhance the governance of aid by linking its allocation more closely to performance. The recent decision by the OECD Development Assistance Committee on untying aid should help reduce the cost of the goods and services financed by aid and the red tape faced by recipients and donors. Even more helpful, however, would be decisive measures to open industrial countries' markets more widely to farming and textile products from the rest of the world.

The domestic structural policy agenda needs to be pursued

The domestic structural policy agenda is unfinished

Countries' overall openness and dynamism also depend on the extent to which domestic policies permit entry into national markets. By reducing economic rents,

20. Model simulations suggest that full liberalisation of merchandise trade by 2005 would permanently increase GDP by ½ to ¾ percentage point in industrial countries and by 1¼ to 3 percentage points in developing countries, where trade barriers remain, on average, much higher. The lower estimate is based on a static model assuming perfect competition (see Anderson, K., B. Dimaranan, J. Francois, T. Hertel, B. Hoekman and W. Martin, "The cost of rich (and poor) country protection to developing countries", Centre for International Economic Studies, University of Adelaide, *mimeo*, 2001). The higher one is based on a model incorporating increasing returns to scale, monopolistic competition and product heterogeneity (see Brown, D., A. Deardorff and R. Stern, "CGE modeling and analysis of multilateral and regional negotiating options", forthcoming in Robert Stern (ed.), *Issues and Options for U.S.-Japan Trade Policies*, University of Michigan Press, Ann Arbor). For a broader range of evidence, see OECD, *Open Markets Matter: The Benefits of Trade and Investment Liberalisation*, Paris, 1998.

21. See for instance Dollar, D. and A. Kraay, "Trade, growth and poverty", World Bank Policy Research Paper, No. 2587, 2001, or Cirera, X., N. McCulloch and A. Winters, *Trade liberalization and poverty: a handbook*, CEPR, London, 2001. For the effects of trade openness on growth, see also *OECD Economic Outlook*, No. 68, December 2000, and for evidence that it helps reduce corruption, see Bonaglia, F., J. Braga de Macedo and M. Bussolo, "How globalisation improves governance", CEPR Discussion Paper No. 2992, 2001.

broader and more intense product market competition can have positive effects on the employment rate in addition to strengthening productive efficiency, since labour-market reforms can help stimulate entrepreneurial and innovative activity.[22] In these respects, although substantial structural reforms have been implemented, there are sectors in all OECD countries where the reform agenda is still in its early stages.

In the United States – as elsewhere – agriculture continues to receive special treatment…

The US economy is more flexible and resilient than most, which will help bring about a relatively swift recovery. Even so, structural distortions remain in some sectors, notably, as in Europe and Japan, in agriculture.[23] The United States has accounted for a growing share of total support for farmers in the OECD area in recent years, as spending on all forms of support rose sharply. The higher outlays have aimed at augmenting farmers' incomes rather than being directly linked to current production or trying to maintain prices above market levels, which has avoided obvious distortions to acreage or crop decisions. Nonetheless, after four consecutive years of "emergency payments", moral hazard has become a concern. While benefits elsewhere in the economy are of limited duration and generally targeted on poor people, the bulk of government payments to farmers goes to already prosperous households. Means-testing would help diminish the spreading dependency culture in the sector. At the same time, efforts should be stepped up to decouple payments from current or past production by reducing market price support.

… and some issues need to be addressed in the network sectors

In several important network sectors, the existing pricing rules, ownership arrangements or competition policy sanctions do not allow for optimal resource allocation. In air transport, competitive pricing of take-off and landing slots would be desirable, as would the sale to the private sector of some air bases owned by the federal Government, which could then be converted to commercial airports. In local telecommunication markets, larger penalties should be levied on incumbent operators which do not co-operate with new entrants. In the electricity sector, deregulation has been conducted differently across states. The maintenance of retail price caps in California contributed – alongside other factors, including a drought which reduced hydro-electric supply – to severe shortages in late 2000 and early 2001. Retail prices should be allowed to signal imbalances between demand and supply in this sector and regulatory and political constraints on new generating capacity need to be eased.

Progress has been uneven in Europe

Notwithstanding the ambitious agenda endorsed by the European Council at the Lisbon summit in March 2000, structural reform in EU member countries has made uneven progress since and needs to regain momentum. Positive developments in recent years include: employment-friendly changes in tax and benefit systems, including the increase in or introduction of in-work benefits, such as earned income tax credits; the long-awaited agreement on a European company statute, coming into force in 2004, which allows firms to register as one European rather than a collection of national concerns (although it fails to unify tax treatment and imposes worker consultation obligations that could be a source of rigidity); an increasingly forceful competition policy; and a clear intensification of competitive pressures in a number of sectors. Even so, as signalled by the still very high level of structural unemployment

22. Trade-offs between efficiency and equity goals may arise, however, as some groups of workers may be adversely affected, calling *inter alia* for careful consideration of the cross-market effects of policy changes (see Chapter VI).
23. See the *OECD Economic Survey of the United States*, Paris, 2001.

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and the persistence of a sizeable productivity gap *vis-à-vis* the United States, there remains considerable scope for further progress.

Labour markets suffer from long-standing but also more recent distortions

As regards labour markets, the interaction between taxes and benefits too often continues to result in penal marginal effective tax rates, which perpetuate unemployment and/or poverty traps. The duration, eligibility and enforcement of unemployment and disability benefit schemes as well as employment protection frameworks need to be reconsidered in some countries (including France, Germany and Italy), especially where recent legislative or other measures have backtracked on the progress made during the 1990s. Early retirement programmes still play too large a role and measures are in order to remove impediments to work facing older members of the workforce. Furthermore, the forthcoming generalisation of shorter legal working time in France to the smaller enterprises will be difficult to implement, especially in a more downbeat macroeconomic situation. It will also weigh on the budget, as will the extension of the 35-hour week to public-sector workers.

Product and financial markets remain overly segmented

Concerning product markets, the opening up of network industries has proceeded unevenly across countries and sectors, enabling some state-owned and relatively protected operators to undertake acquisitions in neighbouring countries where the market has been opened earlier and wider. The European competition authorities should be as rigorous in such instances as when dealing with private-sector companies. Air and rail infrastructures remain less integrated than the single market that they serve. The car market has thus far remained highly segmented, with a block exemption allowing carmakers to control distribution through captive dealers. This exemption expires in September 2002. It should not be renewed, nor replaced by other restrictions that would significantly inhibit competition. Likewise, financial markets are still too segmented, in particular at the longer end of the maturity spectrum. A take-over directive, long in the making, was recently voted down in the European Parliament. Implementation of the European Union's Financial Services Action Plan should be accelerated. Lastly, progress is slow in the ongoing discussions on the reform of the Common Agricultural Policy, which *inter alia* have a bearing on the timing and modalities of EU accession for candidate countries.

In Japan, reforms need to be resolutely pushed through

In Japan, deep structural reform has been elusive during the 1990s, weakening confidence and delaying an eventual sustained recovery. Latterly, in addition to the aforementioned banking sector and fiscal reforms, the Japanese government has announced a broad set of structural changes. Priority ought to be given to "win-win" measures that are likely to boost private demand and supply at low fiscal cost. In this respect, redundant building laws and land regulations, as well as taxes that restrict redevelopment of accommodation in urban areas stand out. Impediments to the development of household services should be removed and nursing-care services should be opened further to private companies. It is also important to reinforce the competition policy framework, including that applying to utilities such as electricity, where incumbent firms are unduly inhibiting entry. Corporate governance arrangements need to be improved by revising the commercial code so that boards, auditors and shareholders can play a more active role. On the labour-market side, flexibility is limited by labour courts' rulings on dismissals. In the short run, existing job-creation programmes and job subsidies should be reviewed, more attention should be given to training programmes, and the scope for fixed-term or temporary contracts should be widened. While a decisive push towards structural adjustment will inevitably involve some short-run adjustment costs, including effects on employment, it is indispensable if the Japanese economy is to break out of the deflation mould.

Summing up

Uncertainty is best addressed by sound macroeconomic and structural policies

The duration and depth of the ongoing downturn depend on how rapidly existing uncertainty dissipates. While the distribution of risks may be skewed to the downside, the central scenario features a turning point towards mid-2002, as security concerns abate and confidence returns. Based on concerted and forceful central bank action and a shift in the fiscal stance, or at least a pause in consolidation, in most OECD economies, macroeconomic policy should limit the amplitude of the slowdown, especially where past efforts have built up room for manoeuvre. But it should not be over-extended or pursued to the exclusion of structural policies, which perform an important if less conspicuous role. Laying the basis for sustainable growth and finances calls for vigilance and action on the structural side, all the more so as fighting global terrorism is likely to translate into a reorientation of public and private resources from productivity-enhancing investments towards security-related spending. Obviously, the lags associated with many structural reforms are even longer and more uncertain than for macroeconomic policy, but the determined short-term actions to restore growth will be most effective if taken with a longer-run focus.

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Appendix
Shocks to the world economy: a toolbox approach

Introduction

What would be the impact of possible shocks?

Given the exceptional range of risks and degrees of uncertainty associated with the current economic situation, it is not obvious what assumptions to use in constructing scenarios departing from the central projection. As an alternative approach, this annex provides a "toolbox" of "ready-reckoners" for assessing the possible impact of one or more specific shocks or policy actions on the world economy. These include:

- a further weakening in OECD domestic demand;
- a contraction in non-OECD import demand;
- higher oil prices;
- a weaker US dollar;
- a concerted reduction in OECD interest rates.

Each of these shocks might be considered as possible elements contributing to alternative scenarios, based on the experience of past episodes of upheaval and strong movements in key variables. The assessment is based on simulations with the OECD INTERLINK model combined with an analysis of the quantitative importance of specific risks and shocks in the past.[24] Table I.10 and Figure I.12 summarise a selection of key results. The following paragraphs describe the main assumptions, features and mechanisms involved for each of the individual shocks considered. These results are, in general, approximately linear and additive but need to be combined with care. For example, in combining an *ex ante* negative shock to demand with the effects of higher oil prices, it will also be important to consider the extent to which lower demand may of itself depress oil prices and vice versa. Importantly, the results are also sensitive to the choice of policy assumptions as discussed later.

A further weakening in OECD domestic demand

Lower confidence and equity prices could further weaken investment and consumption

The central projection described in the main text already embodies a marked slowdown in growth relative to previous projections, reflecting a range of factors.[25] Nonetheless, the risks to the already-weak domestic demand projection for the OECD area are mainly on the downside. To give a better feel for the possible consequences of such a risk, in the absence of any knowledge of its distribution, the analysis considers a demand shock broadly equivalent to the difference between the central projection and previous severe slowdowns in OECD growth.

24. Standard references to the model and a description of its current properties with respect to a variety of policy-related, country-specific and regional shocks are given in Dalsgaard, T., C. André and P. Richardson, "Standard shocks in the OECD INTERLINK model", *OECD Economics Department Working Papers*, No. 306, 2001.
25. Overall, the combination of confidence and equity price effects factored into the central projection represents about one half of the overall weakening over the coming year relative to *OECD Economic Outlook*, No. 69, June 2001.

Table I.10. **Simulated shocks to the world economy**

Percentage deviations from baseline

	GDP growth				Output gap				Inflation			World trade growth
	United States	Japan	Euro area	OECD	United States	Japan	Euro area	OECD	United States	Japan	Euro area	
Weaker OECD domestic demand												
2002	-0.9	-1.0	-1.1	-0.9	-0.9	-0.9	-1.0	-0.9	-0.1	-0.4	-0.2	-2.9
2003	1.0	0.9	1.1	0.8	0.0	0.0	0.0	-0.1	-0.4	-0.4	-0.4	2.8
2004	0.3	0.2	0.2	0.2	0.3	0.1	0.2	0.1	-0.4	0.2	-0.3	0.6
2005	-0.1	-0.1	-0.1	-0.1	0.2	0.0	0.1	0.1	-0.3	0.0	-0.3	-0.2
Contraction in non-OECD import demand												
2002	-0.3	-0.5	-0.6	-0.4	-0.3	-0.4	-0.6	-0.4	0.0	-0.1	0.0	-2.6
2003	-0.7	-1.0	-1.4	-1.0	-0.9	-1.3	-1.9	-1.4	-0.2	-0.6	-0.4	-5.7
2004	-0.1	-0.1	-0.1	-0.1	-0.9	-1.4	-1.9	-1.5	-0.7	-1.1	-1.2	-0.3
2005	0.2	0.0	0.1	0.1	-0.7	-1.4	-1.7	-1.4	-1.1	-0.9	-1.8	0.1
10 dollar increase in oil prices												
2002	-0.2	-0.4	-0.3	-0.2	-0.2	-0.4	-0.3	-0.2	0.5	0.3	0.5	-0.7
2003	0.1	0.1	0.2	0.1	-0.1	-0.3	-0.1	-0.1	0.2	0.0	0.2	0.5
2004	0.2	0.4	0.3	0.3	0.1	0.1	0.2	0.1	0.1	0.0	0.1	0.8
2005	0.0	0.2	0.0	0.0	0.1	0.3	0.2	0.1	0.1	0.0	0.2	-0.1
10 per cent weaker US dollar												
2002	0.7	-0.1	-0.5	-0.1	0.7	-0.1	-0.5	-0.1	1.1	-0.2	-0.4	0.1
2003	0.5	-0.3	-0.1	0.1	1.1	-0.3	-0.6	0.0	0.7	-0.1	-0.4	-0.3
2004	-0.6	-0.1	0.0	-0.2	0.5	-0.4	-0.5	-0.2	1.0	-0.3	-0.6	-0.2
2005	-0.4	-0.1	0.1	-0.1	0.1	-0.5	-0.5	-0.3	1.2	-0.3	-0.7	-0.3
100 basis point reduction in interest rates												
2002	0.4	0.3	0.5	0.4	0.4	0.3	0.5	0.4	0.0	0.0	0.1	1.3
2003	0.3	0.3	0.4	0.3	0.6	0.5	0.8	0.7	0.2	0.3	0.2	1.4
2004	-0.2	-0.1	0.0	-0.1	0.4	0.4	0.7	0.6	0.5	0.5	0.4	0.1
2005	-0.2	-0.1	0.0	-0.1	0.2	0.3	0.7	0.6	0.6	0.4	0.5	0.0

Note: See the text for details of specific assumptions used
Source : OECD Interlink model

The rate of growth of OECD GDP is currently close to zero or slightly negative (Figure I.12, Panel A). There have been only two previous episodes when OECD-wide GDP growth has been negative since 1960, following the first and second oil price shocks, but the impact was more protracted. In terms of the composition of aggregate demand, the current projection of per capita consumption growing at an average 0.1 per cent between the second halves of 2001 and 2002, compares somewhat more favourably with negative paths during previous episodes (Table I.11). Overall, an additional slowdown in consumption at the aggregate OECD level of the order of 1 per cent during the first half of 2002 would be more representative of previous severe slowdowns.[26] The downturns in investment already built into the central projection, combined with the effects of lower demand, are also quite significant,

26. On the basis of available econometric estimates, this would be broadly equivalent to the influence of a further 15 to 20 per cent weakening in equity prices, relative to the central projection. See, for example, Boone, L., C. Giorno and P. Richardson, "Stock market fluctuations and consumption behaviour", *OECD Economics Department Working Papers*, No. 208, 1998.

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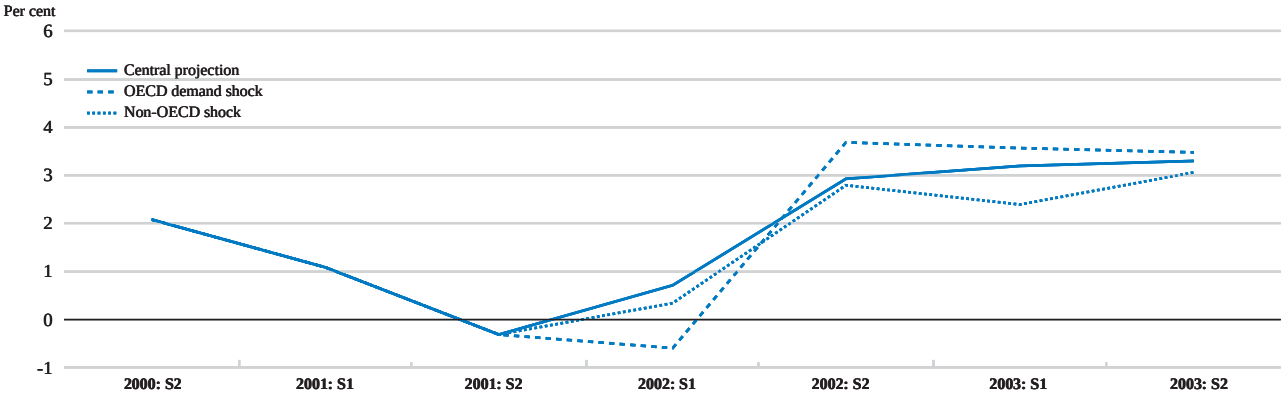
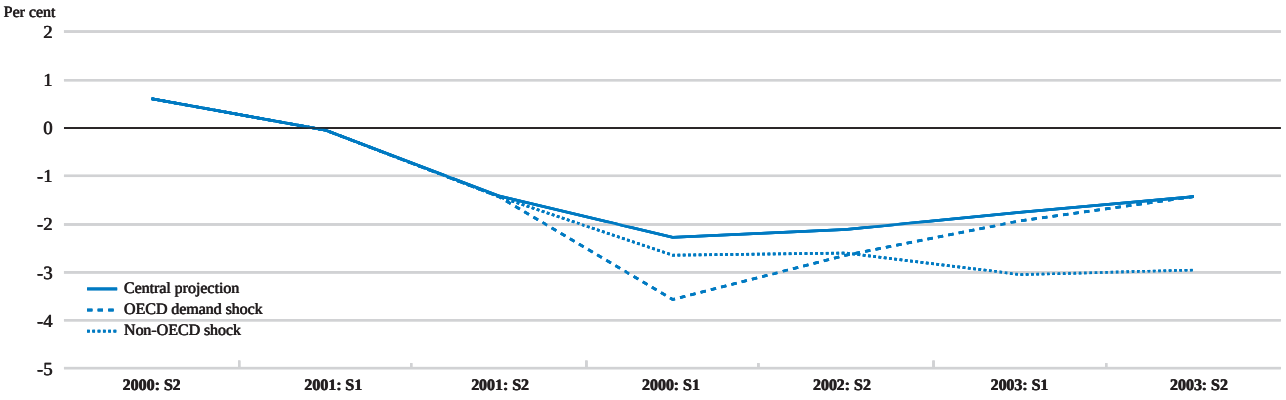
Figure I.12. **Slowdown profiles**

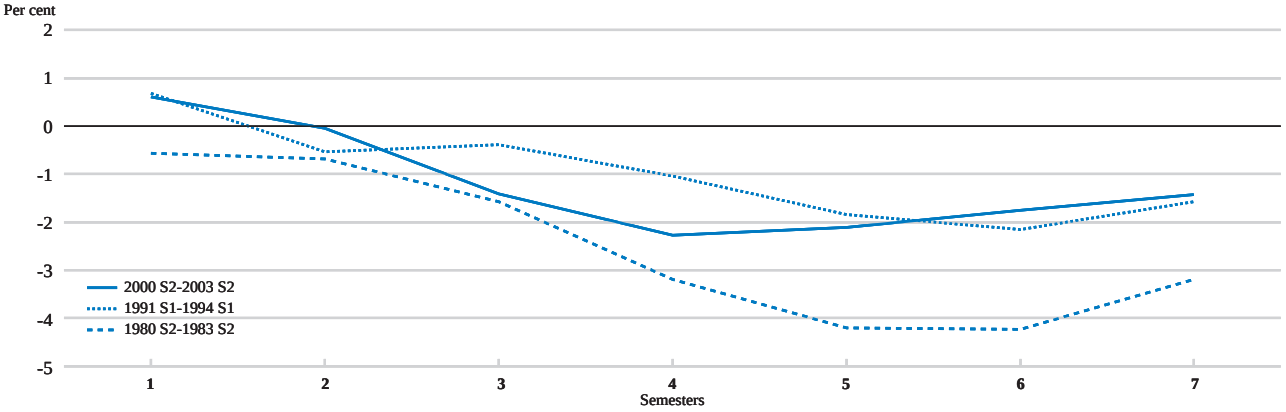
Panel A: OECD growth – comparison between projection and shocks



Panel B: OECD output gap – comparison between projection and shocks



Panel C: OECD output gap – comparison of central projection with previous downturns



Source: OECD.

Table I.11. **Comparisons of the projections and previous episodes of weak consumption and investment growth**[a]

	Event	Period	Growth in consumption per capita (per cent)[b]	Period	Growth in fixed investment (per cent)
United States	First oil shock	1973 S2-1974 S2	-3.1	1974 S1-1975 S1	-11.4
	Second oil shock	1979 S2-1980 S2	-2.2	1979 S2-1980 S2	-7.1
	1981-1982 recession	1981 S1-1982 S1	-0.8	1981 S2-1982 S2	-7.4
	Gulf War	1990 S1-1991 S1	-1.3	1990 S1-1982 S1	-6.9
	Projection	2001 S1-2002 S1	-0.4	2001 S1-2002 S1	-7.2
Japan	First oil shock	1973 S2-1974 S2	-1.5	1973 S2-1974 S2	-10.1
	Second oil shock	1979 S2-1980 S2	-0.5	1979 S2-1980 S2	-2.4
	Asia crisis	1997 S1-1998 S1	-1.2	1997 S2-1998 S2	-5.7
	Projection	2001 S1-2002 S1	-0.4	2001 S1-2002 S1	-7.2
Euro area	First oil shock	1974 S1-1975 S1	0.7	1974 S1-1975 S1	-6.4
	Second oil shock	1980 S1-1981 S1	-1.2	1980 S2-1981 S2	-3.6
	Early 1990s recession	1992 S1-1993 S1	-1.3	1992 S1-1993 S1	-7.2
	Projection	2001 S1-2002 S1	1.3	2001 S1-2002 S1	-0.1
OECD	First oil shock	1973 S2-1974 S2	-0.9	1974 S1-1975 S1	-5.5
	Second oil shock	1979 S2-1980 S2	-0.7	1981 S1-1982 S1	-4.1
	Projection	2001 S1-2002 S1	0.1	2001 S1-2002 S1	-3.8

a) All episodes are of 2 consecutive semesters.
b) Per head of working-age population.
Source: OECD.

especially for the United States and Japan. Nonetheless, an additional reduction in investment of around 2 per cent would, on average, be more in line with the most severe earlier episodes of negative output growth.

To illustrate the possible implications of a further additional weakening in demand, the simulation reported in Table I.10 therefore assumes a further *ex ante* reduction in the level of OECD consumer expenditures in the first half of 2002 of the order of 1 per cent, combined with a further *ex ante* weakening in business fixed investment of 2 per cent in 2002. For illustrative purposes, nominal interest rates and exchange rates are assumed to be unchanged, whilst government expenditures are assumed to be fixed in real terms.[27]

Output growth in 2002 is reduced by an additional 1 per cent for all three major areas while world trade growth declines by about 3 per cent over the same period. The fall in demand reduces inflation by roughly one quarter to half of one per cent in all areas in 2002 and 2003. This provides some support to consumption, partially arresting the decline in activity and eventually increasing growth in 2003 and 2004. However, real interest rates remain higher than the baseline because of the fixed

27. The monetary assumption used is pessimistic in assuming no additional policy actions. As the shock is essentially dis-inflationary, real interest rates rise relative to the baseline and thereby impede recovery. The implications of alternative monetary policy responses are described separately in the final section of this appendix.

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nominal interest rate assumption. This dampens the recovery in growth and the level of the output gap does not return to baseline until 2004.

Figure I.12, Panel C shows the profile of the estimated OECD output gap in the central projection, and compares it with two previous downturns. The central projection implies that OECD output falls more than 2 percentage points below potential in 2002, which is more severe than in the previous downturn in the early 1990s.[28] The additional shock to domestic demand would push the already-negative output gap for the area as a whole to around –3 per cent in 2002, with negative output gaps in all three major regions greater than 2 per cent (Figure I.12, Panel B). Although not unprecedented for individual economies, the synchronicity and scale of such a downturn at the aggregate OECD level would be unprecedented since the oil price shocks of the early 1970s and early 1980s.

A contraction in non-OECD import demand

Slower growth outside the OECD could reduce world trade and the demand for OECD exports

Although sensitive to international events, it is relatively unusual for aggregate non-OECD import volume growth to decline in absolute terms, partly because weakness in one region is often offset by relative strength in another. Nonetheless, two historical episodes of near stagnation in aggregate non-OECD import volume growth stand out:

- During the first half of the 1980s, the level of non-OECD import volumes remained more or less flat, reflecting a period of generally slow world trade growth, weak commodity prices and concern in many non-OECD regions with respect to external indebtedness.
- During the 1997-98 Asia crisis and its aftermath, the level of non-OECD import volumes remained flat overall (with large falls in Dynamic Asia, and to a much lesser extent in Latin America and non-OECD Europe).

The extent and speed of recovery in import volumes varies somewhat between these two episodes. In the former, non-OECD imports remained depressed for many years and showed little evidence of a full return to previous trends. In the Asia crisis, non-OECD imports stagnated for over two years, but recovered relatively rapidly thereafter.

Based on these episodes it might be reasonable to hypothesise a major adverse shock as being one in which there was no growth in non-OECD import volumes over a period of three years (including 2001). This compares with a current import growth projection of about 5 and more than 10 per cent, respectively, in 2002 and 2003, implying a sustained reduction in the levels of non-OECD import volumes of over 15 per cent over the period.[29]

Given the trade exposures, a negative shock to the non-OECD area of this scale is likely to have quite significant effects on the OECD.[30] As illustrated in Table I.10, of the three regions, output declines most in the euro area, given its greater trade exposure to the non-OECD area.[31] Japan is slightly less affected and the United

28. GDP growth would be about two standard deviations below the average OECD rate over the period since 1960.
29. For illustrative purposes this is assumed to apply across all non-OECD regions rather than being concentrated in one region or another.
30. As before, nominal interest rates and exchange rates are assumed unchanged in the OECD.
31. Trade in goods and services of the non-OECD area accounts for more than 25 per cent of world trade, and OECD exports to the area amount to around 4½ per cent of OECD GDP. Of the three main OECD regions, the United States is least exposed with its exports to the non-OECD area amounting to around 3 per cent of GDP, against 4¾ per cent for Japan and 5½ per cent for the euro area.

States significantly less so, with output declining by less than half of the decline seen for the euro area. Overall, the level of world trade falls by about 10 per cent relative to the baseline, reflecting both the size of the initial shock and the feedback from the decline in the non-OECD area to the OECD area itself. The initial decline in OECD activity has second-round impacts on consumption and investment expenditures in the OECD via standard multiplier-accelerator mechanisms. Output growth declines by about ½ per cent in the OECD region in the first year and as much as 1 per cent or more in 2003, before recovering. However, without any offsetting policy adjustment, the level of output over the medium term is permanently lowered. The level of output stabilises at almost 2 per cent below baseline in the euro area, and declines by 1½ per cent in Japan and by around 1 per cent in the United States, reflecting their relative regional exposures.

Figure I.12, Panel B reports the corresponding profile for the estimated OECD output gap. The additional shock implies a milder slowdown in 2002 compared with the domestic demand shock, but with a slower recovery in output, so that the aggregate output gap continues to widen through 2003.

Higher oil prices

Disruptions to oil supplies could lead to higher energy prices

Historically, oil prices have been quite sensitive to international events and political tensions, particularly where there have been risks of supply disruption. During the Gulf War, for example, oil prices rose by around $15 per barrel over two quarters, before falling progressively thereafter. Since the September events, oil prices have declined, reflecting in part an already established weakening in demand, and with the continuation of weakness over the first half of the projection period are assumed to remain subdued in the range $20 to 25 a barrel. Nonetheless, developments may significantly affect oil supplies and to gauge the possible impacts, Table I.10 reports the simulated effects of a hypothetical $10 increase (between 40 and 50 per cent) in the price level. As before, exchange rates and real government expenditures are assumed unchanged, but given the global inflationary nature of the shock, OECD interest rates are assumed to adjust in line with inflation, leaving real interest rates unchanged.

An oil price increase (or decrease) operates in a similar manner to a terms-of-trade shock. For net oil-importing countries there is an initial loss in real disposable incomes as prices of oil and energy-related products increase.[32] This leads to both lower output and higher consumer price inflation. The degree to which output is affected depends in part on the extent to which consumption responds to lower disposable incomes and higher inflation and investment to lower output growth. A further effect arises on the net exports side as overall market growth slows and as competitiveness shifts, depending on the degree to which inflation changes relative to trading partners. In the medium term, the initial output loss is recuperated as higher oil revenues in oil-producing nations are spent and exports to them gradually rise.[33]

While the initial effect on consumer price inflation is fairly similar across the three major regions, at around ½ percentage point, the loss in output, which averages about ½ per cent, is smaller in the United States than in the euro area and Japan. This

32. Other energy prices are assumed to rise in line with crude oil prices.
33. The simulation assumes additional oil revenues are re-spent only gradually, with around one third of additional revenues spent in the first year and around one half in the second year.

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is partly because the terms-of-trade loss for the United States is smaller, since net oil imports are a smaller share of GDP for the United States than for the euro area and Japan. World trade is depressed by about ¾ per cent in the short term, but this is reversed as higher oil revenues are re-spent.

A weaker US dollar *vis-à-vis* the rest of OECD

Exchange rates could fluctuate significantly

Although there have been no major exchange rate movements to date, there is always a risk of large exchange rate fluctuations at times of unsettled economic conditions. As an illustration of the possible implications of a lower or higher dollar over the projection period, Table I.10 reports a simulation of a 10 per cent depreciation of the dollar associated with a long-term shift in expectations and/or market sentiment.[34] As for the demand shocks, nominal interest rates are assumed unchanged and government spending fixed in real terms.

The impact of a sustained nominal depreciation is to increase US trade competitiveness, thereby raising its export volumes and reducing its import volumes. The resulting increase in aggregate demand is partially arrested by the effects of higher inflation on the terms of trade, and the gradual erosion of initial competitiveness gains as costs and prices adjust over time, both in the United States and its main trade competitors. Overall, the effect of a 10 per cent effective depreciation is to raise US GDP growth by around ½ to ¾ per cent in the first two years. However, as inflation is higher (by 1 per cent *per annum* on average), the gains in competitiveness are gradually eroded and the economy begins to return towards baseline output levels, with little effect on the output gap in the medium term. The initial increase in competitiveness, however, results in a gradual improvement in the US current account (subject to an initial J-curve deterioration) of up to ¼ per cent of GDP, which is slow to unwind. In Europe, Japan and the rest of the OECD, the results are essentially reversed, with reductions in price and cost competitiveness having negative effects on GDP growth and current account balances, which are gradually eroded via the effects of appreciation on import prices and inflation. Overall, there is little or no effect on OECD-area GDP, inflation or trade as a change in exchange rates largely results in a re-allocation of trade, output and price pressures.

A concerted reduction in OECD interest rates

Monetary policies could ease further to support weaker demand

Already, policy-controlled interest rates have eased significantly in Europe and North America to meet the weakening in world demand and the further possible effects of lower confidence and falling equity prices. If activity turned out to be weaker than projected, it is likely that monetary policy would be eased further. By way of illustration, the scenario presented here assumes a further 100 basis point reduction in nominal short and long term interest rates in the OECD (excluding Japan), assuming unchanged nominal exchange rates and fixed real fiscal expenditures. Interest rates are assumed to be unchanged for Japan, given that there is no scope for further downward adjustment. By implication therefore the main benefits to the Japanese economy are related entirely to the strength of international spillovers.

34. The effects of a 10 per cent appreciation would be broadly symmetrical.

The immediate effects of across-the-board interest-rate cuts are to reduce the cost of borrowing and the cost of capital, thereby progressively stimulating consumption and investment expenditures over the period in the countries in question. At the same time, normal second-round effects occur through the influence of higher output and lower unemployment on disposable income, consumption and investment. International spillovers are also important given the effects of a stimulus to domestic demand on the exports of other countries.

The corresponding simulation results reported in Table I.10 suggest some modest support to growth of between ¼ to ½ per cent in both 2002 and 2003, with the level of the output gap returning only slowly to baseline. The spillover effects from a synchronised reduction are quite significant for Japan, emanating largely from the US interest rate reduction. The largest overall impact is for Europe, where spillovers from the United States add further to an already significant impact of lower interest rates on the level of GDP, of the order of ½ per cent.[35] The level of world trade is boosted by close to 3 per cent over the next two years.

35. As reported in Dalsgaard *et al*. (*op. cit.*), differences in relative trade elasticity estimates imply an important asymmetry in trade spillovers from an interest-rate reduction. A higher elasticity of US imports with respect to demand (2.5 compared with 2.0 or lower for other OECD countries), implies relatively larger spillovers from a reduction in interest rates for the United States.

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II. DEVELOPMENTS IN INDIVIDUAL OECD COUNTRIES

United States

The slowdown in US economic activity that began in late 2000 has intensified. The contractionary effect of the high-tech correction and the associated collapse in equity values have led to significant declines in business investment and a substantial decumulation in stocks. The heightened state of uncertainty and aversion to risk caused by the 11 September terrorist attacks seem likely to lower activity significantly in the second half of 2001 and the first half of 2002. The rapid easing in monetary and fiscal policies should ensure that growth resumes by mid-year, as security concerns dissipate, inventories bottom out, and household and corporate balance sheets improve.

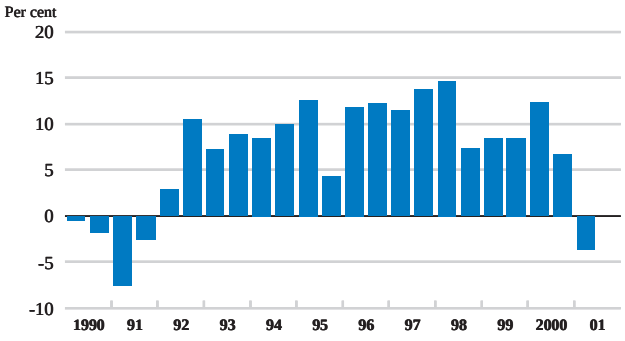
Monetary policy has responded rapidly to the fall in activity. If a greater than expected degree of labour and product market slack emerges, there is still some room for additional interest rate cuts. A substantial fiscal easing, including this year's tax cuts and an expected additional stimulus of nearly one percentage point of GDP, should also support recovery. However, going beyond this expected stimulus would not be warranted, and steps will need to be taken to ensure that the budgetary deterioration is temporary. Monetary stimulus should be withdrawn as soon as there are clear signs that the output gap is beginning to close.

The slowing in activity had not abated by the summer…

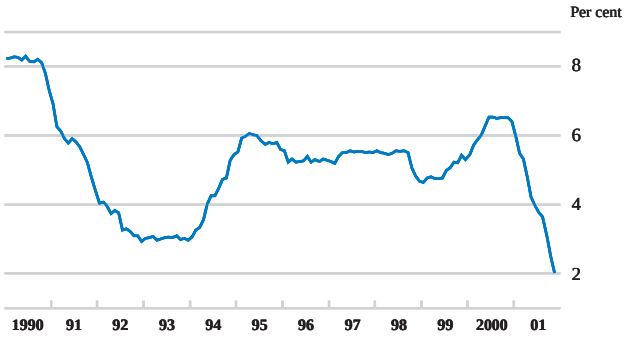
The economy continued to slow in the first half of 2001. The adjustment in expectations regarding the profitability of high-tech investments, in particular, led to a contraction in business investment, the first since 1991. In addition, the strong value of the dollar and the restrictive stance of monetary policy through 2000 lowered the demand for durable goods – from businesses, consumers and foreigners. The falloff in demand produced an imbalance between stocks and sales expectations, which in turn spurred production cutbacks in order to bring about the desired inventory correction. The associated declines in employment placed a drag on income

United States

Business investment weakened sharply in early 2001[1]



Monetary policy has responded aggressively[2]



1. Percentage change from previous period, at annual rate.
2. Federal funds rate. November 2001 figure refers to target federal funds rate.

Sources: Bureau of Economic Analysis and Board of Governors of the Federal Reserve System.

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United States: **Employment, income and inflation**

Percentage changes

	1999	2000	2001	2002	2003
Employment[a]	2.0	2.0	0.1	-0.5	1.5
Unemployment rate[b]	4.2	4.0	4.8	6.2	6.0
Employment cost index	3.2	4.6	4.1	3.3	3.1
Compensation per employee[c]	4.3	5.6	5.5	3.3	3.0
Labour productivity[c]	2.4	2.5	0.9	1.4	2.6
Unit labour cost[c]	1.9	3.1	4.5	1.8	0.5
GDP deflator	1.4	2.3	2.1	1.2	1.3
Private consumption deflator	1.6	2.7	1.8	1.0	1.4
Real household disposable income	2.4	3.5	3.8	3.1	2.1

a) Whole economy, for further details see *OECD Economic Outlook:* Sources and Methods, *(http://www.oecd.org/eco/sources-and-methods).*
b) As a percentage of labour force.
c) In the business sector.
Source: OECD.

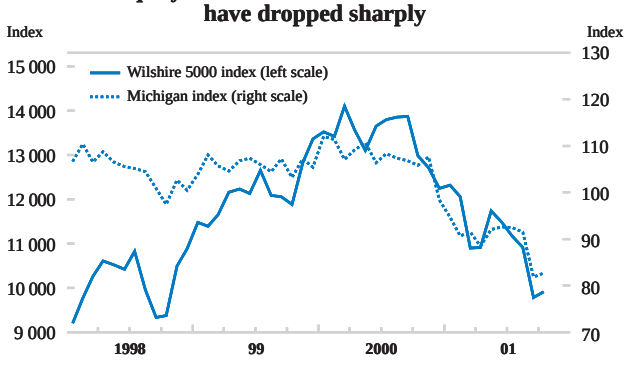
growth and consumer confidence, even if the household sector maintained a relatively strong pace of spending. Activity was supported by the aggressive easing of monetary policy from January onward, which contributed to resilient residential investment as mortgage rates fell. That decline also induced a higher level of mortgage refinancing, freeing substantial amounts of household cash flow for consumption purposes.

… with mixed evidence as to whether the situation was beginning to turn around

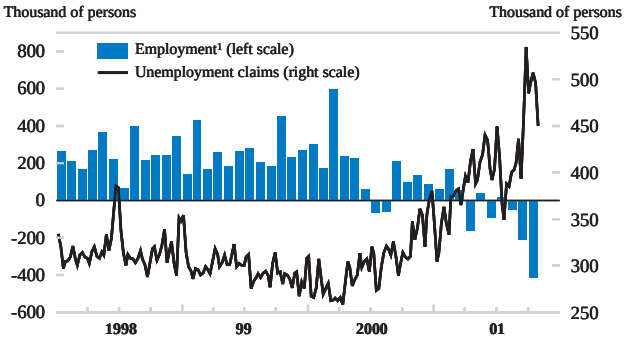
Various factors had suggested a rebound in growth would occur by year-end. Consumer confidence and equity prices stabilised and even improved somewhat in the spring and early summer, in part reflecting the declines in short- and long-term interest rates. Reports from purchasing managers indicated that the deterioration in manufacturing may have been abating as a result of the substantial cuts in inventories in the first half of the year. In addition, disposable incomes began to receive a boost from the tax rate reductions and rebates legislated in the spring, raising hopes of a pickup in consumer spending. However, the deteriorating labour market appeared to be eroding consumer confidence by late summer and, when combined with the

United States

Equity values and consumer confidence have dropped sharply



The labour market has weakened



1. Establishment employment. Change from previous period.
Sources: Bureau of Labor Statistics, Datastream and OECD, *Main Economic Indicators*.

United States: **Financial indicators**

	1999	2000	2001	2002	2003
Household saving ratio [a]	2.4	1.0	2.0	3.8	2.6
General government financial balance [b]	0.8	1.7	0.6	-1.1	-0.6
Current account balance [b]	-3.5	-4.5	-4.1	-3.9	-4.0
Short-term interest rate [c]	5.4	6.5	3.8	2.1	3.1
Long-term interest rate [d]	5.6	6.0	4.9	4.5	5.0

a) As a percentage of disposable income.
b) As a percentage of GDP.
c) 3-month euro-dollar.
d) 10-year government bonds.
Source: OECD.

sizeable decline in household net worth since the first half of 2000, this generated an increase in households' propensity to save. Moreover, export demand continued to weaken considerably.

The uncertainty following September's terrorist attacks has weakened activity in the near term

The terrorist attacks of 11 September aggravated this weakening outlook. The immediate impact was a disruption in production and demand – particularly for airline travel, tourism and financial services – which, on top of the weakening in demand apparent earlier in the summer, contributed to a modest decline in GDP in the third quarter. The spillover effects to future activity are still difficult to quantify but likely to be substantial. The heightened uncertainty will lead agents to adopt a wait -and-see attitude and restrain spending, suggesting a notable weakening in demand in late 2001. A stream of lay-off announcements, the jump in the unemployment rate to 5.4 per cent in October, and the continued high level in unemployment claims indicate that the labour market is deteriorating rapidly.

United States: **Demand and output**

	1998	1999	2000	2001	2002	2003
	current prices billion $	Percentage changes, volume (1996 prices)				
Private consumption	5 856.0	5.0	4.8	2.7	1.1	3.3
Government consumption	1 261.4	2.2	2.9	2.9	3.9	2.2
Gross fixed investment	1 742.8	7.9	6.7	-1.4	-4.2	4.5
Public	277.1	8.3	2.0	4.3	2.9	1.0
Residential	364.4	6.7	0.8	1.1	-1.8	3.6
Non-residential	1 101.3	8.2	9.9	-3.7	-7.1	5.9
Final domestic demand	8 860.2	5.2	4.9	1.9	0.5	3.3
Stockbuilding [a]	73.1	-0.2	-0.1	-1.0	0.3	0.6
Total domestic demand	8 933.3	5.0	4.8	1.1	0.7	3.9
Exports of goods and services	964.9	3.2	9.5	-3.9	-2.1	7.8
Imports of goods and services	1 116.7	10.5	13.4	-2.9	-1.5	7.4
Net exports [a]	- 151.7	-1.1	-0.9	0.0	0.0	-0.3
GDP at market prices	8 781.6	4.1	4.1	1.1	0.7	3.8

Note: National accounts are based on chain-linked data. This introduces a discrepancy in the identity between real demand components and the GDP. For further details see *OECD Economic Outlook* Sources and Methods, *(http://www.oecd.org/eco/sources-and-methods).*
a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
Source: OECD.

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United States: **External indicators**

	1999	2000	2001	2002	2003
			$ billion		
Merchandise exports	684.6	772.2	726.4	700	764
Merchandise imports	1 030.0	1 224.4	1 155.8	1 109	1 207
Trade balance	- 345.4	- 452.2	- 429.4	- 409	- 443
Invisibles, net	21.1	7.5	15.8	5	5
Current account balance	- 324.4	- 444.7	- 413.6	- 404	- 438
			Percentage changes		
Merchandise export volumes [a]	3.9	11.3	- 5.2	- 3.0	8.4
Merchandise import volumes [a]	12.4	13.5	- 3.7	- 1.9	7.6
Export performance [b]	- 2.0	- 1.3	- 4.6	- 4.7	- 0.2
Terms of trade	- 1.5	- 3.5	1.1	1.6	- 0.4

a) Customs basis.
b) Ratio between export volume and export market of total goods.
Source: OECD.

Despite the rapid response of monetary policy…

The deterioration in the economic outlook since the attacks has led to a further rapid policy response on the part of both the monetary and fiscal authorities. The Federal Reserve provided substantial liquidity in September to ensure the orderly operation of financial markets, and the target federal funds rate was lowered to 2 per cent – 4½ percentage points below the figure at the start of the year and the lowest level since 1961 – by early November. A notable easing in long-term interest rates has also occurred since late summer, boosting equity values from September's lows, although risk premia on private instruments over Treasury securities have risen. The target funds rate is projected to remain at 2 per cent until late next year, allowing the recovery to get firmly underway while leaving room for additional cuts should activity weaken even further than projected here. In 2003, the funds rate is expected to rise moderately to 3¾ per cent at year-end, in response to the projected return to strong growth and the prospect of an elimination of slack in the near future.

… and the shift to federal government deficits, aimed at boosting activity…

Besides the major tax cuts legislated in the spring, the federal government implemented an emergency $40 billion package immediately following the terrorist attacks. Half of the package was earmarked for relief and reconstruction efforts associated with the terrorist strikes, and the remainder was available for discretionary spending priorities. In addition, an airline-support programme worth $15 billion was approved: one-third of this money will provide direct subsidies, and the rest will fund loan guarantees. The Administration and Congress also appear willing to provide further stimulus, and the projection assumes that additional fiscal measures – totalling $90 billion (cumulatively) over 2002 and 2003 – are enacted. While their specific form had not been determined by the time the projection was finalised, the assumed plan consists of an extension of unemployment insurance benefits, a rebate of payroll taxes for the 29 million workers who did not earn enough to have received an income tax rebate in the summer, a pulling-forward of permanent income tax rate reductions scheduled for 2004, a modest amount of corporate tax relief, and some additional spending. Combined with the cyclical fall-off in revenues, this leads to a projected federal government budget deficit in calendar year 2002. Once account is taken of the cyclical deterioration at the state and local level, the overall balance is projected to move to a deficit of $120 billion next year, a shift of nearly $300 billion, or 2¾ per cent of GDP, in just two years.

… the economy will contract in the second half of this year, although growth should pick up by the middle of 2002

The economy is expected to shrink in the second half of 2001 and early next year; for 2001, real GDP growth is projected to be 1 per cent, and in 2002 as a whole modestly lower, at ¾ per cent. However, with activity projected to pick up toward mid-year, 2002 may see growth through the year of about 2¾ per cent. Private consumption is expected to remain weak until mid-2002, as households strive to increase savings during a period of heightened uncertainty and rising unemployment that follows a year and a half of declining wealth. Companies may trim investment in plant and equipment this year and next in response to the downward revisions to demand expectations and poor profitability. Stockbuilding should provide some lift to activity, though, by early next year, reflecting the sharp reduction in inventories already achieved. From mid-2002, economic growth should pick up in response to the fiscal impetus and the easy stance of monetary policy, rising above potential growth rates in the second half. The sustained period of sub-par growth is expected to rapidly generate labour-market slack, with the unemployment rate projected to rise to around 6¼ per cent in 2002. Excess capacity will probably lead to some decline in underlying inflation. The sharp slowing in domestic demand may result in some reduction in the current account deficit in 2001 and 2002 to just below 4 per cent of GDP in 2002, before a modest deterioration with the rebound in 2003.

The uncertain response of consumers and businesses makes the outlook very cloudy

The outlook is unusually uncertain at this point, given the range of possible reactions to the terrorist attacks. If consumers prove more reluctant to spend than expected, growth in domestic demand may fall below the central projection. On the other hand, even if perhaps somewhat less likely, the large impetus from fiscal and monetary policy, combined with falling energy prices, could provide a greater lift than anticipated. In either case, the responsibility would fall on monetary policy to react promptly, while fiscal policymakers turn their focus to returning the budget to a sustainable long-term position.

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Japan

The economy slowed rapidly through the first half of 2001, as falling export demand for information and communication technology goods contributed to a sharp contraction of industrial production and investment, which has now spread to other sectors. Nominal incomes have declined, so that private consumption is likely to soften. The economy is projected to be particularly weak in the second half of this year and into 2002, contracting by around 1 per cent this year and next. Exports should pick up in the second half of 2002 followed by investment demand, with growth reaching a modest ¾ per cent in 2003. The government's reform programme could improve prospects for the economy, but risks are mainly on the downside due to financial market fragility.

As deflationary forces are expected to strengthen, monetary policy should be eased further. With policy interest rates close to zero this will involve the Bank of Japan increasing the volume and widening the portfolio of financial assets it will purchase. Fiscal consolidation needs to get underway next year through a targeted reduction in the structural budget deficit, though cyclical revenue shortfalls should not be offset to avoid excessive tightening. Structural reforms are also necessary with an emphasis on measures which could raise the level of activity even in the short term. The work-out of non-performing loans in the banking sector should be the key priority, coupled with determined bank restructuring.

The economy has been weak

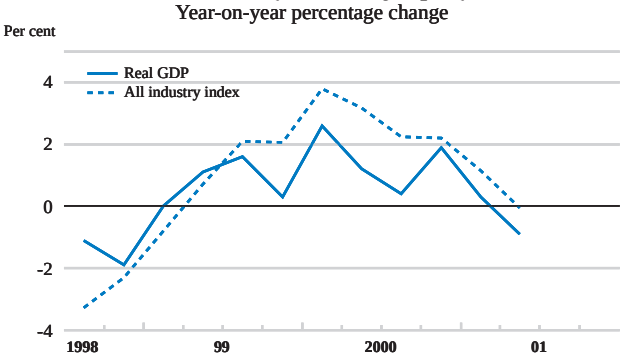
The slowdown of the economy gained significant downward momentum towards the middle of 2001. A continuing fall in exports and a sharply reduced demand for information and communication technology (ICT) products has driven a rapid contraction of industrial production, and a decline in business investment. In combination with a large fall in share prices, these developments have provoked a deterioration in business sentiment, profit expectations and investment plans even before the 11 September terrorist attacks. In addition, public investment is weakening as local governments seek to limit increases in their deficits.

With employment falling more rapidly, consumption could start to weaken

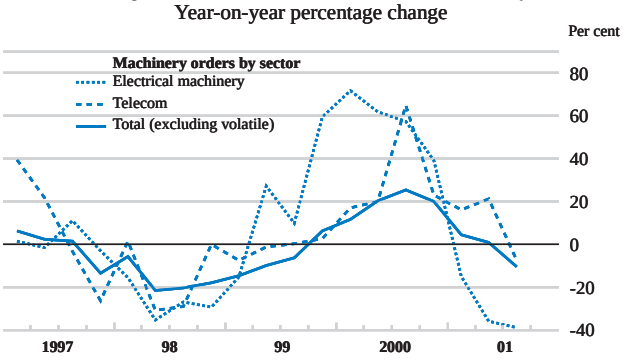
Private consumption remained firm in the first half but has now started to weaken due to the unusually rapid decline in employment and reduced wage income and summer bonuses. The rise in unemployment has been largely forestalled by the exit from the labour force of the elderly and the self-employed. Nevertheless, by August it had passed the previous high of around 5 per cent. Consumer price deflation has picked up somewhat, reflecting weak domestic demand, rising import

Japan

The economy is slowing rapidly
Year-on-year percentage change



The high-tech sector has led the investment cycle
Year-on-year percentage change



Sources: Ministry of Economy, Trade and Industry, and Economic and Social Research Institute.

Japan: **Employment, income and inflation**

Percentage changes

	1999	2000	2001	2002	2003
Employment	-0.8	-0.2	-0.4	-0.8	-0.1
Unemployment rate[a]	4.7	4.7	5.0	5.5	5.4
Compensation of employees	-1.6	0.5	-0.3	-1.6	-0.4
Unit labour cost	-2.3	-1.0	0.3	-0.6	-1.1
Household disposable income	-0.2	-0.4	0.1	-0.8	-0.1
GDP deflator	-1.4	-1.6	-1.6	-1.4	-1.6
Private consumption deflator	-0.7	-1.1	-1.3	-1.5	-1.5

a) As a percentage of labour force.
Source: OECD.

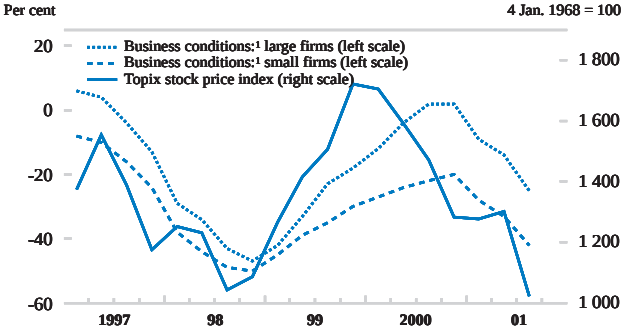
penetration and increased competition in some service sectors. While falling prices raise household real disposable incomes, the effect on spending is ambiguous.

Dealing with non-performing loans has become a more important priority

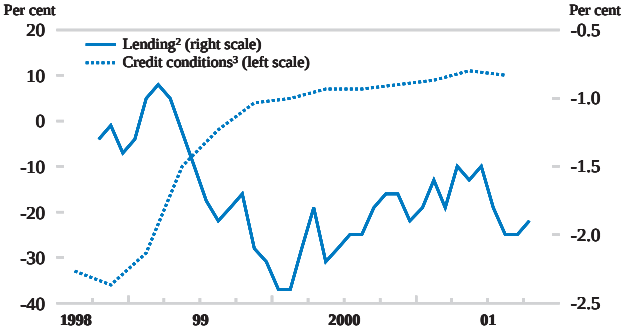
The government's reform programme has set a target for major banks to write off existing bad debts over the next two years, and new bad debts over three years. However, by the middle of 2001 it became apparent that new bad loans were accruing nearly as rapidly as final write-offs. Against the background of increased uncertainty, the government announced a number of new measures in September. Inspections will be tightened and banks will be required to adopt a more forward looking provisioning. A code for private debt workouts, which should increase transparency and tighten proposed restructuring programmes, has also been agreed. The Resolution and Collection Corporation (RCC) is being strengthened so that it can purchase doubtful loans from banks at flexible prices until 2003. Crucial details are still to be decided. In the absence of more concrete plans, the projections assume that major banks will continue to write-off loans at the same rate as in 2000 (*i.e.* around 4 trillion yen per annum, net of past provisions and realised collateral values).

Japan

Lower share prices weaken business sentiment



Demand for bank credit remains limited



1. Tankan diffusion index. Firm's judgement on present business conditions, showing the difference in per cent of firms answering "improving" and "getting worse".
2. Year-on-year percentage change, adjusted for loan write-offs.
3. Opinion on financial institutions' lending attitudes (accomodative minus severe in per cent).

Source: Bank of Japan.

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Japan: **Financial indicators**

	1999	2000	2001	2002	2003
Household saving ratio [a]	11.1	11.3	12.5	13.2	13.6
General government financial balance [b]	-7.0	-6.6	-6.4	-6.7	-6.6
Current account balance [b]	2.4	2.5	2.1	2.9	3.5
Short-term interest rate [c]	0.2	0.2	0.1	0.0	0.0
Long-term interest rate [d]	1.7	1.7	1.3	1.4	1.5

a) As a percentage of disposable income.
b) As a percentage of GDP.
c) 3 month CDs.
d) 10-year government bonds.
Source: OECD.

With short term rates close to zero, monetary policy has aimed to increase liquidity

The Bank of Japan's (BOJ) quantitative monetary policy framework – established in March 2001 – has allowed it to react flexibly to new circumstances, even though the overnight interest rate is practically zero. In response to the threat of liquidity shortages in the aftermath of 11 September, the BOJ temporarily raised the current account balances banks hold with it to above 6 trillion yen and cut the discount rate from ¼ per cent to 0.1 per cent. Later in the month it responded to increased demand for liquidity by banks, lifting current account balances still further. With the exchange rate against the dollar appreciating in late September, the government authorised sustained buying of both dollars and euro, the yen counterpart of which the BOJ did not immediately sterilise. However, the BOJ has not forced extra funds into the market, choosing instead to mop up liquidity as demand for it normalised in October. The target for the current accounts at the BOJ remains practically where it was set in August, at or above 6 trillion yen. The projection assumes that monetary policy will continue to adjust liquidity conditions so as to maintain short-term rates near zero throughout the projection period.

Japan: **Demand and output**

	1998	1999	2000	2001	2002	2003
	current prices trillion yen	Percentage changes, volume (1995 prices)				
Private consumption	286.9	1.2	0.5	0.0	-0.2	0.8
Government consumption	80.7	4.0	3.6	2.3	2.3	1.4
Gross fixed investment	138.7	-0.9	0.6	-2.0	-6.7	-2.2
Public [a]	38.5	4.9	-7.2	-3.6	-10.9	-10.1
Residential	20.1	1.1	1.3	-8.4	-2.4	1.1
Non-residential	80.1	-4.2	4.5	0.3	-5.9	0.4
Final domestic demand	506.4	1.0	1.0	-0.2	-1.5	0.1
Stockbuilding [b]	0.0	-0.2	0.1	0.0	0.0	0.1
Total domestic demand	506.4	0.9	1.1	-0.2	-1.6	0.2
Exports of goods and services	55.1	1.4	12.1	-5.8	-0.8	8.2
Imports of goods and services	45.6	3.0	9.9	-1.8	-7.9	3.5
Net exports [b]	9.4	-0.1	0.4	-0.5	0.6	0.6
GDP at market prices	515.8	0.8	1.5	-0.7	-1.0	0.8

a) Including public corporations.
b) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
Source: OECD.

Japan: **External indicators**

	1999	2000	2001	2002	2003
			$ billion		
Merchandise exports	403.5	459.3	387.0	373	406
Merchandise imports	280.2	342.6	313.2	274	286
Trade balance	123.3	116.6	73.8	99	120
Invisibles, net	- 16.2	0.1	13.0	19	20
Current account balance	107.0	116.7	86.8	118	141
			Percentage changes		
Merchandise export volumes [a]	2.1	9.4	- 10.0	- 1.3	8.8
Merchandise import volumes [a]	9.6	10.9	- 3.7	- 10.4	2.8
Export performance [b]	- 7.5	- 6.6	- 9.2	- 2.6	- 1.4
Terms of trade	4.8	- 5.2	- 1.2	0.0	- 1.4

a) Customs basis.
b) Ratio between export volume and export market of total goods.
Source: OECD.

Fiscal consolidation is to get underway in FY 2002

A key element of the government's policy strategy is to bring the fiscal situation under control, starting with a limit of 30 trillion yen on new borrowing by the central government in fiscal year (FY) 2002. The objective is to achieve a primary budget surplus over the medium term. A second aspect of the strategy is to improve efficiency by reallocating expenditures. However, the current slowdown poses difficulties for consolidation. A supplementary budget has been introduced for FY 2001 amounting to around ¼ per cent of GDP with a focus on supporting the unemployed. The projection assumes that in FY 2002 the government will not seek to offset cyclical shortfalls in tax revenues, but will accept some overshoot of the borrowing target. With spending cuts of some ½ per cent of GDP in that period, the cyclically-adjusted general government deficit is projected to fall by some half per cent of GDP in 2002 and in 2003, once allowance is made for lower tax revenues from postal savings.

The economy is expected to contract this year and next before recovering in line with improving trade prospects

The economy is set to contract by some ¾ per cent in 2001 and by 1 per cent in 2002 as investment falls in response to diminished expectations for profits, low share prices and depressed sentiment on the part of enterprises. In these circumstances, deflationary tendencies could strengthen somewhat and the unemployment rate is projected to rise to around 5½ per cent in the next two years, thereby weakening household income and consumption. Under these conditions the forces acting for recovery are projected to come from an improvement in the world economic situation during the second half of 2002, which will lead to rising exports and eventually to a recovery of investment. With exports strengthening and the terms of trade improving, the current account surplus should recover to around 3½ per cent of GDP in 2003.

Risks remain weighted to the downside

An important domestic uncertainty is related to how and when the government will implement its economic strategy. A determined clean-up of the banking sector will be associated with short run macroeconomic costs, but a hesitant approach risks undermining confidence and deepening recessionary forces. Loss of credibility about budget consolidation could also prolong recession through a rise in long term bond rates with negative consequences for banks, the budget and the economy more generally. Effective structural reforms would improve sentiment and create new opportunities, thereby contributing to an eventual recovery.

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Germany

Economic activity began to stagnate in the spring, when export growth faded and fixed investment contracted. With the present weakness of domestic and external demand reinforced by the impact of the 11 September terrorist attacks in the United States, growth may fall to 0.7 per cent in 2001 and average only 1 per cent in 2002. It should pick up over the course of next year as world trade recovers and disposable incomes benefit from scheduled income tax reductions.

With the general government deficit set to deteriorate this year and remain large in 2002, the authorities could allow the automatic stabilisers to operate but need to resist calls for expansionary discretionary fiscal measures. Further structural reforms – notably with respect to the labour market and social spending – are needed to increase the adaptability of the economy to changing market conditions and raise the growth of potential output.

GDP decelerated sharply in the course of the year

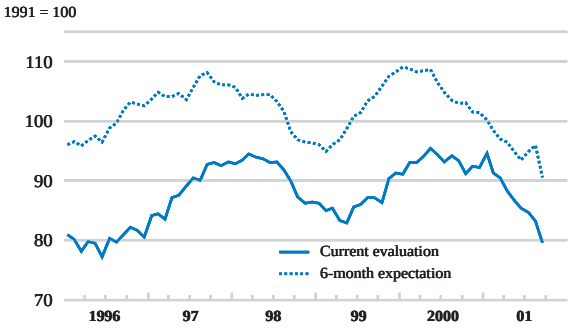
GDP growth continued to slow in the first half of this year, stagnating in the second quarter. Exports decelerated sharply as world trade growth declined, and foreign demand for capital goods turned out to be particularly weak. Simultaneously, imports contracted, mirroring the weakness of total domestic demand. Investment in machinery and equipment declined and appears to have weakened further in recent months. Also, stocks have been rapidly reduced. While some investment appears to have been brought forward into 2000 to avoid less favourable depreciation rules that became effective in 2001, the bulk of the downward adjustments this year correspond to the pronounced deterioration in export expectations, and in business confidence more generally. The construction recession deepened in the first half of the year, on account both of continued downward adjustment in the new states, and weak housing investment in the old *Länder*. In contrast, growth was supported by private consumption, reflecting the boost in household disposable incomes generated by the substantial income tax reductions that became effective in January. The weakening of overall activity is also apparent in the labour market, with employment falling since the beginning of the year and unemployment drifting upwards.

Orders have declined and the business climate has weakened

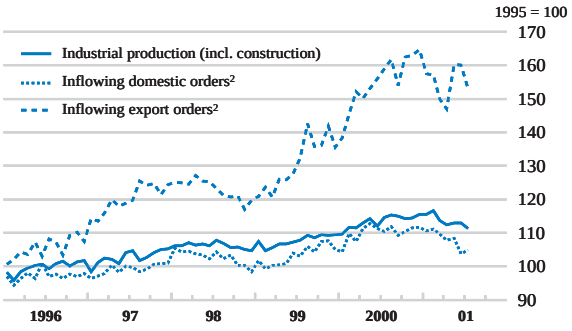
Leading indicators do not suggest a rapid turnaround of economic activity. Incoming orders in manufacturing, both domestic and foreign, have drifted downwards. Consumer confidence has deteriorated more recently and no longer exceeds its long-term average. The business climate weakened substantially through the first part of the year

Germany

Business[1] sentiment has declined



Industrial orders have been falling



1. Industry, western Germany.
2. In manufacturing, volume.

Sources: Ifo Institut für Wirtschaftsforschung; Deutsche Bundesbank and OECD.

Germany: **Employment, income and inflation**

Percentage changes

	1999	2000	2001	2002	2003
Employment	1.2	1.6	0.0	-0.3	0.5
Unemployment rate[a]	8.2	7.5	7.5	8.1	8.0
Compensation of employees	2.7	2.9	2.2	2.1	3.1
Unit labour cost	0.8	-0.1	1.4	1.1	0.2
Household disposable income	3.0	2.8	4.1	2.5	3.5
GDP deflator	0.5	-0.4	1.4	1.1	0.8
Private consumption deflator	0.4	1.4	1.9	1.0	1.1

a) As a percentage of labour force.
Source: OECD.

but expectations in the months prior to the 11 September terrorist attacks in the United States had improved. While this might have been a first sign that the trough in activity was in sight, the negative global growth shock emanating from the terrorist attacks is now reinforcing the economic weakness and business confidence has plummeted.

Easy monetary conditions should support growth

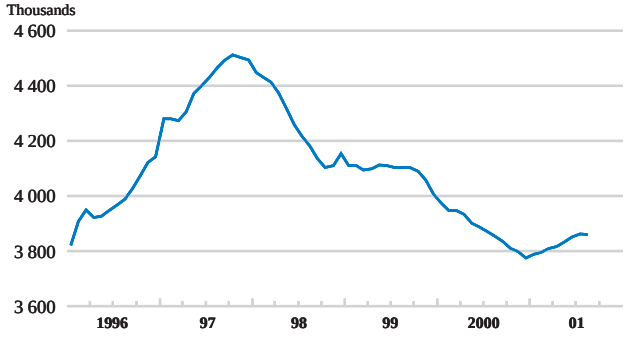
Core inflation has continued to increase, but headline inflation (harmonised consumer price index, HICP) peaked in the spring – at a rate of 3½ per cent – and declined substantially thereafter as energy prices fell. With oil prices continuing to decline, headline inflation is set to continue falling. Real interest rates remain low by historical standards, and further projected cuts in short-term rates by the European Central Bank (ECB) will accommodate economic recovery from the middle of 2002.

General government balances are deteriorating…

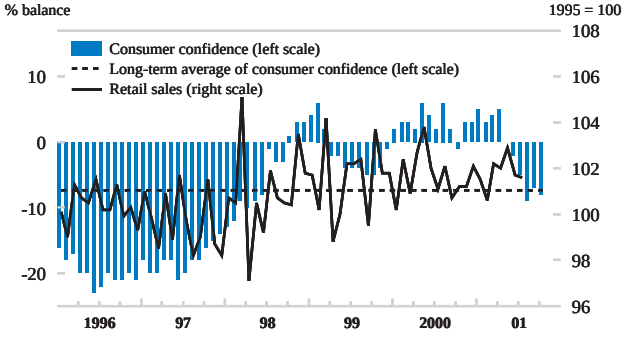
In 2001 general government finances will be expansionary, due to the reduction of revenues associated with the income and business tax reform. Weak growth will further contribute to the deterioration of the general government deficit, which, in the OECD assessment, will increase by 1¼ percentage points to 2½ per cent of GDP (net of last year's receipts from sales of universal mobile telephone service). Accordingly, the deficit target laid down in Germany's stability programme for the European

Germany

Unemployment[1] is on the rise again



Consumer confidence has deteriored



1. Seasonally adjusted, registered unemployment.
Sources: Deutsche Bundesbank and OECD.

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Germany: **Financial indicators**

	1999	2000	2001	2002	2003
Household saving ratio [a]	9.9	9.8	10.2	10.2	10.1
General government financial balance [b]	-1.6	1.2	-2.5	-2.5	-1.8
Current account balance [b]	-1.0	-1.0	-0.7	-0.4	-0.3
Short-term interest rate [c]	3.0	4.4	4.2	3.0	3.8
Long-term interest rate [d]	4.5	5.3	4.8	4.6	5.0

a) As a percentage of disposable income.
b) As a percentage of GDP.
c) 3-month interbank rate.
d) 10-year government bonds.
Source: OECD.

Union (EU) is projected to be overshot by some ¾ per cent of GDP (excluding ¼ per cent due to statistical revisions).[1]

… and no improvement is foreseen for 2002

The draft budget for 2002 foresees spending restraint in some fields. However, some social programmes will be extended, notably child allowances, and tax breaks in favour of voluntary contributions to funded pension plans will be phased in from 2002 onwards. Continued business tax reform will also be associated with some tax relief. Additional expenses on defence and security measures, which have been decided in response to the terrorist attacks, are planned to be fully financed by raising indirect taxes. Overall, the structural deficit is projected to improve by ½ per

Germany: **Demand and output**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	1 110.5	3.1	1.5	1.5	1.4	2.4
Government consumption	369.5	1.6	1.2	1.3	1.2	1.2
Gross fixed investment	412.5	4.2	2.3	-2.6	-0.7	3.1
Public	35.7	6.1	-0.5	0.0	1.4	0.8
Residential	141.5	1.6	-2.9	-6.9	-2.4	-0.2
Non-residential	235.3	5.4	5.7	-0.6	-0.1	5.0
Final domestic demand	1 892.6	3.0	1.6	0.6	0.9	2.3
Stockbuilding [a]	8.7	-0.4	0.4	-0.6	0.2	0.4
Total domestic demand	1 901.3	2.6	2.0	-0.1	1.1	2.7
Exports of goods and services	559.7	5.6	13.2	5.1	3.0	7.0
Imports of goods and services	531.6	8.5	10.0	2.9	3.6	6.7
Net exports [a]	28.1	-0.7	1.1	0.8	-0.1	0.3
GDP at market prices	1 929.4	1.8	3.0	0.7	1.0	2.9
Memorandum items						
Investment in machinery and equipment	169.6	8.0	8.7	0.7	0.5	6.3
Construction investment	243.0	1.5	-2.5	-5.3	-1.7	0.2

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
Source: OECD.

1. Germany's deficit target according to the stability programme is 1½ per cent of GDP. However, for 2000 the deficit was revised upwards statistically by 0.3 per cent of GDP.

Germany: **External indicators**

	1999	2000	2001	2002	2003
			$ billion		
Merchandise exports	542.9	549.6	577.6	601	654
Merchandise imports	472.0	491.3	500.3	514	560
Trade balance	70.9	58.3	77.3	87	94
Invisibles, net	- 91.0	- 77.1	- 90.2	- 95	- 99
Current account balance	- 20.1	- 18.8	- 12.9	- 8	- 5
			Percentage changes		
Merchandise export volumes [a]	6.2	12.5	3.9	3.1	7.3
Merchandise import volumes [a]	6.4	10.2	1.8	3.9	7.3
Export performance [b]	- 0.4	- 0.3	2.1	0.7	- 0.8
Terms of trade	- 0.4	- 6.2	2.2	1.9	0.0

a) Customs basis.
b) Ratio between export volume and export market of total goods.
Source: OECD.

cent of GDP in 2002, but with growth remaining subdued the general government deficit is likely to remain at around 2½ per cent of GDP. While further income tax reductions will become effective in 2003, both spending restraint and a recovery in economic growth are projected to reduce the general government deficit to 1¾ per cent of GDP that year. Given Germany's medium term fiscal consolidation objectives, there is no room for any further easing of the fiscal policy stance beyond the working of the automatic stabilisers.

Growth will be well below potential this year and next but should accelerate as world trade recovers and confidence improves

The economic uncertainty emanating from the terrorist attacks in the United States is projected to further delay economic recovery. Export growth is projected to remain subdued through to the middle of 2002, but should then strengthen again, reflecting the projected recovery in world trade. Private consumption is likely to be subdued for some quarters to come, reflecting rising unemployment and the drop in consumer confidence. However, it should recover in the course of next year and especially in 2003, supported by increases in child benefits, income tax reductions and higher wage growth. Investment in machinery and equipment should also gather momentum during next year, following the improvement in external demand and a recovery of profits. Construction, on the other hand, is projected to remain in recession until well into 2002. All in all, GDP growth is projected to amount to ¾ per cent this year and 1 per cent in 2002, strengthening to close to 3 per cent in 2003.

With growth weakening unemployment will increase

With growth weakening, the unemployment rate is likely to increase from 7.5 per cent in 2000 to 8.1 per cent in 2002, before the economic recovery induces employment to pick up again. Inflation is expected to remain on a declining trend through the rest this year and next as energy prices continue to fall and the output gap widens, although increases in indirect taxes in 2002 should damp this development.

Risks to these projections are significant

Risks to these central projections are large, and essentially arise from the uncertainty surrounding the timing of a stabilisation of consumer and investor confidence both in Germany and abroad. In particular, on the downside a slower recovery in the world economy is likely to lead to further postponements in investment plans. On the upside, scheduled increases in child benefits and income tax reductions could lead to higher private consumption than projected.

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France

GDP growth slowed in the first half of 2001 to an annual rate of some 2 per cent, as weak world demand caused exports to decline. This was compounded by a sharp slowdown in investment and a significant de-stocking. Despite slowing growth and rising unemployment, capacity utilisation levels remain high and underlying inflation has continued to rise. The 11 September terrorist attacks in the United States and the associated climate of uncertainty are expected to prolong the slowdown, with world trade remaining weak. As these effects wear off towards the middle of next year, output should pick up and growth may reach 3 per cent, somewhat above potential, in 2003.

The 2002 budget marks a departure from the government's multiyear plan for sustained decreases in the structural deficit. As a result, although automatic stabilisers may be allowed to operate, substantial further expenditure cuts will be required in 2003 and 2004 to meet the official target of budget balance in 2004. Moreover, in order to build on recent improvements in the labour market, additional reforms are needed to make work pay and reduce regulatory impediments that make firms reluctant to hire.

Economic activity slowed sharply in the first half of 2001

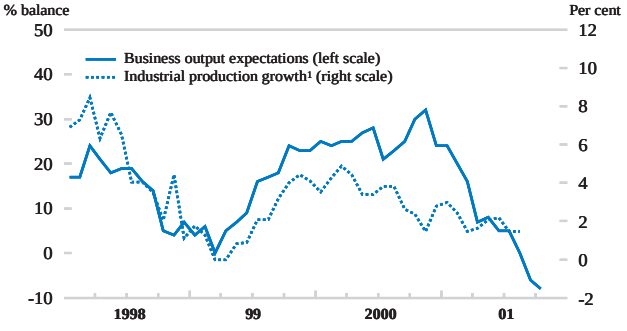
Aggregate output slowed markedly in the first half of 2001 to an annual rate of 2 per cent, down from 3.4 per cent the year before. Supported by a strong expansion of employment, tax cuts and a tight labour market, private consumption grew strongly in the first quarter, but it has slowed since. Investment weakened substantially in the first half and this was accompanied by a significant slowing in industrial activity and substantial destocking by firms. The downturn elsewhere in the OECD contributed to the weakness of French exports, which, however, grew less quickly than their external markets. Nevertheless, the current account surplus actually improved as the deceleration in exports was more than compensated by a fall in imports.

Capacity constraints have eased, but core inflation has risen

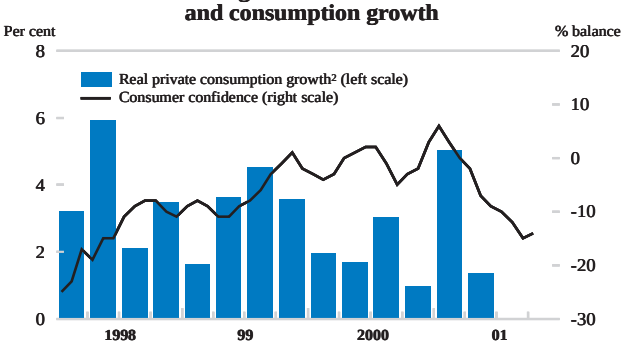
The slowdown in activity has contributed to a gradual easing of the capacity constraints that began emerging in 2000. Capacity utilisation rates, although still high, are declining, as are order books. Meanwhile, firms indicate that their inventories are rising. Within this overall context of a tight but easing balance between supply and demand and notwithstanding recent oil price induced declines in headline inflation, core inflation[2] has continued to rise during the year.

France

Business expectations are falling



Declining consumer confidence and consumption growth



1. Percentage change year-on-year.
2. From previous period at annual rates.

Source: National Institute for Statistics and Economic Studies (INSEE).

2. Both the rate of increase of prices excluding food and energy and the official measure of core inflation, which also excludes various administered prices, have been rising throughout the year.

France: **Employment, income and inflation**

Percentage changes

	1999	2000	2001	2002	2003
Employment	1.8	2.3	1.8	0.5	0.7
Unemployment rate[a]	10.9	9.5	8.9	9.4	9.3
Compensation of employees	4.3	4.5	4.1	3.2	3.4
Unit labour cost	1.3	1.1	2.1	1.5	0.3
Household disposable income	2.8	4.7	4.6	3.7	3.7
GDP deflator	0.3	0.8	1.7	1.8	1.4
Private consumption deflator	0.2	1.2	1.7	1.4	1.7

a) As a percentage of labour force.
Source: OECD.

Following three years of decline, the unemployment rate has risen

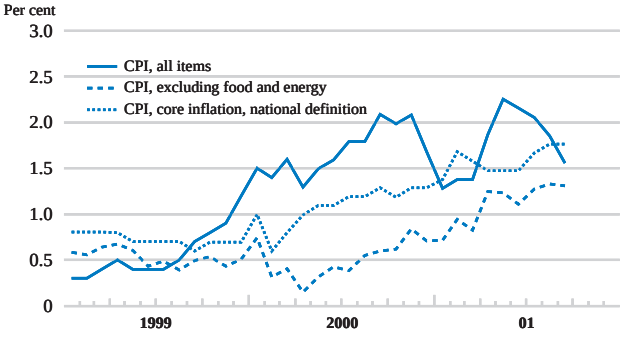
Reflecting output developments but also a more labour intensive pattern of growth, due in part to government incentive programmes, employment expanded at annual rates of 3.4 per cent in the first quarter of 2001. But it slowed substantially to 1.5 per cent in the second, and labour market conditions appear to have weakened further since then. The unemployment rate has been rising since May and reached 9.1 per cent in September – close to the OECD's estimates of France's structural rate of unemployment. Despite tight labour market conditions, real wage growth has been moderate, though unit labour costs began to rise in the first half of 2001 as the economy slowed.

Monetary conditions have eased and fiscal consolidation has been postponed

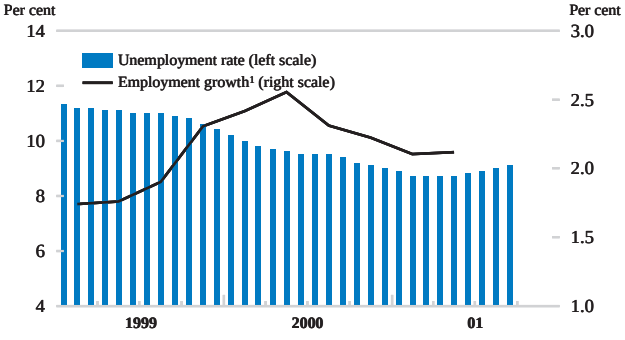
The European Central Bank has cut interest rates in the course of the year as the European slowdown became clearer and inflation prospects improved. Fiscal policy in 2001, as measured by the structural deficit, has been neutral as compared with 2000, with cuts in income taxes and social security charges being offset by a less rapid increase of expenditures relative to potential output. For 2002, the OECD estimates that the structural budget deficit will remain unchanged at about 1.7 per cent of GDP. While not expansionary, these steps represent a looser stance than the progressive reduction in the structural deficit that was outlined in the government's 2002-2004 multiyear plan.

France

Rising core inflation[1]



Weakening labour market



1. Percentage change year-on-year.
Source: National Institute for Statistics and Economic Studies (INSEE).

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France: **Financial indicators**

	1999	2000	2001	2002	2003
Household saving ratio [a]	15.1	15.8	16.4	16.8	16.5
General government financial balance [b]	-1.6	-1.4	-1.5	-1.8	-1.4
Current account balance [b]	2.5	1.6	1.6	1.8	1.6
Short-term interest rate [c]	3.0	4.4	4.2	3.0	3.8
Long-term interest rate [d]	4.6	5.4	5.0	4.8	5.2

a) As a percentage of disposable income.
b) As a percentage of GDP.
c) 3-month interbank rate.
d) 10-year benchmark government bonds.
Source: OECD.

Growth is expected to remain moderate until mid 2002

The weakening of economic growth observed during the first three-quarters of the year will likely be exacerbated by a world-wide slowdown in economic activity following the 11 September terrorist attacks in the United States. In France, this is expected to take the form of a further reduction in consumer confidence and postponement of investment decisions. GDP is, therefore, projected to grow only slowly during the final quarter of 2001 and the first half of 2002. As international uncertainty is reduced, exports and investment spending are expected to pick up towards the middle of 2002, leading to a substantial strengthening of aggregate demand. In terms of annual averages, however, this acceleration will not be perceptible until 2003. Overall, the slowdown in the economy should serve to reduce inflationary pressures in 2002, but the projected rebound of activity and higher oil prices in 2003 may be reflected in some renewed upward pressure on prices towards the end of the projection period. While stronger growth should see the unemployment rate fall again in 2003, high levels of structural unemployment remain a serious problem, and additional concrete steps still have to be taken both to make work pay and to alleviate various regulations that make firms reluctant to hire.

France: **Demand and output**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	716.1	3.2	2.7	2.5	1.7	2.4
Government consumption	306.1	2.0	2.3	2.2	1.9	2.0
Gross fixed investment	240.6	6.2	6.2	2.9	0.8	4.1
General government	37.7	3.6	4.2	2.7	0.3	1.3
Household	59.8	7.6	4.6	0.0	0.5	2.7
Other	143.1	6.3	7.4	4.1	1.0	5.2
Final domestic demand	1 262.7	3.5	3.3	2.5	1.6	2.6
Stockbuilding [a]	8.5	-0.4	0.3	-0.8	0.1	0.4
Total domestic demand	1 271.2	3.0	3.6	1.7	1.6	3.0
Exports of goods and services	341.0	3.9	13.4	2.6	1.6	7.6
Imports of goods and services	306.4	4.2	15.2	1.6	1.7	8.0
Net exports [a]	34.6	0.0	-0.1	0.3	0.0	0.1
GDP at market prices	1 305.9	3.0	3.4	2.0	1.6	3.0

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
Source: OECD.

France: **External indicators**

	1999	2000	2001	2002	2003
			$ billion		
Merchandise exports	298.4	296.7	294.1	300	327
Merchandise imports	279.8	295.2	290.6	293	323
Trade balance	18.6	1.5	3.4	8	4
Invisibles, net	17.0	19.0	17.0	17	19
Current account balance	35.6	20.6	20.5	24	23
			Percentage changes		
Merchandise export volumes [a]	4.0	14.0	2.1	1.6	7.9
Merchandise import volumes [a]	5.2	16.7	1.2	1.1	8.5
Export performance [b]	- 1.9	1.7	- 0.7	- 1.4	0.0
Terms of trade	- 0.4	- 3.4	- 0.2	0.9	- 0.8

a) Customs basis.
b) Ratio between export volume and export market of total goods.
Source: OECD.

This scenario is subject to substantial uncertainty

In the current international environment, this projection, which is based on the assumption that the significant adverse domestic and international confidence effect stemming from the September terrorist attacks will have largely dissipated by the middle of next year, is subject to extraordinary risks. On the upside, if business and consumer confidence (both within and outside France) are less affected than assumed here, then spending levels could be higher and the slowdown shallower and shorter than projected. On the downside, negative business and consumer reactions could be more pronounced and protracted if international political developments yield further uncertainty. In this case, the possibility of a deeper and longer period of slow growth cannot be ruled out.

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Italy

The economy slowed to a halt in the second quarter, but seemed on the verge of recovering when the 11 September terrorist attacks in the United States took place. A sharp near-term slowdown is now foreseen, as businesses delay investment plans in response to rising world uncertainty and households raise precautionary savings. With business sentiment assumed to normalise around the middle of 2002, recovery will be assisted by historically low interest rates, while fiscal policy is expected to play a neutral role.

The easing of strict labour market regulation has contributed to improving employment performance, but should be exploited further if employment growth is to be maintained in the face of rapid population ageing. Policies to raise productivity growth are likewise critical, notably reforms to enhance human capital, increase product market competition, and allocate more resources to innovative activities.

Domestic demand, which seemed to be firming prior to 11 September, has turned down

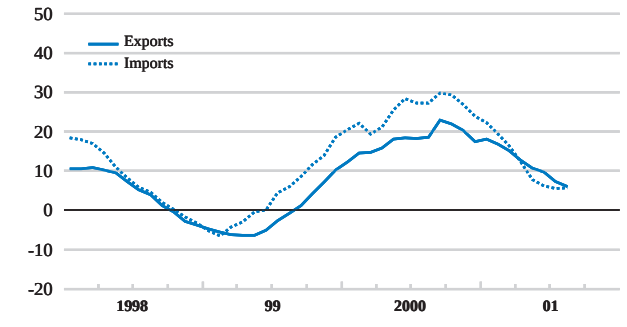
While both domestic demand and exports weakened significantly in the first half of the year, the available data suggested, at the time of the 11 September terrorist attacks occurred, that growth was gradually recovering. Domestic and foreign orders had turned up, with the announcement of tax measures to encourage corporate investment assisting these demand gains. Though weakening somewhat from its spring peak, consumer confidence remained supportive, while leading indicators were pointing to the possibility of an imminent pick-up in industrial production and continuing strong service activities. However, subsequent information showed that the economy had started to slow again even before the 11 September events, and there has been a further sharp decline in business confidence since mid-September.

External demand has slumped but Italy has been gaining market share in 2001

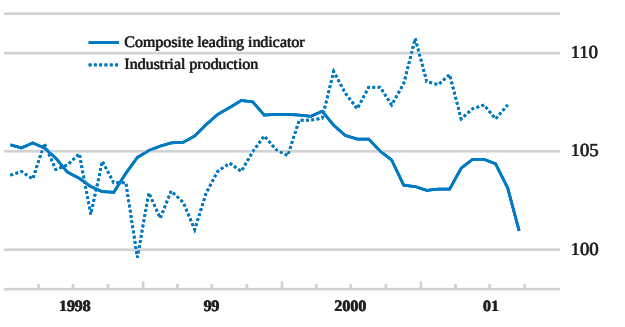
The economic slowdown this year has been driven by the weakness in world trade. Specialising in traditional products, Italian trade has been cushioned from the direct effects of the global information and communications technology (ICT) slump. It has been hit indirectly, as ICT-producing countries tend to be major markets for Italian exports of traditional goods. Nonetheless Italy has been gaining aggregate export market shares this year. With imports weak, due to a slowing domestic demand, the overall contribution of net exports to real GDP growth is estimated to be positive in 2001.

Italy

A slowing external sector[1]



The leading indicator turned down sharply, in the third quarter



1. Year-on-year percentage changes using three-month moving averages. Data are seasonally adjusted.
Source: OECD.

Italy: **Employment, income and inflation**

Percentage changes

	1999	2000	2001	2002	2003
Employment	1.2	1.9	1.6	0.4	1.3
Unemployment rate[a]	11.5	10.7	10.0	10.2	10.0
Compensation of employees	3.7	4.2	4.1	3.2	4.2
Unit labour cost	2.1	1.3	2.3	2.0	1.3
Household disposable income	3.0	4.4	4.0	3.7	4.3
GDP deflator	1.6	2.2	3.0	2.8	1.9
Private consumption deflator	2.1	2.9	2.8	1.7	1.8

a) As a percentage of labour force.
Source: OECD.

Labour market developments remain favourable

Even as growth has decelerated, employment has continued to rise, though at a slowing pace – at an annual rate of close to 2 per cent in the third quarter of 2001, down from more than 3 per cent in the first. The unemployment rate remained on a gradual downward trend, though the South was still lagging behind the Northern and Central regions. A recent development in the employment dynamics has been the rise in permanent full-time contracts. This may be partially imputed to the tax incentives introduced by the 2001 Budget law.

The inflation outlook is relatively benign

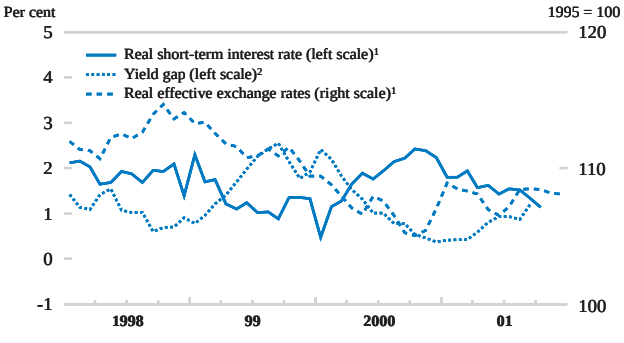
Lower oil prices and a more stable euro have translated into slower producer price inflation. This has had a beneficial impact on consumer prices which increased by 2.5 per cent in October, down from a peak of 3.1 per cent earlier in the year. The wage environment remains favourable, with the newly-concluded national agreements implying moderate wage increases for 2001 and 2002.

Monetary conditions are supportive

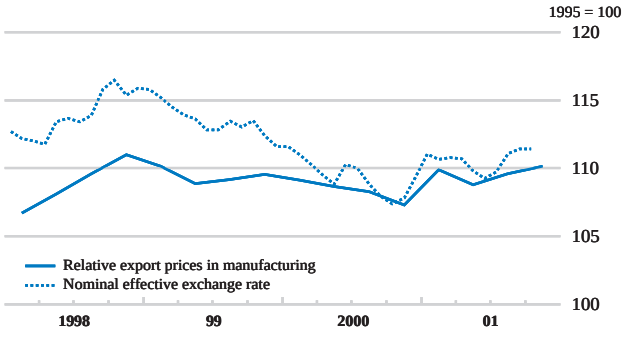
Monetary conditions are helping to counter short-term deflationary risks, the recent reduction in policy rates by the European Central Bank taking real short-term interest rates down to around 1.5 per cent, which is low historically. Falling yields on

Italy

Monetary conditions remain supportive



Some erosion of competitiveness has occured



1. Deflated using the consumer price index.
2. Long-term interest rate minus short-term interest rate.
Source: OECD.

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Italy: **Financial indicators**

	1999	2000	2001	2002	2003
Household saving ratio [a]	11.5	10.2	10.1	10.5	10.3
General government financial balance [b]	-1.8	-0.3	-1.4	-1.1	-1.1
Current account balance [b]	0.7	-0.4	0.1	0.6	0.7
Short-term interest rate [c]	3.0	4.4	4.2	3.0	3.8
Long-term interest rate [d]	4.7	5.6	5.2	4.9	5.3

a) As a percentage of disposable income.
b) As a percentage of GDP.
c) 3-month interbank rate.
d) 10-year government bonds.
Source: OECD.

ten-year government bonds have translated into lower costs of borrowing from banks for both corporations and households.

Fiscal policy is focused on containing recent deficit slippage

Recognising the possibility of a significant slippage from the 0.8 per cent budget deficit target for 2001, in July the government announced a set of measures to contain public expenditure for goods and services, to reduce reimbursements for drug prescriptions and to accelerate the planned sale of real estate assets. The fiscal situation improved thereafter, assisted by better than expected tax revenues. However, the downward revision of the OECD growth projection is stronger than the official one, implying a deficit outcome in 2001 of 1.4 per cent of GDP. For 2002, the official deficit projections may also be on the low side, as real output growth may prove worse than expected by the government, triggering the operation of built-in stabilisers. Revenues from the planned sales of public real estate assets may also turn out to be less than expected, while the revenue consequences of the incentives for repatriation of financial assets illegally held abroad are impossible to quantify accurately.

Italy: **Demand and output**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption [a]	636.7	2.3	2.9	1.2	1.4	2.7
Government consumption	192.5	1.5	1.6	0.6	0.6	0.6
Gross fixed investment	198.7	4.6	6.1	1.5	1.3	4.1
Machinery and equipment	115.2	6.0	7.8	0.7	1.3	4.1
Construction	83.5	2.8	3.6	2.7	1.1	4.0
Residential	46.2	1.8	2.5	1.2	1.2	4.0
Non-residential	37.3	4.1	5.1	4.4	1.0	4.0
Final domestic demand	1 028.0	2.6	3.3	1.2	1.3	2.6
Stockbuilding [b]	8.3	0.4	-1.0	-0.1	0.0	0.0
Total domestic demand	1 036.3	3.0	2.3	1.0	1.3	2.6
Exports of goods and services	283.0	0.0	10.2	5.9	2.2	6.9
Imports of goods and services	246.5	5.1	8.3	3.6	2.7	6.5
Net exports [b]	36.6	-1.3	0.6	0.8	-0.1	0.3
GDP at market prices	1 072.9	1.6	2.9	1.8	1.2	2.8

a) Final consumption in the domestic market by households.
b) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
Source: OECD.

Italy: **External indicators**

	1999	2000	2001	2002	2003
			$ billion		
Merchandise exports	236.0	237.6	250.7	259	282
Merchandise imports	212.4	225.4	232.6	235	256
Trade balance	23.6	12.2	18.1	24	26
Invisibles, net	- 15.3	- 16.8	- 17.1	- 17	- 18
Current account balance	8.3	- 4.6	1.0	7	8
			Percentage changes		
Merchandise export volumes [a]	1.8	10.2	2.9	2.2	7.4
Merchandise import volumes [a]	7.9	8.3	0.5	2.8	6.7
Export performance [b]	- 4.1	- 2.6	0.9	- 0.6	- 0.9
Terms of trade	0.8	- 7.4	0.2	2.9	- 0.7

a) Customs basis.
b) Ratio between export volume and export market of total goods.
Source: OECD.

The overall stance of fiscal policy remains neutral, though a rise in the minimum pension, tax cuts and higher investment in infrastructure, are supportive of demand.

Real GDP growth is expected to decelerate further, before picking up in 2003

The blow to confidence caused by the September events will push an already fragile demand for business investment into temporary stagnation, although household consumption could be somewhat more resilient. However, both domestic demand and exports of goods and services are expected to pick up strongly from the second semester of 2002 onward, the former assisted by the new tax breaks. With consumer sentiment improving, households may also unwind the precautionary savings built up at the peak of the uncertainty period, spurring consumption. Improved employment performance, easier monetary conditions and lower consumer price inflation will further encourage consumption. Some export market losses are expected in 2002 and 2003, as Italy's excessive reliance on exports of traditional goods begins to act to its disadvantage once again. Nonetheless, the current account surplus should improve, partly reflecting recovering tourism receipts. Overall, real GDP is projected to slow to about 1¾ per cent this year and to 1¼ per cent in 2002, picking up to 2¾ per cent in 2003.

There are risks on both the external and domestic side

In view of the September events, significant uncertainties are attached to the projections. The risks are principally on the external side: export demand may decelerate more than expected or remain depressed for a longer period, with negative investment effects. Domestically, the evolution of consumer confidence is also quite uncertain. In addition, there is a fiscal risk, insofar as the planned base-broadening measures may fail to increase revenues as much as expected. If accompanied by continuing spending overruns, this could prove damaging to budget outcomes and confidence in general.

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United Kingdom

Against the background of resilient consumer confidence, growth has slowed only moderately so far and unemployment has declined further. Following the 11 September terrorist attacks in the United States, activity is expected to slow noticeably in the near term due to faltering foreign and domestic demand. However, growth should return to a solid pace in the second half of 2002, supported by fiscal and monetary policy and a projected turnaround in international trade.

Given the downside risks, further monetary easing may prove necessary. Fiscal policy is already becoming more relaxed, but it will be important to ensure an efficient use of the extra resources channelled into public services, the performance of which needs improving. Structural policy should focus on fostering productivity growth, by enhancing human capital and work incentives and raising competitive pressures.

Growth has slowed less than elsewhere…

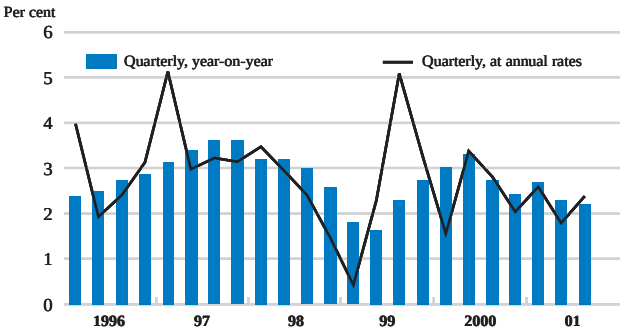
Growth has slowed since the summer of 2000, falling from significantly above to just below potential, but has held up better than in the other major OECD economies. The slowdown stemmed mainly from global factors, notably the subsiding high-tech bubble and faltering overseas demand, which has been reflected in weaker exports and non-residential investment in the first half of 2001. In addition, the foot-and-mouth crisis and poor weather conditions affected the agriculture and tourism sectors. To date, household sentiment has remained fairly resilient and parts of the service and construction industries have remained buoyant, in sharp contrast with weak activity in manufacturing industries that are exposed to international markets.

… and despite some imbalances unemployment and inflation are low

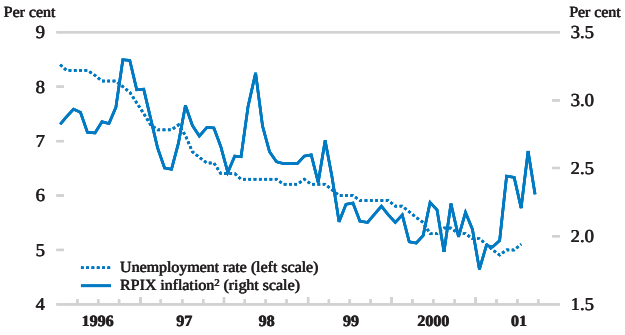
High-tech industries have been disproportionately hit by the slowdown in global demand this year, while the persistent strength of sterling against the euro has continued to put pressure on the competitiveness of manufacturing industries. The combination of weak manufacturing and buoyant service industries has resulted in a widening trade and current account deficit, while pushing the unemployment rate to historical lows – below most estimates of the rate that is compatible with stable inflation. Against this backdrop, consumer price inflation has picked up somewhat, the

United Kingdom

Growth has edged down but remained solid[1]



Inflation picked up amid a tight labour market



1. Real GDP.
2. All items excluding mortgage interest payments, year-on-year percentage changes.

Sources: Office for national Statistics (ONS) and OECD.

United Kingdom: **Employment, income and inflation**

Percentage changes

	1999	2000	2001	2002	2003
Employment	1.3	1.0	0.9	0.3	0.3
Unemployment rate[a]	6.0	5.5	5.1	5.3	5.5
Compensation of employees	6.5	5.5	5.6	4.9	4.6
Unit labour cost	4.3	2.6	3.3	3.1	2.1
Household disposable income	5.1	5.0	5.0	4.7	5.1
GDP deflator	2.6	1.7	2.4	2.5	2.5
Private consumption deflator	1.5	0.6	1.6	2.3	2.3

a) As a percentage of labour force.
Source: OECD.

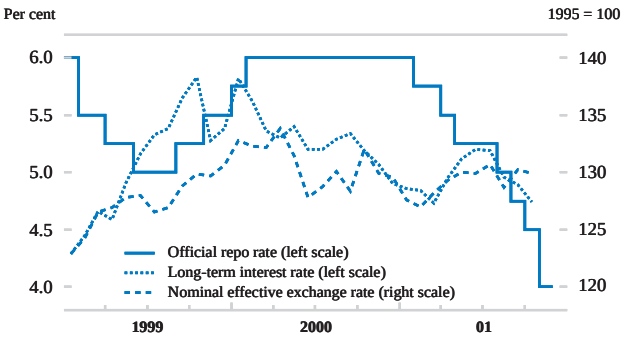
underlying measure of retail inflation (RPIX, which excludes mortgage interest payments) being close to the monetary policy target of 2½ per cent. The rise in inflation also reflects the waning impact of the earlier currency appreciation and temporary factors, such as the effects of poor weather and of the foot-and-mouth epidemic on food prices.

Monetary policy has eased significantly

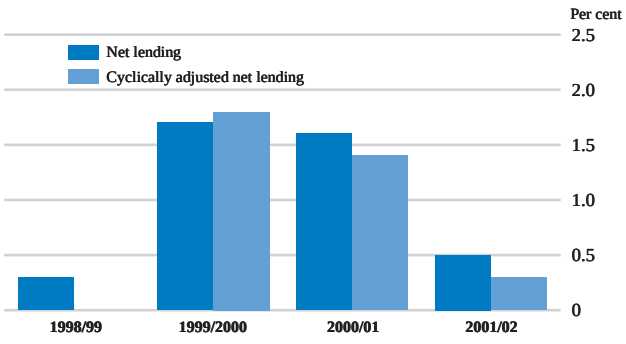
While sterling has barely moved in effective terms over the last six months, monetary policy has eased significantly. Faced with mounting evidence of a global downturn, the Bank of England had already cut the repo rate by 100 basis points since the start of 2001 to 5 per cent in August. Prompted by concerns over the impact of the 11 September terrorist attacks and further evidence of global weakness the Bank of England has cut the repo rate, in three steps to 4 per cent – its lowest level since 1954. As a result, the short-term interest rate spread against the euro area has levelled off at around 80 basis points. By contrast, long-term interest rates have edged up since the start of 2001, although remaining consistently a notch below the euro area average rate. With household sentiment relatively upbeat and the housing market remaining strong, bank credit, especially mortgage lending, has continued to grow vigorously.

United Kingdom

Monetary conditions have eased significantly



The fiscal stance is becoming more relaxed[1]



1. Public sector net lending in per cent of (potential) GDP; fiscal years.
Sources: Bank of England, HM Treasury and OECD.

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United Kingdom: **Financial indicators**

	1999	2000	2001	2002	2003
Household saving ratio [a]	4.8	5.0	5.2	5.6	5.8
General government financial balance [b]	1.1	1.9	1.1	0.0	-0.7
Current account balance [b]	-2.1	-1.9	-1.8	-2.0	-2.2
Short-term interest rate [c]	5.4	6.1	5.0	3.8	4.6
Long-term interest rate [d]	5.1	5.3	4.9	4.7	5.1

a) As a percentage of disposable income.
b) As a percentage of GDP.
c) 3-month interbank rate.
d) 10-year government bonds.
Source: OECD.

Public spending is increasing rapidly and the fiscal stance easing

After years of fiscal restraint, the authorities have established a sound fiscal position. This provides the necessary room for manoeuvre to address some long-standing problems, most prominently the poor quality of public infrastructure and key public services. The latter not only reflects the fact that available resources are not properly mobilised but also results from a long period of under-funding. Accordingly, the Spending Review 2000 and Budget 2001 programme a significant increase in public spending in several areas – notably public transport, health and education. Tax credits and transfers aimed at enhancing work incentives and saving and more generous corporate tax credits for research and development expenditure are also being introduced. Public investment has been rising at an unprecedented two-digit pace and government wages are increasing faster than in the private sector, in part reflecting deliberate policy to attract staff and reward performance. Government employment is also picking up. In accordance with the "golden rule", which allows the Government to borrow to invest, the structural fiscal position will move from a surplus in 2001 towards a small deficit in 2003. This is in line with projections set out in Budget 2000 and

United Kingdom: **Demand and output**

	1998	1999	2000	2001	2002	2003
	current prices billion £	Percentage changes, volume (1995 prices)				
Private consumption	557.6	4.2	4.0	3.7	2.0	2.5
Government consumption	154.9	2.8	1.6	2.1	3.4	3.6
Gross fixed investment	151.5	0.9	4.9	1.4	-0.7	2.4
Public [a]	12.5	-1.4	11.5	19.2	11.2	10.0
Private residential	30.8	-1.3	0.8	-2.3	1.5	2.1
Private non-residential	108.3	1.7	5.1	0.3	-2.7	1.4
Final domestic demand	864.1	3.4	3.7	3.0	1.8	2.7
Stockbuilding [b]	4.9	0.1	-0.3	-0.2	0.0	0.0
Total domestic demand	869.0	3.4	3.4	2.8	1.8	2.7
Exports of goods and services	228.8	5.4	10.2	3.6	3.4	7.3
Imports of goods and services	237.9	8.9	10.7	4.8	3.3	7.1
Net exports [b]	- 9.1	-1.4	-0.7	-0.7	-0.2	-0.3
GDP at market prices	859.8	2.1	2.9	2.3	1.7	2.5

a) Including nationalised industries and public corporations.
b) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
Source: OECD.

United Kingdom: **External indicators**

	1999	2000	2001	2002	2003
			$ billion		
Merchandise exports	268.9	284.1	287.2	302	331
Merchandise imports	313.4	330.1	337.4	355	388
Trade balance	- 44.6	- 46.0	- 50.2	- 53	- 56
Invisibles, net	13.6	18.2	24.7	23	21
Current account balance	- 31.0	- 27.8	- 25.5	- 30	- 35
			Percentage changes		
Merchandise export volumes [a]	3.7	9.4	2.9	3.1	7.4
Merchandise import volumes [a]	7.3	9.7	3.2	3.2	6.9
Export performance [b]	- 2.5	- 2.5	2.1	1.1	- 0.7
Terms of trade	0.8	0.5	- 0.2	- 0.1	0.1

a) Customs basis.
b) Ratio between export volume and export market of total goods.
Source: OECD.

confirmed in Budget 2001, implying a significant fiscal easing over time. In addition, and in line with the budgetary framework, the automatic stabilisers will be allowed to operate to support demand.

A rebound is expected in the second half of 2002…

Activity is projected to remain subdued well into the first half of next year. External demand is expected to continue to slump. Moreover, household consumption is set to slow sharply as confidence falters and the saving rate edges up from its current low level. The economy is expected to rebound in the second half of 2002, as policy easing in the United Kingdom and elsewhere result in a recovery of domestic and external demand. Fiscal policy is set to remain expansionary throughout the projection period, while the Bank of England is expected to start withdrawing part of the monetary stimulus only from early 2003 onwards. Hence GDP growth is projected to recover from a trough of somewhat below 2 per cent in 2002 to around 2¾ per cent by the end of 2003, marginally above the potential growth rate. Unemployment is expected to peak at about 5½ per cent early in 2003, somewhat above the structural rate. Inflation could decline somewhat below target over the projection period.

… though there are serious risks

The projection is surrounded by a great deal of uncertainty. While the economic consequences of the 11 September attacks is difficult to fully assess, it could trigger a sharper downturn globally than expected. This could severely hit the UK economy through the trade channel, as well as through weakening household and business sentiment.

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Canada

Exports were continuing to decline and domestic demand was softening, when the Canadian economy was hit by the consequences of the 11 September terrorist attacks in the United States. The adverse impact of these events on consumer and business confidence is likely to weigh on demand until the middle of next year. Economic growth is then projected to rebound to an above-potential pace, fuelled by stimulatory monetary and fiscal policies in both the United States and Canada, although a more protracted setback to confidence and spending cannot be excluded.

The substantial monetary easing since January has been appropriate in the light of the deteriorating economic outlook. Monetary stimulus should be promptly withdrawn, however, when the economy is moving toward its productive potential. With government finances in comfortable surplus, the automatic stabilisers can and should be allowed to work. Limited fiscal action to deal with the consequences of the terrorist attacks would be justified, but lowering the still heavy government debt over the medium term should remain a priority.

As economic activity has continued to weaken…

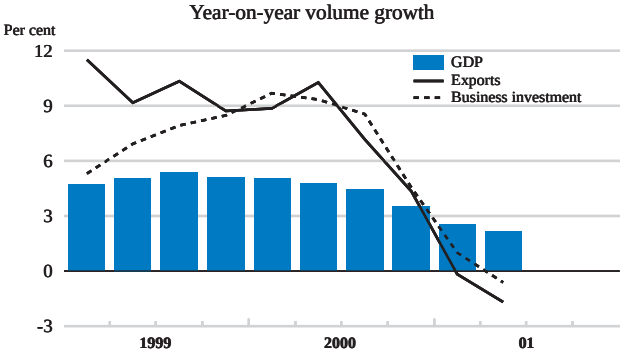
The economic slowdown since late last year, which had been led by weakening US demand and Canadian business spending, continued into the second quarter of 2001, when real GDP grew by only ½ per cent (at an annual rate). The deceleration mainly reflected a lessening in household demand, which had been buoyant in the first quarter. A rebound in business and consumer confidence appeared to bode well for modest growth in the third quarter. However, by mid-summer, evidence had begun to accumulate that the US slowdown would be more prolonged than generally assumed and that – partly as a result – domestic confidence and spending propensities were deteriorating. The terrorist attacks in September reinforced this trend. Although there is only anecdotal evidence of the subsequent disruption of activity in Canada, it seems likely that real GDP contracted in the third quarter of 2001.

… inflationary pressures have begun to abate

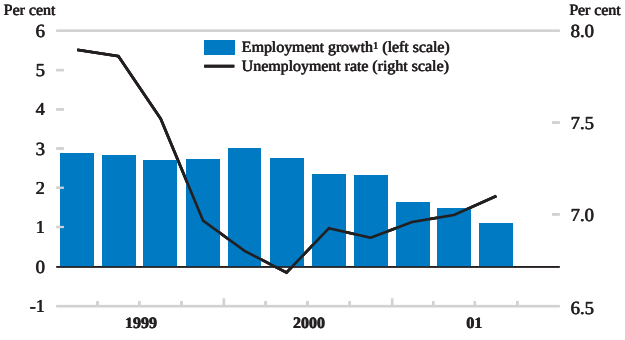
The downturn has been reflected in the labour market. After slowing gradually, net job creation turned negative in the third quarter. Unemployment has edged up to 7¼ per cent in recent months, exceeding its estimated structural rate. As a result, there are signs of an easing in underlying wage growth, which had temporarily reached 4 per cent in the spring. With declining energy prices, headline consumer price inflation, which also peaked at nearly 4 per cent at that time, has fallen back within the official 1 to 3 per cent target range. As the economy was operating above

Canada

Growth has slowed further
Year-on-year volume growth



The labour market has deteriorated



1. Year-on-year change.
Source: Statistics Canada.

Canada: **Employment, income and inflation**

Percentage changes

	1999	2000	2001	2002	2003
Employment	2.8	2.6	1.1	0.7	1.6
Unemployment rate[a]	7.6	6.8	7.3	7.8	7.4
Compensation of employees	5.9	6.8	4.8	4.6	4.5
Unit labour cost	0.8	2.3	3.4	3.4	0.6
Household disposable income	5.0	5.6	5.5	4.5	4.4
GDP deflator	1.4	3.7	2.6	1.3	1.7
Private consumption deflator	1.6	2.0	2.2	1.9	1.6

a) As a percentage of labour force.
Source: OECD.

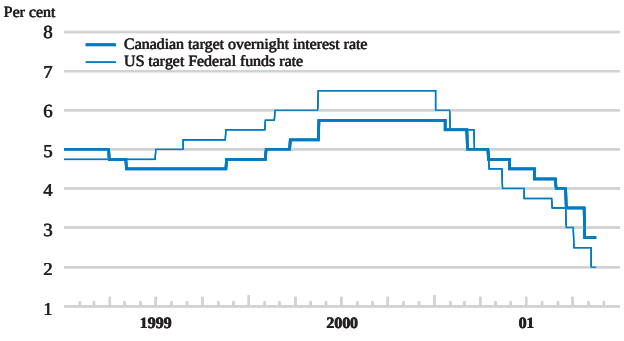
potential at the onset of the current downswing, the Bank of Canada's measure of core inflation continued to edge upward until mid-year, when it approached 2½ per cent, before easing somewhat of late.

Monetary conditions have eased considerably

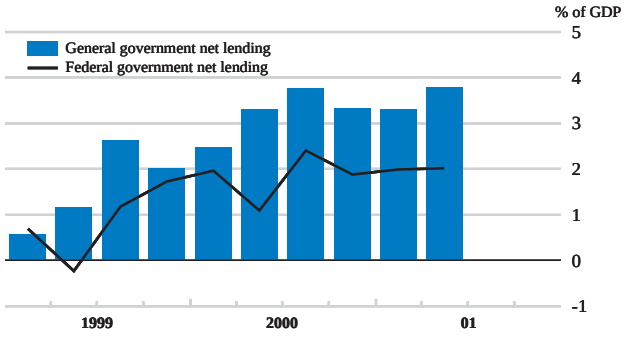
In the light of deteriorating economic prospects, the Bank of Canada lowered its target for the overnight interest rate by 25 basis points in both July and August. In mid-September, the Bank then cut its overnight rate by 50 basis points, in line with a similar decision taken by the US monetary authorities. This was the first time that the Bank acted outside of its normal schedule of announcement dates since this approach was introduced a year ago. This decision was motivated by the need for prompt action to counteract the potential effects on confidence from the extraordinary events in the United States. As economic conditions continued to weaken, it was followed by a 75 basis-point cut in the overnight rate at the October announcement date, bringing the cumulative decline since the beginning of the year to 3 percentage points while leaving Canadian rates still above their US counterparts. The projections assume that the Bank will cut interest rates further somewhat in the near term but partially reverse these reductions during the course of 2003 when the economy is expected to move toward its productive capacity.

Canada

Monetary policy has eased substantially



The budget surplus has remained large



Sources: Statistics Canada, Bank of Canada and US Federal Reserve.

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Canada: **Financial indicators**

	1999	2000	2001	2002	2003
Household saving ratio[a]	4.2	3.9	5.7	7.2	6.8
General government financial balance[b]	1.6	3.2	2.8	2.1	2.2
Current account balance[b]	0.2	2.5	3.7	2.5	2.5
Short-term interest rate[c]	4.9	5.8	4.0	2.6	3.8
Long-term interest rate[d]	5.7	5.9	5.6	5.1	5.3

a) As a percentage of disposable income.
b) As a percentage of GDP.
c) 3-month prime corporate paper.
d) Over-10-year government bonds.
Source: OECD.

Despite tax cuts, budget surpluses have remained large

Notwithstanding personal income tax cuts at both the federal and provincial levels, which have underpinned disposable income and household spending, the government's finances have remained in substantial surplus. In the first half of 2001, general and federal government net lending was running at 3½ and 2 per cent of GDP, respectively, broadly unchanged from the previous half year. This partly reflects continued strong growth in the tax base – both nominal earnings and employment still expanded healthily in the first half of the year – and a declining debt-service burden. From mid-2001, the effects of the economic downturn, along with some further fiscal easing, are expected to make for a decline in general government net lending. The budget surplus is nonetheless likely to remain significant, although the projections do not take account of likely forthcoming spending initiatives (for instance on security) except for those which have already been announced (160 million Canadian dollars in support for the airline industry).

Canada: **Demand and output**

	1998	1999	2000	2001	2002	2003
	current prices billion C$	Percentage changes, volume (1997 prices)				
Private consumption	534.4	3.4	3.6	2.3	2.0	3.2
Government consumption	176.8	2.6	2.2	2.6	2.0	2.0
Gross fixed investment	181.6	7.3	6.7	0.6	1.7	6.2
Public[a]	20.0	12.3	7.6	1.7	3.5	3.4
Residential	42.5	5.3	2.7	3.6	2.6	4.1
Non-residential	119.1	7.2	8.0	-0.6	1.0	7.4
Final domestic demand	892.8	4.1	4.0	2.0	1.9	3.6
Stockbuilding[b]	5.8	-0.1	0.5	-1.0	-0.1	0.2
Total domestic demand	898.6	4.0	4.5	1.0	1.8	3.8
Exports of goods and services	377.3	9.9	7.6	-2.7	0.7	7.5
Imports of goods and services	360.3	7.3	8.1	-4.4	2.3	8.0
Net exports[b]	17.1	1.3	0.2	0.5	-0.6	0.1
Error of estimate[b]	0.1	-0.1	0.0	-0.2	0.0	0.0
GDP at market prices	915.9	5.1	4.4	1.3	1.2	3.8

a) Excluding nationalized industries and public corporations.
b) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
Source: OECD.

Canada: **External indicators**

	1999	2000	2001	2002	2003
			$ billion		
Merchandise exports	245.9	284.5	279.1	270	294
Merchandise imports	220.1	244.6	230.7	230	252
Trade balance	25.9	39.9	48.3	40	42
Invisibles, net	- 24.7	- 21.8	- 22.2	- 23	- 23
Current account balance	1.2	18.1	26.1	18	19
			Percentage changes		
Merchandise export volumes [a]	11.0	8.7	- 3.4	0.6	7.6
Merchandise import volumes [a]	8.7	9.5	- 4.4	2.3	8.2
Export performance [b]	- 0.2	- 4.7	0.8	1.5	- 0.1
Terms of trade	1.8	4.8	2.9	- 1.1	- 0.2

a) Customs basis.
b) Ratio between export volume and export market of total goods.
Source: OECD.

A recovery is expected around mid-2002…

After contracting in the third quarter of 2001, real GDP is expected to virtually stagnate until the second quarter of 2002. Disruptions to traffic flow, which significantly affected automobile and telecom equipment producers, appear to have been short -lived, but setbacks to the airline and travel industries are likely to last longer. In addition, faced with heightened uncertainty, businesses are expected to defer investment decisions and households to postpone major purchases. Thereafter, economic growth is projected to pick up as a recovery in business and consumer confidence allows the expansionary stance of monetary and fiscal policies to be more fully felt and foreign demand strengthens. From the second half of 2002, the upturn is expected to gather considerable momentum, with real GDP growth significantly exceeding the expansion of potential output (estimated at around 3 per cent a year). As a result, unemployment should fall back to about its present level, from a peak of about 8 per cent of the labour force. Excess supply in the economy is projected to bring inflation down to below the mid-point of the official target range. The external balance is expected to continue to weaken due to worsening terms of trade but to remain in comfortable surplus.

… but its timing and strength is uncertain

Although the outlook for Canada crucially depends on developments south of the border, there are reasons to believe that the current downturn will be less severe than the previous one in the early 1990s. Given lower inflation, monetary policy settings are much more accommodative than at that time, when both interest rates and the real exchange rate were considerably higher. Moreover, the large positive swing in the budget balance since the mid-1990s has created room for stimulatory fiscal policies. The principal risk is that these expansionary forces could continue to be offset by a protracted slump in confidence, particularly in response to international developments. On the other hand, once it takes hold, economic recovery may be quite vigorous, highlighting the need for policymakers to react promptly to avoid the re-emergence of the imbalances that impaired Canada's economic performance up to the mid-1990s.

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Australia

The Australian economy has recovered from the slowdown in late 2000, on the back of buoyant consumption and housing investment. Notwithstanding the global slowdown, economic growth is projected to strengthen further, helped by easy monetary conditions and sound household and business finances. With the one-off price level effect of tax reform now being absorbed, headline inflation is expected to remain in the Reserve Bank's 2 to 3 per cent target range.

Fiscal policy should remain geared to preserving the budget consolidation already achieved, which would help to maintain financial market confidence and keep long-term interest rates low. The room for additional monetary relaxation seems limited. However, further progress on the structural reform agenda would enhance Australia's proven resilience to cope with adverse external conditions.

Solid economic growth in the first half of 2001…

Following the downturn in late 2000, the economy resumed solid growth in the first half of 2001. The recovery was led by private and public consumption, assisted by a positive foreign balance contribution. The downward adjustment of dwelling investment following introduction of the Goods and Services Tax (GST) came to an end in the first quarter of 2001 and it picked up sharply thereafter, helped by low lending rates and a generous subsidy for first-home buyers.

… was combined with rising unemployment, while underlying inflation remained in check

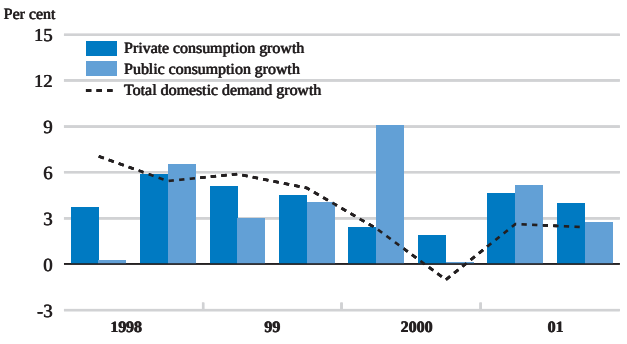
With employment lagging the recovery of output, unemployment rose to just under 7 per cent in the September quarter of 2001, up from a low of 6 per cent about a year ago. Headline inflation remained at 6 per cent throughout the first half of 2001, but fell to 2.5 per cent in the September quarter, when the GST effect dropped out of the statistics. Underlying inflation (net of tax effects) is estimated to have remained below 3 per cent, helped by moderate wage increases.

Monetary conditions are supportive of activity

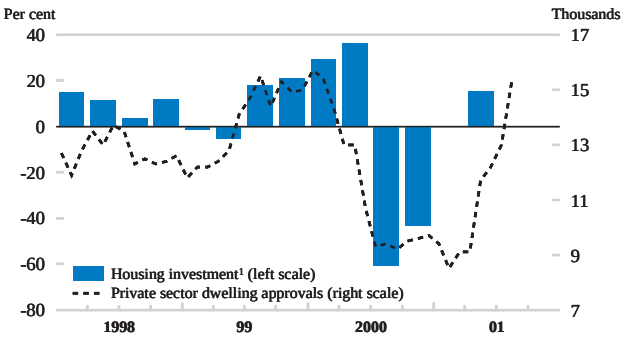
Concerned about the deteriorating international environment, and notwithstanding the pick-up in growth, the Reserve Bank cut the cash rate in two further steps in September and October 2001 by 50 basis points to 4.5 per cent. Scope for further rate cuts appears limited by signs of a stepped-up pass-through of exchange rate depreciation into consumer prices and the recent surge in residential investment, although subdued world activity will have a disinflationary impact on tradables prices. Accordingly, while the projections assume a further cut in the cash rate in the near term, this would

Australia

Consumption has boosted domestic demand



Dwelling investment has rebounded



1. Percentage changes from previous period, at annual rate.
Source: OECD.

Australia: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion A$	Percentage changes, volume (1998/99 prices)				
Private consumption	344.9	5.1	2.8	3.8	3.6	3.6
Government consumption	104.0	4.1	5.4	3.2	3.0	3.0
Gross fixed capital formation	134.3	6.5	0.3	-3.6	3.5	5.0
Final domestic demand	583.1	5.2	2.7	2.0	3.5	3.8
Stockbuilding [a]	3.0	0.3	-0.5	-0.3	0.3	0.2
Total domestic demand	586.1	5.5	2.1	1.7	3.8	4.0
Exports of goods and services	114.7	4.6	10.5	1.8	3.0	7.0
Imports of goods and services	125.0	9.2	7.1	-2.9	5.4	7.0
Net exports [a]	- 10.4	-1.0	0.5	1.0	-0.5	-0.1
Statistical discrepancy [a]	0.0	-0.1	0.7	-0.6	-0.1	0.0
GDP at market prices	575.8	4.5	3.4	2.0	3.2	4.0
GDP deflator	_	0.9	3.9	3.6	2.3	2.5
Memorandum items						
Private consumption deflator	_	0.8	3.2	3.8	2.4	2.8
Unemployment rate	_	6.9	6.3	6.9	6.7	6.4
Household saving ratio [b]	_	2.0	3.8	3.0	3.6	3.7
General government financial balance [c]	_	1.1	0.3	0.1	0.2	0.5
Current account balance [c]	_	-5.9	-4.0	-3.0	-3.6	-3.7

Note: National accounts are based on chain-linked data. This introduces a discrepancy in the identity between real demand components and the GDP. For further details see *OECD Economic Outlook* Sources and Methods, *(http://www.oecd.org/eco/sources-and-methods).*

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of disposable income.
c) As a percentage of GDP.
Source: OECD.

be followed by a period of unchanged monetary policy during 2002 and some tightening thereafter. This is assessed to be consistent with CPI inflation staying inside the Reserve Bank's 2 to 3 per cent inflation target band in 2002-03.

Fiscal policy is focused on preserving budget surpluses

Following its relaxation in 2000-01, fiscal policy is assumed to pay increased attention to preserving budget surpluses so as to continue reducing debt. Nevertheless, some extra spending initiatives were decided in 2001, among them a doubling of the first-home buyers grant, which has supported housing investment in 2001.

The economy is projected to return to a higher growth path, in spite of the fragile external environment

With the economy's adjustment to GST now largely completed, and generally favourable conditions for domestic demand, economic growth is expected to firm. Household consumption is likely to remain supportive of activity, also reflecting an improved consumer sentiment, which so far seems not to have been hard hit by the 11 September terrorist attacks. Dwelling construction activity may lose some of its momentum in 2002, but this should help avoid inflation excesses in this sector. Capital expenditure surveys suggest an imminent recovery of business investment, in line with sound aggregate profitability, improved financing conditions and a competitive exchange rate. Exports may suffer from weaker market growth this year and next, widening the current external deficit from a low 2¼ per cent of GDP in the first half of 2001 to 3¾ per cent in 2003. Altogether, GDP growth may increase from 2 per cent in 2001 to 4 per cent in 2003. A steeper than expected global slowdown is the main risk to the outlook, although enhanced resilience from past structural reforms and the low level of the Australian dollar should help the economy to cope with external weakness.

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Austria

Economic activity continued to weaken in 2001, reflecting a slowdown in both export and domestic demand. These developments are being reinforced by the negative consequences on confidence of the 11 September terrorist attacks in the United States. Following this year's slowing of GDP growth to 1¼ per cent, activity is projected to pick-up during the course of 2002, and to grow slightly above potential in 2003.

The budget has been balanced one year ahead of schedule but this achievement may prove difficult to maintain in the face of weaker growth. While the automatic stabilisers should be allowed to work, the planned fiscal consolidation measures need to be fully implemented so as to preserve the credibility of the government's programme. One-off revenue measures need to be replaced by lasting savings as intended.

The pace of economic expansion has decelerated sharply…

Economic growth decelerated to an annual rate of ¾ per cent in the first half of 2001 as exports slowed, reflecting the decline in world trade growth, and private consumption decelerated as real income growth was reduced by higher inflation and taxes. With business prospects deteriorating, investment in machinery and equipment slowed as well. Construction investment remained weak with residential construction continuing to fall.

… and the labour market has deteriorated

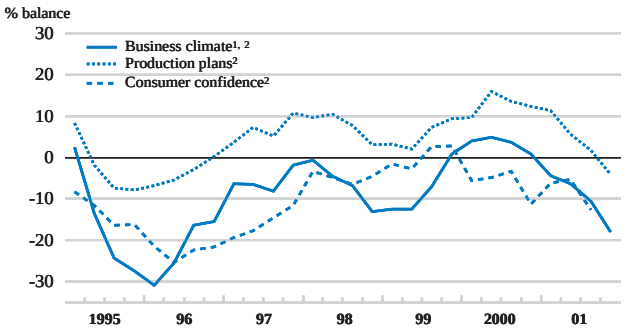
Reflecting the slowdown of economic activity, the registered unemployment rate has increased by nearly ½ percentage point since spring to 6¼ per cent. Some labour market measures have been taken to reduce non-wage labour costs and improve incentives for labour market participation. Increases in collectively negotiated wages levelled off at around 2¾ per cent after mid-2001. Consumer price inflation peaked at 3¼ per cent in May 2001 before coming down to 2½ per cent in response to lower oil prices and as the impact of last year's indirect tax increases disappeared from a year-on-year comparison.

The fiscal stance is restrictive…

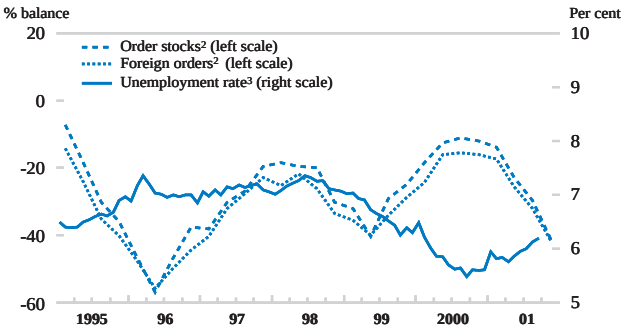
The federal and local governments aimed in their 2000 Stability programme to reduce the general government deficit to ¾ per cent of GDP in 2001 and to balance the budget by 2002. For this purpose a consolidation programme with both expenditure restraint and revenue-raising measures has been adopted and partly implemented. Higher-than-expected business tax revenues and lower interest payments imply that a balanced budget is likely to be reached this year, but

Austria

Confidence is declining



Activity is slowing



1. Anticipated business conditions.
2. Seasonally adjusted. Balance of positive-negative replies.
3. Seasonally adjusted. Registered unemployed.

Sources: WIFO Institut für Wirtschaftsforschung and OECD.

Austria: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	108.5	2.7	2.5	1.5	1.8	2.4
Government consumption	37.2	2.2	0.9	-0.6	0.6	0.5
Gross fixed capital formation	44.8	1.5	5.1	-0.5	0.3	3.6
Final domestic demand	190.5	2.3	2.8	0.6	1.2	2.3
Stockbuilding [a]	1.3	0.2	-0.3	0.1	0.0	0.0
Total domestic demand	191.8	2.5	2.4	0.7	1.2	2.3
Exports of goods and services	82.7	8.7	12.2	5.3	3.8	7.0
Imports of goods and services	83.8	8.8	11.1	4.6	3.3	6.3
Net exports [a]	- 1.1	0.0	0.5	0.4	0.3	0.4
GDP at market prices	189.9	2.8	3.0	1.2	1.5	2.7
GDP deflator	_	0.7	1.2	2.0	1.8	1.9
Memorandum items						
Private consumption deflator	_	0.7	1.5	2.6	1.8	1.9
Unemployment rate [b]	_	5.3	4.7	4.8	5.3	5.1
General government financial balance [c]	_	-2.2	-1.1	0.0	-0.4	0.1
Current account balance [c]	_	-3.2	-2.8	-2.5	-1.9	-1.5

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) See data annex for details.
c) As a percentage of GDP.
Source: OECD.

the sharp deceleration of economic activity has made it considerably more difficult to maintain balance in 2002. Thus, while it is assumed in the projections that the automatic stabilisers will be allowed to work, it is also assumed that the government's planned fiscal consolidation measures will be fully implemented – including the replacement of one-off revenue measures with lasting savings – so as to preserve the credibility of the government's programme and secure long-term fiscal sustainability.

… and confidence is expected to recover only slowly…

Despite accommodating monetary conditions, economic activity is projected to remain weak well into 2002, as the terrorist attacks in the United States are likely to delay the economic recovery. Thereafter, as world trade gathers momentum, the contribution of net exports to growth should increase. Private consumption growth is expected to pick up as consumer confidence stabilises, driven by rising real disposable incomes, partly due to higher family benefits and lower inflation. Investment in machinery and equipment should also recover, following the improvement in external demand. On the other hand, construction activity is likely to remain in a slump with continuing weak housing demand, and government consumption will be restricted by the ongoing fiscal consolidation. Overall, GDP growth is projected to slow to 1¼ per cent in 2001, before recovering from mid-2002 onwards and reaching nearly 2¾ per cent in 2003. Accordingly, unemployment will continue to rise in 2002, before declining thereafter.

… with risks being particularly large

Large uncertainties surround this projection. On the downside, there is a risk not only from the external side but also because a further deterioration of domestic confidence could markedly restrain private consumption growth or further postpone investment projects. On the upside, Austria would of course benefit from a faster-than-projected recovery in Germany, its largest trading partner, although business and consumer sentiment has deteriorated there leaving considerable uncertainties as to the timing of any pick-up.

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Belgium

Driven by weakening exports, real GDP growth is expected to slow sharply to 1 per cent in 2001, and to pick up only slowly over the next two years, to around 2½ per cent in 2003. Owing to softer labour market conditions, the recent pick-up in wages and labour costs is expected to abate. Reflecting corrective measures, the overall budget position may remain close to balance, despite the weakness of the economy.

Given recent losses in competitiveness, it is essential to achieve a lasting deceleration in wages and labour costs. A determined effort should be made to step up structural reform with a view to further increasing labour mobility and the employment rate by, among other measures, strengthening incentives to work.

Economic growth has decelerated sharply and inflation has fallen back

The Belgian economy was already decelerating sharply, reflecting a major slow-down in exports, as well as in private consumption and business fixed investment, when the 11 September terrorist attacks in the United States took place. As a result, real GDP growth for 2001 as a whole is expected to be only 1 per cent, compared with 4 per cent in 2000. Labour market outcomes have been rather positive up to now, with the standardised unemployment rate declining to below 7 per cent in September, though unemployment seems set to rise henceforth. Despite the elimination of the positive output gap, the growth in the wage rate and compensation per employee is likely to remain relatively rapid through 2001. By contrast, harmonised consumer price index (HCPI) inflation has fallen back, essentially reflecting weaker oil prices, to around 2 per cent.

The erosion of competitiveness may weigh on the recovery

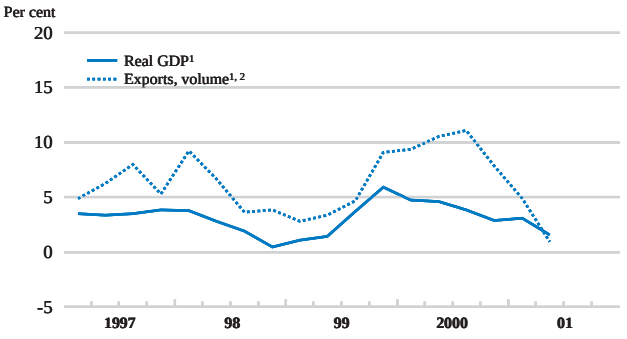
The rapid increase in unit labour costs in 2001, combined with a modest rebound of the euro, has reduced the competitiveness of Belgium not only within the euro area but also *vis-à-vis* its trading partners as a whole. While the increase in unit labour costs is projected to abate as a lagged response to softer labour market conditions, the loss in competitiveness may weigh on the economy both in 2002 and 2003.

The government has taken measures to keep the budget in balance

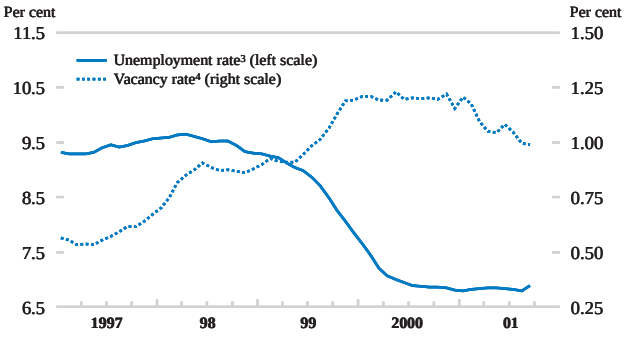
Given the weakness of the economy and uncertain prospects, the 2002 budget has been based on the assumption of real GDP growth of 1.3 per cent and corrective measures have been taken both on the expenditure and the revenue side to keep the budget in balance and assure the pursuit of the trend decline in the debt-to-GDP

Belgium

Exports and growth have slowed



The labour market remains tight



1. Year-on-year percentage changes.
2. Goods and services.
3. Standardised unemployment rate.
4. Unfilled vacancies as a percentage of the labour force.

Source: OECD.

Belgium: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	122.7	2.1	3.8	1.8	1.5	2.6
Government consumption	47.7	3.2	2.5	1.5	1.3	1.4
Gross fixed capital formation	46.5	3.3	2.6	0.4	1.7	3.3
Final domestic demand	216.9	2.6	3.3	1.5	1.5	2.5
Stockbuilding [a]	- 0.4	-0.4	0.5	-0.2	0.0	0.0
Total domestic demand	216.5	2.2	3.8	1.2	1.5	2.5
Exports of goods and services	169.7	5.0	9.7	2.1	3.0	7.0
Imports of goods and services	160.3	4.1	9.7	2.4	3.2	7.2
Net exports [a]	9.4	0.9	0.5	-0.1	0.0	0.2
GDP at market prices	225.9	3.0	4.0	1.1	1.4	2.6
GDP deflator	_	1.2	1.4	2.5	2.1	1.9
Memorandum items						
Private consumption deflator	_	1.0	2.2	2.4	1.2	1.5
Unemployment rate	_	8.8	7.0	6.9	7.2	7.3
Household saving ratio [b]	_	14.4	12.8	12.8	14.0	13.2
General government financial balance [c]	_	-0.6	0.1	0.0	0.0	0.2
Current account balance [c]	_	5.2	4.7	3.3	4.1	4.1

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of disposable income.
c) As a percentage of GDP.
Source: OECD.

ratio. The scheduled personal income tax reform, which is estimated to represent tax cuts of around 1¼ per cent of GDP spread out over several years, has been maintained. It is expected to underpin consumer confidence and improve the working of the economy, thereby cushioning the impact of the fiscal tightening.

The outlook is rather sombre and very uncertain

The international environment will continue to condition the evolution of the Belgian economy. Under present conditions, a central scenario would seem to entail a progressive stabilisation of the economy, followed by a hesitant recovery in the second half of 2002, as the erosion in competitiveness will prevent Belgian firms from fully benefiting from the pick-up in international trade. Real GDP growth is thus projected to edge up to 1½ per cent in 2002 and to move above potential growth only in 2003, with a growth rate of around 2½ per cent. The output gap may widen to around 1 per cent in 2002-03, thereby helping to reduce tensions in the labour market. The rise in unemployment, combined with the increase in household purchasing power entailed by the income tax reform and further cuts in employers' social security contributions, is expected to moderate the increase in wages and unit labour costs. Inflation is projected to decline markedly in 2002, partly as a result of the abolition of the TV licence in Flanders,[1] and to remain subdued in 2003. While the risks are primarily external, on the domestic side a lesser degree of wage restraint than incorporated in the projections would further erode the competitive position of Belgian firms and result in a stronger increase in unemployment.

1. It has not yet been possible to consistently integrate the impact of this measure on the projections since it was taken in the framework of broader institutional changes with multiple effects on national accounts.

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Czech Republic

GDP growth reached 4 per cent in the first half of 2001, reflecting robust investment spending and private consumption. Growth of imports outpaced exports, resulting in a widening current account deficit. Inflation jumped temporarily following increases in both food and regulated prices, but continued to be dampened by a strong currency. Given the deteriorating external environment, the pace of expansion is projected to decelerate until mid-2002, when more dynamic growth should resume simultaneously with a recovery in world trade.

The policy mix has continued to be characterised by fiscal loosening and tightening monetary conditions induced by the currency appreciation. This policy mix threatens to become ineffective in assuring stability and fiscal policy should be considerably tightened. Furthermore, privatisation revenues should primarily be used to reduce government debt.

Domestic demand accelerated in the first half of 2001 while inflation picked up

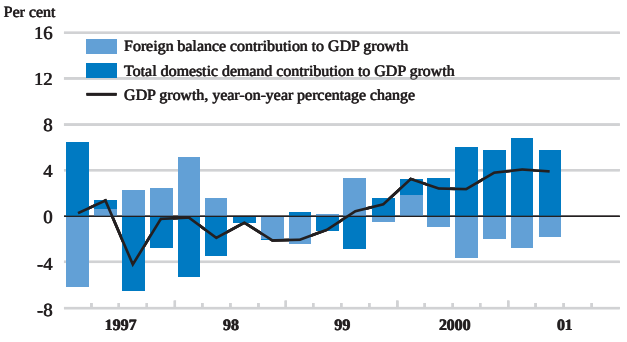
GDP increased by 4 per cent in the first half of 2001, driven by growing investment and private consumption. Given the high import content of both aggregates, the external balance deteriorated further with the current account deficit reaching nearly 5 per cent of GDP. Massive inflows of foreign direct investment (FDI) continued, resulting in a further appreciation of the currency. Despite this, both headline and core inflation increased in June and July, reflecting an upsurge in food and regulated prices. Dependent employment declined because of ongoing labour shedding in restructuring enterprises while unemployment fell within a shrinking labour market; the supply of labour continued to be reduced by early-retirement incentives.

Fiscal policy is loose while monetary conditions have tightened

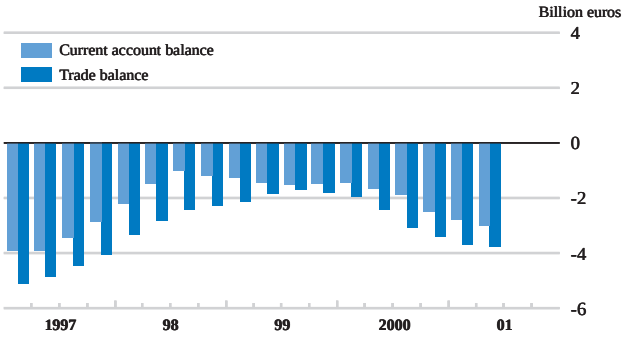
The fiscal stance has remained on a strongly expansionary path, with the general government deficit rising towards 6 per cent of GDP, reflecting both recapitalisation of the banking sector and growth of mandatory spending. As a result, monetary policy has had to bear the burden of macroeconomic stabilisation; the central bank increased its policy rates by 25 basis points in July while buoyant FDI inflows kept propping up the koruna, thereby contributing to the tightening of monetary conditions.

Czech Republic

Domestic demand strengthened



Trade and current account deficits widened[1]



1. Moving aggregate over four quarters balance.
Sources: Czech National Bank; Czech Statistical Office.

Czech Republic: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion CZK	Percentage changes, volume (1995 prices)				
Private consumption	962.4	1.9	1.9	3.5	3.1	3.5
Government consumption	346.5	-0.1	-1.3	-1.2	-0.5	0.0
Gross fixed capital formation	532.2	-0.6	4.2	7.3	5.5	7.5
Final domestic demand	1 841.2	0.8	2.1	3.9	3.3	4.3
Stockbuilding [a]	22.0	-1.4	2.0	0.9	0.1	0.1
Total domestic demand	1 863.2	-0.5	3.9	4.6	3.3	4.2
Exports of goods and services	1 076.0	6.3	18.7	9.3	7.0	10.0
Imports of goods and services	1 102.2	5.4	18.7	10.7	7.2	9.9
Net exports [a]	- 26.1	0.2	-1.3	-1.9	-0.9	-0.9
GDP at market prices	1 837.1	-0.4	2.9	3.0	2.7	3.7
GDP deflator	_	3.1	0.9	4.5	3.8	3.0
Memorandum items						
Consumer price index	_	2.1	3.9	4.8	4.5	4.0
Private consumption deflator	_	3.8	2.8	4.3	4.0	3.7
Unemployment rate	_	8.8	8.9	8.1	8.0	8.0
Household saving ratio [b]	_	13.0	14.8	13.7	13.8	13.7
General government financial balance [c,d]	_		0.0	0.0	0.0	0.0
Current account balance [c]	_	-2.9	-4.5	-5.1	-4.8	-5.4

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of disposable income.
c) As a percentage of GDP.
d) OECD estimate which adjusts official data so as to increase international and intertemporal comparability.

Economic growth will be subdued until late next year and will pick up in 2003

Growth is expected to slow in response to the deteriorating international environment and new market uncertainties. Investment spending and private consumption are expected to weaken at least to mid-2002. Thereafter and through 2003, recovery in western Europe and improved production potential, resulting from ongoing industrial restructuring and cumulative FDI inflows, should enhance growth performance.

A significant risk is the possibility of a slowdown in capital inflows

The government intends to complete an ambitious privatisation programme before the summer of 2002, including the sale of controlling stakes in the energy and telecommunication sectors to strategic investors. A large part of the associated revenues is to finance the sharply rising losses of the Consolidation Agency which reflect costs pertaining to the cleanup of the banking sector and add significantly to the general government deficit in 2002. Following the deterioration of global conditions, a significant risk to the projection is the possibility of a subsequent rapid slowdown in FDI inflows to a level which would be insufficient to finance the current account deficit; this would entail a currency depreciation and add to inflationary pressures. Growing privatisation receipts may, on the other hand, encourage further fiscal spending. The materialisation of either risk would force the central bank to increase interest rates further, creating an increasingly fragile situation. In order to improve the economy's long-term performance, the authorities should rebalance the policy mix and, rather than increasing spending, use the privatisation revenues for reducing the public debt.

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Denmark

The slowdown in the Danish economy has eased the product and labour market pressures that built up during 2000. Demand is projected to remain subdued until the second half of 2002, when private consumption and investment are expected to pick up again as the international outlook becomes more positive.

The overall fiscal stance needs to remain broadly neutral, given that the economy has been operating close to potential for some time, although automatic stabilisers can be allowed to operate. Monetary conditions are effectively determined at the euro-area level and are likely to be helpful to recovery.

Activity has slowed significantly…

The Danish economy experienced a sharp turnaround from 3 per cent growth (seasonally adjusted annualised rate) in the last quarter of 2000 to a 2 per cent decline of GDP in the first quarter of 2001, followed by a 2 per cent rebound in the second quarter. The international slowdown is reflected in Danish export volumes, which barely rose in the first half of this year, although new export orders rose over the summer. Business confidence has been trending downwards since the turn of the year and investment fell by close to 7 per cent in the first half, although the impact on overall activity has been tempered by falling imports. Household real disposable incomes and consumption grew at a modest pace over the same period, underpinned by gains in both real wages and employment, and consumer confidence has held up better than in the euro area.

… and labour market pressures have eased

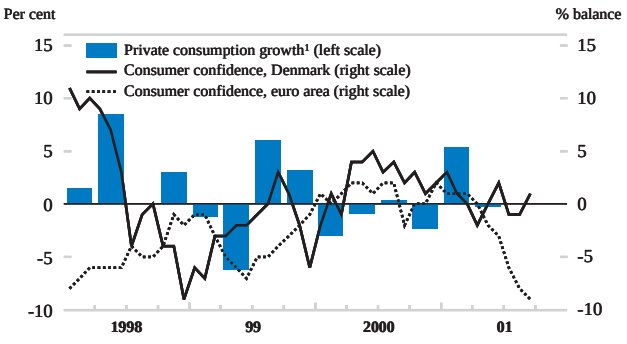
Robust employment growth led to considerable tightening of the labour market and recruitment difficulties towards the end of last year, suggesting that the economy was overheating. As the international downturn was expected to be short-lived, anecdotal evidence suggests that firms, especially those which had experienced earlier problems finding suitable staff, have been hoarding labour. This has provided a cushion to household incomes and shelter from the unemployment effects of weaker demand. But the 11 September terrorist attacks in the United States have clearly changed the international situation, and thereby led to greater uncertainty about the timing and vigour of recovery in Denmark.

Fiscal policy remains neutral, but automatic stabilisers will operate

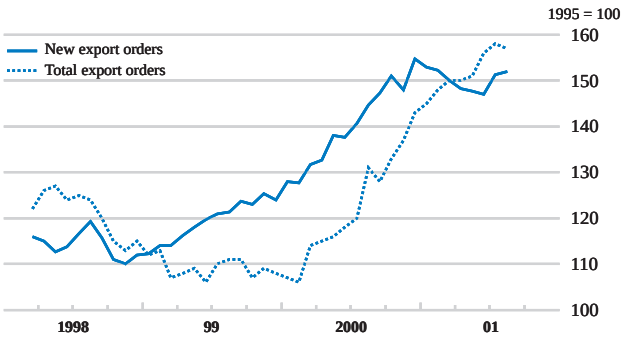
Policy settings have been broadly neutral. As next year's budget was not finalised before the general election was called, these projections are based on the Budget bill presented to Parliament in August. The projected growth in public consumption mainly

Denmark

Confidence remained relatively stable



Export orders were picking up



1. Change over previous quarter at annual rates.
Sources: Statistics Denmark; OECD.

Denmark: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion Dkk	Percentage changes, volume (1995 prices)				
Private consumption	591.5	0.5	-0.1	0.9	0.9	1.2
Government consumption	300.5	1.4	1.0	1.7	1.1	1.3
Gross fixed capital formation	241.0	1.5	9.9	-3.4	1.4	3.6
Final domestic demand	1 132.9	1.0	2.4	0.1	1.1	1.8
Stockbuilding [a]	13.2	-1.6	0.2	0.1	0.0	0.0
Total domestic demand	1 146.1	-0.6	2.6	0.2	1.1	1.8
Exports of goods and services	413.4	9.7	11.6	4.2	3.3	6.7
Imports of goods and services	390.5	2.2	10.8	1.8	2.9	6.1
Net exports [a]	22.9	2.8	0.7	1.1	0.3	0.6
GDP at market prices	1 169.0	2.1	3.2	1.3	1.3	2.3
GDP deflator	_	3.0	3.7	3.2	1.7	1.8
Memorandum items						
Private consumption deflator	_	2.6	3.1	2.1	1.7	1.8
Unemployment rate	_	5.2	4.7	4.7	5.0	5.0
Household saving ratio [b]	_	1.6	2.9	3.4	3.8	4.1
General government financial balance [c]	_	3.1	2.8	2.0	1.4	1.7
Current account balance [c]	_	1.7	2.3	3.2	3.1	3.3

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of disposable income.
c) As a percentage of GDP.
Source: OECD.

involves an expansion of services in education and health, but as these sectors are already facing shortages of skilled staff, these plans may prove difficult to realise. Overall, the government is not expected to provide any significant fiscal stimulus, although the automatic stabilisers will operate, and a cyclically-adjusted general government surplus of more than 2 per cent of GDP is projected to persist.

Monetary conditions may ease in the near term

The effective exchange rate has appreciated over the past year, but this has been offset by reductions in official interest rates, which are now a 1½ percentage points lower than they were a year ago. Overall, the impact on activity from these shifts in monetary conditions is helpful. However, as monetary policy remains committed to maintaining a fixed relationship between the Danish krone and the euro, Danish interest rates are expected to be lowered further, before starting to rise again towards the end of next year, in line with decisions taken by the European Central Bank.

Activity will become more vigorous from mid year, reaching potential growth rates by 2003

The Danish economy is projected to grow by around 1¼ per cent in both 2001 and 2002, with activity expected to pick up significantly in the second half of next year, especially once consumer spending starts to recover from the current uncertainty about the economic outlook. Business investment growth is also expected to remain weak in 2002, but should strengthen once the international situation improves and exports rebound. In 2003, the pace of expansion is projected to accelerate to 2¼ per cent, in line with potential output growth. Private sector employment is expected to fall slightly next year, but government employment is likely to continue expanding. With unemployment projected to edge up next year, and an estimated negative output gap emerging, overall wage pressures should ease, while productivity growth is expected to recover from its current cyclical weakness by 2003. The main risk to these central projections is external; if the international recovery takes longer to materialise, this will hold back growth in Denmark.

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Finland

Weak exports have resulted in a sharp deceleration in output growth from 5¾ per cent in 2000 to an estimated ½ per cent in 2001. A recovery is not expected to take hold before the second half of 2002. As a result, unemployment is expected to rise and the government budget surplus to diminish. With oil prices projected to fall and a sizeable output gap, inflation should decline further.

While allowing the automatic stabilisers to operate, the Finnish authorities should avoid relaxing fiscal policy further as this could jeopardise essential long-term budgetary objectives. Concerning structural reform, measures that would delay retirement and provide better incentives to the unemployed to find regular work should be high on the agenda.

Plummeting exports cause a sharp deceleration in activity

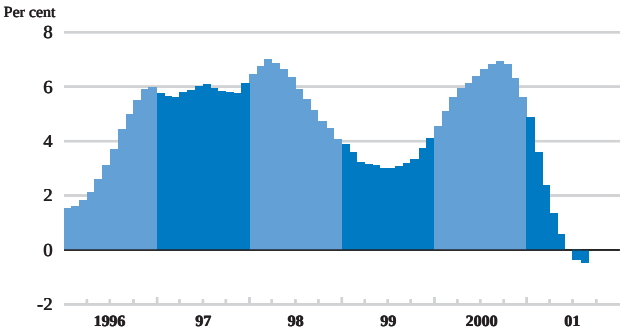
The international economic slowdown, combined with the world-wide slump in the telecommunications equipment industry, caused exports to contract in the first half of 2001. As a result, with domestic demand also weakening, output declined, pushing the economy into recession. A negative output gap has emerged and labour market tensions have evaporated. Unemployment continued to edge down up to mid year, the slowdown being reflected mainly in weak productivity, but then increased in the third quarter. With oil prices declining, consumer price inflation – measured by the harmonised consumer price index – has decelerated from the peak of 3.4 per cent in October 2000 to 2.6 per cent in September 2001, and is no longer above the euro area average.

The government surplus is projected to drop sharply from the record high in 2000

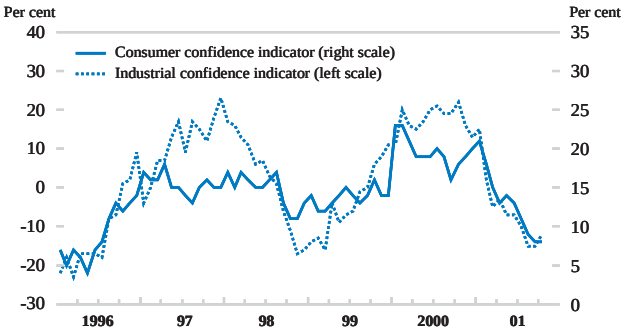
Owing to the slowdown in activity, sizeable income tax cuts and a sharp drop in tax revenues on realised capital gains and stock options, the general government surplus is set to decline from 6.9 per cent of GDP in 2000 to an estimated 3¾ per cent in 2001. The same factors, plus a rise in outlays, will lead to a further decline in 2002 to around 2 per cent. The central government budget could even move into a small deficit and will certainly be below the government's target of achieving a surplus of 1½ to 2 per cent of GDP over the medium term, which is considered necessary to cope with the long-term consequences of ageing. The fiscal stance is expected to be expansionary in 2001 and 2002, and should be broadly neutral in 2003. Helped by the tax cuts, the social partners reached a central wage agreement in late-2000 with

Finland

Steep drop in output growth[1]



Confidence weakens[2]



1. Monthly indicator of total output; trend series, year-on-year percentage change.
2. Balance, seasonally adjusted data.

Sources: Statistics Finland and Eurostat.

Finland: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	58.2	4.0	3.0	2.0	2.1	2.5
Government consumption	25.1	1.9	0.7	1.6	1.3	1.3
Gross fixed capital formation	21.7	3.0	5.5	1.3	-1.3	2.6
Final domestic demand	105.0	3.3	3.0	1.8	1.2	2.2
Stockbuilding [a]	1.1	-1.2	0.9	-0.1	0.1	0.0
Total domestic demand	106.2	2.0	4.0	1.7	1.3	2.2
Exports of goods and services	45.0	6.8	18.1	-3.7	1.0	6.4
Imports of goods and services	34.8	4.0	15.7	-2.2	1.3	4.2
Net exports [a]	10.2	1.6	2.7	-1.0	0.0	1.5
GDP at market prices	116.0	4.0	5.7	0.4	1.2	3.4
GDP deflator	_	-0.1	3.4	2.1	1.6	2.0
Memorandum items						
Private consumption deflator	_	1.1	3.5	2.6	1.7	1.9
Unemployment rate	_	10.2	9.8	9.2	9.6	9.6
General government financial balance [b]	_	1.9	6.9	3.7	1.9	2.1
Current account balance [b]	_	6.0	7.4	6.6	5.9	6.5

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of GDP.
Source: OECD.

moderate gains in contract wages of 3.1 and 2.3 per cent in 2001 and 2002, respectively. Only doctors in the public health sector benefited from a substantially sharper wage rise of above 10 per cent over the two-year period.

Lacklustre activity is projected for much of 2002, with an acceleration in 2003

The strong financial position of households, solid company balance sheets and the healthy financial sector should make it somewhat easier to weather the current harsh international climate. However, with activity projected to remain weak until mid-2002 in the OECD area, output is projected to increase by a mere 1¼ per cent in 2002, causing unemployment to rise on a yearly basis for the first time since 1994. This will weaken consumer confidence further, so that private consumption growth will be limited, while investment activity will soften due to weak business confidence and demand. With oil prices declining and the negative output gap widening, consumer price inflation should decelerate further. An export-led recovery is projected to take place as from the second half of 2002, with output growth accelerating to 3½ per cent in 2003. Hence, unemployment could start to fall again towards the end of the projection period. Owing to weaker exports, the current account surplus is projected to fall somewhat from a peak of 7½ per cent of GDP in 2000 to 6 per cent in 2002, before rising again in 2003.

The uncertainty related to the global ICT market casts a shadow over the projected recovery

The main uncertainties in the outlook concern the timing and size of the international recovery and the sales prospects for the telecommunication equipment industry. A delayed international rebound would imply lower output growth in Finland in 2002 and 2003. Concerning information and communication technology (ICT) exports, downside risks prevail in the short term, but a positive international reaction of consumers to third-generation mobile telephony could provide stronger demand in the medium term.

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Greece

GDP growth slowed in 2001 as a result of weakening exports, but activity continues to outpace the euro-area average due to domestic factors. Output growth is set to remain broadly unchanged in 2002 at around 4 per cent and gain momentum in the following year. With oil prices declining and moderate wage increases, supply-side pressures on inflation are expected to recede over the projection period. However, domestic demand pressures are projected to gather strength, and higher consumer price increases in the short run cannot be ruled out.

Entry into the euro area has provided further stimulus to press ahead with fiscal consolidation and structural reforms. Fiscal policy may need to be more ambitious in reining in primary government expenditure to sustain low inflation. Progress in addressing labour and product market rigidities, along with bold reforms of the pension system and public sector management, would facilitate non-inflationary growth and enhance incomes over the medium term.

Growth has eased somewhat…

Economic growth is set to ease somewhat to around 4 per cent in 2001. The sharp reduction in interest rates following the entry to the euro area is providing a continuing stimulus to domestic demand, which will be further boosted by disbursements from the new Community Support Framework (CSF III) for 2000-06, and the preparation for the 2004 Olympic Games. However, the rise in inflation, combined with only moderate wage increases, has been dampening real disposable income growth. At the same time, business fixed investment has lost some of its earlier remarkable buoyancy, reflecting the significant stockmarket losses in 2000 and 2001, as well as a weaker conjectural situation. Residential investment has, nevertheless, staged a strong recovery on the back of lower lending rates for housing loans.

… and inflation is entering a phase of deceleration

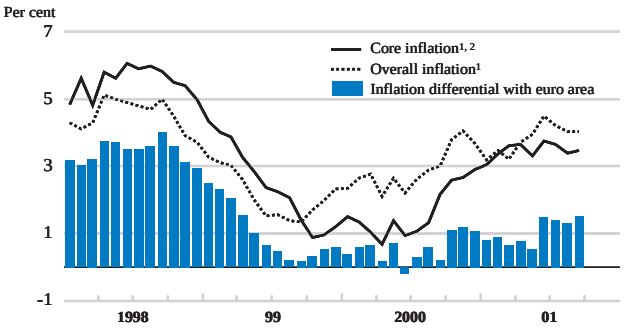
Harmonised consumer price inflation (HCPI) peaked at 4.5 per cent in June 2001. Although lower energy prices subsequently helped it fall back, it remains well above the euro area average. Core inflation also crept up until mid-year, largely because of increases in the cost of transport services. Labour cost pressures are subdued for the moment, as the two-year collective agreement, concluded in May 2000, provides for an explicit catch-up clause only in 2002.

Monetary conditions have remained easy…

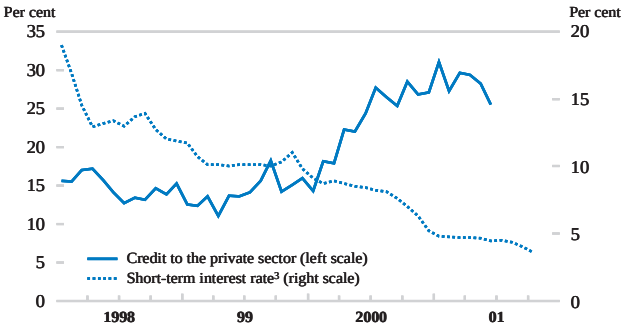
The Bank of Greece reduced its intervention rate by 600 basis points during 2000, to the European Central Bank (ECB) level of 4.75 per cent. The monetary

Greece

Core inflation has increased



Monetary conditions have remained easy



1. Harmonised index of consumer price. Year-on-year percentage change.
2. Excluding energy, food, alcohol and tobacco.
3. Three-month interest rate. From January 2001, 3-month Euribor.

Sources: OECD ; Bank of Greece.

Greece: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	75.9	2.9	3.2	3.0	3.0	3.2
Government consumption	16.2	-0.1	2.3	1.5	1.1	0.7
Gross fixed capital formation [a]	22.3	6.2	7.8	8.5	8.7	9.1
Final domestic demand	114.4	3.1	4.0	3.9	4.1	4.3
Stockbuilding [b,c]	0.2	-0.6	0.4	0.0	0.0	0.0
Total domestic demand	114.6	2.6	4.4	3.9	4.1	4.3
Exports of goods and services	21.0	8.1	18.9	5.7	4.3	8.2
Imports of goods and services	29.8	3.6	15.0	5.2	4.5	7.1
Net exports [b]	- 8.8	0.6	-0.4	-0.3	-0.4	-0.3
GDP at market prices	105.8	3.4	4.3	3.9	4.0	4.3
GDP deflator	_	3.0	3.4	3.8	3.4	3.1
Memorandum items						
Private consumption deflator	_	2.1	3.1	3.3	2.6	2.7
Unemployment rate	_	12.0	11.4	11.2	10.9	10.4
General government financial balance [d]	_	-1.8	-1.1	0.2	0.6	1.3
Current account balance [d,e]	_	-4.1	-7.1	-5.2	-5.1	-5.0

a) Excluding ships operating overseas.
b) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
c) Including statistical discrepancy.
d) As a percentage of GDP.
e) On settlement data basis.
Source: OECD.

policy stance continued to ease after Greece joined the single currency area on 1 January 2001, as the ECB has cut its key intervention rate by 150 basis points since May 2001. Easier monetary conditions helped fuel a near 30 per cent credit expansion to the private sector by mid-2001.

... while fiscal policy has remained neutral

With the proceeds of sales of mobile telephone licences (about 0.4 per cent of GDP) having an immediate impact on the budget balance, the general government is projected to move to a small surplus of 0.2 per cent of GDP in 2001 from a deficit of 1.1 per cent in the previous year. Unexpectedly strong non-tax revenue (comprising largely dividends from state-owned companies) has offset somewhat weaker than projected tax revenues. The 2002 draft Budget includes a special social welfare package spread over the period 2002-04. Nevertheless, the budget balance is projected by the OECD to move to a surplus of 1.3 per cent in 2003, up from 0.6 per cent in 2002, reflecting lower interest rate payments, improved tax collection procedures and continuing above-potential growth.

Growth is expected to strengthen late in 2002 and 2003, with a risk of inflationary pressures

Output growth is expected to continue at about 4 per cent in 2002, but to pick up to around 4¼ per cent in 2003. Investment related to the 2004 Olympic Games, along with the favourable financial conditions stemming from euro-area membership and the sizeable inflow of European structural funds, are expected to boost business investment and spur private consumption. Imports are projected to pick up in 2003 but the expected recovery in world demand should also boost exports, keeping the real foreign balance contribution unchanged. Given the projected strength of the economy, and the possibility of faster wage growth in 2002, a major uncertainty regards the extent to which inflation will actually recede. Another, but opposite uncertainty arises from the possibility of a more prolonged downturn in the world economy and its subsequent effects on foreign demand.

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Hungary

Though activity has decelerated due to a sharp slowdown in exports and corporate investment, strong household consumption and public and private construction activities will allow the Hungarian economy to grow at a relatively healthy pace before the projected international recovery further lifts GDP growth to 4 per cent in 2003. Monetary policy tightened following the widening of the fluctuation band of the forint in the spring, and headline and core inflation showed signs of deceleration. The external position improved, reflecting a lower trade deficit and a services surplus due to strong tourism revenues.

The expansionary stance of the 2001 budget threatens to be reinforced by recent initiatives, which imply additional multi-year spending pressure. This would run the risk of fuelling inflation and should be avoided, since the central bank would be forced to tighten monetary conditions to reach its inflation targets, with disruptive impacts on international competitiveness and domestic demand.

GDP has decelerated as exports and investment have slowed…

After a remarkable 5.2 per cent growth in 2000, GDP decelerated in the first half of 2001 with divergent trends in demand components. Spurred by a 50 per cent increase of the minimum wage in January and government subsidies to housing, private consumption and construction remained dynamic. In contrast, corporate investment growth decelerated and exports grew at a much slower rate than previously.

… but inflation has remained high

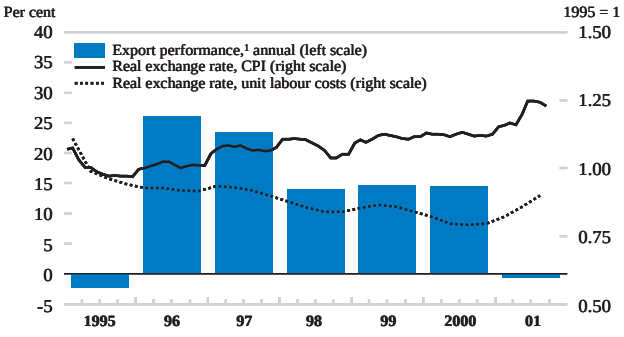
Inflation remained high in the first half of the year in spite of the slowdown in activity, not only under the influence of high energy and food prices but also of domestic cost pressures due to wage increases. Core inflation progressed more rapidly than CPI, attaining 8.7 per cent in September (year-on-year). Nevertheless, the appreciation of the currency after the widening of its fluctuation band in the spring has begun to exert an impact on inflation during the second half of 2001 through dampening imported inflation. The external balance improved up till September, due to a decreased trade deficit and strong tourism revenues.

Fiscal policy is expansionary…

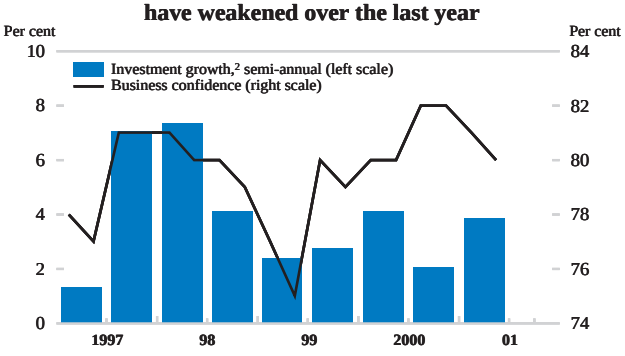
The expansionary 2001 budget, with a planned deficit of 4.5 per cent of GDP (national accounts basis) provided additional stimulus following the decision to spend the revenue windfall due to higher-than-expected inflation and to increase infrastructure spending under the recently adopted "Szechenyi plan". A growing social security deficit, reflecting a rapid increase in health expenditure, is also putting pressure on public finances. In the wake of the 11 September terrorist attacks and prior to the forthcoming general elections in the spring of 2002, new budgetary measures were announced to stimulate the economy. A precise quantification of such additional spending is not yet available, but current fiscal activism faces both the

Hungary

International competitiveness has deteriorated



Investment and business confidence have weakened over the last year



1. Change in export market share in manufactured goods. 2001 on basis of semi-annual data.
2. Infrastructure and housing included.

Source: OECD.

Hungary: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion HUF	Percentage changes, volume (1995 prices)				
Private consumption	4 994.2	5.4	3.8	4.5	3.9	5.1
Government consumption	2 313.2	1.7	1.4	1.0	1.0	2.2
Gross fixed capital formation	2 384.6	5.9	6.6	6.0	5.5	5.5
Final domestic demand	9 692.0	4.6	4.0	4.1	3.7	4.6
Stockbuilding [a]	607.8	-0.3	1.5	-0.4	0.0	0.0
Total domestic demand	10 299.7	4.0	5.1	3.3	3.4	4.3
Exports of goods and services	5 105.9	13.1	21.8	10.7	3.7	6.6
Imports of goods and services	5 318.2	12.3	21.1	9.8	3.5	6.8
Net exports [a]	- 212.3	0.1	-0.1	0.3	0.0	-0.3
GDP at market prices	10 087.4	4.2	5.2	3.8	3.5	4.1
GDP deflator	_	8.4	7.5	9.4	5.8	4.8
Memorandum items						
Consumer price index	_	10.0	9.8	9.0	5.5	4.6
Private consumption deflator	_	10.7	9.6	9.0	5.5	4.6
Unemployment rate	_	7.1	6.5	5.9	6.0	6.1
General government financial balance [b,c]	_	-5.2	-3.0	-4.9	-4.8	-4.5
Current account balance [b]	_	-4.4	-3.3	-2.9	-2.4	-2.3

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of GDP.
c) OECD estimate which adjusts official data so as to increase international and intertemporal comparability.
Source: OECD.

risks of adding new irreversible expenditures to the budget, and of accelerating infrastructure programmes without sufficient cost-benefit analysis.

… while monetary conditions tightened

The central bank, whose independence was strengthened by a new law in July, aims at reducing the inflation differential with the euro zone to around 1 per cent by January 2006. It targets headline inflation of 7 and 4½ per cent respectively with a 1 per cent tolerance band for December 2001 and December 2002. The widening of the fluctuation band improved the efficiency of its policy instruments. Nominal rates were not modified until September, when the slight decrease in the basic rates of the European Central Bank (ECB) was replicated, but monetary conditions tightened as a result of the appreciation of the currency and the rise of real interest rates. Confirming their commitment to the announced inflation targets, the monetary authorities only partially followed the last 50 basis point reduction in the ECB rates in October. They fully followed the 8 November adjustment in ECB rates.

Although the global slowdown is hitting Hungary, consumer demand is robust

The slowdown was underway before the 11 September terrorist attacks, in the context of weakening business confidence. The subsequently depressed international environment has reinforced this trend. GDP growth is projected to slow to 3.8 per cent in 2001 and 3.5 per cent in 2002, with trade contracting and corporate capital formation remaining low. Household consumption should remain relatively robust despite an increase in precautionary savings, and government infrastructure investment should be the most dynamic component of demand in 2001 and 2002. Growth is projected to recover to around 4 per cent in 2003. The main risks on the demand side concern factors which may lead to an additional tightening of monetary conditions. If the fiscal stance deteriorates further in 2002 in the pre- and post-electoral environment, with inflationary wage settlements in the public sector spilling over into the rest of the economy, higher interest rates would be required to reach the inflation target. Further complication could be caused by necessary adjustments of regulated prices. On the supply side, downside risks for GDP growth could stem from a reduction in foreign direct investment which, by slowing the transfer of technology, would adversely affect growth potential.

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Iceland

Iceland's economy is going through its first recession since the early 1990s. The fall in activity is home-grown, and largely the result of the overheating that built up in the late 1990s, which generated imbalances in the labour, equity, housing and product markets. These manifested themselves in an external deficit that reached 10 per cent of GDP in 2000 and some 8 per cent this year. The downturn is expected to ease some of these problems, but inflation is projected to remain above trading-partner levels.

The Central Bank should show caution in cutting its interest rates, since it is crucial to build confidence in the current level of the exchange rate in order to prevent the spike in inflation from being reflected in wage demands. Fiscal easing associated with a relaxation of spending constraints is set to come to an end in 2002, but renewed stimulus will result from the tax reform package just announced. It would be best to avoid major slippage in 2002 and to offset some of the tax and expenditure stimulus with spending restraint in 2003.

Notwithstanding the sharp slowdown, inflation has surged

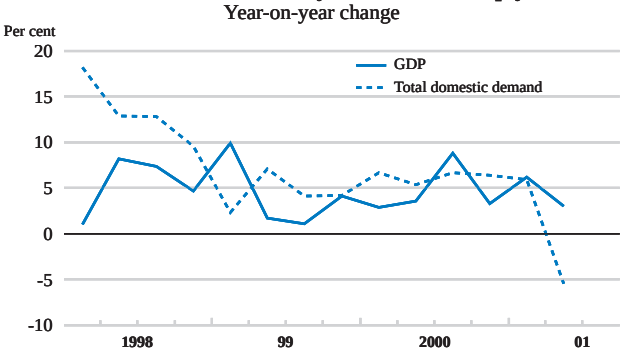
The overheated domestic economy has slowed sharply thus far in 2001, despite continuing growth in public spending. Only residential investment has held up among private demand components. By the spring overall domestic demand was more than 5 per cent below year-earlier levels, according to the latest quarterly national accounts. However, persistent export strength has meant that real GDP in the second quarter was some 3 per cent greater than in the same quarter of 2000. The result of this disparity is that unemployment has remained at unsustainably low levels, but the current-account deficit has shrunk somewhat, albeit to a still-disconcerting level in relation to GDP. Following the massive currency depreciation in the spring, about 15 per cent in effective terms, inflation has continued to rise, peaking at over 8 per cent, about 6 percentage points above trading-partner rates.

The downturn follows earlier overheating

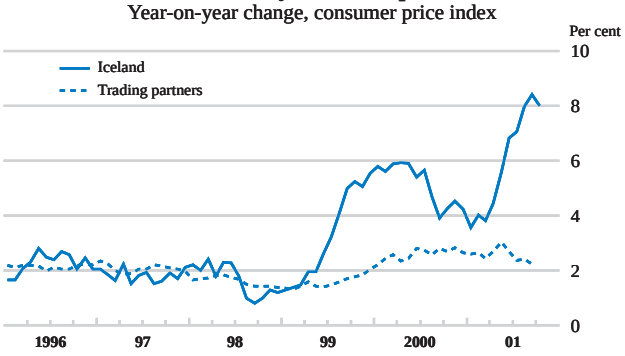
The economy has been labouring under the burden of interest rates, which have been set at deliberately high levels in order to head off a wage/price/exchange-rate spiral. With the enormous depreciation that occurred up to June, real disposable income gains have been severely eroded. The result is that private consumption has fallen off, along with financial wealth, as the stock market has declined by around a third over the past year. Business investment has also slumped, in part because major expansions in the aluminium and power-intensive sectors have been completed, but also more generally as profits have fallen relative to wages to such an extent that prospective rates of return on real investment may no longer be attractive.

Iceland

The domestic economy has slowed sharply
Year-on-year change



Inflation may now have peaked
Year-on-year change, consumer price index



Sources: Central Bank and Statistics Iceland.

Iceland: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion Ikr	Percentage changes, volume (1990 prices)				
Private consumption	332.6	7.2	4.2	-1.2	-0.6	1.3
Government consumption	127.8	5.1	3.7	3.7	3.2	3.2
Gross fixed capital formation	142.2	-2.5	13.1	-5.5	-13.7	3.3
Final domestic demand	602.6	4.5	6.1	-1.3	-2.8	2.1
Stockbuilding [a]	1.1	-0.1	0.3	-0.4	0.1	0.0
Total domestic demand	603.7	4.4	6.3	-1.7	-2.7	2.1
Exports of goods and services	203.7	4.8	6.3	5.5	0.0	6.5
Imports of goods and services	230.1	5.7	9.3	-3.0	-5.0	4.0
Net exports [a]	- 26.3	-0.7	-1.7	3.4	2.2	0.9
GDP at market prices	577.4	4.0	5.0	1.5	-0.6	3.0
GDP deflator	_	3.4	3.7	8.5	6.0	4.0
Memorandum items						
Private consumption deflator	_	2.7	4.9	7.1	5.9	3.6
Unemployment rate	_	1.9	1.4	1.5	2.5	2.5
General government financial balance [b]	_	2.1	2.3	-0.2	-0.8	-0.9
Current account balance [b]	_	-6.9	-9.9	-8.0	-6.1	-4.8

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of GDP.
Source: OECD.

Fiscal policy has eased, but monetary policy remains relatively tight

Fiscal policy has turned decidedly expansionary. Besides allowing the automatic stabilisers to function, the government has boosted social security and child benefits, permitted its consumption spending to increase well beyond budgeted rates and most recently announced a major tax reform that is officially estimated to cut tax revenues by nearly ½ percentage point of GDP by 2003. There have been increasing pressures for a relaxation in monetary policy, but the Central Bank refrained from lowering its policy rate after a reduction in March when it was handed the responsibility of bringing inflation down to 2½ per cent by 2003. Nevertheless, market rates have fallen since then, and in November the Bank cut its policy rate following similar moves of monetary authorities abroad.

The outlook is for depressed activity followed by a cyclical rebound

The economy is likely to have shrunk significantly in the second half of this year and in 2002 is set to endure its first year of declining activity in a decade. As in 2001, private domestic demand is projected to shrink significantly, offset by government consumption and investment, while the contribution from the foreign balance also diminishes in line with a stagnation in exports. The worsening in exports is attributable to another substantial cutback in cod quotas, slowing growth in ferrosilicon output resulting from the depressed state of world steel production and generally weaker export markets, especially for tourism, following the 11 September terrorist attacks in the United States. However, once that shock is overcome, output growth should resume, reaching 3 per cent in 2003. Unemployment is likely to rise next year before stabilising in 2003. Inflation is set to fall quite sharply, consistent with the technical assumption of unchanged exchange rates (since so much of the recent rise resulted from the earlier depreciation), but may not quite reach the official target of 2½ per cent by 2003. Finally, the current-account deficit as a share of GDP is projected to fall by a half from 2000 to 2003 because of the severe import compression this year and next as well as moderate improvements in the terms of trade.

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Ireland

With exports slowing rapidly and service sector employment and output close to stagnation, GDP growth is decelerating sharply, albeit from an unsustainably high level in 2000. However, with the world economy expected to recover and underpinned by continuing strength in consumption, growth is likely to accelerate to around 6½ per cent in 2003.

The budget surplus is set to fall quite markedly as tax revenues decline. Rising current expenditures should be carefully monitored to ensure that objectives are being achieved efficiently. Policy needs to continue to focus on improving human capital and the provision of infrastructure but will need to be supported by moderate pay increases in the private sector to maintain competitiveness.

Growth has declined rapidly going into the second half…

With exports equal to some 95 per cent of GDP and concentrated in the high technology sector, the economy has been hard hit by the global slowdown in demand for information and communication technology (ICT) products. Industrial production fell at an annualised rate of around 20 per cent in the three months to August, and several plants have closed. Tourist activity declined over the summer months due to the threat of foot and mouth disease, and widespread cancellations have also been reported in the wake of the September events.

… but strong consumption has supported economic activity

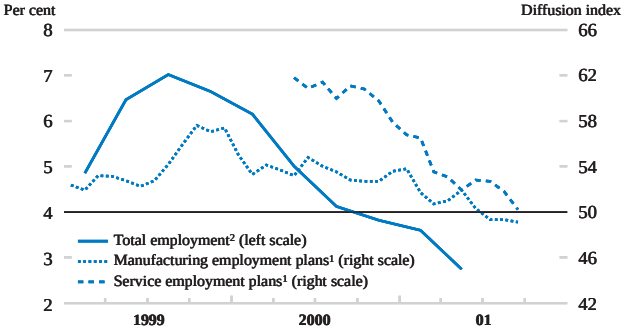
Employment increased somewhat in the first half of 2001, suggesting that GDP nevertheless continued to expand. Activity has been underpinned by strong private consumption and buoyant public sector demand. Wages have continued to rise by some 8 per cent annually and, combined with tax reductions and slower inflation, real disposable income has grown significantly. This has led to substantial retail sales. Housing construction growth has fallen rapidly this year, but house prices have remained firm. Public expenditures on health and education have risen rapidly owing to attempts to re-establish wage relativity with the private sector and to bolster service provision.

Tax revenues are surprisingly weak, although a significant budget surplus is still projected

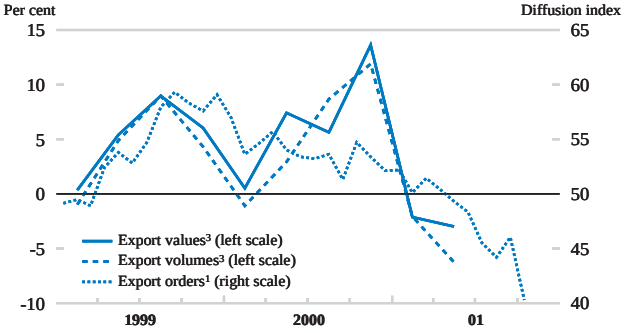
Tax revenues have been much lower than expected, due both to weaker activity and to special factors. Indirect taxes have been very weak owing to reduced cross-border trade, especially for gasoline, and subdued tourist activity. Moreover, lower car sales, following last year's surge, have also had a marked impact. On the other hand, income tax receipts have weakened despite the strong rise in wages and continued employment

Ireland

Growth is slowing in all sectors



Export orders are contracting sharply



1. Above 50 indicates expansion.
2. Year-on-year percentage change.
3. Percentage change over preceding quarter.

Sources: NCB Purchasing Managers' Index and Central Statistics Office.

Ireland: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	39.4	8.2	9.9	6.2	5.5	6.5
Government consumption	10.2	6.5	5.4	5.2	5.3	5.3
Gross fixed capital formation	17.0	14.0	7.0	2.5	-0.6	5.9
Final domestic demand	66.6	9.3	8.5	5.1	4.0	6.2
Stockbuilding [a]	1.2	-1.9	0.6	0.1	-0.1	0.1
Total domestic demand	67.7	7.0	9.2	5.2	3.8	6.3
Exports of goods and services	66.8	15.7	17.3	5.1	1.2	8.8
Imports of goods and services	58.0	11.9	16.0	4.8	1.0	9.3
Net exports [a]	8.8	5.0	3.6	1.2	0.4	1.1
GDP at market prices	77.1	10.8	11.5	5.6	3.7	6.4
GDP deflator	_	4.2	4.3	4.0	4.6	4.3
GNP at market prices	67.7	8.2	10.4	5.0	2.9	6.3
Memorandum items						
Private consumption deflator	_	3.4	4.7	4.3	3.5	3.3
Unemployment rate	_	5.6	4.3	4.3	5.3	5.3
Household saving ratio [b]	_	10.4	7.9	8.3	8.4	8.2
General government financial balance [c]	_	2.3	4.6	3.2	2.2	1.9
Current account balance [c]	_	0.4	-0.7	-2.0	-1.8	-1.6

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of disposable income.
c) As a percentage of GDP.
Source: OECD.

growth, suggesting that bonuses have suffered a marked reduction. The government has partially offset higher expenditures with slower implementation of the National Development Plan, thereby limiting the overall increase. The projection assumes that the government will go ahead with its prior tax commitments in 2002 but go no further and will stabilise expenditure growth at recent levels. The budget surplus is projected to decline by some 1½ per cent of GDP this year and by around 1 per cent next, stabilising at around 2 per cent of GDP in 2002 and 2003. The structural surplus is projected to remain broadly unchanged over the next two years suggesting no change in the fiscal stance.

Growth should remain subdued until the world economy picks up

Exports and the associated imports are likely to remain weak until well into 2002 when a pick-up in the world economy is projected. Global recovery should lead to a significant rebound in exports since the main forces attracting foreign manufacturing activity in recent years will not have changed significantly. In the meantime, both private and government consumption and infrastructure investment will support activity at a moderate level. GDP growth is projected to fall to some 5½ per cent in 2001 and to around 3¾ per cent in 2002 before recovering to 6½ per cent in 2003. With the labour force expected to continue to expand, the unemployment rate should drift up to some 5¼ per cent, while wage growth and price inflation are projected to slow.

A key risk is that competitiveness might deteriorate

A key risk is that wages will continue to grow rapidly; if the euro were also to appreciate, competitiveness might deteriorate significantly. This would reduce the impact of the global pick-up going into 2003. With the economy slowing, house prices could weaken, leading to reduced consumption and less buoyant household sentiment. However, the banking system appears to be well prepared for the situation, so that the risk of financial distress remains limited.

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Korea

A sharp slowdown in export growth in mid-2001, combined with the negative impact of the 11 September terrorist attacks in the United States, has delayed the economic recovery which had been anticipated for the latter half of 2001. An upturn, which depends on a rebound in confidence and a pick-up in overseas demand, may not begin until mid-2002, limiting output growth to around 3 per cent for the year. Inflation is likely to slow further towards the medium-term target of 2½ per cent.

Macroeconomic policy is supporting demand through two supplementary budgets and a 100 basis point cut in short-term interest rates since July. Given the sound fiscal position, the automatic stabilisers should be allowed to operate in 2002 to support recovery. Achieving a sustained expansion requires effectively addressing the remaining problems in the corporate and financial sectors in a way that allows market forces to drive restructuring.

A sharp downturn in exports has derailed the expected recovery

By mid-2001, Korea appeared poised for an economic recovery from the downturn that began in the fourth quarter of 2000. The unemployment rate fell to 3½ per cent and business and consumer confidence was surging in the first half of 2001. However, a further weakening in overseas demand reversed the upward trend in industrial output. Exports fell at double-digit rates (year-on-year in US dollar value) in the second and third quarters of 2001, led by sharp declines in the information and communication technology sector. The 11 September terrorist attacks have further undermined confidence. Inflation, which peaked at 5¼ per cent (year-on-year) in the second quarter of 2001 because of the lagged impact of higher oil prices and increases in public service fees, slowed to 4¼ per cent in the third quarter.

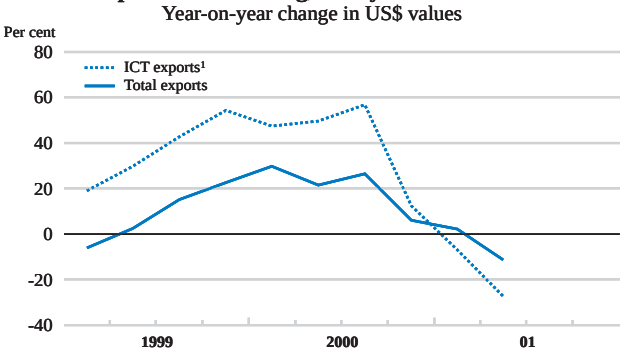
Macroeconomic policies are supporting demand…

Following the terrorist attacks, the central bank cut the overnight interest rate by 50 basis points to a record low 4 per cent, although the decline in bank lending rates has been smaller. Moreover, the on-going restructuring of the financial sector may tend to limit the impact of an easier monetary policy stance. Lower interest rates were accompanied by two supplementary budgets in the second half of 2001, which will increase spending by 7 trillion won (1.3 per cent of GDP), matching the consolidated central government budget surplus in 2000. While a small budget deficit is likely in 2001, the initial budget for 2002 calls for a substantial surplus of more than 1 per cent of GDP. Given the impact of slower than expected growth on government revenue, however, the budget may remain in deficit.

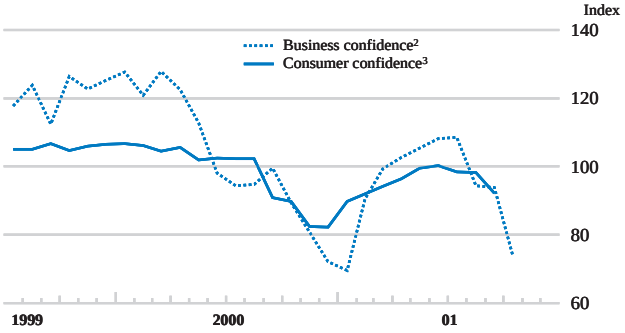
Korea

Exports are declining, led by the ICT sector

Year-on-year change in US$ values



Business and household confidence are weakening



1. Information and communication technology products, including semi-conductors.
2. Seasonally adjusted. A score of 100 means that overall business conditions are expected to be the same as the previous month.
3. A score of 100 means that consumption is expected to be the same in six months as at present.

Sources: National Statistical Office and Federation of Korean Industries.

Korea: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices trillion won	Percentage changes, volume (1995 prices)				
Private consumption	242.8	11.0	7.1	1.7	2.5	4.4
Government consumption	48.8	1.3	1.3	0.8	3.0	1.9
Gross fixed capital formation	132.4	3.7	11.0	-2.7	2.6	6.1
Final domestic demand	424.1	7.6	7.7	0.2	2.6	4.7
Stockbuilding [a]	- 38.3	5.4	-0.9	-0.2	0.2	0.0
Total domestic demand	385.8	14.7	6.7	0.0	2.9	4.8
Exports of goods and services	221.0	15.8	21.6	1.4	3.2	10.8
Imports of goods and services	161.1	28.8	20.0	-3.4	2.5	10.0
Net exports [a]	59.8	-1.0	3.5	1.9	0.8	2.2
Statistical discrepancy [a]	- 1.1	-0.4	-0.5	0.0	0.0	0.0
GDP at market prices	444.5	10.9	8.8	2.0	3.2	6.2
GDP deflator	_	-2.1	-1.5	2.0	2.5	1.0
Memorandum items						
Private consumption deflator	_	0.5	2.0	4.4	3.3	2.5
Unemployment rate	_	6.3	4.1	3.9	4.3	4.0
Household saving ratio [b]	_	16.0	16.6	15.2	13.3	13.6
Consolidated central government balance [c]	_	-2.7	1.3	-0.1	-0.5	0.0
Current account balance [c]	_	6.0	2.4	2.2	2.3	2.6

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of disposable income.
c) As a percentage of GDP.
Source: OECD.

… accompanied by policies to restructure the financial and corporate sectors

Financial-sector restructuring remains a priority. The 40 trillion won second-stage programme launched in September 2000 will boost total outlays in this area to more than 130 trillion won, a quarter of GDP (see the 2001 *OECD Economic Survey of Korea*). Effectively implementing the programme will increase the amount of these outlays that can be recovered and avoid the need for additional public expenditures. Concerned about the problems of low-rated firms in rolling over their maturing debt, the government continues to provide public guarantees for corporate bonds, which risks blunting the role of market forces in restructuring and creating moral hazard problems. The government has also announced steps to prop up the stock market, though it remains to be seen if the benefits of this approach outweigh the costs.

An economic recovery is projected by mid-2002 as growth in Korea's export markets picks up

The timing of an economic rebound depends on overseas developments that influence the demand for Korean exports as well as confidence within Korea. Given the extent of the recent fall in business confidence, a recovery based on a pick-up of exports and investment is not likely to begin until mid-2002. Weak demand in the first half of 2002 will probably limit output growth to around 3 per cent for the year and may increase the unemployment rate to around 4½ per cent. The extended period of subdued demand may reduce inflation towards the medium-term objective of 2½ per cent by 2003. In addition to the uncertainty on the external side, the weak balance-sheet position of the corporate sector may also pose a risk to recovery. Indeed, more than a quarter of corporations did not earn enough profits to pay interest on their debt, let alone repay principal, in 2000, when growth was 9 per cent. With the downturn likely to exacerbate corporate balance-sheet problems, there is a risk of major failures in the business sector, creating a further rise in joblessness and problems in the financial sector.

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Luxembourg

Real GDP growth is projected to fall from 7½ per cent in 2000 to 4 per cent this year owing to a sharp deterioration in exports and in financial markets. As the international situation improves, the economy should recover to around trend by 2003. With import prices falling and intervals between indexed wage increases lengthening, inflation should decline to 2¼ per cent by 2003.

Energy prices should be excluded from wage indexation arrangements to reduce the risk that any increase sets off a wage-price spiral, as occurred in 1999-2000.

Exports are dragging down economic growth

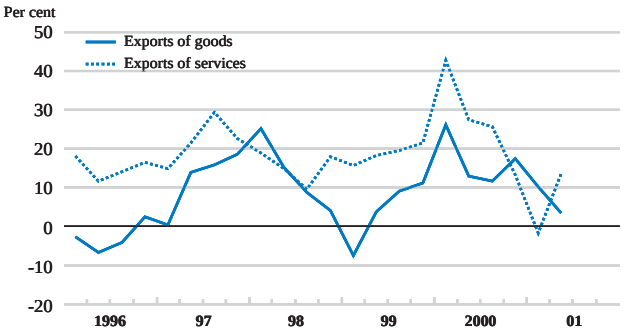
Economic activity is set to slow sharply this year owing to a sharp deterioration in export markets whose growth is estimated to fall from 10 per cent in 2000 to only 2½ per cent in 2001. This has a major impact on economic growth in Luxembourg since exports, adjusted for their (direct and indirect) import content, represent 60 per cent of GDP. In addition, the decline in international stock markets has driven down financial service prices, which are based on asset values, and hence the terms of trade. Industrial production and business expectations have also weakened markedly. Employment growth has slowed since mid-year but was still 5½ per cent (year-on-year) in the third quarter of 2001. At the same time, the unemployment rate has stabilised at around 2½ per cent.

Inflation has eased but remains high

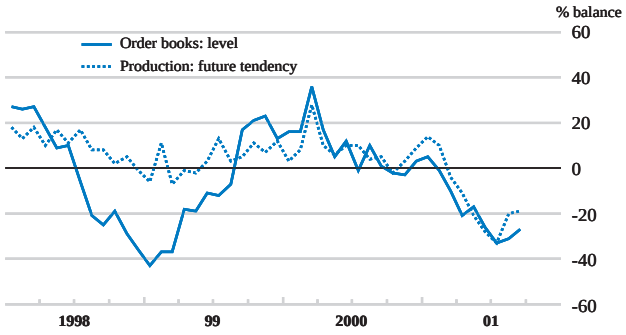
Inflation has eased to around 2¾ per cent in recent months mainly owing to the fall in oil prices. Core inflation, on the other hand, has continued to rise to around 3 per cent. This is mainly attributable to a further acceleration of wage increases, which reached 6 per cent (year-on-year) following an index-linked rise in April. With consumer price inflation slowing, index-linked wage increases should become less frequent (they occur whenever cumulative price rises since the last threshold was breached amount to 2½ per cent), contributing to a decline in core inflation. The next index-linked wage increase is expected in the second quarter of 2002.

Luxembourg

Export growth[1] has slowed sharply



Business expectations[2] have deteriored



1. Year-on-year percentage changes; seasonally adjusted.
2. Industry. Balance of positive-negative replies.

Sources: Central Service of Statistics and Economic Studies (STATEC) and OECD.

Luxembourg: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	7.3	2.1	3.1	3.5	4.0	4.0
Government consumption	2.9	7.7	4.8	3.4	3.0	3.0
Gross fixed capital formation	3.6	19.6	-3.0	5.5	4.0	5.5
Final domestic demand	13.8	7.8	1.7	4.0	3.8	4.2
Stockbuilding [a]	0.1	-0.4	0.2	0.0	0.0	0.0
Total domestic demand	13.9	7.3	1.9	4.0	3.8	4.2
Exports of goods and services	21.5	13.3	16.4	6.3	4.5	8.5
Imports of goods and services	18.5	15.6	13.8	6.8	4.9	7.6
Net exports [a]	3.0	-0.3	5.4	0.6	0.3	2.7
GDP at market prices	17.0	6.0	7.5	4.0	3.4	5.9
GDP deflator	_	2.5	3.7	0.7	1.4	3.5
Memorandum items						
Private consumption deflator	_	1.4	2.9	2.6	2.5	2.2
Unemployment rate	_	2.9	2.6	2.5	2.8	2.8
General government financial balance [b]	_	3.6	6.1	5.3	3.2	2.9

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of GDP.
Source: OECD.

Monetary conditions and fiscal policy should contribute to economic recovery

Fiscal policy is set to ease substantially, complementing the reduction in interest rates decided by the European Central Bank (ECB). Personal income tax cuts amounting to 1.2 per cent of GDP have been implemented this year and further cuts of 0.6 per cent of GDP are planned for next year. In addition, corporate taxation is to be reduced by around 1½ per cent of GDP in 2002. At the same time, large increases in public investment are planned for this year and next. As a result of these policies and the sharp slowdown in growth, the budget surplus is projected to decline from 6 per cent of GDP in 2000 to 3 per cent by 2002 and to remain broadly stable thereafter. In view of the high level of economic uncertainty, it is assumed that households will delay spending their tax cuts until 2002.

Growth should return to trend by 2003…

Economic growth is projected to slow sharply this year to 4 per cent and to remain weak in 2002, though recovering in the course of the year. As exports and financial markets improve, output growth of 6 per cent, slightly above the 1990s average, might be re-established in 2003. Employment growth is likely to decline with a lag, but lower inflows of cross-border workers (who account for two-thirds of employment growth) and immigrants should imply only a modest rise in unemployment. Inflation is projected to decline to around 2¼ per cent by 2003 as import price inflation falls and intervals between indexed wage increases lengthen.

… provided that the international economy recovers as anticipated

The main risks surrounding these projections concern developments in trading partners' economies and in financial markets. Differences from anticipated developments would have a major effect on economic growth owing to the openness of the Luxembourg economy and its dependence on the mutual fund industry, which is the second largest in the world after that in the United States.

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Mexico

Five years of expansion came to an end with a sharp downturn of activity and zero growth in 2001, mostly reflecting the fall out in United States demand. Disinflation has continued, helped by the strength of the peso, while real interest rates have declined. Given the absence of major imbalances, the slowdown is expected to be temporary. Real output growth is projected to gain momentum in the course of 2002, to reach 4 per cent in 2003. But the timing and scale of the recovery are uncertain and will largely depend on external developments.

A tight macroeconomic policy stance will continue to be required to bring inflation down further and achieve fiscal consolidation targets, so as to retain the confidence of international markets. In the structural area, implementing the tax reform currently under discussion is the foremost priority. It should broaden the tax base, reduce dependence on volatile oil revenues and permit an increase in social spending.

GDP growth slowed sharply in 2001…

A sharp drop in exports to the United States in the latter part of 2000 reversed five years of economic expansion. Real GDP declined in the first half of 2001 from the previous half year (on seasonally adjusted data), although private consumption still recorded positive growth. Employment in the formal sector has fallen, but real wage increases have remained strong. Following the weakening of export markets, imports declined in 2001, reflecting the high degree of trade integration among members of North American Free Trade Agreement. Despite falling oil export revenues the current account balance stopped deteriorating, helped by the improvement in factor services and remittances from abroad. Net foreign direct investment is likely to reach US$15 -20 billion, financing most of the current account deficit.

… while inflation fell further, helped by the strength of the peso

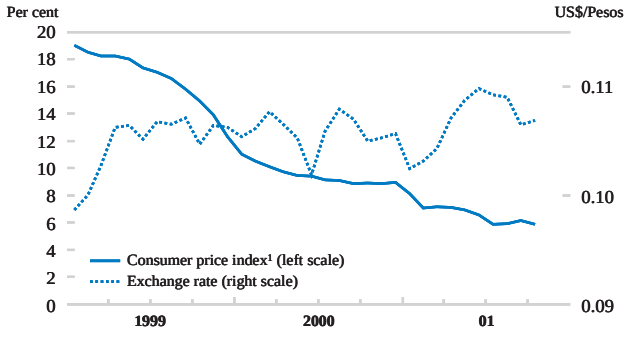
Large net capital inflows have strengthened the peso exchange rate, notwithstanding some degree of volatility in the wake of the 11 September terrorist attack in the United States. In a context of weaker economic activity, the strong peso has helped to bring down inflation; and the decline in underlying inflation has been compounded by falling prices for farm products and public tariffs. By October, year-on-year consumer price inflation had fallen to below 6 per cent; it is expected to stay below the central bank target, set at 6.5 per cent for the 12 months to December.

After some easing in 2000, the fiscal stance has been tightened

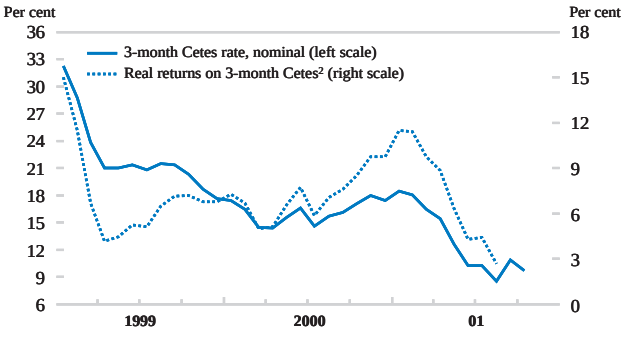
Following a public sector deficit of 1.1 per cent of GDP in 2000, the deficit target for 2001 was set at 0.65 per cent of GDP. Given the sharp economic slowdown, achieving this target requires a significant tightening of fiscal policy. In the event,

Mexico

Disinflation continued, helped by a strong peso



While interest rates declined



1. Consumer price index inflation, year-on-year percentage change.
2. Three-month Cetes rate minus average year-on-year inflation of the following three months.

Sources: Bank of Mexico; OECD.

Mexico: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion Pesos	Percentage changes, volume (1993 prices)				
Private consumption	2 593.3	4.3	9.5	2.8	1.7	4.0
Government consumption	400.0	3.9	3.5	-2.5	0.7	2.5
Gross fixed capital formation	804.0	7.7	10.0	-4.9	3.0	6.1
Final domestic demand	3 797.3	4.9	8.9	0.7	1.9	4.3
Stockbuilding [a]	133.3	-0.5	0.1	-0.5	0.2	0.3
Total domestic demand	3 930.6	4.3	8.8	0.2	2.0	4.5
Exports of goods and services	1 180.4	12.4	16.0	-3.2	0.7	7.5
Imports of goods and services	1 262.8	13.8	21.4	-2.4	2.2	8.7
Net exports [a]	- 82.4	-0.5	-1.9	-0.2	-0.6	-0.7
GDP at market prices	3 848.2	3.8	6.9	0.0	1.5	4.0
GDP deflator	_	14.8	10.8	6.0	5.3	4.8
Memorandum items						
Private consumption deflator	_	13.8	8.9	6.5	5.2	4.5
Unemployment rate [b]	_	2.6	2.2	2.5	2.6	2.5
Current account balance [c]	_	-3.0	-3.2	-3.0	-3.3	-3.5

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) Based on the National Survey of Urban Employment.
c) As a percentage of GDP.
Source: OECD.

budget cuts have been implemented, starting in the first half of 2001, in response to lower -than-projected oil revenues, which account for one third of budget receipts. A tight fiscal stance is assumed over the coming two years, the budget being brought near balance by 2003.

Real interest rates have come down in 2001 but may now stabilise

Short-term interest rates declined significantly during 2001, partly as a result of central bank action around mid year. After a temporary rise in September, reflecting the more uncertain environment, the three-month *Cetes* rate fell back to below 9 per cent – half the level at the end of January – implying a comparable fall in real interest rates. Monetary conditions are unlikely to ease further in the near-term. In real terms interest rates are assumed to remain close to their level in recent months over the projection period. The Central Bank has re-stated its medium-term objective of bringing year-on-year inflation down to 3 per cent by December 2003.

Economic growth is projected to gain momentum in the second half of 2002, although there are risks

In the near term, the negative impact of the slowdown in Mexico's main trading partner will continue to be felt, so that GDP growth may only average 1½ per cent next year. However, helped by a more supportive external environment, real GDP growth should regain momentum in the course of 2002, reaching 4 per cent by 2003. Inflation is expected to come down gradually, to around 4½ per cent by the end of 2002, under the usual assumption of constant exchange rates. As trade flows pick up with the economic recovery, the current account deficit is projected to widen slightly, to perhaps 3½ per cent of GDP in 2003. Unusually large uncertainties regarding external developments will continue to prevail until well into 2002. There are also some domestic uncertainties related to the final shape of the tax reform, which is aimed at strengthening budget revenue while reducing tax distortions. If the planned tax reform succeeds in raising more revenue, which is very low by OECD standards, part of it is expected to be allocated to additional social spending.

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Netherlands

GDP growth is projected to slow sharply from an average rate of close to 4 per cent in 1997-2000 to about 1½ per cent in 2001-02, reflecting strong decreases in both domestic and foreign demand. The output gap has turned negative and will widen further until 2003, when growth should accelerate to 2½ per cent following a recovery of private consumption, in response to recent tax reliefs, and exports. Inflation, which has accelerated to 5 per cent, mainly as a result of the increase of value-added-tax and higher food prices, will fall in 2002 though some upward pressure due to higher wages will persist. The general government budget is expected to continue to show a small surplus.

In view of the tight conditions in the labour market, measures should be taken to raise the participation rate further, the more so as persistent wage pressure would harm international competitiveness, thereby risking a prolongation of the current downturn.

Economic growth has decelerated further, but inflation remained too high

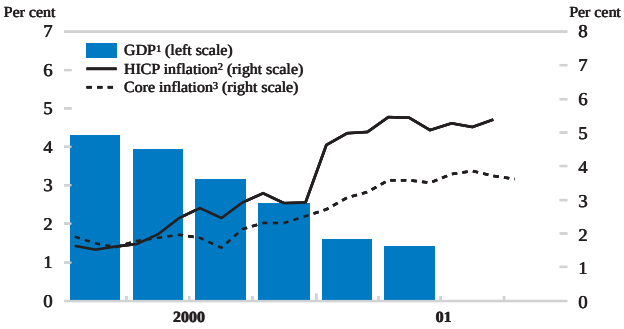
In the first half of 2001, economic growth continued to slow down, to an annual rate of 1½ per cent in the second quarter. Consumption growth decelerated, despite tax relief, resulting from the 2001 income tax reform. Investment growth, which had been very high since the mid-nineties, turned negative, in part because of a continued decrease in profits. Both exports and imports have fallen substantially, in line with world trade. For 2001 as a whole, real GDP growth is estimated to decelerate to 1½ per cent (compared with 3½ per cent in 2000). However, labour market conditions are still tight and wage growth has picked up significantly. Consumer price inflation rose from 3 to 5 per cent following increases in value-added-tax and labour costs, but also as a result of temporary shocks to food and petrol prices.

Fiscal policy is set to remain supportive of growth

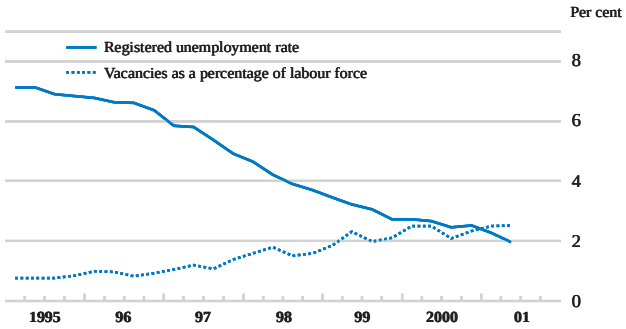
Taxes have been cut in 2001 by around 0.7 percentage points of GDP, while budget windfalls, owing to lower unemployment outlays and interest payments, have been used for increases in spending on health, education and infrastructure. In addition, structural revenue windfalls in 2001 will be partly translated into a further tax relief in 2002. Finally, within the Dutch budgeting framework, automatic stabilisers on the revenue side are allowed to operate to a large extent, so that any revenue shortfalls in 2002 will not be offset by corrective actions. Even so, the budget is likely to remain in surplus.

Netherlands

Growth has slowed but inflation has increased



The labour market has remained tight



1. Volume, year-on-year percentage changes of quarterly data.
2. HICP is the harmonised index of consumer prices (EU definition).
3. As defined by the Dutch authorities, *i.e.* CPI excluding vegetables, fruit, energy, government services and indirect and consumption related taxes.

Sources: CPB Netherlands Bureau for Economic Policy Analysis; Statistics Netherlands; OECD.

Netherlands: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	176.0	4.5	3.8	1.2	2.0	3.1
Government consumption	80.4	2.8	1.9	3.0	2.4	2.5
Gross fixed capital formation	76.2	7.8	3.8	-0.6	0.1	1.8
Final domestic demand	332.6	4.8	3.3	1.2	1.7	2.7
Stockbuilding [a]	2.4	-0.6	-0.2	0.2	0.0	0.0
Total domestic demand	335.0	4.2	3.1	1.3	1.7	2.7
Exports of goods and services	215.9	5.4	9.5	2.5	3.4	7.5
Imports of goods and services	196.7	6.3	9.4	2.4	3.7	8.0
Net exports [a]	19.2	-0.2	0.6	0.1	0.0	0.1
GDP at market prices	354.2	3.7	3.5	1.4	1.6	2.6
GDP deflator	_	1.7	3.7	5.3	3.3	2.4
Memorandum items						
Private consumption deflator	_	1.9	2.8	4.6	2.4	1.9
Unemployment rate	_	3.2	2.6	2.5	2.8	3.1
Household saving ratio [b]	_	9.5	7.6	10.3	12.2	12.7
General government financial balance [c]	_	0.4	2.2	1.1	0.6	0.7
Current account balance [c]	_	3.8	3.7	3.6	3.8	4.0

Note: National accounts are based on chain-linked data. This introduces a discrepancy in the identity between real demand components and the GDP. For further details see *OECD Economic Outlook* Sources and Methods, *(http://www.oecd.org/eco/sources-and-methods).*

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.

b) As a percentage of disposable income, excluding net contributions (actual and imputed) to life insurance and pension schemes.

c) As a percentage of GDP.

Source: OECD.

Growth is expected to pick up somewhat and to return to potential

Growth of GDP is projected to average 1½ per cent in 2001-2002 with a return towards potential – between 2½ and 2¾ per cent – in 2003. The output gap is likely to remain negative over the projection period. Consumption is set to show only a modest pick-up in 2002, with the favourable impact of tax reliefs temporarily offset by negative wealth effects and the adverse consequences on global confidence stemming from the 11 September terrorist attacks in the United States. Investment is projected to fall in 2001 by 2 per cent and to continue to lag behind GDP in the coming couple of years, with residential construction in particular constrained by labour shortages. After a weak 2002, exports are projected to rebound in 2003, due to increased world trade. Imports are set to rise in parallel, as domestic demand also picks up. Employment growth is expected to decline, resulting in an increase in unemployment.

A balanced recovery depends on wage moderation

International risks, notably on the downside, dominate the near-term outlook. But there are also domestic risks. In particular, due to the tight labour market, wage moderation has come under pressure. A further acceleration in wages and a persistently high inflation rate would have unfavourable effects on export performance and employment growth. While consumer price inflation is projected to decline to around 2½ per cent in 2002, reflecting the passing through of the hike in the value-added-tax rate in 2001 and a fall in import prices, a sustained deceleration will strongly depend on re-establishing wage moderation.

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New Zealand

Growth rebounded strongly in the first half of 2001, driven by booming exports. A low currency combined with exceptionally high commodity export prices resulted in rises in export incomes of 20 per cent compared with a year before. Consumption growth also picked up as unemployment fell to 5.2 per cent by mid-year. As a result, core inflation has been rising. In the short term New Zealand will be hit by the global slowdown, although it is well placed to benefit from the global rebound projected from the second half of 2002.

While the government is likely to continue to run operating surpluses, gross debt will be pushed up by a significant investment programme. Improved spending discipline will be necessary to maintain fiscal prudence over the medium term. Interest rates may need to fall further during the present period of uncertainty but will need to be tightened quickly when the rebound becomes evident.

Exports are booming…

Growth of real output picked up in the first half of 2001 to around its potential rate of 2½ to 3 per cent. While this is not a spectacular performance, it disguises large real income gains caused by booming terms of trade. Export earnings benefited from high prices for New Zealand's main commodity exports, good climatic conditions and a very competitive exchange rate. In local-currency terms, commodity export prices were 50 per cent higher at mid-year than at their last cyclical low in mid-1999. The tourism industry also benefited from the depreciation. Consequently, the current account deficit fell to 4 per cent of GDP in the year ending in June, down 3 percentage points from a year earlier.

… and are lifting the rest of the economy

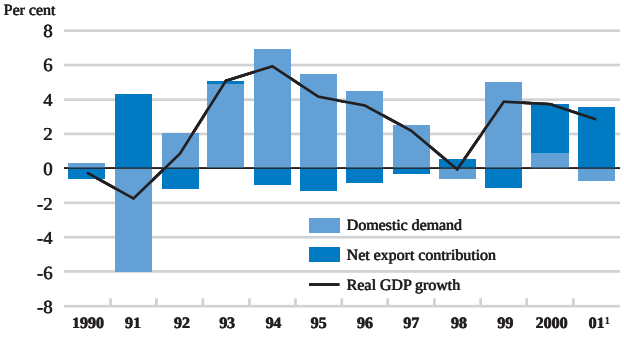
The strong export sector has been lifting the rest of the economy. Rising household incomes have boosted consumption, capacity utilisation is high, and the labour market has improved markedly: despite a rising participation rate, the unemployment rate has fallen to its lowest level since 1988. This has begun to put pressure on both wages and prices. Even excluding petrol prices, consumer price inflation is at the top of the 0 to 3 per cent target range. Most measures of core inflation are also in the top half of the target range, and rising.

Monetary policy has been cautious

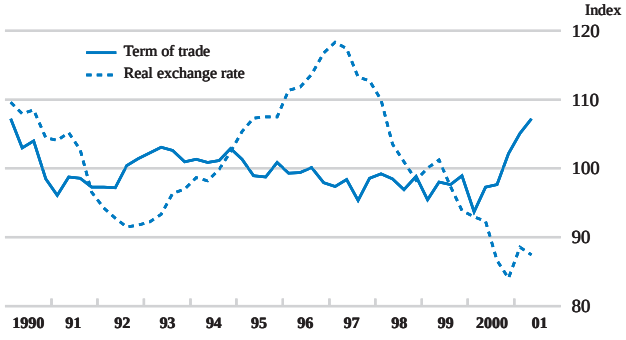
Given the low exchange rate and continuing price pressures, interest rates were held slightly tighter than neutral until the 11 September terrorist attacks. They were then lowered by ½ percentage point to 5¼ per cent and are assumed to fall by that

New Zealand

The external sector has been sustaining activity



Export prices have also helped



1. First half change at annual rate.
Source: OECD.

New Zealand: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion NZ$	Percentage changes, volume (1995/96 prices)				
Private consumption	60.9	3.5	1.5	1.8	1.3	3.0
Government consumption	18.7	6.1	-3.2	3.0	2.5	2.5
Gross fixed capital formation	20.0	2.7	7.0	-5.2	2.3	6.2
Final domestic demand	99.7	3.9	1.6	0.6	1.7	3.5
Stockbuilding [a,b]	0.0	1.1	-0.6	0.0	0.0	0.0
Total domestic demand	99.7	5.0	0.9	0.2	1.7	3.5
Exports of goods and services	29.8	7.1	7.6	4.2	1.3	8.0
Imports of goods and services	29.6	11.7	1.1	-0.4	1.1	7.5
Net exports [a]	0.3	-1.3	2.0	1.5	0.1	0.4
GDP (expenditure) at market prices	100.0	3.7	3.0	1.9	1.8	3.8
GDP deflator	_	-0.4	2.5	4.7	1.2	1.8
Memorandum items						
GDP (production)	_	3.9	3.7	2.4	1.8	3.8
Private consumption deflator	_	0.3	1.9	2.1	1.9	1.6
Unemployment rate	_	6.8	6.0	5.3	5.8	5.4
General government financial balance [c]	_	0.9	1.9	1.3	0.1	-0.3
Current account balance [c]	_	-6.7	-5.5	-3.1	-3.9	-3.8

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) Including statistical discrepancy.
c) As a percentage of GDP.
Source: OECD.

much again by early 2002. However, they may need to rise during 2002 in anticipation of a strong economic rebound.

Fiscal pressures are significant

The June 2001 fiscal year delivered a central government operating surplus of 1.3 per cent of GDP, approximately unchanged from the previous year. Nevertheless, fiscal pressures are becoming increasingly difficult to absorb. Projected operating surpluses are not sufficient to cover the Government's investment programme, which includes significant spending on infrastructure, NZ$6 billion over the next four years to partially pre-fund superannuation, and the re-nationalisation of Air New Zealand and Auckland's rail infrastructure assets. Consequently, gross debt may begin to rise.

The immediate prospects look bleak, but the slowdown will be short-lived

The outlook over the next six months is poor. The global slowdown will take some of the steam out of the export sector, with the tourism industry likely to be especially hard hit. Export prices are expected to fall as world demand softens, but the impact will be cushioned because part of the strength in commodity prices reflects structural rather than cyclical factors. Heightened uncertainty is likely to put investment plans on hold but prospects are good for a return to growth at or above potential rates in the second half of 2002 as foreign markets bounce back, giving a strong boost to exports through to the end of the projection period. The exchange rate is at an extremely competitive level, while interest rates are stimulatory and the fiscal stance will be expansionary, helping to restore momentum to the domestic economy. The net effect of these forces is projected to result in GDP growth of 1¾ per cent in 2002 and 3¾ per cent in 2003. The risks to the outlook are a deeper or more protracted global downturn, or a sudden and vigorous bounce-back on the back of the low currency, as occurred in the early 1990s. In either case monetary policy would need to react quickly.

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Norway

The slump in international trade has started to influence Norwegian activity but the impact has been relatively limited. Continuing moderate output growth will be supported by an easing of fiscal policy and strong wage gains. Despite some rise in unemployment, the economy remains characterised by a tight labour market and high capacity utilisation.

Against this background, an expansionary fiscal stance will make it difficult to achieve moderate wage increases by means of the traditional incomes policy. Strong wage gains would undermine the aim of preventing the erosion of the traditional exposed sector. Increases in public spending on priority areas should be accompanied by cuts elsewhere. Furthermore, public-sector and product-market reforms would help to improve productivity growth.

Output growth has remained moderate in 2001

With output close to potential and a tight monetary policy stance, growth in 2001 has remained moderate. Vacancies have dropped somewhat, but with an unemployment rate of 3.6 per cent, the labour market is still tight. House prices have continued to rise. On the other hand, due to the halving of the VAT rate on food in July, consumer price inflation has dropped from a peak of 4.3 per cent in May to 2.2 per cent in October and is no longer above the euro area average, though this is likely to be temporary given continuing strong rises in labour costs. Up to now, consumer sentiment is broadly unchanged while business sentiment is heading downwards.

Fiscal policy will be expansionary in the coming years…

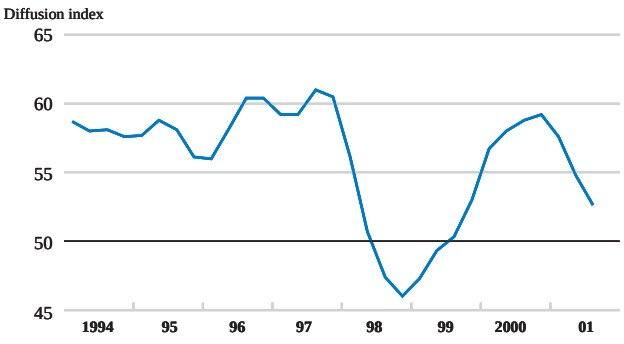
While fiscal policy is estimated to loosen marginally in 2001, the 2002 budget will be clearly expansionary through higher outlays and especially tax cuts. Continued fiscal stimulus can be expected thereafter, as Parliament recently approved more spending of the petroleum revenues. Despite the expected easing of fiscal stance, the government surplus is projected to stay clearly above 10 per cent of GDP in 2002 and 2003.

… while monetary policy is likely to remain cautious

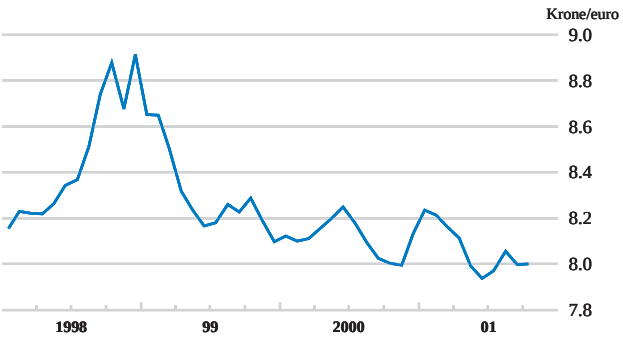
Due to the relaxation of fiscal policy and persisting cost pressures, the Norges Bank was one of the few central banks that did not cut rates after the 11 September terrorist attacks in the United States. The key deposit rate has been kept at 7 per cent since September 2000. In October, however, the Central Bank moved to an easing bias. The introduction in 2001 of an inflation target of 2.5 per cent two years ahead, essentially formalised the implicit objective that was already in place. Notwithstanding

Norway

Business sentiment is heading downwards[1]



The krone has been fairly stable recently



1. Manufacturing sector. The diffusion index has a turning point of 50.
Source: Statistics Norway.

Norway: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion NOK	Percentage changes, volume (1997 prices)				
Private consumption	552.8	2.2	2.4	1.9	2.8	2.9
Government consumption	238.3	3.3	1.4	2.2	2.2	2.5
Gross fixed capital formation	289.5	-8.2	-1.1	-0.1	-0.6	1.4
Final domestic demand	1 080.5	-0.3	1.3	1.5	1.8	2.5
Stockbuilding [a]	24.4	-0.3	0.8	-0.1	0.0	0.0
Total domestic demand	1 104.9	-0.7	2.2	1.3	1.8	2.4
Exports of goods and services	411.6	2.8	2.7	2.2	1.9	3.2
Imports of goods and services	401.7	-1.6	2.5	1.1	1.0	4.1
Net exports [a]	9.9	1.7	0.2	0.5	0.4	-0.1
GDP at market prices	1 114.8	1.1	2.3	1.7	2.1	2.2
GDP deflator	_	6.2	16.3	4.3	-0.1	5.1
Memorandum items						
Mainland GDP at market prices [b]	_	1.0	1.8	1.2	1.2	2.2
Mainland GDP deflator [b]	_	2.7	3.7	5.2	3.9	3.1
Exports of non-manufactures (incl. energy)	_	2.4	4.5	4.0	5.5	2.3
Private consumption deflator	_	2.0	3.1	3.0	1.7	2.5
Unemployment rate	_	3.2	3.4	3.5	3.7	3.6
Household saving ratio [c]	_	7.3	7.6	8.0	8.4	8.1
General government financial balance [d]	_	5.9	14.8	14.3	11.5	11.7
Current account balance [d]	_	3.9	14.3	14.2	12.5	14.0

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) GDP excluding oil and shipping.
c) As a percentage of disposable income.
d) As a percentage of GDP.
Source: OECD.

the changes in the fiscal policy guidelines, the formalisation of inflation targeting and sharp oil price swings, the Norwegian krone has been relatively stable *vis-à-vis* the euro. However, mainly due to the sharp weakening of the Swedish krone, the Norwegian currency has appreciated significantly in effective terms since the beginning of the year.

The economy will remain close to full capacity

As the impact of the easing of fiscal policy and further sizeable real wage rises should be broadly offset by weak international activity, tight monetary conditions and a deterioration in competitiveness, growth is expected to remain moderate in 2002. Mainland GDP growth is projected at only 1¼ per cent in 2002, but should accelerate to 2¼ per cent in 2003 due to the international recovery. Unemployment could rise somewhat but the labour market will remain tight. As a result, labour cost are expected to rise, thus limiting the room for a monetary easing. As the drop in oil prices is assumed to be temporary, the current account surplus should fall in 2002 but to rise again in 2003, to 14 per cent of GDP.

The risks to the projection are substantial

Apart from the usual substantial uncertainty about investment by the petroleum sector, there are considerable risks related to international trade and the coming wage round. If the international recovery is delayed, Norwegian exports would suffer but a pronounced downturn in activity is unlikely. Although the wage-leading export industries will be most influenced by the international slowdown, the persistence of a tight labour market may lead to stronger than projected wage rises, which would lower exports further via adverse competitiveness effects in the medium term, even though it would raise consumption in the short run.

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Poland

GDP growth slowed sharply in the first half of 2001 reflecting investment weakness, while an associated cut in import growth reduced the current account deficit. With demand weak and unemployment high and rising, inflation declined to 4 per cent in October 2001. Output growth is projected to remain weak through much of 2002 before picking up somewhat in 2003, allowing the unemployment rate to stabilise at around 19 per cent.

A combination of tighter fiscal and easier monetary policies would improve the chances for a stronger recovery without endangering the recent reduction of domestic and external imbalances. Given high unemployment levels, resolute action is required to remove labour market rigidities and further improve the business environment.

Declining investment and a sharp fall in exports have led to slower growth…

Aggregate output growth slowed to 1.6 per cent (year-on-year) during the first half of 2001. Final domestic demand was virtually stagnant. A 1.7 per cent rise in consumption was largely offset by a 4 per cent drop in investment due, in large part, to a rise in already high real interest rates. Declining world demand and a substantial appreciation of the currency contributed to a sharp decline in export growth. However, imports decelerated even more so that the contribution of net exports to GDP growth was positive. As a result, the current account deficit (on a cash basis) decreased, from about 7 to below 5 per cent of GDP between the first halves of 2000 and 2001.

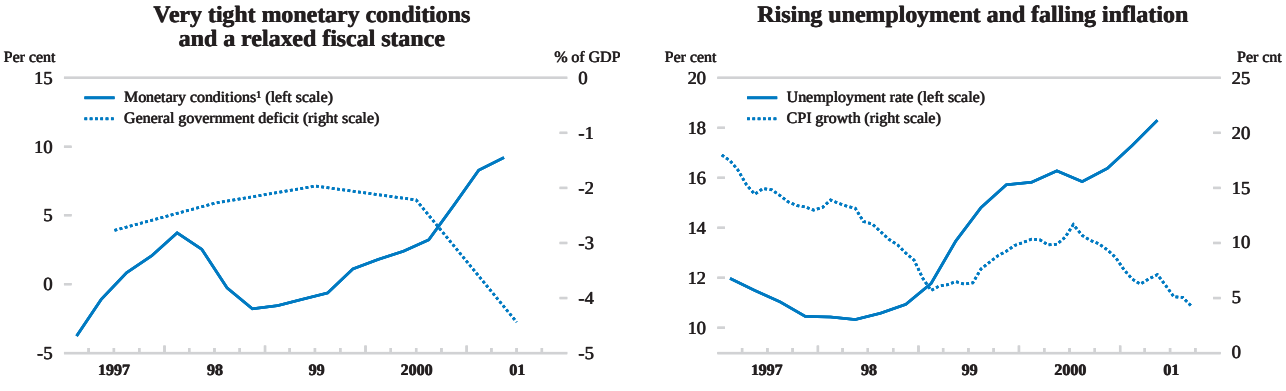
… a sharp rise in unemployment and a decline in inflation

The slowdown in activity led to a 1½ per cent decline in employment and an increase in the unemployment rate to almost 19 per cent in the second quarter. Weak labour market conditions were reflected in the slow growth of real wages through the first nine months of the year, even as labour productivity rose substantially. This contributed to the continued decline of inflation from 7.4 per cent at the beginning of the year to 4 per cent in October.

Fiscal policy is loose, while monetary policy is very tight

The macroeconomic policy mix has exacerbated difficulties. Fiscal policy has been relaxed excessively, with the general government deficit expected to double in 2001 to 4.4 per cent of GDP (on a national accounts basis). This deterioration has reflected not only the operation of automatic stabilisers but also a substantial increase in discretionary spending. Partly in reaction to this, the central bank has

Poland



1. The monetary conditions index was computed as a weighted average of changes in real interest rates and real effective exchange rates.
Source: OECD.

Poland: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion Zl	Percentage changes, volume (1995 prices)				
Private consumption	352.1	5.3	2.6	1.7	1.5	2.9
Government consumption	85.5	1.0	1.1	0.3	0.9	1.9
Gross fixed capital formation	139.2	9.2	-1.6	-2.6	2.4	6.8
Final domestic demand	576.8	5.7	1.3	0.4	1.6	3.7
Stockbuilding [a,b]	5.8	-0.3	0.5	-0.4	0.0	0.0
Total domestic demand	582.6	5.3	1.7	0.0	1.6	3.7
Exports of goods and services	155.9	-3.2	32.9	12.5	8.5	11.1
Imports of goods and services	184.9	1.1	23.1	7.0	6.8	9.3
Net exports [a]	- 29.0	-1.4	1.6	1.8	0.6	0.7
GDP at market prices	553.6	4.0	4.0	1.5	1.8	4.0
GDP deflator	_	6.9	7.1	5.3	5.7	3.9
Memorandum items						
Private consumption deflator	_	6.9	9.6	5.4	5.0	4.0
Unemployment rate	_	13.9	16.1	17.9	19.3	19.1
General government financial balance [c]	_	-2.0	-2.2	-4.4	-4.9	-4.9
Current account balance [c]	_	-8.1	-7.5	-6.2	-5.7	-5.7

Note: National accounts are based on chain-linked data. This introduces a discrepancy in the identity between real demand components and the GDP. For further details see *OECD Economic Outlook* Sources and Methods, *(http://www.oecd.org/eco/sources-and-methods).*

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.

b) Including statistical discrepancy.

c) As a percentage of GDP.

Source: OECD.

raised interest rates to very high levels. This, along with a substantial real appreciation of the currency, resulted in very tight monetary conditions at a time when the economy was already slowing and inflation falling. While policy rates have been lowered recently, they remain extremely high – close to 12 per cent in real terms.

GDP growth is expected to remain subdued before recovering from mid-2002

The overall weakness in the first three-quarters of 2001 is expected to be exacerbated by a general world-wide slowdown in economic activity following the 11 September terrorist attacks in the United States. As a result, GDP is expected to increase by only 1.5 per cent this year and only somewhat more in 2002, as investment activity remains weak and labour market conditions depress consumer demand. As international uncertainty is reduced, exports and investment spending are expected to pick up, leading to a moderate recovery in demand from around mid-2002. The weakness of the economy should permit the central bank to reduce interest rates substantially and still achieve its inflation targets. While a pick-up in growth should see the unemployment rate stabilise in 2003, unemployment will remain a serious problem. Concrete steps need to be taken to increase labour market flexibility and enhance entrepreneurial activity.

Prospects remain sensitive to external and domestic confidence, as well as to interest rate levels

The future evolution of consumer and business confidence (both within Poland and abroad) are important sources of risk. If investments are not postponed, as projected, or if consumers do not increase precautionary savings, the slowdown could be both less serious and shorter-lived. However, if world events deteriorate further, a deeper and more prolonged slowdown cannot be ruled out. In addition to these risks, which are shared by all OECD countries, the projected recovery could be threatened if interest rates fail to come down as assumed.

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Portugal

A broad-based slowdown in economic activity started towards the end of 2000 and has continued into 2001. Real output growth might average less than 2 per cent this year, much below the rate of the past five years. A recovery is projected in the second half of 2002, as export markets strengthen and increased European Union transfers boost investment. By 2003, GDP growth could reach almost 3 per cent, close to potential. The current slowdown is helping to correct macroeconomic imbalances. Inflation is coming down and the current account deficit is expected to narrow gradually to below 9 per cent of GDP in 2003.

The cyclical downturn has increased the difficulties already encountered in budget implementation in recent years. To contain slippage from the fiscal targets for 2002 and 2003 established in the latest stability programme, decisive measures will be required. They should aim at improving control over government spending, including strong action to rein in the public sector payroll and further structural reform in the health and other social spending areas.

Activity has been slowing and inflation has declined

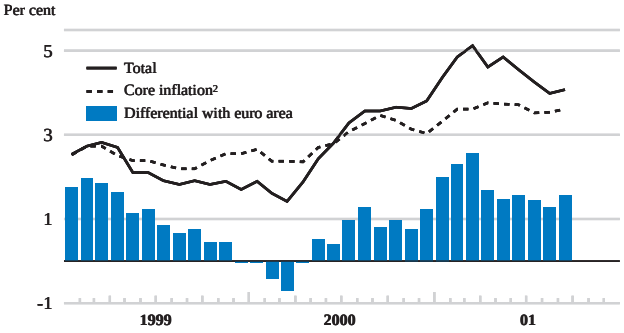
Activity continued to decelerate in the course of 2001, as a result of slowing domestic demand and much weaker export markets. Real output is estimated to grow by less than 2 per cent on average, after five years of expansion in excess of 3 per cent. Employment growth is slowing and the unemployment rate is edging up, to a little over 4 per cent, just above its estimated structural rate. Weaker demand pressures and the unwinding of special factors (notably the removal of restrictions on domestic oil price hikes in early 2000) led to a marked decline in consumer price inflation (CPI), which fell to around 4 per cent from mid-year, still much higher than the euro area average. The household saving ratio appears to have risen, reversing the trend observed during the late 1990s. The current account deficit, having peaked at above 10 per cent in 2000, is estimated to come down towards 9 per cent of GDP in 2001.

Fiscal targets have been vulnerable to the cyclical downturn

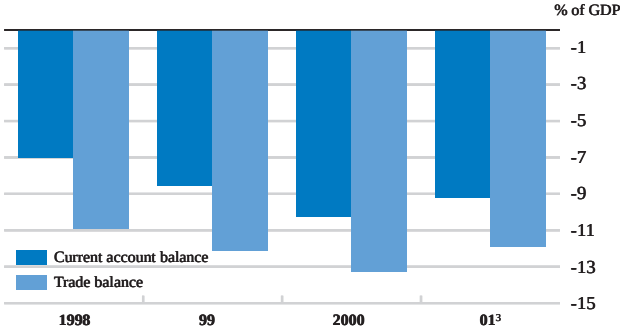
Budget revenue has been significantly lower than projected, mostly as a result of the economic slowdown. The shortfall was only partly offset by higher social security contributions, and the government implemented a series of emergency budget cuts around mid-2001. The authorities have recognised that the deficit target for 2001 will not be met in spite of those cuts. It might exceed the target of 1.1 per cent of GDP, set in the stability programme, by well over half a percentage point.

Portugal

Inflation is still above euro area average[1]



The current account deficit has stopped widening



1. Harmonised index of consumer price. Year-on-year percentage change.
2. Excluding energy, food, alcohol and tobacco.
3. Estimates.

Sources: Banco de Portugal; OECD.

Portugal: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	63.7	5.0	2.5	1.5	1.4	2.2
Government consumption	19.0	4.5	3.8	2.2	2.2	2.2
Gross fixed capital formation	26.3	6.6	5.1	2.2	3.2	5.0
Final domestic demand	109.1	5.3	3.3	1.8	2.0	2.9
Stockbuilding [a]	0.4	0.2	-0.3	-0.1	0.0	0.0
Total domestic demand	109.5	5.5	3.1	1.7	2.0	2.9
Exports of goods and services	30.8	3.4	6.6	3.4	3.3	7.6
Imports of goods and services	40.1	8.9	5.1	2.6	3.3	6.8
Net exports [a]	- 9.3	-2.7	-0.1	0.0	-0.4	-0.5
GDP at market prices	100.2	3.3	3.3	1.9	1.8	2.8
GDP deflator	_	3.3	3.2	5.0	4.5	3.5
Memorandum items						
Private consumption deflator	_	2.3	2.9	4.3	3.5	3.0
Unemployment rate	_	4.4	4.0	4.2	4.4	4.4
Household saving ratio [b]	_	7.7	8.7	9.0	9.3	9.6
Current account balance [c]	_	-8.6	-10.3	-9.2	-9.0	-8.8

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of disposable income.
c) As a percentage of GDP.
Source: OECD.

This outturn is only slightly lower than the deficit for 2000, once adjusted for exceptional proceeds from the sale of mobile phone licenses that year (equivalent to 0.4 per cent of GDP). Given the background of slowing activity, however, it implies a tighter fiscal policy than in 2000. Looking ahead, the budget deficit is assumed to decline marginally towards 1½ per cent of GDP in 2003, almost 1 percentage point over the deficit target set in the latest stability programme. Decisive new fiscal measures are required to assure a consolidation path. The new framework for budget planning and control that is being implemented could bring benefits in that regard, but its impact is still uncertain.

Economic momentum will be regained in the second half of 2002…

The expected further decline in euro area interest rates should contribute to a recovery of domestic demand in the course of 2002, though real output growth is expected to gain momentum only in the second half reaching around 3 per cent on average in 2003. Investment spending should be further supported by a pick-up in European Union (EU) transfers, and net exports are projected to accelerate. The decline in inflation in combination with moderate wage gains, should allow real disposable income to continue to increase and private consumption to recover. The current account deficit is projected to continue to fall gradually, to below 9 per cent of GDP in 2003, as the terms of trade improve.

… but there are external uncertainties as well as domestic risks

The uncertainties attached to the outlook chiefly concern the external environment, particularly the timing and speed of the recovery in Europe. In addition, if wages continue to rise at the strong pace observed recently, cost-price competitiveness would be further eroded, putting at risk the current account adjustment process underway. While tightening fiscal policy should support adjustment, there are risks in this regard: public spending will need to be strictly controlled so as to ensure that fiscal consolidation does not stall, thereby undermining investors' confidence.

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Slovak Republic

After two years of contraction, a rebound in domestic demand is driving economic growth, thus helping to attenuate the impact of negative trends in the world economy. Investment, much of it linked to privatisation and inflows of foreign direct investment, is projected to help sustain growth at around 3 per cent in 2002, while widening the current account deficit. Unemployment is expected to remain very high at around 19 per cent, with inflation above 6 per cent.

Continuing the stabilisation programme, which has allowed the government to meet its inflation and budgetary targets, is a pre-requisite for consolidating the current expansion. It is important that the budget deficit in 2002 does not exceed the target of 3½ per cent of GDP. Structural reforms aimed at improving the business environment should be a priority to boost growth and job creation.

Strong domestic demand is driving growth

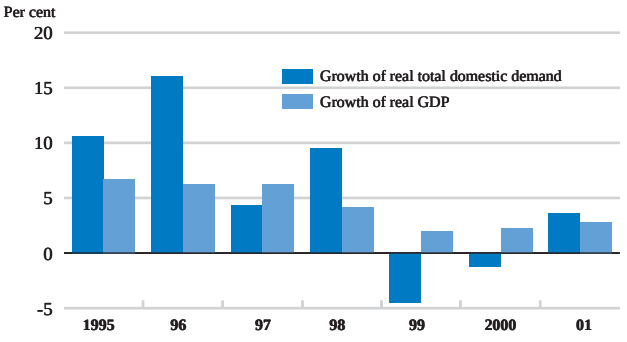
Output growth accelerated to 3 per cent in the first half of 2001, underpinned by buoyant domestic demand and led by a 14 per cent rise in fixed investment. The strength of domestic demand, which contracted sharply in 1999 and 2000, has thus far protected Slovakia from the negative trends experienced in most OECD countries. Buoyant imports, particularly for investment goods, widened the current account deficit from 4 per cent of GDP in 2000 to 7½ per cent in the first half of 2001, despite continuing strong export growth. The external deficit in 2000 was financed by inflows of foreign direct investment (FDI) amounting to 10½ per cent of GDP, and additional large inflows related to privatisation are expected in 2001 and 2002. Employment growth remained subdued relative to the increase in the labour force, pushing the unemployment rate over 19 per cent. Inflation has slowed from 8.7 per cent in 2000 to around 7½ per cent (year-on-year) in September, well within the central bank's target band of 6.7 and 8.2 per cent for end-2001.

Macroeconomic policies are focused on meeting inflation and budget targets…

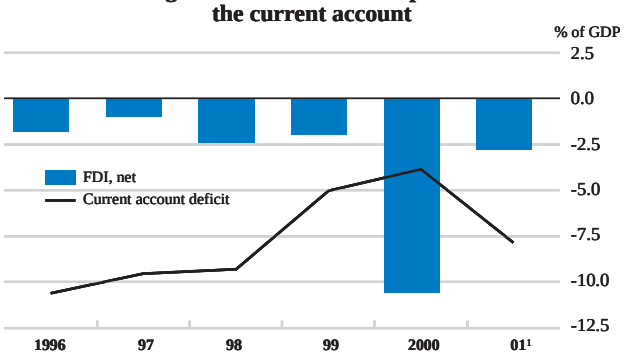
To contain potential inflationary pressures, key policy interest rates have remained unchanged since March 2001. Moreover, the restructuring of the banking sector is also contributing to some tightening of credit conditions, as the newly-privatised banks implement new lending strategies. On the fiscal side, the authorities are committed to keeping the general government budget deficit below 4 per cent of GDP in 2001 by cutting current expenditures by 1.5 per cent of GDP. In 2002, the

Slovak Republic

Rebound of domestic demand sustains growth



Foreign direct investment helps finance the current account



1. FDI figures cover the period January-May.
Source: Statistical Office of the Slovak Republic.

Slovak Republic: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion SkK	Percentage changes, volume (1995 prices)				
Private consumption	400.4	-0.2	-3.4	2.3	2.5	3.5
Government consumption	161.4	-6.9	-0.9	2.0	3.0	1.0
Gross fixed capital formation	285.3	-18.8	-0.7	7.4	6.5	10.0
Final domestic demand	847.1	-7.7	-2.1	3.8	3.8	5.1
Stockbuilding [a]	- 14.0	3.5	0.8	-0.1	-0.1	-0.4
Total domestic demand	833.1	-4.6	-1.3	3.5	3.6	4.5
Exports of goods and services	459.5	3.4	15.9	10.0	7.5	9.6
Imports of goods and services	541.8	-6.0	10.2	11.0	8.0	10.0
Net exports [a]	- 82.3	7.0	3.6	-0.8	-0.5	-0.5
GDP at market prices	750.8	1.9	2.2	2.7	3.1	4.1
GDP deflator	_	6.6	6.5	5.4	5.3	5.5
Memorandum items						
Private consumption deflator	_	10.2	11.3	7.0	6.0	6.0
Unemployment rate	_	16.4	18.8	19.1	18.9	18.4
Current account balance [b]	_	-5.0	-3.8	-7.8	-8.0	-8.4

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of GDP.
Source: OECD.

budget deficit is to be reduced to between 3 and 3½ per cent of GDP. However, the prospects for further fiscal consolidation may be hindered by recent cuts in personal and corporate income tax rates and the creation of a regional level of government, which will likely increase public expenditures, at least in the short term. The reform of the pension system also creates additional pressure for public spending.

… while structural reforms, including privatisation, are essential to promote growth

The sale of government-owned banks to foreign investors has laid the foundation for a market-based financial system. The privatisation programme is continuing with the sale of public monopolies in electricity and gas which, accompanied by a new regulatory framework, should also boost efficiency. Recent measures to improve corporate governance and reform bankruptcy procedures need to be implemented to promote restructuring. Such reforms should be part of an effort to improve the business environment, aiding the creation of new enterprises and employment and encouraging inflows of FDI.

Domestic demand is projected to sustain the expansion

Despite the deterioration in economic prospects in its major trading partners, GDP growth is projected to remain at around 3 per cent in 2002 and increase to 4 per cent in 2003 based on the strength of domestic demand. Investment, sustained by FDI inflows and public infrastructure works, is likely to be the driving force of the expansion. Private consumption is expected to be supported by employment growth, a recovery in real wages and lower income taxes. Given the rapid increase in the working-age population, however, a significant decline in the unemployment rate is unlikely, while adjustments in regulated prices will keep inflation around 6 per cent. There are both domestic and external risks to these projections. On the domestic side, recent income tax cuts and looser fiscal discipline during the run up to general elections in the autumn of 2002 could result in some fiscal slippage, reversing the gains of the stabilisation programme of the past three years. On the external side, a sharper-than-expected decline in external demand could slow export growth and reduce the FDI which is needed to finance the growing current account deficit.

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Spain

GDP growth continued to slow in the second quarter of 2001 to an annual rate of just below 3 per cent, reflecting a decline in exports and weaker private consumption. Due to lower energy prices, headline inflation decelerated but underlying inflation has remained high. Activity will slow further in the coming months as both net exports and consumer confidence are bound to weaken, but it should start to recover by the middle of next year, with output growth rebounding to over 3 per cent in 2003.

A balanced budget is planned for 2002, based on growth projections that now appear optimistic. While lower-than-expected activity will adversely affect revenues, it is important that public spending be kept under strict control, in order to limit the shortfall from the budget deficit target. The reform of the collective bargaining system that is being negotiated among social partners should aim at establishing a closer link between wage and productivity growth. Such policies would help to reduce the inflation differential with the euro area.

Activity has slowed as export growth has diminished markedly

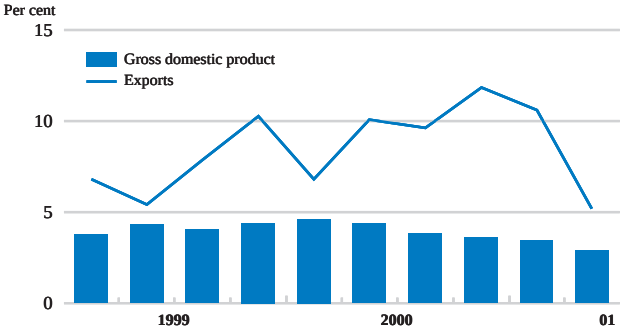
Export growth fell sharply in the first half of 2001 to only 2½ per cent, mainly reflecting lower demand from the rest of Europe. But domestic demand was more resilient during the first semester than in the euro area average. In particular, investment in construction remained strong, as real interest rates were low and real estate became an attractive alternative to stock market investment. However, consumption slowed significantly in the second quarter. Indicators of domestic demand give a mixed picture for the rest of the year. Car sales have been strong in recent months and leading indicators for construction activity have remained buoyant, but consumer confidence has deteriorated since the summer and industrial production has fallen. The swift deceleration of GDP has also been reflected in more sluggish job creation, while registered unemployment has started to rise.

Lower oil prices have moderated inflation

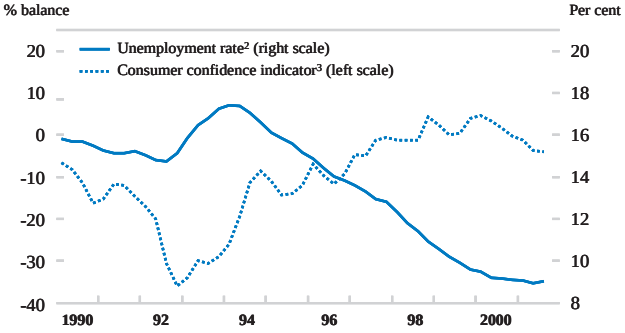
The decline in the oil price has moderated the pace of headline inflation since May, when it hit 4.3 per cent. Core inflation reached 3.7 per cent in October, but should also decelerate soon reflecting the fall in industrial prices observed during 2001. The differential with the euro area, both for headline and core inflation, has diminished from around 1½ per cent in January to less than 1 per cent. Wages increased at the beginning of the year from 3 per cent to 3½ per cent as catch-up clauses to compensate for past inflation were activated, but they have since stabilised.

Spain

Exports have further slowed GDP growth[1]



Confidence has turned down as unemployment has stabilised



1. Year-on-year percentage change of seasonally adjusted data.
2. Registered unemployment.
3. Seasonally adjusted.

Source: OECD.

Spain: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion euros	Percentage changes, volume (1995 prices)				
Private consumption	313.0	4.7	4.0	2.8	2.2	3.0
Government consumption	92.1	4.2	4.0	1.9	2.0	2.0
Gross fixed capital formation	120.5	8.8	5.7	3.3	1.8	4.5
Final domestic demand	525.6	5.6	4.4	2.8	2.1	3.2
Stockbuilding [a]	2.1	0.1	-0.1	0.0	0.0	0.0
Total domestic demand	527.7	5.6	4.2	2.7	2.0	3.2
Exports of goods and services	143.9	7.6	9.6	4.3	3.8	7.4
Imports of goods and services	143.6	12.8	9.8	4.2	3.7	7.3
Net exports [a]	0.2	-1.5	-0.2	0.0	-0.1	-0.1
GDP at market prices	528.0	4.1	4.1	2.7	2.0	3.2
GDP deflator	_	2.9	3.4	4.1	3.1	2.5
Memorandum items						
Private consumption deflator	_	2.4	3.2	3.7	2.5	2.4
Unemployment rate	_	15.9	14.1	13.3	13.7	13.0
Household saving ratio [b]	_	11.7	11.2	10.7	11.3	11.2
General government financial balance [c]	_	-1.2	-0.3	0.0	-0.4	0.0
Current account balance [c]	_	-2.3	-3.1	-2.4	-2.0	-2.0

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of disposable income.
c) As a percentage of GDP.
Source: OECD.

The fiscal stance is likely to remain neutral in 2001 and 2002

Despite weak revenues from indirect taxes in the first half of the year, the target of a balanced budget for 2001 is likely to be met thanks to strong social security contributions. The budget for 2002 is based on a growth projection of 2.9 per cent, and aims again at a balanced budget. Spending priorities are infrastructure and research and development (R&D) investment and education. On the revenue side, the budget incorporates some changes to corporate taxation, with higher tax allowances and a more favourable treatment of capital gains. However, the impact of these changes and of the greater taxing powers of the Autonomous Communities has not been quantified, and the budget is therefore difficult to interpret. The OECD projects a small budget deficit for 2002, reflecting weaker growth than assumed in the budget.

GDP will decelerate further in the short run, but should pick up later in 2002

Growth may be quite weak for several quarters. Exports, which are likely to have been almost flat during the second half of 2001, may remain weak until global demand picks up. Equipment investment is unlikely to recover in the short term. Consumer sentiment is likely to deteriorate further as employment prospects become bleaker and the international environment remains uncertain, inducing a higher household savings ratio and sluggish consumption. But improving international environment and the lagged effect of interest rate cuts should be felt progressively during 2002, with growth returning to close to 3 per cent in the second half of the year. On average, growth could be around 2 per cent in 2002 and rise to over 3 per cent in 2003. Inflation is likely to stabilise at near 2½ per cent as the output gap will remain close to zero.

The economy risks a more marked slowdown if confidence deteriorates sharply

Downside risks attach to these projections. If consumer and business confidence were to fall more sharply, lower domestic demand could worsen the projected slowdown in activity, especially as many temporary jobs would not be renewed, thereby inducing a faster rise of unemployment.

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Sweden

The favourable combination of vigorous growth and low inflation that Sweden had enjoyed in the four years to 2000 reversed in the first half of this year. In part, the deceleration in output is attributable to the global collapse in demand for information and telecommunication equipment. Currency weakness and domestic factors have caused inflation to pick up more than expected.

Both monetary conditions and fiscal policies are supportive to growth. The budget for 2002 embodies a fiscal stimulus of 1¾ per cent of GDP, primarily in the form of tax cuts, which should lead to renewed growth in private consumption. Recent inflation and exchange-rate developments, along with the aggressive budgetary boost to activity, seem to leave no room for additional cuts in policy-controlled interest rates in the short term, while some tightening of monetary conditions may be warranted towards the end of the projection period.

Output decelerated considerably in the first half of 2001, while inflation picked up

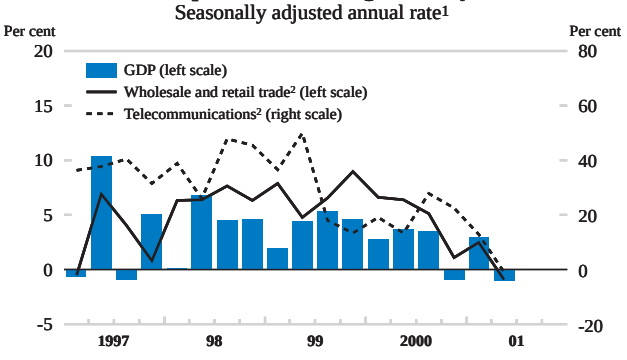
Output growth slowed to 1.6 per cent year-on-year in the first half of 2001, with telecommunications and wholesale and retail trade among the industries most affected. Slowing growth in world trade and Sweden's specialisation in information and communication technology (ICT) goods and services caused an abrupt decline in exports. Moreover, private consumption fell at an annualised rate of ¾ per cent in the second quarter in part reflecting a significant and surprising jump in the saving rate. The inflation measure targeted by the central bank rose rapidly from 1½ to 3 per cent early this year and jumped to 3.4 per cent in September, in contrast with the recent fall in inflation in most other European Union countries. While domestic factors such as higher rents have been mainly responsible hitherto, the exchange rate weakening over the past year is expected to cause inflation to increase further in the short term. The pace of employment growth has fallen, with absolute declines recorded in manufacturing, leading to a bottoming out in unemployment.

The expansionary fiscal stance in 2002 and easier monetary conditions will support activity

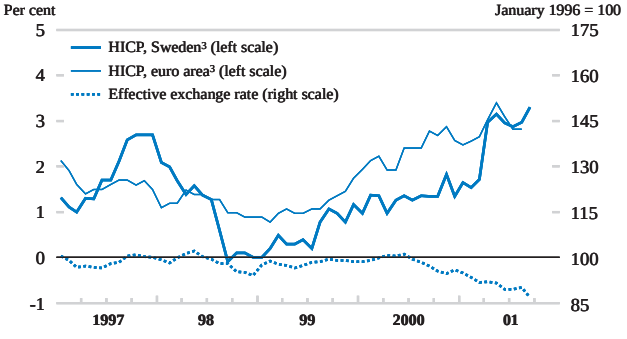
The budget for 2002 includes a fiscal stimulus of some 1¾ per cent of GDP, which will contribute to the expected 4½ per cent increase in real disposable income. The fiscal easing is mostly in the form of tax cuts, which, by reducing marginal tax rates, will have beneficial incentive effects, but tax bases are also narrowed. The general government budget surplus is expected to fall considerably, from 3.8 per cent of GDP in 2001 to 1.6 per cent in 2002. In addition to the expansionary policy stance

Sweden

Output has slowed significantly
Seasonally adjusted annual rate[1]



Inflation has risen more than elsewhere



1. Seasonal adjustment by OECD.
2. 3-quarter moving average.
3. European harmonised consumer price index (HICP). Year-on-year change.

Sources: Statistics Sweden; OECD.

Sweden: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion SKr	Percentage changes, volume (1995 prices)				
Private consumption	956.9	3.8	4.1	1.7	2.9	2.5
Government consumption	509.4	1.7	-1.7	1.2	1.6	1.5
Gross fixed capital formation	304.9	8.1	4.5	-0.9	-2.0	2.9
Final domestic demand	1 771.2	4.0	2.6	1.1	1.7	2.3
Stockbuilding [a]	15.0	-0.5	0.6	-0.1	-0.1	0.0
Total domestic demand	1 786.2	3.4	3.2	1.0	1.5	2.3
Exports of goods and services	832.6	5.9	9.8	-1.1	1.2	8.2
Imports of goods and services	713.5	4.3	9.7	-2.3	1.0	7.6
Net exports [a]	119.1	1.1	0.9	0.4	0.2	1.0
GDP at market prices	1 905.3	4.1	3.6	1.4	1.6	2.8
GDP deflator	_	0.5	0.8	1.7	2.2	2.5
Memorandum items						
Private consumption deflator	_	0.8	0.9	2.6	3.0	2.5
Unemployment rate [b]	_	5.6	4.7	4.1	4.5	4.7
Household saving ratio [c]	_	2.1	1.9	4.9	6.1	5.9
General government financial balance [d,e]	_	1.7	4.1	3.8	1.6	1.8
Current account balance [d]	_	3.7	2.9	2.3	1.8	2.3

Note: National accounts are based on chain-linked data. This introduces a discrepancy in the identity between real demand components and the GDP. For further details see *OECD Economic Outlook* Sources and Methods, *(http://www.oecd.org/eco/sources-and-methods).*

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) Based on monthly Labour Force Surveys.
c) As a percentage of disposable income.
d) As a percentage of GDP.
e) Maastricht definition.
Source: OECD.

and cyclical weakness, this is due to the disappearance of exceptionally high revenues in 2000 and 2001 from corporate and capital gains taxes. Following the 11 September terrorist attacks in the United States, the *Riksbank* reduced the repo rate by ½ percentage point, thereby returning it to its year-earlier level. The effective exchange rate has depreciated by around 10 per cent thus far this year, loosening overall monetary conditions.

Slow GDP growth is projected to raise unemployment in 2002, but to recover in 2003

Real GDP is projected to expand by 1.6 per cent next year, before growth strengthens to 2¾ per cent in 2003. Overall, output gains are expected to remain modest in 2002, despite the significant macroeconomic stimulus, mainly because of the product mix of Sweden's exports, notably its exposure to ICT goods and services. With uncertainty persisting and confidence weak, losses of export market shares and postponement of investments are expected. However, the low real effective exchange rate by historical standards should help exports to recover strongly once these factors subside. Unemployment is expected to edge up, as productivity gains resume normal rates following mediocre progress in 2000 and 2001. Thus, higher inflation this year and next is not expected to feed into wage behaviour, eventually allowing consumer price increases to moderate from 3 per cent in 2002 to 2½ per cent in 2003.

Risks are considerable, in part due to Sweden's ICT exposure

Downside risks to the projection stem mainly from external factors, including uncertainty about the duration and severity of the ICT cycle. A related source of uncertainty is the future evolution of the effective exchange rate. An early, significant appreciation, as assumed by both the *Riksbank* and the government, could help to contain inflation. On the other hand, the spill-over to wage increases from higher inflation in 2001 and 2002 might be greater than projected.

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Switzerland

GDP growth slowed somewhat in the first half of 2001. This slowdown in activity is likely to become more pronounced until the first half of 2002, with continuing weakness on the external front and loss of momentum in domestic demand. GDP growth is projected to fall back to 1 per cent in 2002, before picking up to 2 per cent in 2003. Inflation, already moderate, could edge down to ¾ per cent in 2002-03.

The recent easing of monetary policy appears appropriate in order to support activity and limit the substantial appreciation of the Swiss franc, which is being used as a safe heaven in the current uncertain international context. A further relaxation could be necessary if a steep exchange rate appreciation were to weaken the economy further. The federal authorities should allow the built-in fiscal stabilisers to operate if, as is likely, the slowdown in activity makes it difficult to attain the target of a budget surplus in 2002. It is also important to pursue the efforts to increase competition and improve the functioning of the domestic market, where there is substantial room for further progress.

Activity has slowed because of the weaker external environment, while inflation has declined

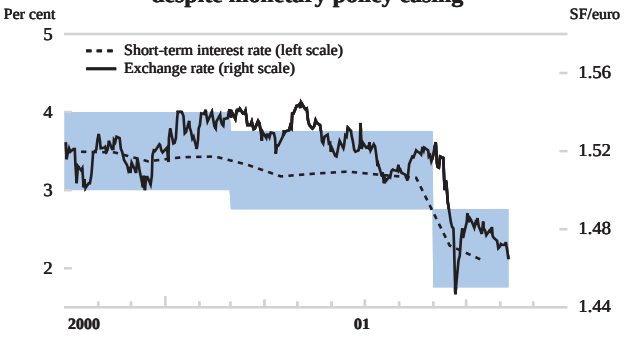
Output growth slowed to under 2 per cent in the second quarter of 2001, due to a loss of momentum in equipment investment and a downturn in exports as the external environment worsened. The slowdown, which began in mid-2000 and continued into the second half of 2001 according to leading indicators, has nevertheless been limited by the still robust growth of private consumption. Household expenditure remained buoyant, reflecting high levels of confidence up to the beginning of the third quarter. Consumer confidence dropped however sharply in October 2001 and unemployment rate edged up to 1.9 per cent following a slowdown in job creation. Inflation, which averaged 1.3 per cent year-on-year in the first half of 2001, fell to 0.6 per cent in October as energy prices declined.

The National Bank has significantly eased monetary policy to limit the Swiss franc's appreciation

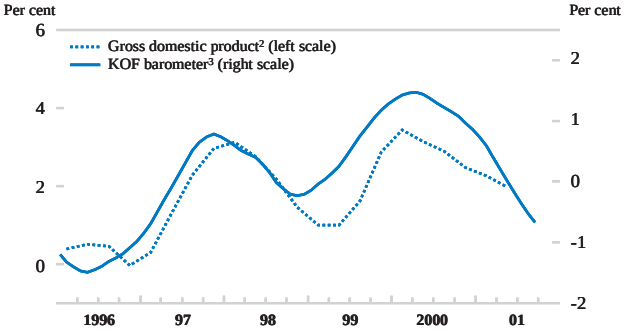
The National Bank eased monetary policy twice in September, lowering the target range for the three-month LIBOR overall by 1 percentage point to 1.75-2.75 per cent. This cut in the key rate was considered necessary in order to limit the appreciation of the Swiss franc, which played its usual role as a safe heaven following the uncertainties created by the 11 September terrorist attacks in the United States. The

Switzerland

The exchange rate has appreciated, despite monetary policy easing[1]



The slowdown in activity continues



1. The boundaries of the shaded "corridor" correspond to the National Bank's intervention rate.
2. Real terms. Year-on-year percentage changes.
3. The KOF barometer is a leading indicator of future GDP growth, with an average lead of 6 to 9 months.

Sources: Swiss Institute for Business Cycle Research/Swiss Federal Institute of Technology of Zurich (KOF) and OECD.

Switzerland: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices billion SF	Percentage changes, volume (1990 prices)				
Private consumption	229.0	2.2	2.0	2.2	1.3	2.1
Government consumption	56.8	0.5	-0.4	0.3	0.4	0.3
Gross fixed capital formation	76.0	3.7	5.8	1.1	0.9	3.8
Final domestic demand	361.8	2.3	2.7	1.6	1.1	2.3
Stockbuilding [a]	3.2	-0.8	0.1	0.2	0.1	0.0
Total domestic demand	365.0	1.5	2.7	1.8	1.1	2.3
Exports of goods and services	153.0	5.9	11.4	0.3	1.0	5.2
Imports of goods and services	138.1	5.3	10.6	0.7	1.1	5.6
Net exports [a]	15.0	0.2	0.3	-0.2	-0.1	-0.2
GDP at market prices	380.0	1.6	3.0	1.7	1.1	2.1
GDP deflator	_	0.6	1.1	1.8	1.3	1.1
Memorandum items						
Private consumption deflator	_	0.4	0.9	0.8	0.5	0.5
Unemployment rate	_	2.7	2.0	1.8	2.2	2.1
Current account balance [b]	_	11.6	13.0	12.2	12.0	11.8

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of GDP.
Source: OECD.

projections assume that the Bank will maintain the interest rate differential *vis-à-vis* the euro unchanged.

The slowing of activity could make it difficult to achieve a balanced budget in 2002

Although it remains broadly favourable, the budgetary outlook has deteriorated in recent months. At the federal level, the balanced budget target set for 2001 will probably not be met because of the weakening of tax receipts and the overspending of about SF 1.7 billion (0.4 per cent of GDP), most of it related to payments to Swissair. The draft federal budget for 2002, which assumes economic growth of 1¾ per cent, projects a slight surplus, equivalent to 0.1 per cent of GDP. But this target will be difficult to achieve, if the slowdown in activity is more pronounced than the authorities foresee. According to the OECD projections, the stance of fiscal policy will be broadly neutral in 2002.

The slowdown could last well into 2002, before recovery takes hold

The deceleration of activity is likely to become more pronounced in the months ahead, bringing growth down to 1 per cent in 2002. Investment and exports will probably remain subdued until mid year owing to weak growth of foreign markets and exchange rate appreciation, while private consumption is likely to slow as fewer jobs are created and the household saving ratio increases following rising uncertainties. Weaker activity and lower import prices could bring inflation down to ¾ per cent in 2002, while the unemployment rate will probably rise to over 2 per cent. From mid-year, an improved external environment and easier monetary conditions should induce a pickup of GDP growth, which could exceed 2 per cent in 2003. The main risk surrounding this projection relates to the international environment and exchange rate developments. A further effective appreciation of the Swiss franc in response to increasing uncertainties would cause a more pronounced weakening of activity. However, the National Bank has some room to cut its key rates again in the event of a significant exchange rate appreciation, given that current real interest rates are not at historically low levels.

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Turkey

The economic outlook in Turkey has continued to deteriorate and financial conditions have not stabilised since the twin crises of November 2000 and February 2001. The revised programme with the International Monetary Fund has aimed at cushioning the short-term macroeconomic impact of the financial turmoil, while laying the foundation for the resumption of disinflation and sustained economic growth. The Turkish lira has depreciated sharply since the abolition of the pegged exchange rate and the impact on inflation, while initially modest, has recently been more marked. With persistently high real interest rates, GDP is set to contract sharply this year, but as confidence returns and exports respond more fully to devaluation, a slow recovery is in sight over the next two years.

Despite accelerated structural reforms, notably in the banking sector, policy credibility has yet to be achieved. Though monetary and fiscal policies have not been out of line with the new programme, adverse debt dynamics raise doubts about sustainability. Fresh money from international donors will be all the more important in the light of the 11 September terrorist attack and its consequences, though a full and undivided political support for implementing the economic programme is the most essential factor in restoring credibility and the fundamental requirement for policy success.

The new stabilisation programme…

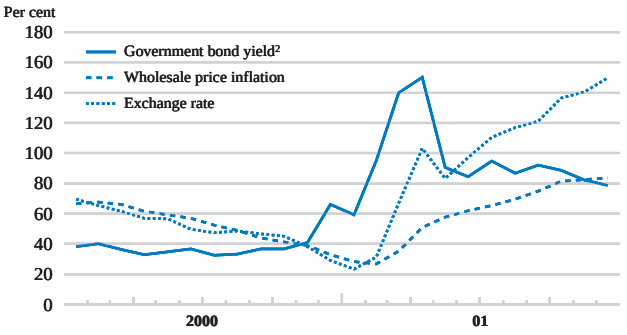
Previous failed stabilisation programmes highlighted the difficulty of implementing tight monetary and fiscal policies aimed at disinflation while there were persistent and widespread structural weaknesses. The new programme, agreed with the International Monetary Fund (IMF) in May 2001, places a heavy emphasis on several areas of reform, the failure to deal with which had contributed to the recent economic crises: in particular strengthening the banking sector, achieving fiscal transparency and improving debt management. A strict agenda on structural targets has been set in this regard.

… strengthens the banking sector by shifting costs and risks to the budget

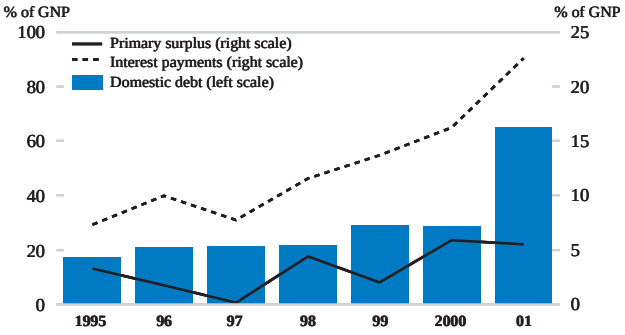
The fragility of the banking sector has involved sizeable fiscal costs and distorted the functioning of monetary policy. Besides structural weaknesses in the state-owned banks, a steady erosion of solvency in private banks led to a growing number of take-overs by the State Deposit Insurance Fund (SDIF) from just prior to the November 2000 crisis. The resultant accumulation of large losses has had to be borne by the government. In this respect, the financial restructuring programme has entailed the elimination of "duty losses" and recapitalisation of state-owned and

Turkey

The crisis continues[1]



Public sector deficit and debt have been pushed up



1. Year-on-year percentage changes.
2. Secondary market, an average of 6 month maturity.

Sources: State Institute of Statistics, Central Bank of Turkey, The Undersecretariat of Treasury, IMF, OECD.

Turkey: **Demand, output and prices**

	1998	1999	2000	2001	2002	2003
	current prices trillion TL	Percentage changes, volume (1987 prices)				
Private consumption	36 123	-2.6	6.4	-6.9	2.5	4.0
Government consumption	6 633	6.5	7.1	-5.5	-1.0	1.5
Gross fixed capital formation	12 839	-15.7	16.5	-23.0	-1.9	11.8
Final domestic demand	55 595	-5.6	9.0	-11.1	1.2	5.5
Stockbuilding [a]	- 212	2.0	0.8	-3.7	2.0	0.1
Total domestic demand	55 383	-3.7	9.6	-14.3	3.2	5.6
Exports of goods and services	12 713	-7.0	19.3	5.0	7.0	12.0
Imports of goods and services	14 573	-3.7	25.4	-19.0	9.0	13.0
Net exports [a]	-1 860	-0.9	-2.9	9.3	-0.5	-0.1
Statistical discrepancy [a]	-1 298	0.0	0.0	-1.3	0.0	0.0
GDP at market prices	52 225	-4.7	7.2	-7.3	2.6	5.4
GDP deflator	_	55.6	50.7	54.6	54.0	26.2
Memorandum items						
Private consumption deflator	_	59.0	49.5	54.7	53.6	27.2
Unemployment rate	_	7.5	6.4	7.9	7.6	6.9
Current account balance [b]	_	-0.9	-4.9	2.4	2.1	2.2

a) Contributions to changes in real GDP (percentage of real GDP in previous year), actual amount in the first column.
b) As a percentage of GDP.
Source: OECD.

SDIF banks. This operation was funded through Treasury issuance of securities of an amount equal to 24 per cent of GNP, half of which had been already scheduled in 2000. In addition to the recapitalisation, Treasury conducted a swap operation in June 2001 in which domestic treasury bills and longer-term fixed and floating rate bonds were exchanged for a package of US dollar indexed bonds and Turkish lira bonds. The operation resulted in an improvement of the government's debt service profile by extending the average maturity of debt and reducing the refinancing needs of the central government. Meanwhile, it gave an option to private banks to reduce their open positions significantly at the expense of an increase in the foreign exchange risk borne by the government.

Tight fiscal policies are needed to stabilise public debt

Building confidence in the ability of Turkey to stabilise the domestic public debt to GNP ratio, which will reach around 65 per cent in 2001, remains the most critical element for the programme's success. The transfer of bank duty losses to the budget has further increased both interest costs and the roll-over burden. Hence, in order to stabilise the debt, higher primary surpluses will be required, starting with a target of 5.5 per cent of GNP for 2001. The fiscal program achieved its interim targets through July 2001, despite the overshooting of expenditure plans and economic weakness, mainly because revenues were higher than expected by the programme. For 2002-03, the fiscal agenda remains tight, with targets for primary surpluses of 6.5 per cent of GNP in each year (assuming 4 per cent growth in 2002).

Income and monetary policies are geared to disinflation

Incomes policy has established guidelines supportive of the disinflation effort. The public workers' wage settlement in May exceeded these guidelines, however, and raised concerns about the success of the programme, which in turn pushed up real interest rates. In view of the expected improvements in the fiscal situation and the rapid progress in banking reforms, the Central Bank plans to announce a quarterly inflation target sometime in 2002 that will serve as a nominal anchor for mone-

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tary policy. Once introduced, the Bank plans to raise interest rates in order to meet its disinflation objective, but inflation targeting may be problematic so long as the Turkish lira weakens and real interest rates remain high.

This implies deep economic contraction and slow recovery…

The increases in interest rates and inflation, combined with volatile exchange rates, have adversely affected economic activity. Real GNP fell by 6.1 per cent year-on-year in the first half of 2001 and is likely to fall further until the end of the year. Under the OECD projections, the exchange rate undergoes a moderate appreciation in real terms in 2002 and 2003 while remaining at a depreciated level on a cumulative basis; this will allow export-led growth, albeit less high in 2002 than the official projection. On the other hand, following the 11 September events, tourism receipts seem certain to be adversely affected, weakening the contribution of exports and possibly delaying the recovery of domestic demand. Moreover, real interest rates are likely to remain high until well into the first half of 2002. They may decline thereafter (down to an assumed 20 per cent), as the credibility of the programme eventually restores market confidence. The resulting demand weakness should enable CPI inflation to decline to 37 per cent by end-2002, and to 22 per cent by end-2003.

… with public debt the main element of domestic risk

Apart from the external elements, fiscal developments constitute the main area of risk. As already announced by the authorities, there will be additional foreign official financing which will ease the implementation of the programme. But the roll-over of the public debt stock could still be a problem. The ability to achieve the ambitious fiscal targets (and hence programme credibility) *via* spending cuts is also uncertain under conditions of slower-than-programmed growth.

III. DEVELOPMENTS IN SELECTED NON-MEMBER ECONOMIES

The deterioration of economic conditions in the OECD area has worsened growth prospects in the non-member economies, and this trend can only be aggravated by the 11 September terrorist attacks in the United States. The impact of the different forces at work – supply-side adjustments, slowdown in trade with the OECD area and reduced confidence of financial markets – varies across the major non-member regions depending largely on the degree of their sectoral and regional exposure.

The global adjustment in information and communication technologies has continued to hit the Dynamic Asia economies. China and Russia have so far been largely insulated given their low exposure, although growth is projected to moderate. In the case of China, accommodating fiscal policy has supported domestic demand, while foreign investment has been strong in anticipation of China's entry to the World Trade Organisation. Given its heavy reliance on energy exports, Russia will start to be affected by slowing world demand.

Lower GDP growth in Brazil has been mainly due to domestic and regional factors, in particular contagion from the difficult situation in Argentina. Other countries in South America, more exposed to the US economy, will be affected by the slower trade growth. Overall, countries in the region could suffer most from a worldwide reduction in private capital flows.

The slowdown in the OECD is affecting non-member regions in three ways

The significant downward revision to growth prospects in the OECD is affecting non-OECD regions mainly via three channels: first, the supply-side adjustments in the information and communication technologies (ICT) and associated lower business expectations in the other sectors of the economy; second, the generalised slowdown in trade driven by the deteriorating prospects in the OECD area; finally, the adverse impact of reduced confidence on financial markets. Indeed, lower growth and higher risks are translating into pressure on balance sheets of financial intermediaries. This is likely to imply higher risk aversion, and may hence lead to lower private international capital flows to emerging markets. These three transmission channels will have a differentiated impact across the various non-OECD regions.

The downturn in Dynamic Asia has worsened…

The economic situation in Dynamic Asia has worsened over the past six months with the intensification of the worldwide downturn in information technology. In response to declining exports and de-stocking, imports fell sharply during the first half of 2001 and are expected to continue to fall through at least the remainder of the year. Capital spending is virtually at a standstill, and consumption growth has slowed markedly. GDP growth for the region as a whole is expected to be modestly positive in 2001, with Singapore and Chinese Taipei recording recessions.

… with recovery unlikely before mid-2002 at the earliest

There is little prospect of a recovery in economic activity before the second half of next year, and then only if world ICT demand begins to recover. In countries less exposed to ICT, notably Indonesia and Thailand, along with other commodity exporters such as the Philippines, economic conditions are likely to be depressed by the broader slump in OECD economies and consequent weakening in world commodity markets. Prospects for domestic demand are especially uncertain. Financial positions of banks and enterprises had only partially recovered from the 1997 crisis and were still fragile when the current downturn began. Government spending and debt accumulation after the 1997 crisis have narrowed the scope for further stimulus in most cases. Equity prices have continued to fall for much of the past six months

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and non-performing bank loans still remain high in Indonesia, Thailand, and to a lesser extent Malaysia. Prospects for a revival in capital flows to the region have probably been set back by the present international environment, which is likely to heighten concerns about political conditions in a number of countries.

China's performance is diverging from that of Dynamic Asia

The contrast in performance between China and the Dynamic Asian countries has become starker over the past six months. China, which is much less exposed than other countries in the region to ICT markets, has maintained strong growth due to robust domestic demand. The broader slump in world demand and a temporary drop in foreign direct investment in the wake of the September attacks in the United States are expected to moderate growth through next year, but confidence engendered by China's accession to the World Trade Organisation should spur a pick-up in 2003.

South America could be affected by a reduction of private capital inflows…

South America was not exposed to the direct impact of the ICT shock, but is already feeling the effects of the global reduction in consumption and investment, which is putting downward pressure on commodity markets. In this respect, the most exposed countries are Venezuela, Chile, Colombia and Ecuador. The effect on Brazil and Argentina is smaller, since trade accounts for a much lower proportion of their GDP. Overall, an important risk factor for the countries in the region would be a strong reduction in private international capital flows. Although improved macro and structural policies have reduced their dependence, these economies continue to have a chronic need for external financing. Brazil has one of the world's highest current account deficits in dollar terms and, overall, the region needs some $40-45 billion of net foreign savings annually. While South America has increasingly used international bond issues for their financing needs, this source has been disrupted in the wake of the September attacks. In 2000, Argentina alone accounted for more than 20 per cent of all emerging market bond issues.

… which would add to domestic and regional financial pressures

These potential international financial pressures have added to domestic factors that have contributed to deteriorating financial conditions since the beginning of the year, notably in Argentina and Brazil. Spreads have increased sharply. As a result, these countries have not really benefited from falling international interest rates. At the same time, there has been strong pressure on exchange rates, with the Brazilian Real depreciating by more than 30 per cent between January and October. These developments have put exceptional pressure on Argentina, which has maintained its currency board only at the cost of a deep recession. In facing downward pressures on growth, the still fragile fiscal positions in most countries leave the authorities little room to run counter-cyclical policies.

China

China's real GDP growth remains strong but is moderating

China's real GDP expanded at an annual rate of 7.6 per cent (year over year) in the first three quarters of 2001, slightly below the 8 per cent growth recorded in 2000. Growth held up despite a sharp slowdown in exports that was only partially offset by declining growth in imported inputs. Robust domestic demand mitigated the resulting decline in the growth contribution of external demand. Activity was driven mainly by an acceleration of fixed investment underpinned by government spending; strong residential investment as a result of housing reforms; and

Table III.1. **Projections for China**[a]

	2000	2001	2002	2003
Real GDP growth	8.0	7.4	7.2	7.7
Inflation	0.4	1.0	1.4	2.0
Fiscal balance (% of GDP)	-2.8	-2.4	-2.3	-2.1
Current account balance (US$ billion)	20.5	10.2	2.7	1.7
Current account balance (% of GDP)	1.9	0.9	0.2	0.1

a) The figures given for GDP and inflation are average percentage changes from the previous period.
Source: Figures for 2000 are from national sources. Figures for 2001-03 are OECD estimates and projections.

rising foreign direct investment (FDI) inflows in anticipation of China's imminent accession to the World Trade Organisation (WTO) (see Box III.1). Private consumption has remained strong, bolstered by salary increases for civil servants and increased spending on home renovation and decoration. Monthly indicators, however, point to a slowing in economic activity since the second quarter, in response to the further weakening of external demand. Although consumer prices rose 1 per cent in the first nine months of this year, deflationary pressures still remain in many manufacturing sectors. The growth process is still characterised by unevenness and rising inequalities, with non-state sector investment lagging significantly behind that of the state-owned entities, and consumption growing much more rapidly in urban than in rural areas.

Macroeconomic policies remain supportive of economic growth

The government continues to rely on macroeconomic stimulus to support growth. Treasury bonds amounting to 150 billion yuan ($18.1 billion or 1.7 per cent of GDP) are being issued in 2001 – the same amount as in 2000 – to finance infrastructure spending, and the authorities plan to issue a comparable amount next year. Most of the proceeds of this year's issue will be spent during the second half of this year, which should partly offset the drag from net exports on growth. Even so, fiscal policy is now contributing less to overall growth than 1998-99, when a strongly stimulating policy was enacted. Monetary conditions continue to be accommodative. While domestic interest rates have been unchanged since mid-1999, real rates have continued to fall as deflationary pressures have eased.

GDP growth is expected to pick up in 2003

Real GDP growth is expected to be nearly 7½ per cent in 2001 as external demand weakens further during the second half. Growth will likely continue to edge down in 2002 as the drag from net exports increases, although domestic demand growth is expected to remain strong. The economy should then pick up in 2003, pulled by the projected recovery in external demand and the pick-up in FDI inflows spurred by China's WTO entry. Import growth should remain strong during the projection period, due to continued domestic demand growth and as tariffs and other import barriers are gradually lowered after WTO entry. On the other hand, the bulk of the WTO stimulus to China's exports is not expected to come until the multi-fibre agreement is phased out in 2005. The resulting fall in the trade surplus along with a deterioration in the invisible balances is likely to result in a declining current account balance during the next two years. Although FDI inflows may moderate temporarily as a result of the September attacks, they are expected to rise over the projection period as a whole. This, together with foreign purchases of Chinese equity, should at least offset the decline in the current account, and the balance of payments is expected to remain healthy.

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Box III.1. Implications of WTO accession for China's economy

China is scheduled to become a full member of the World Trade Organisation (WTO) on 11 December 2001. China's accession culminates an effort that began nearly 15 years ago and its accession agreement is one of the broadest and most comprehensive in the history of the WTO. China's WTO entry follows a long period of gradual opening of its foreign trade and investment going back to the 1980s. This opening has brought the average tariff rate down from 43 per cent in the early 1990s to just above 15 per cent now. Nearly $350 billion in foreign direct investment (FDI) have gone into China since 1979, making it the second largest FDI recipient after the United States. China's accession will further reduce tariffs, from 31.5 per cent to 17 per cent for agricultural products, and from 24.6 per cent to 9.4 per cent for industrial products. It will also expand the opportunities for FDI in China by opening sectors previously largely closed to foreigners, such as telecommunications and financial services, and by improving the overall business climate for foreign firms. However, because China is already substantially exposed to international competition, its economy is not expected to experience the severe shock suffered by Russia and other Eastern European countries following their opening up in the late 1980s.

Labour-intensive industries, which are China's comparative advantage, are the clearest winners from WTO entry. Some studies suggest that China's textile output could double after the multi-fibre agreement regulating world textile trade is eliminated in 2005.[1] Some capital- and technology-intensive industries, such as automobiles, telecommunications, and segments of the chemical and metallurgical industries are expected to lose ground, at least initially. In agriculture, markets for land and water intensive crops, notably wheat, corn, soybeans, and other crops produced mainly in the North of China will be opened up to lower cost competing products from abroad. Labour-intensive crops such as vegetables and flowers will enjoy expanded opportunities in foreign markets. The impact on the grain market will be limited as long as China's grain procurement system, which sets minimum producer prices and which is not covered under its WTO agreement, is maintained. However, the higher cost to the government once import controls are lifted will create strong incentives for the system's modification or elimination.

Some estimates suggest that accession could boost annual FDI inflows by more than two-fold in the medium term.[2] Worries that domestic banks will suffer severely from China's commitment to allow foreign banks to compete on comparable terms by 2005 has been one of the chief concerns within the country about the effects of WTO entry. However, foreign banks are likely to be selective in their activities and to avoid most lending to domestic businesses until the performance of those businesses improves.

The direct impact of WTO entry on China's macroeconomic performance should be positive in the medium term. Stronger FDI inflows and improved domestic business confidence are expected to provide a boost to domestic demand growth. Both exports and imports should increase although the impact on the trade balance is difficult to determine. Their effects, however, will not occur immediately nor at the same time. China's import controls will begin falling immediately after accession and the effect on imports should start to become apparent by 2003. The main impact on exports is only likely to occur after the multi-fibre agreement lapses in 2005.

Finally, the overall effect of WTO entry, and the extent to which China realises its potential benefits, will depend on the ability of the economy to reallocate its resources and to restructure the business sector to correct the widespread inefficiencies that now exist.[3] These adjustments are now being impeded by government interference in enterprise management, weaknesses in the financial system, local protectionism, and other problems. Success in addressing these problems will help some sectors that initially lose, such as automobiles, to restructure so as to be able to better exploit China's low cost of labour and large market. Progress on domestic economic reforms is thus needed to ensure that the benefits to the economy outweigh the adjustment costs as trade and investment liberalisation proceeds.

1. See Zhai, F. and S. Li, *The Implications of China's Accession to the WTO on China's Economy*, Development Research Centre, the State Council, 2000.
2. See, for example, United Nations Conference on Trade and Development (UNCTAD), *World Investment Report 2000: Cross-border Mergers and Acquisitions and Development*, 2000.
3. The OECD is now working on a major study on "Realising the Benefits of China's Trade and Investment Liberalisation: The Domestic Economic Policy Challenges", which will be published in 2002.

The Russian Federation

Growth has strengthened again in Russia

Economic growth appears to have strengthened again in Russia. Revised numbers by the State Statistical Committee (Goskomstat) show Russian GDP and industrial output growing by 8 and 12 per cent in 2000, respectively. While this growth appeared to level off in the fourth quarter of the 2000, preliminary data point to another upturn since February 2001. Strong export prices, particu-

larly for natural gas, and higher domestic demand contributed to the growth. On preliminary estimates, GDP and industrial output were respectively 5 per cent and 5.5 per cent higher in the first half of 2001 relative to the same period in 2000. Given these trends, GDP growth may be something like 6 per cent in 2001.

Higher imports promise to narrow the current account surplus

Import growth has finally started to accelerate in Russia in the context of a stronger rouble and higher domestic demand. Since the last quarter of 2000, the value of Russian imports in dollar terms has increased at an annualised rate of close to 20 per cent. Despite this growth, strong export prices kept the trade balance from narrowing much in the first half of 2001. Preliminary estimates place the current account surplus for the first half of the year at over $20 billion, a figure similar to the first half of 2000. But import growth and falling energy prices should reduce this surplus somewhat in the second half of 2001 and into 2002.

A large budgetary surplus has helped ease potential inflationary pressures

There have been pressures on monetary policy. Given the strong current account inflows, the monetary authorities have resisted nominal appreciation of the rouble through active intervention on the foreign exchange market. Inflation, measured by the consumer price index for the first nine months of the year, already amounted to the annual target of 14 per cent. But a large budgetary surplus, deposited with the Central Bank, has helped ease potential stronger inflationary pressures. Boosted by export revenues, the federal budget reported a surplus of 4 per cent of GDP in the first six months of 2001. Future plans envision a type of stabilisation fund that will prevent the use of "excess" revenues for current expenditures. Some of this fund might be used for the early retirement of foreign debt. Indeed, Russia plans to generate fiscal surpluses in 2001 and 2002 in anticipation of escalating debt repayment requirements. Due to these requirements and additional social policy commitments, Russia's budgetary surpluses are expected to disappear in 2003.

Medium-term prospects continue to depend on structural reforms

Medium-term prospects in Russia continue to hinge on the vital structural reform agenda. By some estimates, almost half of the huge current account surplus is invested abroad, legally or illegally, reflecting a still rather inhospitable environment for business and investment in the country. A more prolonged economic slowdown in OECD countries could adversely affect Russia through weaker export prices.

Table III.2. **Projections for the Russian Federation**[a]

	2000	2001	2002	2003
Real GDP growth	8.3	6.0	5.0	5.0
Inflation	20.2	20.0	12.0	10.0
Fiscal balance (% of GDP)[b]	2.0	2.0	2.0	0.0
Current account balance (US$ billion)	46.3	37.0	26.0	23.0
Current account balance (% of GDP)	16.0	11.0	7.0	6.0

a) The figures given for GDP are percentage changes from previous year. Inflation refers to end-of-year consumer price index.
b) Includes federal, regional and local budgets.
Source: Figures for 2000 are final figures from national sources. Figures for 2001-03 are OECD estimates and projections.

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Brazil

Due to external shocks and the energy crisis, prospects for economic growth have worsened

GDP growth in Brazil slowed significantly in the second quarter of 2001, and recent data on sales and industrial production tend to confirm the slowdown. Investment and consumption growth slowed as interest rates increased and Brazil suffered from the prospect of an energy shortage. As a net result of these events, growth projections for 2001 have been revised down substantially. Industrial production has been falling on a monthly basis since February, although for the year to July it was still some 4 per cent higher than in July 2000. Noteworthy is that the impact of the energy crisis on industry has been less than feared, given that most of the adjustment has been through energy savings in the public administration and households. Reacting strongly to the increase in the cost of credit, retail sales fell by nearly 8 per cent (seasonally adjusted real terms) in the four months to June. Employment (formal sector) was still 3.3 per cent higher in May than a year earlier, though its rate of growth has levelled off. The trade balance has slightly improved, though somewhat below expectations given the extent of exchange rate depreciation. Overall, the current account is expected to deteriorate to around 5 per cent of GDP as the burden of debt servicing has increased.

Responding to exchange rate pressures, monetary policy was tightened

In March, the central bank moved to increase base interest rates, as a response to potential pass-through to inflation from exchange rate depreciation. The rate was raised in several steps from 16.25 per cent in March 2001 to 19 per cent in September. Inflation pressures may now be abating as the economy slows, even though the target for end 2001 (4 ± 2 per cent) is likely to be exceeded. Hence, in September, the bank announced a neutral stance but has tightened reserve requirements.

The fiscal situation has remained under control

So far, there has been no difficulty in meeting the fiscal targets. From January to July the collection of tax and social security contributions were 3.6 per cent higher than in the same period of 2000. The important state-level value-added tax increased by 20 per cent in nominal terms year-on-year for the first half of 2001. Increased tax collection made it possible to reach a revised target of 3¼ per cent primary consolidated surplus (¼ per cent higher than originally programmed). However, the situation in 2002 may become more difficult as tax revenues are expected to decline. On the expenditure side the risks are contained since the legislative framework (notably

Table III.3. **Projections for Brazil**[a]

	2000	2001	2002	2003
Real GDP growth	4.5	1.7	2.0	3.0
Inflation	7.0	7.0	6.0	4.0
Fiscal balance (% of GDP)	-4.6	-7.0	-5.0	-4.0
Operational fiscal balance (% of GDP)[b]	-1.2	-3.0	..	..
Primary fiscal balance (% of GDP)	3.5	3.3	3.5	3.5
Current account balance (US$ billion)	-24.6	-26.0	-22.0	-25.0
Current account balance (% of GDP)	-4.1	-5.5	-4.3	-4.5

a) The figures given for GDP and inflation are average percentage changes from the previous period. Inflation refers to consumer price index (IPCA).
b) According to a new harmonised concept, which excludes revaluations of public debt due to changes in the exchange rate.
Source: Figures for 2000 are from national sources. Figures for 2001-03 are OECD estimates and projections.

the Fiscal Responsibility Law) prohibits the adoption of significant commitments to expenditure during the last 12 months of an administration's mandate. It was against this background that the IMF extended the stand-by arrangement, providing credit of up to $15 billion. The government also made a substantial effort to increase the maturity of public debt. All these measures are vital to control the dynamics of public debt that may yet be affected by the recognition of contingent liabilities in the government's accounts.

The outlook for Brazil is affected by both domestic and international factors

Although the primary causes of the slowdown in the economy have been domestic and regional, a reduction of international capital flows could quickly reinforce weakening confidence in the economy. The structure of Brazil's debt means the country has a high demand for capital inflows to service existing debt as well as to finance the current account deficit. By continuing to put pressure on the exchange rate, this channel is likely to be the one through which the risks of slowdown in the OECD could most affect Brazil. A rough calculation suggests that, at the present rate of exchange rate depreciation, the public debt-to-GDP ratio could increase by 4-5 percentage points by year-end. Moreover, despite a substantial effort to improve the maturity structure of public debt, the fiscal accounts remain very sensitive to short-term interest rates. Brazil is also entering a period of political uncertainty linked to presidential elections at the end of next year. It would now be difficult to undertake major reforms before 2003.

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IV. SAVING AND INVESTMENT: DETERMINANTS AND POLICY IMPLICATIONS

Introduction

Trends in saving and investment rates have emerged as an issue

Recent trends in national saving and investment rates have raised questions about sustainability, both with respect to their levels and the balances between them.

Strong investment has led to a large US current account deficit

– In the United States, the total investment rate rose throughout the 1990s, reflecting mostly a rapid acceleration in the purchase of machinery and equipment by the business sector, notably in real terms. In contrast, the national saving rate remained flat during the 1990s, masking significant offsetting changes in the public and private sector components. As a result, the US current account deficit widened to 4.5 per cent of GDP in 2000, before narrowing somewhat in the current downturn (Table IV.1).

Japanese saving and investment remain high despite weak growth

– In Japan, although both national saving and investment rates trended down during the 1990s, their levels are still well above the OECD average. Such high levels are not easy to justify, especially in the case of investment considering the weak output growth performance. In the case of saving also, it is not clear that the substantial demographic transition ahead, together with other factors, can fully account for the high saving rate. Parallel declines in saving and investment have left the Japanese current account surplus in a range of 2 to 2.5 per cent of GDP.

Within the euro area, a number of smaller countries face large imbalances…

– In the euro area, national investment and saving rates remain below their peak levels of the early 1990s, despite the moderate increase registered during the second half of the decade. While the euro area-wide current account is close to balance, for a number of smaller Member states large current account deficits emerged in the late 1990s.

… as are some emerging market OECD economies

– Finally, in most of the OECD emerging market economies, current account deficits have widened substantially in recent years, reflecting in some cases widening government deficits and in others private sector imbalances. While it is not unusual for countries that are catching up with more advanced economies to rely partly on foreign capital to modernise and expand their production capacity, a high imbalance leaves them more exposed to possible episodes of turbulence in international financial markets. In this context, such external deficits raise the importance of setting domestic economic policies so as to preserve credibility with investors.

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Table IV.1. **Saving/investment imbalances in OECD countries**

in per cent of GDP

	Current account			Government balances			Private sector balances		
	1996-00 *average*	2001	2003	1996-00 *average*	2001	2003	1996-00 *average*	2001	2003
Countries with current account deficits									
United States	–2.7	–4.1	–4.0	–0.1	0.6	–0.6	–2.7	–4.7	–3.4
United Kingdom	–1.2	–1.8	–2.2	–0.6	1.1	–0.7	–0.6	–2.9	–1.5
Australia	–4.4	–3.0	–3.7	–0.1	0.1	0.5	–4.3	–3.0	–4.1
New Zealand	–5.8	–3.1	–3.8	1.4	1.3	–0.3	–7.2	–4.5	–3.5
Iceland	–5.4	–8.0	–4.8	0.7	–0.2	–0.9	–6.1	–7.7	–3.9
Countries with current account surpluses									
Japan	2.3	2.1	3.5	–5.6	–6.4	–6.6	7.9	8.5	10.1
Canada	0.1	3.7	2.5	0.5	2.8	2.2	–0.4	0.9	0.3
Korea	3.1	2.2	2.6	3.9	5.7	5.5	–0.8	–3.4	–2.9
Sweden	3.4	2.3	2.3	0.6	3.8	1.8	2.8	–1.5	0.5
Denmark	1.0	3.2	3.3	1.3	2.0	1.7	–0.3	1.2	1.6
Norway	5.9	14.2	14.0	7.7	14.3	11.7	–1.8	0.0	2.3
Euro area countries									
Total area	0.8	0.0	0.4	–2.0	–1.2	–0.9	2.8	1.2	1.3
of which countries with current account surpluses									
France	2.2	1.6	1.6	–2.6	–1.5	–1.4	4.7	3.0	2.9
Italy	1.6	0.1	0.7	–2.9	–1.4	–1.1	4.6	1.5	1.8
Netherlands	4.5	3.6	4.0	–0.2	1.1	0.7	4.8	2.5	3.3
Belgium	5.0	3.3	4.1	–1.4	0.0	0.2	6.4	3.3	3.9
Finland	5.7	6.6	6.5	1.1	3.7	2.1	4.7	2.9	4.3
of which countries with current account deficits									
Germany	–0.6	–0.7	–0.3	–1.7	–2.5	–1.8	1.2	1.8	1.6
Spain	–1.1	–2.4	–2.0	–2.4	0.0	0.0	1.4	–2.3	–1.9
Austria	–2.8	–2.5	–1.5	–2.3	0.0	0.1	–0.5	–2.5	–1.6
Portugal	–7.1	–9.2	–8.8	–2.5	–1.7	–1.4	–4.5	–7.5	–7.4
Greece	–4.5	–5.2	–5.0	–3.4	0.2	1.3	–1.1	–5.4	–6.3
Ireland	1.2	–2.0	–1.6	2.0	3.2	1.9	–0.9	–5.1	–3.5
Emerging market countries									
Mexico	–2.5	–3.0	–3.5	7.4	7.7	8.3	–9.9	–10.7	–11.9
Turkey	–1.5	2.4	2.2	–4.7	–2.6	–3.2	3.2	5.1	5.3
Poland	–5.2	–6.2	–5.7	–2.4	–4.4	–4.9	–2.8	–1.7	–0.8
Czech Republic	–4.6	–5.1	–5.4	–3.2	–6.0	–5.8	–1.4	1.0	0.4
Hungary	–3.7	–2.9	–2.3	–5.9	–4.9	–4.5	2.2	2.0	2.2
Slovakia	–7.7	–7.8	–8.4	–4.3	–4.4	–4.7	–3.4	–3.5	–3.7

Source: OECD.

If these trends prove to be unsustainable, they raise the risk of disruptive adjustments

These developments raise two related sets of issues. First, current saving and investment imbalances, if they prove to be unsustainable, could lead to potentially disruptive adjustments being triggered, with implications for financial markets and economic activity. Even though in principle large imbalances can be unwound gradually, past experience has shown that they often give rise to abrupt exchange-rate changes, with adverse spill-over effects in product and labour markets. Within the euro area, there is the additional issue of whether or not fiscal policy should play a more active role in limiting "internal" imbalances. Second, even in cases where imbalances are not a source of concern, saving and investment rates may not be at levels that are sustainable or that best contribute to underpinning output growth and economic welfare in the short and the medium term. In both cases the question arises as to what role structural and macroeconomic policies can play to facilitate the desired adjustment.

This chapter addresses these issues by looking at the factors driving the developments in saving and investment, with a view to assessing their sustainability, and then draws out a number of policy implications. The next section describes the recent trends in national investment and saving rates and examines whether their respective private-sector components can be explained in terms of their main fundamental determinants, including macroeconomic policy. Based on these findings, the last section assesses the risk that the unwinding of the existing imbalances between saving and investment, in particular of the large US current account deficit, takes place abruptly, with sharp exchange-rate swings.

The main findings from the analysis are:

Strong business investment cannot easily be explained by fundamentals

– In a number of countries, the rise in the volume of business investment observed in the second half of the 1990s can be partly explained by output growth, the steady decline in the relative price of capital goods and, until mid-2000, the relatively low cost of equity financing. This is particularly the case for most countries where real business investment has been buoyant, but also for Japan where investment has grown more modestly. On that basis, the empirical analysis would tend to support the view that investment has exceeded its steady-state level, not least in the United States. In the latter case, however, increases in depreciation rates associated with changes in the composition of capital, may have boosted gross investment sufficiently to make the actual investment rate look sustainable.

Changes in national saving have been driven mainly by changes in fiscal balances

– National saving rates have generally stabilised or even rebounded somewhat in the 1990s, halting the trend decline observed in previous decades. This change has been mainly driven by the rise in public saving, resulting from the significant fiscal consolidation efforts pursued in the majority of countries in the second half of the 1990s. The increase in public saving has been partly offset by a fall in private saving, for the most part due to sharp declines in household saving rates. While the latter have raised concerns regarding possible over-indebtedness and sustainability, there is no clear evidence that consumers have gone too far in responding to the stock market boom of the late 1990s.

A significant decline in the US current account deficit is likely to be accompanied by an exchange rate adjustment

– The slowdown in US output has already contributed to a slight narrowing of the current account deficit, which is now expected to remain close to 4 per cent of GDP over the next two years. Yet, given that cyclical factors alone are only estimated to account for a relatively small portion of the US imbalance, a further narrowing to a more sustainable level will also depend on the evolution of the basic determinants of saving and investment, including relative trend productivity growth and demographics. Private saving rates in Japan and Europe may well decline more rapidly than in the United States in the coming decades as a result of faster population ageing. However, considering that the associated weaker growth in the labour force is also seen to lower investment, the contribution of demographic changes to the unwinding of external imbalances in both the United States and Japan remains uncertain, both with respect to timing and magnitude. In any event, a significant narrowing of imbalances to more sustainable levels is likely to involve relative price adjustments.

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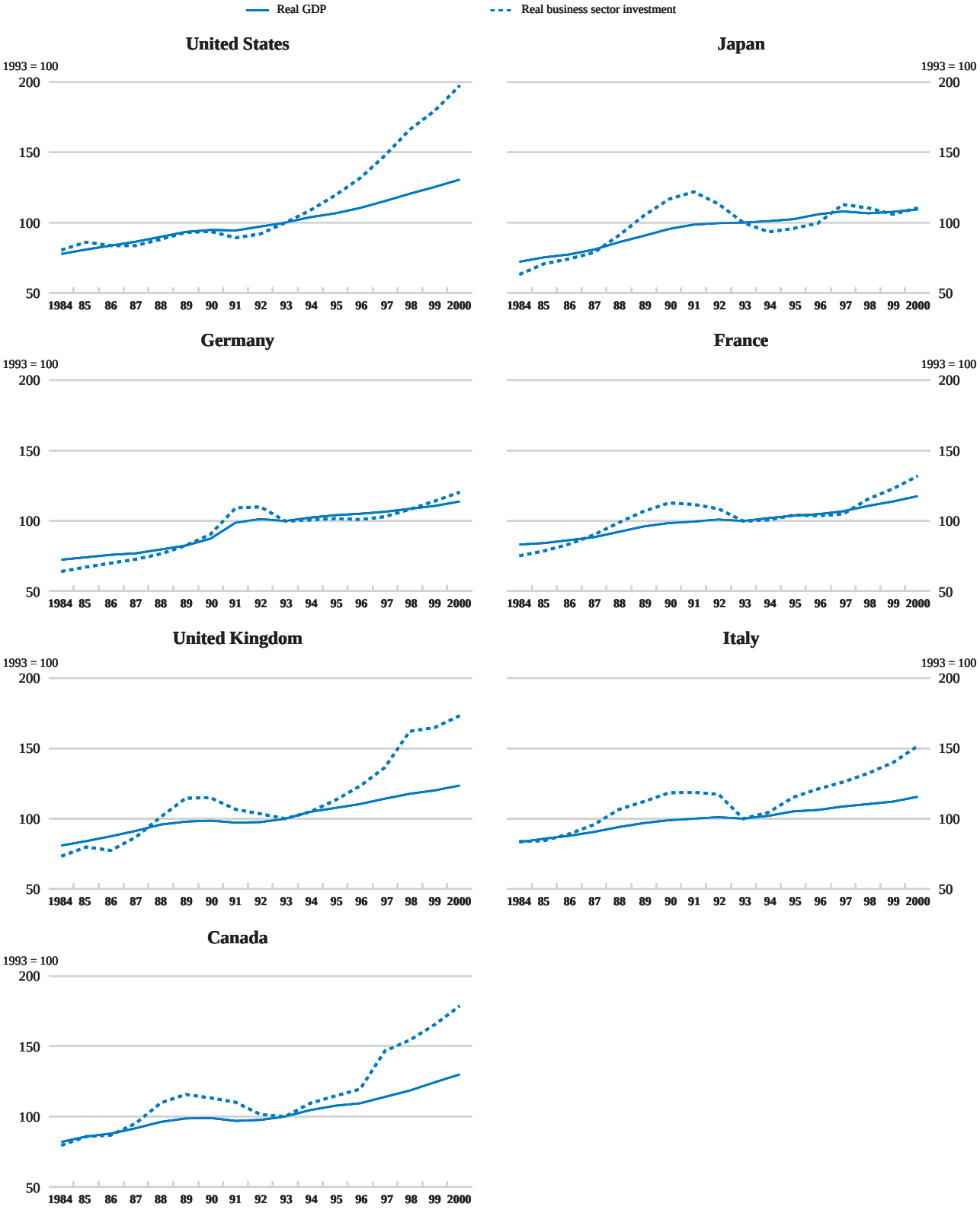
Figure IV.1. **Real output and business investment**



Source: OECD.

Factors driving developments in investment and saving

Development in investment rates

Investment spending by businesses has outstripped advances in GDP gains…

The rise in total investment in most countries during the 1990s was largely concentrated in the business sector, where spending on capital goods accelerated sharply, especially in volume terms. In fact, after moving more or less in line with real output throughout the 1980s and early 1990s, real business investment pulled away in the following years in some countries (Figure IV.1). While investment is generally more volatile than output, such a large and persistent gap between the two series is difficult to explain by traditional "accelerator" effects alone.[1] This raises the issue of sustainability of investment, unless the recent buoyancy can be accounted for by other determinants that have themselves evolved in a sustainable way.

… in part due to declines in cost of capital…

A number of additional factors may have contributed to the acceleration in business investment, including changes in the relative price of capital goods, the rate of depreciation of the capital stock, the financial cost of acquiring funds – either in the form of loans or equities – as well as the extent of development of financial systems which plays a role in channelling funds towards the best investment opportunities. In most countries, the composition of investment has shifted towards information and communication technology (ICT) equipment, although at a varying pace across countries (Colecchia and Schreyer, 2001).[2] Given the difficulty of properly quantifying rapid quality improvements, measuring price developments of ICT equipment has become particularly problematic.[3] Nevertheless, it is clear that in most countries the relative prices of capital goods have trended down, at least since the early 1980s, with measurement problems largely having to do with the extent of the declines. Against this background, the cost of capital, measured roughly as the real interest rate adjusted for the relative price of capital goods, seems to have fallen in the 1990s (Figure IV.2).[4]

… as well as gains in equity prices

Previous empirical work has underscored the contribution that financial market development can make to output growth *via* its impact on investment. To capture this effect, a number of proxies have been used in the literature, some of which have been found to have a significant effect on investment (Beck and Levine, 2001; Leahy *et al*., 2001). These include the amount of private credit provided to the private sector by deposit money banks, which is intended to measure the degree of financial intermediation, as well as the stock market capitalisation or the value of domestic shares traded on domestic exchanges (expressed in both

1. The accelerator effect refers to models that postulate investment as a function of the change in output.
2. Between 1990 and 2000, the percentage share of ICT investment in total non-residential investment rose from 22 to 30 per cent in the United States, from 11 to 16 per cent in Japan, and from 14 to 16 per cent in Germany.
3. In a growing number of countries, a hedonic method is used to measure the price of capital goods. Under such a method, the price of a particular good is adjusted so as to reflect quality improvements over time. The rapid increase in computer power and quality of telecommunication equipment have made the measured relative price of ICT equipment fall quite rapidly in countries using hedonic price measurement.
4. More specifically, the cost of capital shown in Figure IV.2 is one plus the product of the real long-term interest rate on government bonds and the ratio of the deflator of private non-residential fixed capital formation to the GDP deflator. A more complete measure of the cost of capital would take into consideration the effects of depreciation, valuation effects on the capital stock, taxes and subsidies as well as the cost of equity. However, many of these variables are difficult to measure properly at the aggregate level.

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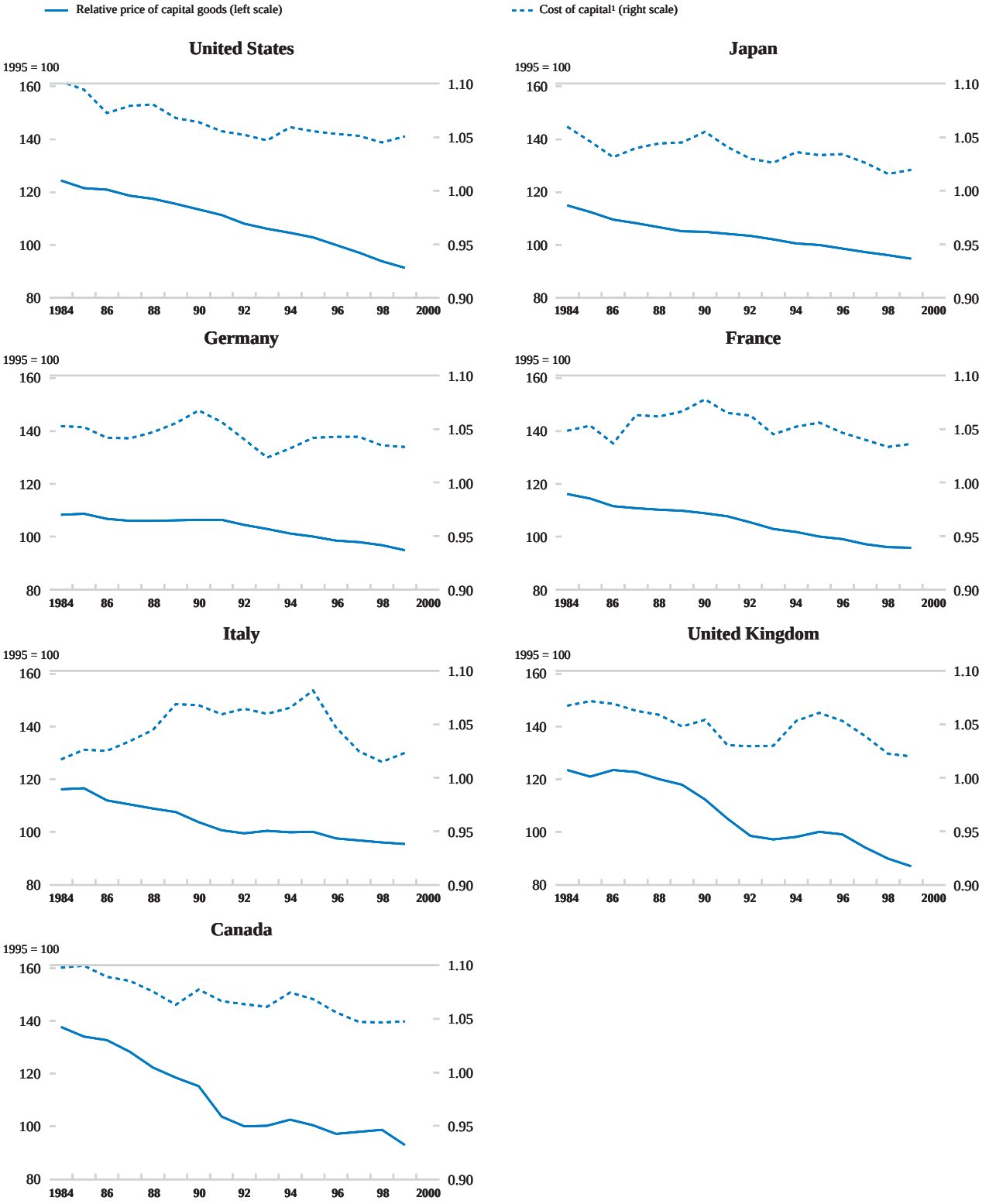
Figure IV.2. **Relative price of capital goods and cost of capital**



1. The cost of capital is approximated by one plus the product of the real long-term interest rate on government bonds and the ratio of the deflator of private non-residential fixed capital formation to the GDP deflator.

Source: OECD.

cases as a ratio of GDP), which are aimed at capturing the relative ease with which funds can be raised in the equity market. Given that the latter two variables measure values rather than volumes, they have been strongly influenced by the sharp rise in equity prices during the late 1990s and the substantial retrenchment observed since spring 2000. As a result, they may not only be capturing the role of equity market development but also the effect on investment of the cost of equity financing, a component of the broader concept of cost of capital not taken into account in the measure shown in Figure IV.2.

Nevertheless, a large part of investment gains remains unexplained

To assess the role played by these factors in the rise in business investment in the 1990s, some econometric analysis was employed.[5] The results from estimating real business investment equations combining information across countries and over time suggest that both the adjusted real interest rate and the ratio of stock market capitalisation to GDP have, in addition to output, contributed to the rise in real business investment in the 1990s. In fact, in the case of the main euro-area countries, the changes in these variables explain most of the increase in investment between 1995 and 1999 (Table IV.2). In contrast, only between about one-third and one-half of the increase in business investment that took place in the United States, Japan, the United Kingdom, Canada, Denmark and Austria over the same period can be accounted for by these factors. Taken at face value, the results suggest that investment rates in these countries may have been pushed beyond the levels which would be supported by long-term fundamentals. Some retrenchment from the high levels of the late 1990s has already been observed in some of these countries.

Table IV.2. **Contributions to the changes in real business investment between 1995 and 1999**[a]

	United States	Japan	Germany	France	Italy	United Kingdom	Canada
Percentage changes in investment	50.3	10.5	12.1	18.2	21.3	48.9	44.3
Contribution from:							
Real GDP	17.5	5.0	6.1	9.8	6.7	11.5	15.7
Adjusted real interest rate	0.5	1.3	0.8	1.8	5.5	3.9	1.9
Stock market capitalisation	3.6	0.1	5.2	4.2	5.7	1.8	2.7
Total explained[b]	21.5	6.4	12.0	15.9	17.9	17.2	20.3

	Australia	Austria	Belgium	Denmark	Greece	Nether-lands	Spain	Sweden
Percentage changes in investment	34.8	23.1	24.5	42.3	52.1	36.2	32.9	29.9
Contribution from:								
Real GDP	18.8	9.8	10.2	10.9	12.9	15.9	15.9	11.4
Adjusted real interest rate	3.7	0.8	2.0	4.7	3.3	2.5	5.3	4.1
Stock market capitalisation	1.6	1.8	10.3	2.2	21.4	6.5	8.4	6.0
Total explained[b]	24.2	12.3	22.5	17.8	37.6	24.9	29.6	21.5

a) These results are obtained from the estimation of panel equations which relate the volume of gross business investment to the level of real GDP, a measure of the cost of capital (adjusted real interest rate) and the ratio of stock market capitalisation to GDP. It is based on annual data going from 1970 to 1999. For more details see Pelgrin *et al*., 2001.
b) May not exactly add up due to rounding.
Source: OECD estimates.

5. See Pelgrin *et al*. (2001) for details on the econometric analysis of business investment across time and countries.

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The strength in the United States could be a result of an adjustment to higher trend growth…

The difficulties in explaining the rise in investment in some cases may also reflect the absence of factors which cannot be easily incorporated in the context of regression analysis based on information that is pooled across a relatively large set of countries. For instance, it is to be expected that investment will rise faster than output for several years when an economy is adjusting to a higher trend output growth rate, which requires a higher investment rate to be maintained in the long run. Although it has become clearer recently that part of the sharp acceleration in US output in the 1990s was cyclical, a higher trend growth rate nevertheless looks likely to be sustained in the medium run. Another factor not taken into account in the econometric estimates, which could help explain the rise in gross investment, is the possible increase in the rate of depreciation associated with the compositional shift in the aggregate capital stock towards shorter-lived assets such as computers and software.

… as well as a higher rate of depreciation

An illustration of the possible implication of different rates of potential growth and depreciation is shown in Table IV.3,[6] which provides rough, mechanical estimates of underlying investment rates on the basis of assumptions regarding the trend growth rate of GDP, the capital-output ratio and the depreciation rate. These calculations are based on a simple relationship between these variables. Looking at the results, what stands out is that despite the recent capital spending boom, the US business investment rate, at around 15 per cent, would still be at the low end of the range of estimated "steady-state" rates if it were assumed that the rise in trend output growth and the depreciation rate were permanent. Taken at face value, these simple calculations would suggest that if some excess investment took place during the 1990s, the recent retrenchment may have already brought the investment rate to a more sustainable level.

Table IV.3. **Estimates of underlying "steady-state" business investment rates**

as a per cent of total GDP

	Capital-output ratio[a]	Potential growth[a]	Depreciation rate[a]	Steady-state investment rate[b]	Current investment rate[c]
United States	2-3	3-3½	5-7	13-25	15
Japan	2-3	1¼-1¾	3-5	7-17	16
Germany	2-3	2-2½	2½-4½	7-17	13
France	2-3	2¼-2¾	2½-4½	7-15	12
Italy	2-3	2-2½	2-4	6-15	14
United Kingdom	2-3	2¼-2¾	3-5	10-18	14
Canada	2-3	2¾-3¼	3-5	8-17	13

a) Given the pitfalls in properly measuring capital-output ratios and depreciation rates at the aggregate levels, and the fact that these could be changing, a range of plausible assumptions is used. A range is also used for trend growth rates, based on the OECD's latest estimates.

b) Under the steady-state assumption of a constant capital-output ratio (K/Y), this is calculated by $[K(g+\delta)/Y(1+g)]$, where g is the potential GDP growth rate and δ is the rate of depreciation. The result from this calculation is then multiplied by the ratio of real business sector GDP to real total GDP (average 1996-2000) so as to make it comparable to the current business investment rate (last column), which is expressed as a per cent of total GDP.

c) Real business investment as a share of real GDP in the year 2000. This ratio of real terms is reported for comparison with the steady-state rate; in countries using chain-weighting aggregation methods, it represents only an approximation of the true underlying real investment rate.

Source: OECD.

6. While the depreciation rate is assumed to have risen to between 5 and 7 per cent in the United States, lower estimates are used in the other G-7 countries, reflecting the smaller share of ICT equipment in total capital. The assumptions used for potential growth rates correspond to the OECD's latest estimates.

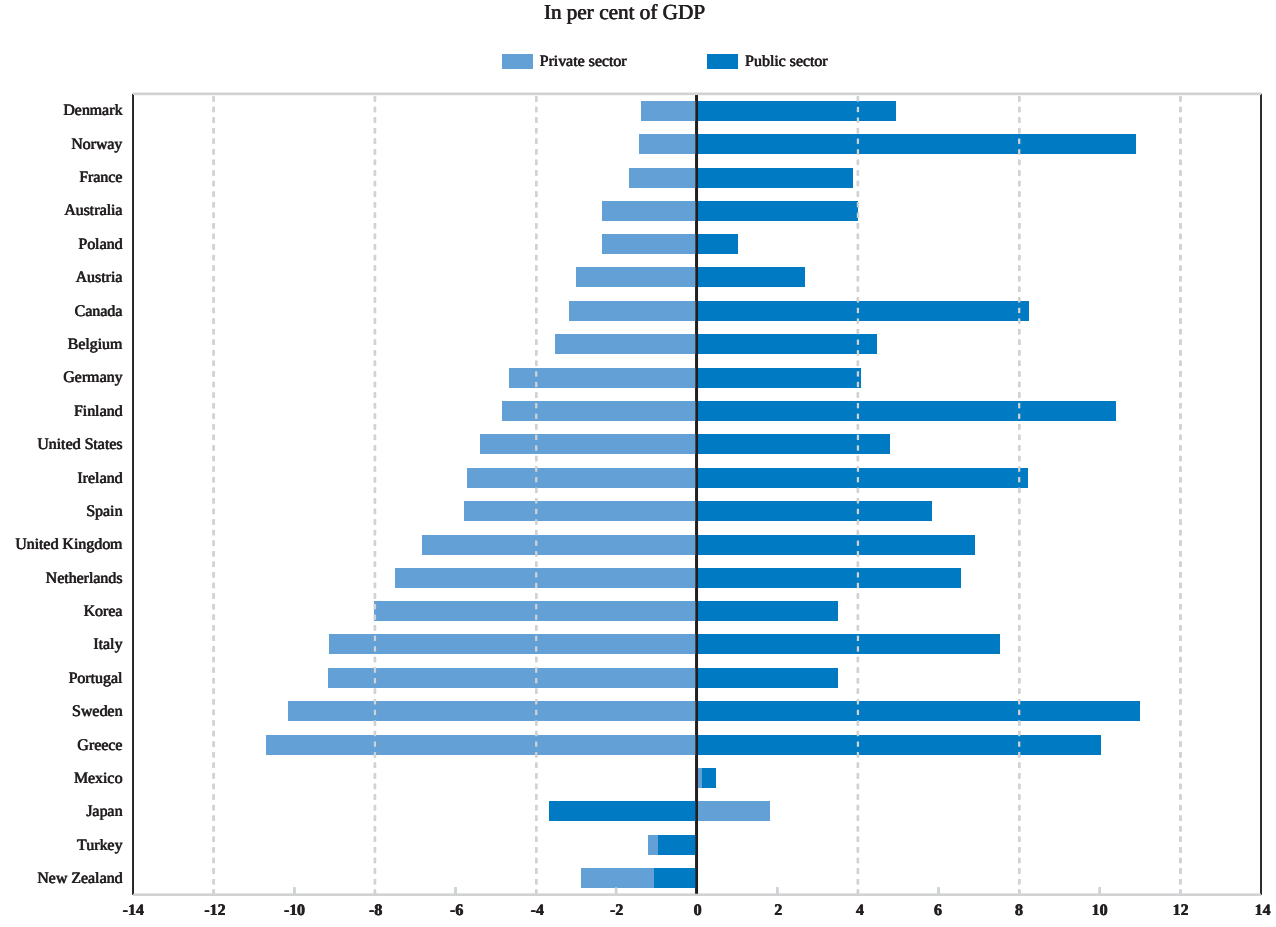
The results for the other G-7 countries show current business investment rates within the "sustainable" range, albeit generally closer to the upper end.

Developments in saving rates

National saving rates have stabilised in recent years

After being on a trend decline throughout the 1970s and 1980s, gross national saving rates have stabilised or risen in a large number of OECD countries since the early 1990s. Notable exceptions to this pattern are Germany, where the national saving rate continued to decline until 1995 and has remained flat since then, and Japan, where it has trended down throughout the past decade, although it remains higher than elsewhere. Developments in public-sector saving have been the dominant influence on the direction of changes in national saving in the 1990s. In most countries, both actual and cyclically-adjusted budget deficits have either turned into comfortable surpluses or at least moved in a direction that has contributed to an increase in total national saving. At the same time, the rebound in the government saving rate in the second half of the 1990s has been accompanied by a substantial decline in private-sector saving, in a few cases completely offsetting the rise in public saving (Figure IV.3).

Figure IV.3. **Change in gross saving positions between 1995 and 2000**



Source: OECD.

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Box IV.1. Conceptual issues regarding the measurement of saving in the national accounts

Adjusting consumption for reclassification effects

The measurement of consumption depends on how certain items are classified. From an economic point of view some items can be considered as investment, but are nevertheless treated as consumption (spending on education, particularly higher education, and expenditures on R&D, which are treated as consumption when funded by the public sector and as an intermediate input when financed by the private sector). Even though the rationale is somewhat different, many argue that the purchase of a durable good by households should be treated as investment, as is currently the convention when the buyer is a firm. In all cases, legitimate arguments could be made for reclassifying these elements as investment, since, for the most part, they contribute to raising future levels of potential output. However, while making such an adjustment would no doubt raise the overall level of saving rates, there is no evidence that their relative importance has changed sufficiently in recent years to be a major factor behind the decline in private saving trends in the 1990s.

Adjusting measured income for valuation effects on net worth

The System of National Accounts (SNA) only treats as income those revenues that are generated from the current production flow, ignoring revaluation effects on the stock of wealth. As a result, even in the absence of a behavioural response to capital gains or losses, inflation and re-valuation of financial assets may have non-negligible effects on the classification of national accounts saving across the main sectors – personal, business and government. Of particular importance in the current environment are realised capital gains, which are not included in personal income, although taxes paid on them are fully deducted. This implies a shift of income and, thereby, saving from the household to the public sector when substantial gains occur. For example, after several years with estimated annual increases of 30 per cent, realised capital gains reached 9 per cent of US disposable income in 2000. Taxes paid on those gains lowered the personal saving rate by around 2.5 percentage points in that year (OECD, 2001*a*). Similar estimates suggest that capital gains taxation would account for 0.7 percentage points of the 5.6 per cent decline in the US personal saving rate observed between 1988 and 1999 (Reinsdorf and Perozek, 2000). Needless to say, a much bigger adjustment to the personal saving rate would ensue if realised capital gains were, on top of that, added to measured income.

In countries where fully-funded pension regimes account for a large proportion of overall retirement benefits, the SNA measure of personal saving rates may be sensitive to significant capital gains or losses on invested funds, depending on the nature of the regime. Under defined benefits schemes, large capital gains allow employers to reduce their direct contributions to employee pension funds while keeping the system fully funded. Since employers' contributions are counted as "other" labour income in US National Accounts, buoyant real estate and stock markets lead to a decline in the measure of wages and salaries (Lusardi *et al.*, 2001). Nevertheless, the gains to beneficiaries and consumption plans have remained unchanged. The result is an artificial shift of saving from the personal to the corporate sector.

The SNA treatment of valuation effects discussed so far may have important implications for the composition of saving across sectors but they are essentially neutral with respect to the aggregate or national saving rate. Moreover, the induced shifts in the sectoral composition would take place even when nothing has changed for the consumer in real terms. For these reasons, it is fair to say that at least part of the decline in the US personal saving rate in the 1990s is the result of an accounting artifice, which should ideally be adjusted for when assessing household financial positions. Even though estimates of the effects of capital gains tax and pension funds are drawn from the US experience, similar factors could be at play in other countries as well, given that opposite shifts between personal, corporate and government saving rates have also been observed elsewhere.

The sharp declines in personal saving, where they occurred…

The decline in private saving has largely been concentrated in the household or personal sector, especially in the United States, Japan, Italy, Canada and Australia, where levels in per cent of GDP have been significantly lower on average in the 1990s than in the 1980s. In those countries where it has occurred, the sharp decline observed in household saving has been accompanied by a significant rise in debt as a proportion of GDP over the past few years. It is now generally above the high levels of the late 1980s (the United Kingdom being an exception). At the same time, the decline in saving rates has coincided with a sharp increase in households' financial net worth, in particular in the United States, Japan, Germany, Italy and the United Kingdom. While this could be seen as evidence that the strong rise in equity prices during the late 1990s has been treated by households as a permanent increase in wealth – hence leading to an unsustainable drop in saving – several factors would suggest a more cautious interpretation.

Table IV.4. **Contributions to the changes in private saving rates between 1995 and 1999**[a]

percentage points

	United States	Japan	Germany	France	Italy	United Kingdom	Canada
Change in:							
Gross private saving rate	–2.5	0.7	–2.0	–1.8	–6.5	–6.2	–4.8
Contributions from:							
Old-age dependency rates	0.2	–2.2	–0.7	–0.8	–1.1	0.0	–0.4
Gross public saving rate	–2.8	2.3	–1.0	–2.4	–4.1	–4.1	–4.7
Percentage change of terms of trade	–0.2	0.7	–0.2	–0.2	0.5	0.5	0.0
Productivity growth rate	0.5	0.0	0.0	0.1	–1.3	–0.2	0.7
Real interest rate	0.0	0.0	0.0	1.4	1.0	–0.6	0.0
Inflation rate	–0.3	0.0	0.0	0.5	0.0	0.0	–0.2
Total[b]	–2.5	0.7	–1.9	–1.3	–5.0	–4.3	–4.7

	Austria	Belgium	Finland	Ireland	Netherlands	Norway	Spain	Sweden
Change in:								
Gross private saving rate	–3.1	–4.0	–1.8	–1.7	–5.5	–0.5	–5.0	–8.6
Contributions from:								
Old-age dependency rates	–0.2	–1.1	–0.6	0.7	–0.3	0.6	–1.1	0.2
Gross public saving rate	–3.2	–2.4	–3.7	–3.5	–3.4	–1.1	–3.3	–6.1
Percentage changeo f terms of trade	–1.2	–0.1	–2.8	0.1	–0.3	1.5	–0.4	–1.0
Productivity growth rate	0.0	0.0	0.0	0.0	1.0	0.0	0.0	0.0
Real interest rate	0.5	2.2	0.0	0.0	0.0	0.0	1.3	0.0
Inflation rate	0.0	0.4	0.0	0.0	–0.3	0.0	1.2	0.0
Total[b]	–4.0	–0.9	–7.0	–2.7	–3.3	0.9	–2.3	–6.8

a) These results are obtained from the estimation of dynamic panel equations which relate the private-sector saving rate to the set of determinants shown in the table, over a sample of annual data going from 1970 to 1999. For more details, see de Serres and Pelgrin (2001).
b) May not add up due to rounding.
Source: OECD estimates.

… did not appear to reflect an excessive response to stock market gains

First, given the divergence between the economic definitions of the two main variables entering the calculation of saving – income and consumption – and their respective treatment in the National Accounts, it may well be that the negative correlation between household saving and financial wealth is partly spurious (see Box IV.1). Second, recent empirical evidence has shown that the sensitivity of consumption and/or saving to wealth can vary quite substantially depending on the source of capital gains (*e.g.* housing *vs.* stock-market) and whether such gains are realised or not.[7] Third, econometric analysis undertaken by the OECD suggests that the decline in private saving rates observed in many countries in the second half of the 1990s can be largely explained by fundamental determinants other than measures of financial and/or housing wealth.[8] Noteworthy in this analysis is the apparent influence on private saving of changes in public-sector saving rates. This suggests a specific link between the substantial recent improvement in public finances and the partially offsetting decline in private saving (see Table IV.4 for estimates of this over the 1995-99 period).

7. See Greenspan (2001). See also Edison and Sløk (2001) who have found that in the United States, the United Kingdom and Canada, capital gains on new economy shares (Telecommunication, Media and Information Technology) have had a lesser impact on consumption than those on old economy stocks, while they found the reverse to hold in the case of continental Europe.
8. See de Serres and Pelgrin (2001) for details of the econometric analysis of private saving behaviour over time and across OECD countries. The main factors influencing private saving appear to be public-sector saving rates, the demographic structure of the population (as measured by the old-age dependency ratio), the growth rate of labour productivity, changes in the terms of trade, the real interest rate and the inflation rate. Stock variables such as financial or housing wealth have not been included, in part because of restrictions on data availability.

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Sustainability and policy considerations

In this section, the issue of sustainability of trends in net saving is addressed. The discussion first focuses on the risks of an abrupt correction of the private sector financial balance in the United States. Given that the counterpart to the US external deficit is more diffused now than in the 1980s, the discussion concentrates on the US situation, albeit with references to the possible contribution of Japan to a gradual narrowing of global imbalances. The section then addresses the issue of large imbalances within the euro-area monetary union as well as in a number of emerging market OECD economies.

Sectoral imbalances in the United States and Japan

While private saving rates in the United States can be explained reasonably well, the case of investment is less clear

The US private-sector financial deficit has widened sharply, driven by a combination of strong business investment as well as declining total private saving. The sustainability of the private saving-investment balance depends on the sustainability of business investment and private saving rates. The empirical evidence presented above does not provide a clear answer. The extent (if any) to which business investment has to adjust further to bring it to a sustainable level depends importantly on one's view of the extent to which depreciation rates have risen with the shift in the composition of capital. Regarding private-sector saving, while increases in financial wealth have certainly been a key driving force behind the declines in households saving rates to historically low levels, there is no conclusive evidence that consumers have over-reacted to the stock market boom of the late 1990s. As a result, the risk that the recent correction of stock market indices could induce an abrupt retrenchment of private saving should not be over-stated. Nevertheless, based on the analysis in the previous section, private sector saving is likely to rise in response to the projected deterioration in government saving, but not in a one-for-one fashion. Accordingly, national saving should decline.

Some part of the current account deficit looks to be sustainable…

The deterioration of the private sector financial balance has more than offset improvements in government net lending and this has led to a large and continuing reliance on foreign saving. From the point of view of the US economy, some of this looks to be sustainable. First, the stock of net foreign liabilities remains, at 20 per cent, relatively small in proportion to GDP, both according to historical and international standards. Moreover, by allowing capital to flow more easily to its most productive use, enhanced financial market integration implies that financing imbalances may now be easier compared with earlier decades.[9]

… although there is likely to be an upper limit on foreign holdings of US assets

So far, investors encouraged by prospects of relatively favourable returns have been willing to finance the US deficit. Going forward, however, persistent current account deficits of between 4 and 5 per cent of GDP would raise US foreign debt to a magnitude that would put a large burden on international financial markets.[10] While

9. The more integrated are international capital markets, the less changes in national saving and investment rates should be correlated, in particular in the short run. While the simple correlation between changes in saving and investment has been declining over time, it remains, however, higher than the correlation observed in regions within countries suggesting that cross-border capital markets are less integrated than those within national borders.
10. If maintained in conditions of a 5 per cent nominal GDP growth rate, a deficit in the range of 4½ per cent of GDP would push the foreign debt-to-GDP ratio close to 50 per cent within 12 years (Obstfeld and Rogoff, 2000). Under those conditions, the foreign debt-to-GDP ratio would eventually stabilise at around 90 per cent of GDP, which would represent a very high share of world savings.

there is no straightforward definition of what constitutes a sustainable current account deficit, one approach is to define it as the level that will stabilise the net external debt to GDP ratio at a particular threshold, although defining such a level is arbitrary. For the US economy, a ratio in the range of 25 to 30 per cent of GDP could be viewed as a reasonable benchmark, as such levels leave some scope for further increases in the near term but also take into consideration the large weight of the economy in international financial markets. A current account deficit of between 1 and 2 percentage points of GDP would stabilise the external debt-to-GDP ratio at around 30 per cent, assuming that a 5 per cent growth rate of nominal GDP can be sustained in the medium run.

Most of the US deficit appears to be structural…

The slowdown of the US economy is already having an impact on the US trade and current account deficits given that imports have fallen more than exports. However, with a cyclically-adjusted current account deficit estimated to be in the vicinity of 4 per cent of output, a reduction by around 2 to 3 percentage points would be needed to bring the deficit back to a level that, in accordance with the above arguments, can be sustained in the medium run.

… and in this regard, a narrowing of existing growth differentials…

Two structural factors may influence the US current account imbalance, particularly *vis-à-vis* Japan and the euro area, but in themselves seem insufficient to reduce it to between 1 and 2 per cent of GDP. First, a convergence in output growth rates between the main areas could lower the US deficit by at least half a percentage point of GDP,[11] but the slower expected growth in the working-age population in Japan and the euro area suggests that potential GDP growth in the United States could remain higher for the foreseeable future, even if rates of productivity growth observed in the main zones were to converge.

… as well as differences in demographics, should reduce the US and Japanese imbalances

Second, over the next 20 years, both the total and the old-age dependency ratios are expected to rise more rapidly in Japan than in Europe and in Europe faster than in the United States, implying that saving could fall more quickly and significantly in the former zones as larger shares of their populations reach retirement age. Here as well the effect on external imbalances could be limited, at least over the next 10 to 15 years. For example, there is an absence of convincing evidence, particularly in Japan, that saving rates of older people are substantially lower than those observed for the working-age population (Börsch-Supan and Brugiavini, 2001). Furthermore, ageing is also expected to reduce investment spending because of the associated lower growth of the labour force, although the adverse effect of a falling working-age population on the labour force growth rate could be compensated for, at least partly, by an increase in participation rates or in retirement age.[12] As a result, the net expected effect of ageing on external imbalances is ambiguous.

11. See Visco (2000). The effect would be larger if convergence were accompanied by a depreciation of the US dollar (IMF, 2001). Moreover, even in the absence of a significant convergence in growth rates, a narrowing of the difference between income elasticities of US imports and exports could contribute to lowering the current account deficit. Previous empirical evidence suggests that the increase in the US trend output growth rate in the 1990s could well lead over time to higher income elasticities of demand for US exports and lower income elasticities of import demand in the United States, reflecting product differentiation and increasing returns to scale of production (Krugman, 1989; Bayoumi, 1998).
12. In many countries, the demographic transition is so strong that an increase in participation rates or in retirement age, while being helpful by raising investment and reducing saving, would be incapable of fully restoring the labour force (see Chapter IV, "Fiscal implications of ageing: projections of age-related spending", in OECD, 2001*b*). In the empirical analysis of investment discussed in the previous section, this scale effect is captured by output. A decline in total output growth induced by a falling labour force would imply a similar reduction in the growth of investment.

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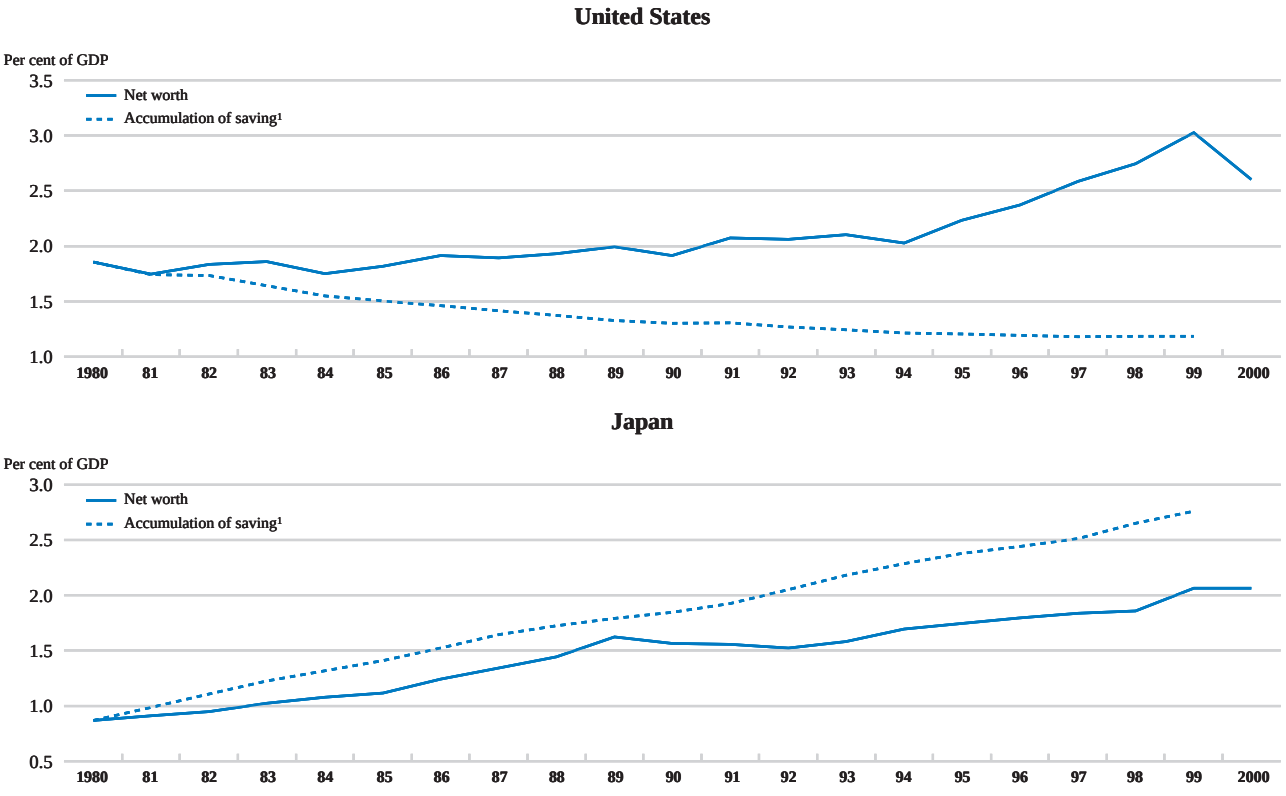
Structural factors may keep Japan's saving rate high

An explanation for the persistence of high private saving rates in Japan is that the effect from an ageing population has so far been more than offset by the poor *ex post* returns that Japanese investors have realised on their financial assets since the late 1980s (Ando, 2000). A good illustration of this phenomenon is provided by the comparison between the accumulation of saving over time and the measure of the stock of net wealth.[13] As shown in Figure IV.4, significant capital gains on financial assets have been realised in the United States over the past 20 years compared with Japan. If this relatively poor performance has indeed been a key factor driving Japanese saving behaviour in the past decade, then an increase in rates of returns could in all logic lead to a reduction in saving and contribute to the narrowing of the current account surplus in Japan. In this respect, structural reforms which could successfully boost returns on investment could help bring about a smooth adjustment of external imbalances.

Some exchange rate adjustment cannot be excluded

Regardless of the role played by these structural factors, a narrowing of the US external imbalances to sustainable levels is unlikely to materialise without a contribution from relative price adjustments. In this regard, the concern is that the required

Figure IV.4. **Household financial net worth and the accumulation of net saving rates**



1. With 1980 net worth as a benchmark.
Sources: National flow of funds or financial accounts statistics; OECD.

13. Since the measure of household net worth incorporates revaluation effects, the difference between the two lines can be interpreted as an approximation of the capital gains in excess of the "normal" return on saving which is included in the accumulation of saving.

change in relative prices takes place abruptly, implying large swings in currency values. However, even assuming that structural factors do not contribute significantly to the narrowing of imbalances in the medium term, the required adjustment in relative prices would not necessarily have to be particularly large, provided that it was spread over several years. On the other hand, considering the degree of short-run real wage and price rigidities and given that exporters often prefer to absorb the effect of currency changes by temporarily cutting their profit margins rather than losing market shares, a larger than proportional depreciation of the exchange rate in nominal terms may be needed if the adjustment in the current account were to take place rapidly.[14]

Large imbalances within the euro area and in the emerging market OECD economies

Large current account deficits have emerged within the euro area

Large private sector (and in some cases external) deficits have recently emerged in a number of euro-area countries – notably Portugal, Greece, Ireland and, to a lesser extent, Spain. With the absence of exchange rate risk, a single monetary policy implies that similar borrowing rates prevail throughout the zones, regardless of the differences in inflation rates. Moreover, country specific premiums have been limited. This could reflect either market confidence in these economies or a market assessment that, should a crisis develop, the no bail-out clause of the Maastricht Treaty will not be respected. Likewise, credit risk *premia* for individual borrowers do not appear to be strongly affected by country-specific saving and investment patterns.

This has raised concerns that a bubble in asset prices may develop

While increases in inflation in countries that experienced strong demand pressures may have led to a decline in net exports *via* the loss of competitiveness, this may not in all cases have constrained demand sufficiently to prevent household and business sectors from becoming over-indebted. At the same time, domestic overheating may have tended to push up asset prices, further adding to overheating through wealth and positive balance sheet effects. The concern has been that a bubble may emerge, the bursting of which would have potentially painful consequences. In the four countries mentioned above, real interest rates fell sharply in 2000 and household credit grew at double-digit rates, fuelling domestic consumption, and leading to a sharp decline in the private sector financial balance, and in Greece and Portugal large current account deficits have emerged.

While fiscal policy could play a more active role…

The combination of such risks and the weakening of market mechanisms have led some to argue that fiscal policy should play a more active role in countering the cycle, in part because the effect of automatic stabilisers is considered not to be sufficient. However, the benefits of fiscal policy action must be carefully weighed against the dangers of compromising medium-term credibility, public administration efficiency and simplicity of the tax structure. Notwithstanding these concerns, the fact that in Portugal the general government balance is still in deficit, even after several years of robust economic growth up to 2000, suggests that fiscal policy tightening should be undertaken; such action would be consistent with the Stability and Growth Pact. On the other hand, the situation in Ireland, and to a lesser extent in Greece,

14. According to estimates based on the OECD international model (INTERLINK), a US dollar depreciation of between 20 to 30 per cent would be needed to permanently reduce the current account deficit to between 1 and 2 per cent of GDP within two to three years. Obstfeld and Rogoff (2000), on the other hand, estimate that a 40 to 50 per cent adjustment would be required to achieve such a rapid reduction in the current account deficit.

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raises trickier issues given that each country currently enjoys a structural surplus that is expected to persist. Moreover, in the case of Ireland, the current account deficit is not overly large.

… a reinforcement of bank supervision and prudential standards may be preferable

Persistent imbalances may also occur in other countries with established monetary unions such as Canada and the United States. However, the emergence of such imbalances and the adverse consequences of their unwinding are diminished by the greater integration of asset markets and financial systems, the possibility of large transfers from the central budget and internal migration. The further development of some of these mechanisms in the euro area could still take quite some time. In the meantime, to the extent that household and business sector over-indebtedness during periods of boom constitutes the main concern, perhaps a solution would be to reinforce bank lending prudential standards and supervision.[15]

A number of emerging market economies could be vulnerable

A number of emerging market countries also run significant saving-investment imbalances. A large external imbalance that has much of its counterpart in a public-sector deficit could be a sign of domestic problems, in particular if inflation is also high. There is, as discussed above, some evidence to suggest that financial market integration has increased and this may facilitate the financing of continuous current account deficits. Even so, these current account deficits are projected to remain over the medium term. On balance, some of these countries could become vulnerable to changing sentiments in financial markets, in particular if international financial conditions for one reason or another should become unsettled.

15. A step in that direction, even if not motivated by the existence of macroeconomic imbalances, was taken in Spain in 2000 where new regulations on loan losses oblige all deposit institutions to set provisions so as to take into account that default rates tend to vary counter-cyclically (OECD, 2001*c*). The purpose is to force banks to increase provisions for bad loans during periods of excess demand in order to avoid raising them during recession.

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V. INVESTMENT IN HUMAN CAPITAL THROUGH POST-COMPULSORY EDUCATION AND TRAINING

Introduction and summary[1]

Post-compulsory education raises efficiency and equity issues

Human capital accumulation is an important determinant of individuals' earning capacity and employment prospects, and therefore plays an important role in determining the level and distribution of income in society. Recent OECD work has also confirmed the importance of investment in education as a determinant of economic growth[2] and education is also found to be associated with various non-economic benefits.[3] Across countries, there is a broad consensus that some degree of government involvement is needed in the provision of educational services. All OECD countries seek to ensure that all young people enter working life with a minimum amount of human capital acquired during the years of compulsory education. However, governments are also heavily involved in the financing and delivery of post-compulsory education and training where returns may to a larger extent accrue to the individual and where participation is by choice. This element of discretion highlights the importance of incentives, raises certain equity issues and indeed questions about the appropriate role of government in the provision of such education and training.

This chapter examines various efficiency and equity aspects of post-secondary education and training. The first section assesses current incentives for young people to participate in upper-secondary and tertiary education immediately following compulsory schooling and the extent to which these incentives are aligned with the returns to society. The following section addresses the incentives for older adults to invest in human capital through formal education and for employers to offer training to their employees. The final section discusses some equity issues related to post-compulsory education and training. The analysis presented in this chapter abstracts from any non-economic benefits, reflecting the difficulty to translate these into monetary values.

The main conclusions of this analysis are the following:

Post-compulsory education results in significant gains for young people…

– Human capital investment in all countries is associated with significant labour-market gains for the individuals in question, such as higher post-tax earnings, higher participation in the labour market and improved employment probability.

– The costs to individuals of pursuing post-compulsory education differ across countries and are strongly influenced by policy-related factors including the

1. This chapter draws on a study on the efficiency and equity aspects of investment in post-compulsory education and training by the Economics Department and the Directorate for Education, Employment, Labour and Social Affairs. For the detailed study, see Blöndal *et al.* (2001).
2. See OECD (2001*a*).
3. These may include better health and, for many people, enjoyment derived from the process of learning and the exercise of learnt skills independently of monetary rewards. See OECD (2001*b*) for a review of studies on the non-economic benefits of education.

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length of education programmes, the subsidisation of tuition fees and public financial support to students.

– Private internal rates of return for young people who successfully pursue a post-compulsory education suggest that there are strong incentives for the average student to engage in education activity. Social rates of return are also high, even if they are lower than the private rates, and point to the benefits of investment in post-compulsory education for society as a whole.

… but the net benefits fall with age

– Incentives to invest in formal education diminish at an increasingly rapid rate as a function of age, reflecting a shorter period to amortise investment costs and higher costs in terms of foregone earnings. Private internal rates of return are correspondingly low and fall strongly with age.

Employers benefit from training their employees

– The limited evidence available shows that employers have an incentive to train their employees since such activity results in higher productivity and profits.

Students in higher education come from favoured backgrounds

– Notwithstanding the expansion of enrolments in tertiary education in recent decades, students in higher education still tend to come from relatively favoured backgrounds.

– Financing arrangements in post-compulsory education tend to be regressive. Those not participating in post-compulsory education – typically people from disadvantaged backgrounds – do not benefit at all from public funding while graduates from tertiary education institutions receive large government subsidies, even though they are likely to come from relatively well-off families and have high-income prospects.

The benefits of post-secondary education for individuals

Labour-market benefits of additional human capital for individuals

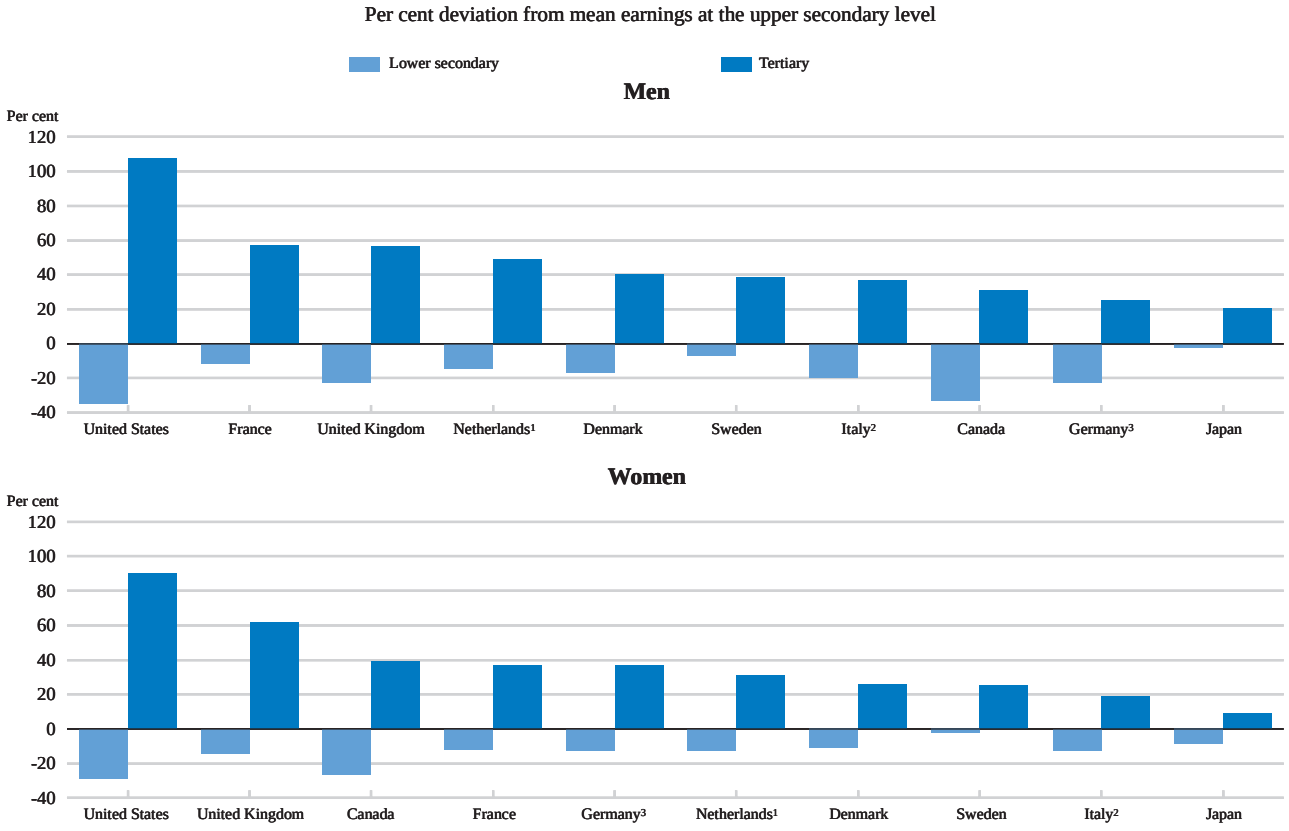
Better education results in higher wages…

An important motivation for individuals to invest in education is that the acquired knowledge and skills tend to raise their productivity and hence earnings potential. Figure V.1 shows that the wage premium earned by tertiary graduates is substantial in all countries considered, and particularly high in the United States, France and the United Kingdom. Investment in upper-secondary education is also associated with significant wage premia over lower-secondary education, especially in the United States and Canada. This wage pattern is broadly the same for both men and women, although education wage premia tend to be somewhat smaller for women.

Education appears to provide not only an initial earnings advantage but also a wage premium that increases with time spent in the labour market.[4] In most countries the earnings of tertiary-educated men and women increase more sharply with age

4. Additional evidence of the labour market benefits of post-compulsory education is available in Blöndal *et al.* (2001).

— Figure V.1. **Relative earnings of full-time workers by gender and level of educational attainment, 1999/2000** —



1. 1997.
2. Annual post-tax earnings.
3. 1998.

Note: Countries are ranked in descending order in terms of the tertiary earnings progression. Wage premia are not standardised for different age and seniority compositions of educational groups across countries.

Source: National statistical institutes. See Blöndal *et al.* (2001).

than is the case for less-educated workers.[5] The main exception is Japan where all the main educational groups register a decline in earnings towards the end of their careers.[6] The progression in women's earnings towards the end of their working life is somewhat smaller than for men in some countries, which could reflect greater barriers for them to advance to higher levels in the job hierarchy (Blau and Kahn, 2000).

… and stronger attachment to work

A further important motive behind acquiring more education is to lower the risk of unemployment. The reduction in risk is particularly large for those investing in upper-secondary education, whereas the gap in unemployment rates between upper-secondary and university-educated workers is comparatively small (Figure V.2). The difference in

5. However, human capital acquired during formal schooling is subject to some depreciation due to technological change and other factors (Ramirez, 2001). These effects put downward pressure on the earnings of older workers.
6. This pattern reflects the Japanese seniority pay system and the mandatory age of retirement. This arrangement results in the well-known fact that older workers in Japanese firms leave their "career" employer prior to permanent withdrawal from the labour market, transferring to a related company (subsidiary) where earnings are lower. Because the mandatory retirement age from a career job intervenes before the employee becomes eligible for a public pension, there are strong incentives for older workers to continue work at lower wages.

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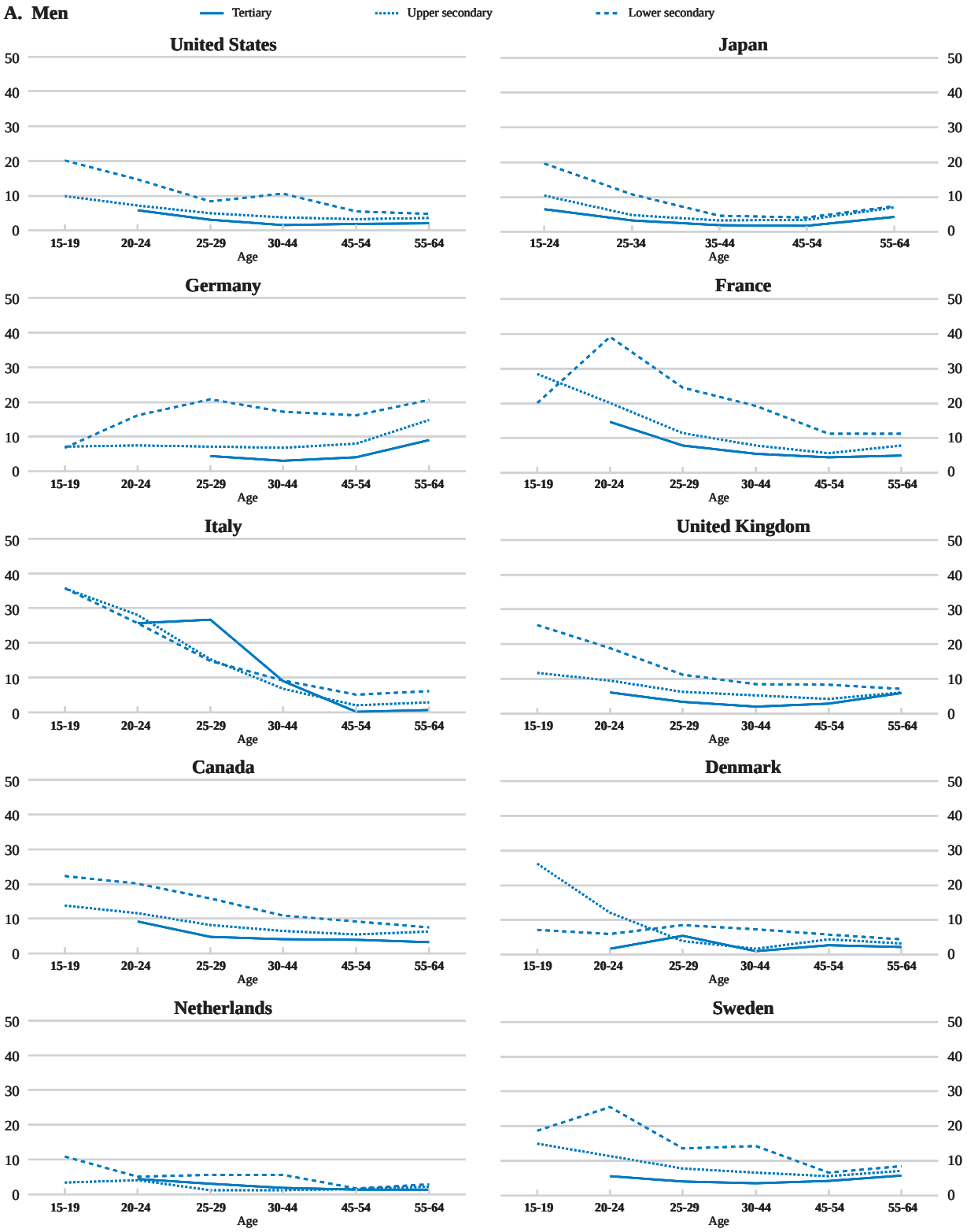
Figure V.2. **Unemployment by level of educational attainment, gender and age, 1999**

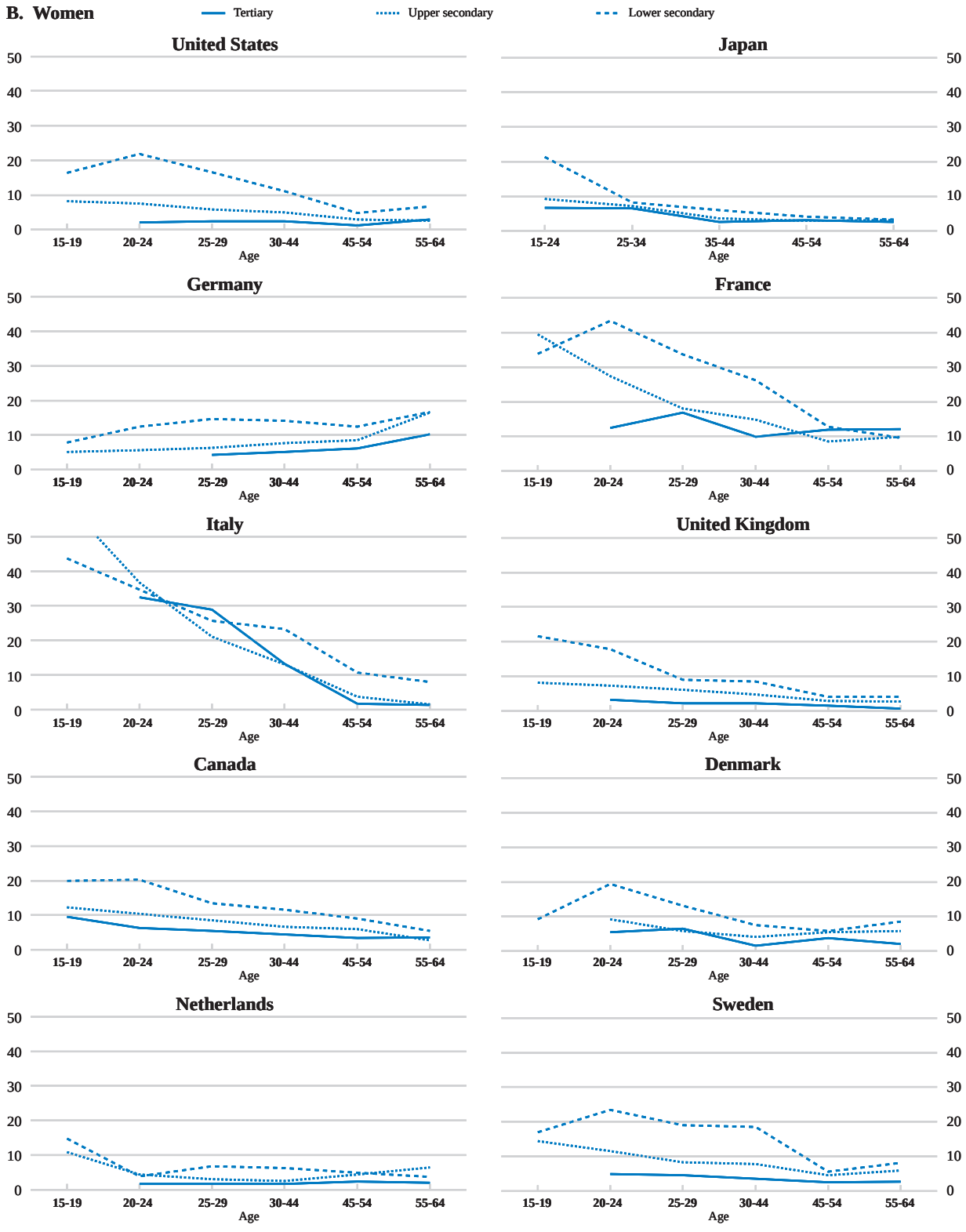
Percentage of labour force



Source: OECD (2001*c*).

Figure V.2. **Unemployment by level of educational attainment, gender and age, 1999** *(cont.)*

Percentage of labour force



Source: OECD (2001*c*).

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unemployment risk across educational categories is notably large for young persons, but it tends to narrow with age.[7] Moreover, educated workers are more likely to participate in the labour market, and their active working life is generally longer than that for those with lower educational attainment.[8]

Policy factors affecting the costs and benefits of additional human capital for individuals

Incentives to invest in education are influenced by subsidised tuition…

Public financing of provision has been the traditional means in most countries to encourage post-compulsory education. At the upper-secondary level, the general academic stream is predominantly funded by government in most countries, while vocationally-oriented programmes are often privately funded. At the tertiary level, the average subsidy rate ranges from 50 per cent or less in Japan, Korea and the United States to close to 100 per cent in some European countries, such as Austria, Denmark, Iceland, the Netherlands and Switzerland.

… length of study periods…

The theoretical or minimum length of study periods is another policy variable that influences the financial rewards from human capital accumulation. Thus, very long study periods will tend to discourage investment in education unless they are associated with equivalent extra gains in productive capacity, and hence earnings potential. Standard upper-secondary education programmes in most OECD countries last for two or three years, and the proportion of students that extend their studies beyond this theoretical length is small. The theoretical length of first-degree tertiary education programmes varies from three to five or more years across OECD countries. Countries with relatively short first-degree programmes include France and the United Kingdom, while long programmes are standard in Germany and Austria.

… student loans and grants…

Most OECD countries have also sought to support educational activity by offering financial assistance to individuals during their tertiary studies. Indeed, in the absence of government intervention investment in human capital is difficult to finance for persons without other collateral. As documented in Blöndal *et al.* (2001), student loan and grant arrangements differ significantly across countries in terms of the extent of income and asset testing of both students and their parents, the amount of financial assistance, and the interest rate and repayment schedules of loans. Indeed, the maximum annual loan and grant entitlement in Japan, the United Kingdom and the Netherlands is close to a half of the opportunity costs of lost earnings plus fees while it ranges from a tenth to a third in the other countries. Similarly, the implied subsidy rate[9] varies significantly across the ten countries reviewed. It is over 20 per cent in the Netherlands, Germany, Denmark and the United Kingdom, falling to around 10 per cent or less in Japan and France.

… and the tax system

A progressive income tax system will work to discourage education activity as it implies a tax on human capital. By taxing the earnings of the better-educated at a

7. High youth unemployment may also provide a strong incentive for young people to continue their studies beyond the compulsory school-leaving age, as this will tend to reduce the opportunity cost of such activity. The increasing number of youths participating (and staying longer) in education in the 1990s in several countries is thus partly a natural response to the weak state of the youth labour market.
8. See Blöndal *et al.* (2001) for cross-country comparisons.
9. The subsidy rate is calculated as the net present value (NPV) of the grants and maximum loans available during study periods as a proportion of the NPV of the overall cost involved with the studies (*i.e.* lost earnings and tuition fees). See Blöndal *et al.* (2001) for detailed analysis.

higher rate than applied to the earnings of the less-educated, the post-tax earnings differential is narrowed and the gains from human capital investment lowered. Among the ten countries reviewed, the gap between the average tax rate on the earnings of upper-secondary and tertiary graduates is particularly large in the United States due to the large earnings differential. By contrast, earned income of lower, upper-secondary and university-educated workers are taxed at a similar marginal rate in Japan.

Internal rates of return to education

The private internal rate of return to post-compulsory education…

The overall financial incentives to invest in human capital that are embedded in the labour market benefits, financing and tax arrangements discussed above can be summarised in estimates of private real internal rates of return (Table V.1). The internal rate is the discount rate that equalises the real costs of education during the period of study to the real gains from education thereafter (see Blöndal *et al.* (2001) for detailed methodological issues). In its comprehensive form, the costs equal tuition fees, foregone earnings net of taxes adjusted for the probability of being in employment minus the resources made available to students in the form of grants and loans. The benefits are the gains in post-tax earnings adjusted for higher employment probability minus the repayment, if any, of public support during the period of study. The calculations assume that the student is in full-time education and has no work activity, and hence no earnings while studying.[10] Moreover, as the probability of course drop-out has not been taken into account, the reported internal rates are conditional on successful completion of the relevant education programmes.

… is generally high…

The estimated private real internal rates of return to upper-secondary and university education differ significantly across the countries listed in Table V.1. They are generally higher than the real interest rate or the rate of return on other productive assets, suggesting that human capital investment is an attractive way for the average person to build up wealth.[11] For tertiary studies, three groups of countries can be identified depending on the estimated values of the "comprehensive" internal rate. Firstly, with its very high rewards from tertiary education, the United Kingdom is in a group of its own. Second, the United States, France, Denmark, the Netherlands and Sweden are characterised by relatively high internal rates of return, ranging from 11 to 15 per cent. Third, in the remaining countries rates are below 10 per cent, with the lowest rates recorded for Italy and Japan. For upper-secondary education, the internal rate is calculated to exceed 10 per cent in all countries listed in Table V.1 with the exceptions of Japan, the Netherlands, Sweden and Germany (women).[12]

… primarily due to earnings differentials and length of education…

As can be seen from Table V.1, earnings differentials and the length of education are generally the prime determinants of the private internal rates of return. Thus, countries with strong overall incentives to invest in human capital are typically characterised by high education-earnings differentials and/or relatively short education

10. The calculated rates of return are likely to be biased upwards as unemployment and retirement benefits are not taken into account. However, Brunello (2001) suggests that the inclusion of the unemployment risk may exaggerate the impact of unemployment on the financial reward of education because unemployment may have more detrimental effects on subsequent earnings of those with higher education.
11. The existence of non-economic benefits would reinforce this argument as, if quantified, they would raise further the calculated rates of return.
12. Reflecting somewhat different data sources and methodology, these estimates differ in some cases from earlier OECD estimates of internal rates of return (OECD, 1997 and 1998). The estimates reported in Table V.1 are broadly in line with the results of empirical studies that derive rates of return from earnings regressions using micro data (*e.g.* Card, 1999 and 2000; O'Donoghue, 1999; and Barceinas-Paredes *et al.*, 2000).

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Table V.1. Private internal rates of return to education, 1999-2000

Per cent

	United States	Japan	Germany	France	Italy[a]	United Kingdom	Canada	Denmark	Nether-lands[b]	Sweden	Unweighted average
A. Men											
Tertiary education											
Return based on pre-tax earnings and the length of studies (narrow rate)	18.9	8.0	7.1	13.3	6.7[d]	18.1	8.4	7.9	11.7	9.4	11.4[c]
Impact of (in percentage points)											
Taxes	–2.3	–0.3	–1.5	–1.6	..	–2.1	–0.5	–0.4	–2.0	–1.5	–1.3
Unemployment risk	0.9	0.9	1.1	2.4	0.5	1.6	1.3	1.1	0.0	1.2	1.1
Tuition fees	–4.7	–2.0	–0.3	–1.1	–0.7	–2.7	–2.3	–0.1	–0.6	–0.7	–1.5
Public student support	2.1	1.3	2.7	1.3	0.0	3.6	1.8	5.2	2.9	3.0	2.4
Comprehensive rate	**14.9**	**7.9**	**9.1**	**14.3**	**6.5**	**18.5**	**8.7**	**13.7**	**12.1**	**11.4**	**11.7**
Upper-secondary education											
Return based on pre-tax earnings and the length of studies (narrow rate)	14.4	4.4	10.0	7.5	9.5[d]	12.4	11.9	11.3	6.9	3.9	9.2[c]
Impact of (in percentage points)											
Taxes	–0.9	–0.2	–2.1	–1.0	..	–1.5	–1.6	–2.2	–0.2	–0.6	–1.1
Unemployment risk	2.9	2.6	2.9	7.0	1.7	4.2	3.6	2.2	1.2	3.1	3.1
Comprehensive rate	**16.4**	**6.8**	**10.8**	**13.5**	**11.2**	**15.1**	**13.6**	**11.3**	**7.9**	**6.4**	**11.3**

	United States	Japan	Germany	France	United Kingdom	Canada	Denmark	Nether-lands[b]	Sweden	Unweighted average
B. Women										
Tertiary education										
Return based on pre-tax earnings and the length of studies (narrow rate)	18.8	8.0	7.0	12.1	16.4	10.6	6.0	9.4	7.4	10.6
Impact of (in percentage points)										
Taxes	–2.0	–0.2	–1.6	–1.7	–2.3	–1.3	–1.1	–1.0	–0.7	–1.3
Unemployment risk	1.4	0.5	0.6	4.8	1.3	1.2	0.7	0.7	1.6	1.4
Tuition fees	–6.0	–2.4	–0.6	–1.7	–2.5	–2.9	–0.1	–0.7	–0.8	–2.0
Public student support	2.7	1.3	3.0	1.9	3.2	2.4	5.6	4.1	3.3	3.1
Comprehensive rate	**14.7**	**7.2**	**8.4**	**15.4**	**16.1**	**9.9**	**11.1**	**12.5**	**10.8**	**11.8**
Upper-secondary education										
Return based on pre-tax earnings and the length of studies (narrow rate)	10.6	6.6	6.1	10.5	..	10.8	8.3	7.9	..	8.7
Impact of (in percentage points)										
Taxes	–1.3	–0.2	–1.7	–0.7	..	–1.2	–1.4	–1.6	..	–1.2
Unemployment risk	2.5	3.0	2.6	8.1	..	3.1	3.6	2.1	..	3.6
Comprehensive rate	**11.8**	**9.4**	**7.0**	**17.9**	**..**	**12.7**	**10.5**	**8.4**	**..**	**11.1**

Note: The rates of return to tertiary education are calculated by comparing the benefits and costs with those of upper-secondary education. In the case of rates of return to upper-secondary education, the calculation compares the benefits and costs with those of lower-secondary education. In Sweden, the theoretical length of standard tertiary courses is used in the calculations rather than the average theoretical length of different programmes. Moreover, earnings differentials for women between upper and lower-secondary levels are not large enough to permit a positive rate-of-return calculation. In the United Kingdom, data on earnings of women up to age 30 with lower-secondary education were not available. In Italy, reliable data on earnings for women were not available.

a) 1998.
b) 1997.
c) Excluding Italy.
d) Post-tax earnings.
Source: Blöndal *et al.* (2001).

programmes, and *vice versa*. The influence of other factors (elaborated below) does, however, generate notable exceptions to this general pattern. Thus, despite narrow wage differentials and long study periods, Denmark and, to a lesser extent, Sweden offer comparatively strong incentives to acquire university education. And France has strong incentives for young people to invest in upper-secondary education despite relatively small wage gains compared to the length of such education.

… but other factors also play a role

The contributions of the other factors can be evaluated by adding them successively to the estimate of the "narrow" rate derived from only pre-tax earnings and study length:[13]

- *Taxes* reduce the narrow rate by 1¼ percentage point on average for tertiary education and 1 percentage point for upper-secondary education. At the tertiary level, the impact of taxes is particularly strong in the United Kingdom and the United States. At the upper-secondary level, the depressing effect of the tax system is most notable in Germany, while it is the smallest in Japan.
- *Unemployment* risk increases the internal rate of return notably for upper-secondary education, with the effect averaging 3½ percentage points in the countries under review.[14] In France, it adds as much as 7 to 8 percentage points to the internal rate of return at the upper-secondary level. For tertiary education, the differential unemployment risks have much less effect on the rates of return, adding on average 1 to 1½ percentage point for men and women, respectively.
- *Tuition fees* have a particularly important negative impact on rates of return to tertiary education in the United States, and, to a lesser extent, in the United Kingdom and Canada. In the continental European countries, the impact is significantly smaller due to the much lower level of tuition fees.
- *Public student grant and loan arrangements* at the tertiary level give a significant boost to incentives, averaging 2½ to 3 percentage points, compared with rates of returns excluding such support. The impact is particularly strong in Denmark, and, to a lesser extent, in the Netherlands and Sweden, while it is weak in Japan and France, and absent in Italy.

The social rate of return is also high

The benefits to society of additional education should be assessed on the basis of social rates of return which reflect the costs and benefits to society of investment in education, and these can differ significantly from private costs and benefits. The social cost includes the opportunity cost of people not participating in the production of output plus the full cost of providing education rather than only the cost borne by the individual. The social benefit includes the increased economy-wide productivity associated with the investment in education. While data on social costs are available for most OECD countries, information about the full range of social benefits is less readily available. For example, the possibility of growth externalities associated with education suggests that the observed earnings differentials might not fully account for the economy-wide efficiency gains, even if such externalities may be relatively smaller at the post-compulsory level of education. Indeed, a recent OECD study on the determinants of economic growth suggests that such positive externalities may be important.[15] On the other hand, some studies suggest that a (small) part of the wage premium received by better educated individuals is due to the fact that educational attainments signal their inherent abilities to employers, rather than their higher productivity arising from investment in human capital.[16]

13. This implies that the impact of the other factors is conditional on the earnings gains and the length of education.
14. The inclusion of unemployment benefits in the rate-of-return calculation would lower the impact of the unemployment risk. As replacement rates move towards 100 per cent, the impact of the unemployment risk would go to zero.
15. See Bassanini and Scarpetta (2001).
16. The signalling role of education is analysed in Bedard (2001) for the United States and in Harmon and Walker (2001) for the United Kingdom.

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In view of the difficulty in constructing comprehensive social rates of return, Table V.2 presents estimates of a "narrow" definition that abstracts from any externality effects and assumes that all wage gains from education represent associated gains in productivity (likewise, the calculations do not take into account non-economic benefits, see Blöndal *et al.* (2001) for detailed methodological issues). On this basis, the social internal rates of return are generally significantly lower than the private internal rates of return in Table V.1, primarily reflecting that the social cost of education is higher than the private cost. Even so, social internal rates of return are typically well above 5 per cent in real terms for both upper-secondary and tertiary education, suggesting that investment in education may often be a productive use of public funds. The estimates suggest that the social internal rate of return is particularly high at both the upper-secondary and tertiary levels in the United States and the United Kingdom, while it is the lowest in Japan at both of these education levels. In France, it is small for upper-secondary education but comparatively high at the tertiary level.

Internal rates of return can be interpreted in different ways

The private and social internal rates of return reported above are generally well above the real interest rate and the rate of return on other productive assets. This may partly reflect that the calculations ignore educational failure but even correcting for this, rates of return are likely to remain high. One interpretation is that the high rates indicate a disequilibrium in the market for educated workers, with shortages of better-educated workers driving up their earnings. This might imply a temporary situation, where super-normal returns to education would subsequently generate enough supply response to push the rates down into line with returns available on other productive assets – though this adjustment might take a long time.[17] While temporary

Table V.2. **Narrow estimates of social rates of return to education, 1999-2000**

Per cent

	Upper-secondary education		Tertiary education	
	Men	**Women**	**Men**	**Women**
United States	13.2	9.6	13.7	12.3
Japan	5.0	6.4	6.7	5.7
Germany	10.2	6.0	6.5	6.9
France	9.6	10.6	13.2	13.1
Italy[a]	8.4	. .	9.7	. .
United Kingdom[b]	12.9	. .	15.2	13.6
Canada[c]	. .	. .	6.8	7.9
Denmark	9.3	8.7	6.3	4.3
Netherlands	6.2	7.8	10.0	6.3
Sweden[d]	5.2	. .	7.5	5.7

Note: These calculations relate to a narrow definition of the social rate of return which exclude any possible positive external effects due to education.The rates of return to tertiary education is calculated by comparing the benefits and costs with those of upper-secondary education. In the case of the rates of return to upper-secondary education, the calculation is done by comparing the benefits and costs with those of lower-secondary education.

a) In Italy, reliable data on earnings for women were not available.

b) In the United Kingdom, data on earnings of women up to age 30 with lower-secondary education were not available.

c) In Canada, no data are available on expenditure per student at the upper-secondary level.

d) In Sweden, earnings differential for women between upper and lower-secondary levels are not large enough to permit a positive rate of return calculation.

Sources and Methods: see Blöndal *et al.* (2001).

17. The speed of adjustment would importantly depend on the capacity of the education and training system to respond to the derived increase in demand and the capacity of the labour market to absorb the changing relative supplies of labour.

disequilibrium may account for some of the apparent "excess" returns, part of the super-normal returns may also reflect an equilibrium situation. This second interpretation would be relevant if the marginal rates of return are significantly lower than the average rates and thus closer to marginal rates on alternative productive assets.[18] The marginal rate would indeed be lower than the average rate if the students at the margin are of lower ability and less motivated than the average students, and thus unlikely to be able to command the average wage premium in the labour market. On this interpretation, the high internal rates of return would partly reflect economic rents on a scarce resource, namely individual ability and motivation.

On either of the two interpretations, the authorities could enhance incentives for investment in education, for example, if it were to be possible to reduce the standard length of education programmes without compromising their quality and if they were to increase the generosity of student financial support. On the other hand, stronger incentives may not elicit a large supply response if there is a serious shortage of young people with the abilities and motivation required to profit from continued education. In this case, it might be more appropriate to improve the average abilities of young individuals through interventions at pre-schooling ages and in compulsory schooling, with studies indicating that cognitive abilities can be developed into teenage years.

Adult education: incentives for post-compulsory education and training

Incentives for older adults to pursue formal education programmes

The incentives to pursue education diminish as a function of age

The costs and benefits for older adults to participate in formal education programmes will differ from those for young people in important ways:

- The opportunity costs of foregone earnings will be significantly higher for older adults if education requires time out of work. Indeed, earnings tend to rise with age even if the progression is weaker for the lower educated than for the higher educated.[19] This rising cost as adult workers age acts as a disincentive for them to invest in additional human capital.
- The eventual return in the form of higher earnings from formal education or training at older ages may be subject to considerable uncertainty. Making use of enhanced human capital may often require switching to another employer, in which case wage premia due to seniority or employer-specific skills will be lost and thus cancel part of the expected gains due to more education and training *per se*.

18. High private internal rates of return would also be compatible with equilibrium if individuals apply a high discount rate to future gains. Indeed, some studies on time preferences of individuals report very high discount rates, see *e.g.* Alessie and Kapteyn (2001).
19. For example, a 40-year-old male with upper-secondary education earns from around 50 per cent (in Sweden) to around 90 per cent (in the United States) more than his counterpart in his early twenties.

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– Adult workers will often not have the same access to public financial support as their younger counterparts. In some countries, such as Germany, there is an age limit for entitlements to standard student grants and loans. In other countries, the means testing of such support on students' assets is likely to limit the availability of any support to adult students.

The shorter remaining length of the working life for adult workers also implies a compression of the period to amortise the investment costs associated with such programmes. Pursuing long formal education programmes would tend to reduce even further the period in which the benefits from such investment can be enjoyed. Even if such education contributes to an extension of the period until retirement, the short remaining working life is likely to be a greater disincentive for human capital acquisition with age, and can eventually eliminate all financial gains from such investment.

To illustrate the combined impact of the various individual effects discussed above on incentives facing mature adults, Table V.3 presents stylised internal rates of return to standard first-degree university education for a male starting studies at the ages of 40, 45 and 50.[20] The table shows clearly that under prevailing policies private incentives to increase human capital diminish with age. By the age of 40 the internal rate of return to tertiary education is considerably lower on average than that shown in Table V.1 for young men undertaking such studies as a part of their initial education (excluding student support). The drop in returns accelerates after the age of 40, the rate falling by 10 percentage points on average in the ten years up to the age of 50. Indeed, on the assumptions used for the calculations, by the age of 50 only the United States and the United Kingdom offer a positive rate of return to tertiary education. Adult participation in formal education would be stimulated if programmes could be designed in a way that reduces the high opportunity cost for older workers to participate, *e.g.* through greater use of intensive or modular courses, or if benefits could be increased, *e.g.* through longer working lives.

Table V.3. **Private internal rates of return to tertiary education for older adults (men)**

Per cent

	Age 40	Age 45	Age 50
United States	8.9	6.7	3.5
Japan	0.9	–3.0	–10.5
Germany	–1.5	–9.7	–23.0
France	7.3	1.9	–11.4
Italy	0.4	–4.1	–21.6
United Kingdom	11.1	8.8	5.5
Canada	1.0	–3.0	–10.5
Sweden	3.9	0.6	–7.5

Note: The internal rates of return to tertiary education are calculated by comparing the benefits and costs with those of upper-secondary education.
Sources and Methods: see Blöndal *et al.* (2001).

20. All the calculations assume that the wage premia at the end of study are identical to those received by a young male finishing his degree as a part of initial education, and that they evolve over time in line with those for a young graduate. The length of study is assumed to be identical to that for young persons, and adult students are assumed to have no public grants or loans.

Incentives for employers to invest in training

Employer-sponsored training appears to increase profits while also inducing higher wages

The principal incentive for firms to spend on training is that such activity may increase profits. Training will increase profits if it results in sizeable productivity gains and if the productivity gains are not fully appropriated by the trained workers in the form of higher wages. The wage response may depend on the nature of the training in question. On the one hand, training in firm-specific skills is unlikely to result in higher wages as the acquired skills are not readily exportable to other firms. On the other hand, training in general skills raises the risk of the productivity gains being appropriated by the trained workers as their value to other employers has risen and the resultant threat of "poaching" may force the employer who sponsored the training to increase wages. However, even if training involves the acquisition of general as well as firm-specific skills, as often appears to be the case, there are various mechanisms that can reduce the risk of "poaching" and introduce an element of cost-sharing between firm and worker. The relationship between firm-sponsored training and profits can thus only be determined on the basis of empirical analysis.

The evidence available suggests that training tends to increase productivity, wages and profits. For example, a recent study based on UK data suggests that a 5 percentage point increase in training incidence could lead to an increase in the level of labour productivity by 4 per cent (see Dearden *et al*., 2000).[21] An OECD (1999) econometric study that controls for a wide range of individuals' characteristics has identified the important influence of training on wage determination in many countries, confirming results obtained in national studies.[22] The few studies that look at the impact of training on productivity and wages jointly suggest that training has strong positive effects on profits.[23] To the extent that these studies are representative, their findings suggest that employer-sponsored training is profitable and that employers have an incentive to offer training to their employees.

Many countries have policies aimed at increasing enterprise training

However, concerns about a chronic lack of supply of enterprise training have prompted governments to intervene in the training market. Such interventions have included requirements that employers spend a certain proportion of their wage bill on training and giving employees the right to training:

– *Mandatory spending on training*. In France, companies with ten or more employees have to spend a minimum of 1½ per cent of their wage bill on training, or pay a corresponding levy. Most of the programmes target the already well-educated, and workers in large enterprise have a higher access rate to training then workers in small and medium-sized enterprise. Korea and Australia both had similar training levies in place in the 1990s, but they have now been abolished. An assessment of the levy in Australia suggested that it had increased spending on training, but, as seems to have been the case in Korea, had not been effective in stimulating such activity in small and

21. Other studies finding significant impacts of training on firm productivity include Holzer *et al.* (1993) for the United States, De Koning (1994) for the Netherlands, Alba-Ramirez (1994) for Spain, and Barrett and O'Connell (1998) for Ireland.
22. The OECD study detected a robust "genuine" wage premium related to company training in Australia, Canada, Germany and Britain, but such training effects on wages were not found in France and Italy. National studies reviewed in OECD (1999) are in line with these findings.
23. Thus, Barron *et al*. (1989) show that a 10 per cent increase in training in US companies is associated with a 3 per cent increase in labour productivity and only a 1½ per cent increase in wages. Also, Dearden *et al.* (2000) find that a 1 percentage point increase in the incidence of training in the United Kingdom implies a fall in unit labour costs of ½ percentage point.

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medium-sized enterprises that preferred to pay the levy rather than spend on training. As in France, the Australian levy also left the distribution of training across different categories of workers relatively unchanged, as most of the training went to higher educated and more skilled workers, as it does in the absence of a levy.

– *Employees' rights to be trained.* France, Belgium and Denmark grant workers a right to paid training leave under certain conditions. This option puts the onus on the individual, rather than the firm, to choose to be trained, and to choose the type of training. In France, beneficiaries of the programme must have an indefinite work contract, thereby excluding temporary workers, while in Belgium the scheme is restricted to full-time workers.

Reflecting the limited evaluation available of these schemes, it is uncertain to what extent such measures have been successful in increasing gainful adult training for individuals and society.

Equity in post-compulsory education

The element of choice raises particular equity issues in post-compulsory education

In the compulsory phase of education, participation is by definition near-universal, and equity issues arise over the extent to which such participation realises the potential of all, regardless of social background or circumstances (see Box V.1). In post-compulsory education, the equity issues arise in quite different form because of the extent of individual variation in participation. Two such issues addressed below

Box V.1. The dimensions of educational equity

The central goal of education and training is to ensure that all individuals develop to their full potential. A realisation of this goal would not remove differences between individuals in educational achievement and the associated benefits. It would not necessarily mean access for all to the same educational and training experiences but would imply access to skill development that would enable each individual to develop his or her full potential. In practice, it will often be unclear whether differences in educational outcomes reflect variation in "full potential" or differentially effective provisions.

Consideration of equity in education must address outcomes as well as access. The question to be addressed is not whether outcomes vary but whether they do to an extent that is unreasonable and whether the distributions of outcomes are equivalent in groups between which it is not reasonable to expect differences. For example, it is generally accepted in OECD countries that no factors (genetic, social or cultural) should automatically constrain female educational achievement to a different level or distribution from that of men and many countries have increased female achievement to match or go beyond that of males.

Socio-economic equity raises different issues. General cognitive abilities are significantly heritable, and these genetic effects are sustained throughout life (McLearn *et al.*, 1997). To the extent that innate abilities determine the educational attainment and socio-economic level of parents, and are genetically linked to the capacities of their children, success in one generation will be correlated with that of the next. However, the evidence suggests that socio-economic privilege confers many direct benefits, both through a home culture which tends to reinforce the goals of formal education and through the capacity to fund access to education in private schools and post-compulsory education (Dearden, 1998; McPherson and Schapiro, 2000).

Particularly in the post-compulsory phase, systems of educational finance also have an impact on outcomes by virtue of how they distribute the costs of human capital investment between different parties. Overall outcomes for any individual depend not only on the benefits of educational attainment, but also on how much of the cost of that education falls on the individuals who benefit or their families.

are: *i)* the extent to which the expansion of post-compulsory education has enhanced equality of opportunities to access; and *ii)* the distribution of costs and benefits of public spending on post-compulsory education.

Expansion of post-compulsory education and the equality of opportunity

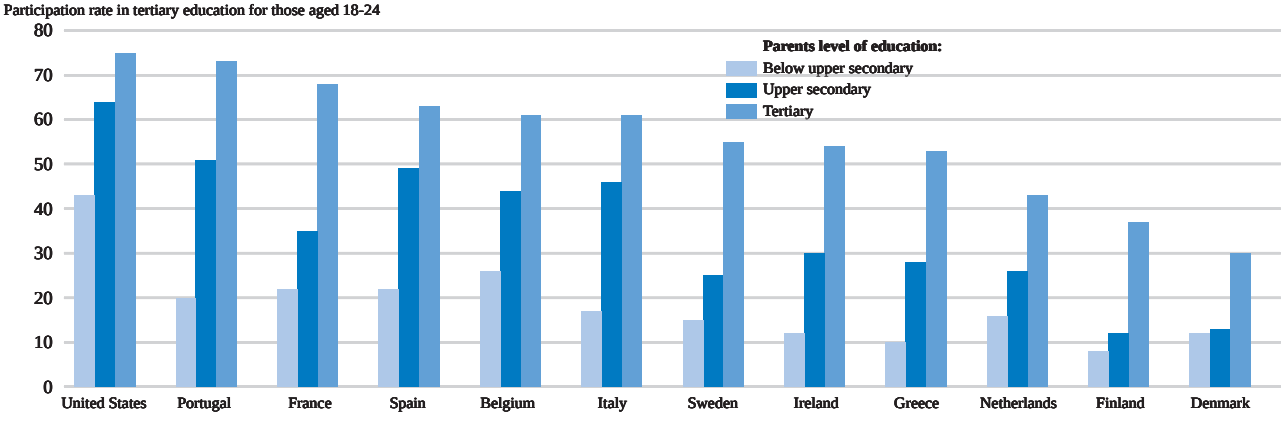
Despite the expansion of post-compulsory education…

Over the past 30 years both participation and attainment rates in post-compulsory education have increased rapidly. Thus, on average in OECD countries, nearly three quarters of the younger cohort aged 25-34 have completed upper-secondary education, and one quarter have completed tertiary education. Conversely, among those currently aged 55-64, under half have completed the upper-secondary phase of education, and only one in seven has completed tertiary education. Much of the progress is attributable to women catching up with men – the attainment levels of younger men and women aged 25-34 are now very similar.

… educational attainment remains linked to parental achievements…

However, evidence from a number of countries, including the United States, the United Kingdom and France, suggests that the minority of young people who fail to complete upper-secondary education tends to come from less affluent backgrounds.[24] Moreover, the participation of young people in tertiary education is highly correlated with the educational attainment of their parents (Figure V.3). In many countries,

Figure V.3. **The influence of parental education on tertiary participation in 1994-95**



Note: Overall participation rates cannot be inferred from this figure since the reported participation rates refer only to those aged 18-24.
Sources: EURYDICE (1997), *Key Data on Education in the European Union*, 1997 European Communities, Luxembourg; US Bureau of the Census (1995), *Social and Economic Characteristics of the Population: School Enrolment*, October 1994, *Current Population Reports*, Series P-20, Table 17. National surveys in Denmark, Finland and Sweden.

24. In France in the late 1990s, 62 per cent of the 15-year-olds coming from the poorest two deciles of families have had to repeat at least one year in school compared with 17 per cent from the richest two deciles (INSEE, 2000). In the United States in 1999, over three-quarters of high-school drop-outs came from families with below median income, and only 8 per cent from the highest family income quartile (National Center for Education Statistics, 2000). In the United Kingdom in the late 1990s, young people from households headed by a professional and managerial worker were twice as likely to remain in full-time education at 18 as those from households headed by an unskilled manual worker (UK Department for Education and Employment, 2000). The links between childhood experiences and educational attainment are analysed in Gregg and Machin (2001) for Britain and in Büchel *et al.* (2001) for Germany.

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those whose parents have completed some tertiary education are about twice as likely to participate in tertiary education as those whose parents lack upper-secondary education qualifications. These differences are unlikely to reflect purely hereditary influences. New research (OECD, 2001*d*) shows that in the compulsory phase of education, the relationship between socio-economic backgrounds and educational achievement varies in strength across OECD countries which again may be reflected at the post-compulsory level.

… and to school influence

School influence is another major, though not independent, determinant of participation at post-compulsory level. In most countries tertiary education requires prior qualifications – generally at upper-secondary level – so that attainment in the compulsory phase of education, as much as anything which occurs subsequently, is a key to tertiary participation. Therefore, the expansion of capacity at the tertiary level will not in itself have much impact on these factors. The challenge to public policy of delivering equality of opportunity in tertiary education is sizeable, and falls not only on the system for tertiary education itself, but also on support for children and their families, reaching back to pre-schooling and into compulsory and upper-secondary schooling.

The distribution of the costs and benefits of public post-compulsory education spending

Financing arrangements for post-compulsory education are regressive

Financing arrangements for public funding of post-compulsory education appear to be regressive.[25] University graduates, typically from favoured backgrounds and with high income prospects, receive large government subsidies with some social returns attached to them. However, those terminating studies after the end of compulsory schooling do not benefit from such subsidies. Indeed, it can be estimated that, on average in OECD countries, individuals with tertiary qualifications receive a gross transfer from public funds of about $50 000, taking into account the public financing of tuition as well as student grants and loans.[26] Individuals in an intermediate group whose highest qualification is upper-secondary – about half the cohort – receive a transfer from public funds of about $18 000. The worst-off group – those who drop out of school at the compulsory school-leaving age – do not obtain such transfers.[27] However, in the context of a progressive tax system, such regressiveness may merely act to limit the net transfer of resources from the richer to the poorer segments of society that is embedded in the overall tax-transfer system.

25. This regressive nature of the financing of post-compulsory education would be accentuated if an account were to be taken of non-economic benefits associated with education.
26. In OECD countries, the average tuition cost of a tertiary qualification is $35 000, with 80 per cent coming from public funds. In addition, student grants and loans represent about 17 per cent of total government expenditure on tertiary education. The net result is a transfer from public funds to the graduate of about $35 000. On the premise that schooling is compulsory up to the 16th birthday, and upper-secondary education typically lasts until age 18, it can be assumed that a tertiary graduate has also benefited from three years of upper-secondary education, with the average transfer of public funds estimated at $6 000 per year – yielding a separate transfer of about $18 000. The total subsidy to tertiary graduates is therefore about $50 000. See OECD (2001*c*) for more details.
27. The regressive nature of funding arrangements in tertiary education has been recognised for many years. For an early analysis, see Hansen and Weisbrod (1969).

If public funding for tertiary education were to be cut to reduce this regressive transfer from public funds, there would be a risk that participation in such education might fall. However, the limited direct experience of changes in public funding arrangements suggests that the impact on student numbers is likely to be relatively small:

Participation in tertiary education does not appear to fall with higher tuition fees when accompanied by greater availability of student loans…

– In the United Kingdom, the replacement of grants by loans and the introduction of tuition fees in the 1990s had no obvious effect on participation rates (UCAS, 2000).

– In New Zealand, the replacement of grants by a loan system in 1992 had no marked observable effect on the growth rate of participation in tertiary education (New Zealand Ministry of Education, 2001).

– In Australia, according to one study, the introduction of tuition fees in 1989 reduced applications by school leavers by 14 per cent below what they would otherwise have been, but did not affect application rates by older applicants (Andrew, 1997). However, another study suggested that tuition fees have had no discernible negative effects on student enrolment (Vossensteyn and Canton, 2001).

As for possible adverse effects on particular groups, policy has sought to minimise such negative effects on access by students from disadvantaged backgrounds.[28] In many cases, loan and fee regimes have been introduced with elements of means-testing, and loan arrangements are often structured so that the lifetime repayments are lower for graduates with lower incomes and/or do not begin until graduate incomes exceed a set threshold in the future. Experience to date suggests limited effects on access by disadvantaged groups:

– In the United Kingdom, the replacement of grants by loans and the introduction of tuition fees has left the social class mix of entrants to universities unchanged, and the proportion of ethnic minority entrants and women slightly higher than before (UCAS, 2000). The take-up of student loans has been approximately equal across students from more and less affluent backgrounds.

– In New Zealand, despite the introduction of a loan scheme in 1992 and substantial fee increases, Maori and Pacific Island groups increased their participation rates substantially (by 24 per cent and 28 per cent, respectively, between 1994 and 1998) (New Zealand Ministry of Education, 1999).

– In 1974, Australia abolished tuition fees and introduced income support measures for all students in an attempt to widen access. A number of studies have shown that the socio-economic mix of students in universities was little changed as a result (Committee on Higher Education Funding, 1998). Nor did the socio-economic mix of students change following the re-introduction of tuition fees in 1989 based on an income contingent loan, or following the more recent increase and differentiation in fees (Vossensteyn and Canton, 2001).

28. To the extent that potential students from disadvantaged backgrounds have less information about the net lifetime gains of education or that they are particularly adverse to going into debt, an increase in fees, even if accompanied by greater loan availability, could depress their participation in higher education.

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… and such policies may advance equity objectives without compromising efficiency goals

The limited evidence reviewed above suggests that the simultaneous increase in tuition fees and an expansion of student loan arrangements might advance equity objectives without compromising efficiency goals. An increase in tuition fees would reduce the regressive nature of financial arrangements in post-compulsory education, while the greater availability of student loans would act to offset the impact of increased private costs on enrolment. At the same time, easier access to student loans, even without a subsidy element, may be particularly important for young people from disadvantaged backgrounds, improving opportunities for all individuals to develop to their full potential.

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VI. THE CROSS-MARKET EFFECTS OF PRODUCT AND LABOUR MARKET POLICIES

Introduction and summary[1]

Product and labour market reforms are likely to have significant cross-market effects

OECD countries have pursued product and labour market reforms over the past two decades to increase employment and enhance productive efficiency. For example, countries have adjusted their employment protection and minimum wage legislation, reformed their benefits systems and modified their tax policies with the aim of reducing unemployment and stimulating labour force participation.[2] Moreover, many OECD countries have initiated pro-competitive regulatory reforms of product markets, leading to positive effects on productivity and consumer welfare.[3] However, little attention has been paid to the potential impact of product market regulations on labour market outcomes or of labour market policies and institutions on product market performance.

This chapter reports on recent OECD empirical analysis aimed at shedding some light on the potential long-run cross-market effects of policy reforms in product and labour markets.[4] Focusing on anti-competitive product market regulations in potentially competitive markets (such as legal barriers to entry, price controls, state ownership, administrative burdens and trade and investment barriers), the first section presents quantitative assessments of the impact of regulatory reforms on employment, employment insecurity and earnings inequality. The following section examines the effects of selected labour market policies and institutions on innovation performance and industry structure.

Increased product market competition can raise overall employment rates in the long run...

The main message of the chapter is that there are significant cross-market effects of product market regulations and labour market policies and institutions. This has several policy implications:

– The reduction of barriers to trade and competition in potentially competitive product markets can be a complement to labour market reforms aimed at increasing long-run employment levels of OECD countries.

1. This chapter is based on a study prepared by the Economics Department and the Directorate for Education, Employment, Labour and Social Affairs.
2. See Chapter IV "Labour market performance and the OECD jobs strategy" in OECD (1999), Chapter VII "Recent labour-market performance and structural reforms" in OECD (2000*a*), and the Editorial "Rewarding work" as well as Chapter IV "Eligibility criteria for unemployment benefits" in OECD, (2000*c*).
3. See *OECD Report on Regulatory Reform I-II* (OECD, 1997), Chapter IV "Regulatory reform in network industries: past experience and current issues" in OECD (2000*a*) and Chapter IV "Links between policy and growth: cross-country evidence" in OECD (2000*b*).
4. The study employed cross-section and pooled cross-section time-series regressions to analyse long-term cross-market effects, and made extensive use of the OECD regulatory database (see Nicoletti *et al.*, 1999). A more extensive presentation of the analysis and a discussion of methodological issues are contained in Nicoletti *et al.* (2001).

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... while leaving employment security largely unaffected

– At the same time, preliminary evidence suggests that these long-run employment gains do not come at the expense of greater long-run inequality in labour markets or greater insecurity about employment prospects, as proxied by several measures of job turnover and average job tenure. Nevertheless, the impact of regulation on job security appears to differ across different groups of workers and the adjustment costs can be significant for some displaced workers. This points to the need to accompany product market reforms with appropriate labour market policies.

Reforms of job protection may stimulate innovative activity…

– Depending on the industrial-relations regime, a relaxation of hiring and firing restrictions seems to be either positive or approximately neutral with respect to its effect on innovative activity in individual economic sectors.

… and encourage specialisation in R&D intensive industries

– In addition, the potential growth effects of labour market reforms (easing of employment protection, reducing the administrative extension of collective agreements and lowering tax wedges) are likely to be reinforced since they increase specialisation in R&D intensive industries.

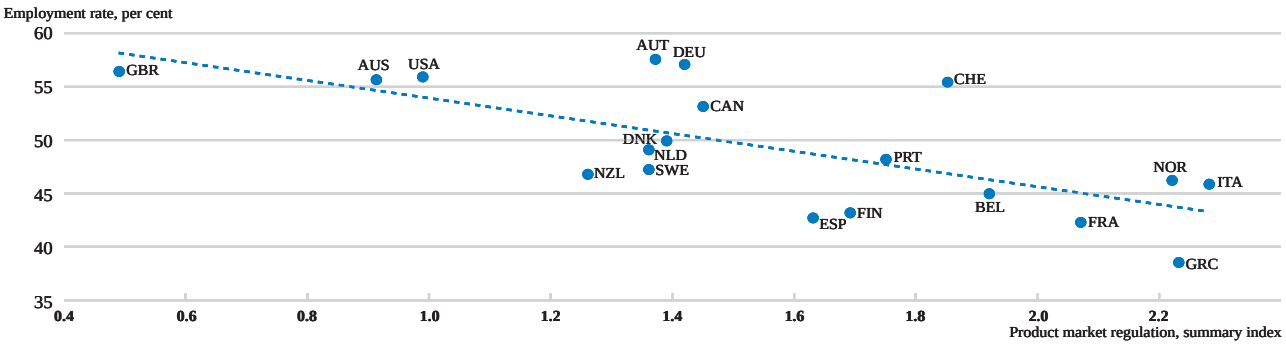
Product market regulation and labour market performance

The impact of product market regulations on employment

Product market regulations influence employment levels among countries

The intensity of product market regulations is negatively correlated with employment rates in the non-agricultural business sector across Member countries (Figure VI.1), pointing to negative influences on labour demand from the output-restraining effects of product-market regulations (See Blanchard, 2000 and Nickell, 1999). Thus, relatively more permissive product market regulations in Australia, the United Kingdom and the United States have been accompanied by a relatively high employment rate in the business sector. By contrast, relatively

Figure VI.1. **Employment rate and product market regulation,[1] 1998**



1. Employment rate in the non-agricultural business sector and indicator of stringency of product market regulation (varying between 0 and 6 from least to most restrictive).
Source : OECD.

stringent state control, barriers to entrepreneurship, and/or barriers to foreign trade and investment in France, Greece, Italy and Norway have coincided with a comparatively low share of the working-age population being employed in the business sector.

Empirical estimates confirm the importance of product market regulations for employment performance (Table VI.1) (Nicoletti and Scarpetta, 2001), even if differences in labour market policy settings appear to account for the major part of the cross-country difference in employment rates that can be explained.[5] Differences in product market regulation may on average account for just over 1 percentage point of the cross-country differences in business non-agricultural employment rates from the OECD average over the 1982-98 period. This is equivalent to half of the deviation that can be attributed to the tax wedge (2½ percentage points) and a third of the deviation that can be explained by employment protection legislation (EPL) and benefit policies (3¼ percentage points).

In some countries the effect of product market regulations is estimated to be particularly strong. For instance, in Italy, where on average employment rates have been

Table VI.1. **Accounting for differences in employment rates across OECD countries**

Percentage deviations from OECD average[a]

	Contribution from :				
	EPL and benefit policies	**Tax wedge**	**Product market regulation**	**Other**[b]	**Total**
Australia	4.1	5.0	1.0	0.9	11.1
Austria	–0.1	–1.6	–0.2	23.0	21.1
Belgium	–2.5	–3.3	–0.7	–1.8	–8.3
Canada	4.9	2.6	1.6	–1.3	7.7
Denmark	–3.0	–3.0	–0.6	9.7	3.0
Finland	–0.6	–1.8	–0.2	–0.4	–3.0
France	–2.3	–2.2	–1.4	–4.6	–10.5
Germany	–2.7	–1.3	0.0	17.7	13.7
Greece	–1.3	0.3	–2.0	–22.8	–25.8
Ireland	3.8	1.9	–1.4	–22.7	–18.4
Italy	–2.2	–1.5	–1.9	0.7	–5.0
Japan	1.5	2.3	0.4	26.0	30.2
Netherlands	–3.8	–3.6	–0.8	1.0	–7.2
New Zealand	3.6	2.9	1.8	–12.7	–4.4
Norway	–2.9	–0.5	0.4	–2.1	–5.0
Portugal	–4.6	2.0	–1.5	–1.6	–5.7
Spain	–3.8	0.5	–0.1	–12.7	–16.1
Sweden	–2.2	–3.6	0.8	10.1	5.0
United Kingdom	6.4	2.4	2.2	–3.9	7.1
United States	8.0	3.1	2.9	–3.9	10.2

a) Based on parameter estimates from pooled cross-country/time-series regressions covering 20 OECD countries over the period 1982-1998.
b) Includes effects of bargaining systems, unionisation, output gaps and other unexplained factors (country-specific effects and residuals).
Source: OECD.

5. Those labour market policy variables and product market regulations included in the analysis explain only 40 per cent of the variation in employment rates across countries; the remaining 60 per cent of the variation is due to labour market institutions, output gaps and unexplained factors.

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5 percentage points below the mean of OECD countries, anti-competitive product market regulations may account for about one third of this gap.[6] Also, comparatively stringent regulations may reduce employment rates in France, Greece, Ireland and Portugal by 1½ to 2 percentage points. Conversely, in the United Kingdom and the United States, low levels of product market regulations explain about 1½ to 2½ percentage points of their better-than-average employment rate performance (respectively 7 and 10 percentage points greater than the mean of the OECD countries).

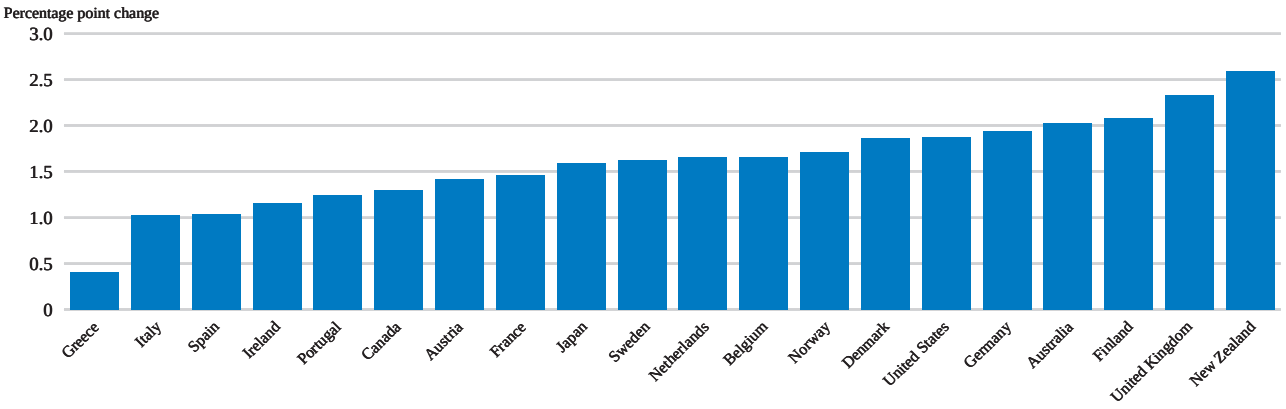
Product market liberalisation has fostered employment in the past two decades…

Over the past two decades, regulatory reforms have played a significant role in increasing employment in the OECD area (Figure VI.2), particularly where pro-competition policy developments have been extensive. Product market reforms in New Zealand and the United Kingdom are estimated to have added around 2½ percentage points to their employment rate in the non-agricultural business sector over the 1978-98 period. On the other hand, countries where regulatory reform has made more modest progress have experienced correspondingly smaller employment gains, with Greece, Italy and Spain adding only around ½ to 1 percentage point to their employment rate via such reforms.

… and there is still significant potential to increase employment via regulatory reforms

There is still considerable scope for most Member countries to expand employment via regulatory reforms in the product market. As an illustrative gauge of this unused potential, the OECD has assessed the employment consequences if countries were to align their overall regulatory stance in product markets to that of the United States. This would involve a fundamental overhaul of the extent of state control, of barriers to entrepreneurship and of constraints on external trade and investment in

Figure VI.2. **The contribution of product market liberalisation to changes in the employment rate**[1]
1978-1998



1. The figure reports the estimated impact on the employment rate in the non-agricultural business sector of pro-competitive regulatory reform in 7 non-manufacturing industries (gas, electricity, post, telecommunications, passenger air transport, railways and road freight).
Depending on the industry, changes in the following dimensions have been considered: barriers to entry, public ownership, market structure, vertical integration and price controls (see Nicoletti and Scarpetta, 2001, for full regression results).

Source: OECD.

6. Regulatory reforms that occurred in Italy after 1998 (see OECD, 2001, for details) are not taken into account in these calculations.

countries with relatively stringent regulations, but these countries would also experience the greatest employment gains. Thus, in the long run, some southern European countries and Ireland might gain as much as 2 to 2½ percentage points in their employment rate compared with 1998. Smaller, but still noticeable, employment gains could be obtained in countries with less regulated product markets.

Product market regulations and rent sharing

There are sizeable industry-specific wage premia…

One of the channels through which anti-competitive product market regulations negatively influence employment levels is the sharing of rents between workers and firms in the form of higher wages. Indeed, such rent sharing is one major reason for wages differing greatly across industries in OECD countries, even after controlling for different worker characteristics.[7] The cross-industry structure of wage premia is also remarkably similar across countries:[8] capital-intensive industries, such as petroleum, chemicals and energy, typically pay very high wages, while labour-intensive industries, such as apparel, leather, and hotels and restaurants, generally pay low wages. As a result, a worker moving from the low-wage industries to the high-wage chemical industry could experience wage gains of around 30 per cent on average.

… that are partly related to industry-specific regulations restraining competition

There is a positive relationship between the degree of product market regulation and industry wage premia (Table VI.2).[9] In manufacturing, trade barriers are on average estimated to raise wages by 4 to 5 per cent. In services and utilities, regulatory restrictions to competition (where competitive developments would in fact be possible) are on average estimated to increase wages by 5 to 6 per cent compared with a benchmark where such

Table VI.2. **Average effect of product market regulation on wage premia**[a]

	Estimated effect on hourly wages[b] (per cent)
Manufacturing industries	
Trade barriers	4.3
of which: Tariff barriers	3.2
Non-tariff barriers	1.1
Non-manufacturing industries	
Overall regulation[c]	5.6

a) Based on estimations covering a sample of 33 manufacturing and non-manufacturing industries across 12 OECD countries.
b) Estimated difference in wages between industries with an average level of regulatory restrictions to competition and industries where such restrictions do not exist.
c) Depending on the industry the following dimensions have been included in the regulatory indicator : barriers to entry, public ownership, market structure, vertical integration and price controls.
Source: OECD.

7. For instance, at the two-digit industry disaggregation, standard deviations of estimated industry wage premia (once controls have been made for workers' and firms' characteristics) range from 8 per cent in Sweden to 16 per cent in the United Kingdom and Canada.
8. Correlations of national wage premia by sector with the those of the United States range from 0.35 (in Denmark) to 0.90 (in Canada) with the median correlation being 0.70.
9. See Jean and Nicoletti (2001) for detailed regression results.

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restrictions do not exist. In services and utilities, however, the relationship between wage premia and regulation appears to be hump-shaped.[10] Wage premia seem to be lower in sectors where state control and legal monopolies were, until recently, very pervasive (such as in electricity, gas, water, post and air transport) as compared with sectors with an intermediate level of regulation. This pattern could imply that regulation in these industries has been successful in preventing rent formation and rent-sharing, but is more likely to reflect regulatory failures involving low-productivity traps[11] and/or the existence of non-pecuniary rents that are not reflected in wages.[12]

Product market regulations: impact on job security and income inequality

Product market regulatory reform could increase job insecurity...

Although there is no *a priori* reason to expect negative outcomes in the long run, the perception that efficiency-oriented regulatory reforms may result in increased job insecurity and income inequality contributes to resistance to such policies. Liberalisation tends to increase the sensitivity of employment to market conditions, increasing the probability of individuals losing their job, and therefore damping the perceptions of job security. Furthermore, in industries dominated by state-owned enterprises and restrictions to entry, greater job security may be bargained against lower wages. Under these circumstances, product market liberalisation may entail important changes in workers' employment conditions, including a marked increase in the probability of being laid-off.

... but mainly for workers previously employed in highly regulated industries…

However, job security (*i.e.* in respect of the present job) is only one dimension of employment security. Employed workers are also likely to care about the ease of finding a new job in the case of being laid off, which in turn is closely related to the length of the average unemployment spell. Pro-competition regulatory reform, by increasing the number of firms and employment in the long run, is likely to reduce the time it takes to find a new job, thus lowering the costs for displaced workers. Data on the incidence of job losses resulting in long-term unemployment can be used to assess the combined effects of the higher risk of lay-offs and the lower cost of displacement. OECD empirical work, using such data for 13 non-manufacturing industries in 13 OECD countries, indicates that reducing anti-competition product market regulations increases the incidence of job losses resulting in long-term unemployment only in traditionally heavily regulated industries.[13]

... and it is uncertain to what extent product market liberalisation is associated with greater earnings inequality

Regulatory reform in the product market might also have an impact on earnings inequality. Increased competitive pressures may lead to a decline in workers' bargaining power or more decentralised wage bargaining that, in turn, could result in greater wage dispersion.[14] Similarly, the positive effect of regulatory reform on productivity may tend to increase wage dispersion to the extent that technological change is

10. Jean and Nicoletti (2001).
11. Efficiency losses in regulated industries involve lower productivity of workers and consequently may entail lower wages.
12. Non-pecuniary rents can take the form of business practices that induce firms to operate below the efficiency frontier while increasing the utility of workers and managers (*e.g.* labour hoarding leading to greater job stability and less demanding work schedules).
13. See Nicoletti *et al.* (2001).
14. See Blau and Kahn (1996) for evidence supporting the relationship between decentralisation and wage dispersion.

skill-biased. However, these effects may be compensated by reductions of rents, including the part that employees may be able to capture in the form of non-competitive wage premia. Furthermore, since product market liberalisation boosts long-run employment levels, at least one component of the labour force (those previously unemployed or not even in the labour force) would benefit from it.[15] Empirical work by the OECD suggests that, once the direct effect of labour market policies and institutions is controlled for, there does not seem to be a significant effect of product market regulation on wage inequality. Similarly, product-market regulation did not appear significantly to affect the share of workers with low-paid jobs or the rate of working poor.[16]

Labour market policies and product market outcomes

Innovations play a key role in the growth process

A well-performing product market is characterised by high rates of (multi-factor) productivity growth. Innovations appear to play an important role in this growth process,[17] with the degree of product market regulation influencing the strength of innovation activity.[18] This section assesses to what extent labour market policies and institutions influence the creation of new products and processes through their impact on research and development (R&D) spending. In addition, it examines the implications of these labour-market factors on the size distribution of firms, though it is still unclear how firm size influences innovative activity and the growth process.

Labour market policies and innovation activity

The impact of labour market policies on industry R&D spending …

There is no simple relationship between labour market policies and industry R&D spending. OECD analysis based on a sample of 18 manufacturing industries in 18 OECD countries over the 1993-97 period has been unable to find any significant impact of the level of unemployment benefits or the tax wedge on the intensity of R&D expenditure undertaken by the business sector at the industry level. This would seem to cast doubt on the conjecture that high taxes and benefits limit the availability of qualified manpower for innovation-intensive activities. For example, it would indicate that high benefits, and the associated strong bargaining power, have not increased the ability of insiders to appropriate profits that result from innovation.

… appears to depend crucially on the prevailing industrial relation …

On the other hand, the role of EPL appears to be ambiguous, affecting innovations in some types of industries only under certain industrial relation arrangements.[19] In particular, there is some evidence[20] that strict employment protection legislation could reduce R&D spending in high-technology industries when the industrial relations system is characterised by low or intermediate levels of co-ordination. Thus, the combination of comparatively strict statutory employment protection rules

15. Regulatory reform may also affect income distribution via its impact on the prices consumers pay for different goods and services. The large share of services provided by utilities (usually among the most regulated industries) in the consumption basket of lower income people suggests that this group may benefit more from price reductions induced by regulatory reform than people with higher incomes.
16. See Nicoletti *et al*. (2001).
17. See Chapter IV "Links between policy and growth: cross-country evidence" in OECD (2000*b*).
18. Across countries the number of patents per capita is positively correlated with the degree of protection of intellectual property rights and negatively correlated with the overall indicator of the strictness of anti-competition regulation, see Bassanini and Ernst (2001).
19. The system of industrial relations of a country can be defined by the set of bargaining institutions, business associations, and code of conduct among firms, prevailing in that country (see *e.g.* Carlin and Soskice, 1990).
20. See Bassanini and Ernst (2001) for detailed regression results.

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and uncoordinated industrial relations in France, Portugal and Spain may significantly depress R&D spending in their high-technology industries, with adverse effects on overall R&D intensity (Table VI.3). By contrast, the relatively high levels of employment protection in Germany, Greece and Italy may have much less impact, thanks to the co-ordination among the social partners.

… with co-ordinated arrangements being able to offset any negative effects on R&D spending

This strikingly different impact of strict EPL suggests that co-ordinated systems can offset the induced high labour adjustment costs. Taking advantage of new opportunities in high-technology sectors will generally require significant labour re-allocation, with innovating firms typically recruiting skilled workers on the job market. If the cost of such labour adjustment is increased through employment protection provisions, the result will be lower profits from innovation and hence lower R&D spending. However, such effects may be offset through industrial relations arrangements. For example, the compression of wages across different skill categories which typically accompanies highly co-ordinated industrial relation systems tends to favour the emergence of internal labour markets. Thus, employers are more willing to train existing employees to meet firms' skill needs than to hire new workers.[21] This internal adjustment is not subject to the statutory employment protection applicable to external

Table VI.3. **Estimated effects of relaxing employment protection on R&D intensity**

Industrial relations context	Estimated change in R&D intensity of aligning EPL to that of the United States[a] (percentage points)		
	High-technology industries[b]	Low-technology industries	Total industries
High coordination			
Austria	..	0.4	0.2
Denmark	..	0.2	0.1
Germany	..	0.5	0.3
Greece	..	0.6	0.3
Ireland	..	0.1	0.1
Italy	..	0.6	0.4
Japan	..	0.4	0.3
Norway	..	0.4	0.3
Netherlands	..	0.4	0.2
Low and intermediate coordination			
Belgium	5.7	0.8	2.2
Canada	1.3	0.2	0.5
Finland	5.8	0.8	2.3
France	8.7	1.2	3.4
Portugal	10.7	1.4	4.2
Spain	9.1	1.1	3.6
Sweden	6.7	0.9	2.6
United Kingdom	0.9	0.1	0.4
United States	0.0	0.0	0.0

a) Estimated change in R&D intensity of aligning employment protection legislation to that of the United States, based on cross-section regression analysis on a sample of 18 OECD counties and 18 manufacturing industries.
b) Estimates for countries with a high level of coordination of industrial relations are not statistically significant.
Source: OECD.

21. Firms have incentives to pay for training when wages are compressed over the skill dimension, so that they can reap the difference between the marginal productivity of skilled workers and their earnings, and when the rigidity of the wage structure inhibits the possibility for firms to poach each others' skilled workforce. Both these conditions tend to be true in co-ordinated industrial relation systems. Employment protection may also add to these factors insofar it increases the ties between workers and employers and tends to decrease the quality of those in the unemployment pool (Acemoglu and Pischke, 1999).

adjustment, and thus weakens any negative effect of hiring and firing restrictions on innovation.

Labour market policies may have implications for the share of innovative industries in the economy

Labour market policies may not only affect innovative activities in individual sectors but also the sectoral composition of economies. Table VI.4 provides some suggestive evidence of the importance of labour market policies for the share of R&D-intensive industries in total industrial output. In particular, there is a significant negative correlation between specialisation in R&D-intensive industries and the tax wedge, the coverage of collective agreements and the stringency of employment protection. These correlations might reflect that tax pressure, statutory employment protection and the scope of collective agreements could affect the pace of reallocation of resources among industries characterised by different rates of technological change. Hence, countries where taxation and labour market arrangements are less burdensome for innovative firms may have a comparative advantage in seizing opportunities in high-tech industries.

Table VI.4. **Labour market policies and specialisation in R&D intensive industries**

Cross-country correlation coefficients[a]

Tax wedge	–0.43*
Unemployment benefits	–0.13
Coverage of collective agreements	–0.65**
Employment protection legislation	–0.47*

a) Cross-country correlations between the component of manufacturing R&D intensity that is due to industry composition and selected labour market policies (see Nicoletti *et al.*, 2001, for full details on the decomposition of R&D intensity in within-sector and industry composition components).
*, ** denote significance at the 5% and 1% level, respectively.
Source: OECD.

Labour market policy and the size distribution of firms

Labour market policies tend to reduce the average size of firm

Significant differences can be seen in firm sizes across countries (Figure VI.3). Although product market regulation is by far the most important institutional determinant of firm size, some labour market policies seem to have a significant effect.[22] More specifically, administrative extension of collective agreements[23] is found to have a robust positive impact on the average size of firms within a sector, especially in manufacturing. This could reflect the fact that such extension may be more constraining for small firms that are often less unionised than larger firms. Conversely, strict employment protection legislation appears to encourage smaller firm size, at least in some industries.[24] This is likely to mirror the fact that small employers are

22. Industry composition does not affect significantly the firm size patterns across OECD countries (Figure VI.3). Therefore, the empirical analysis focused on the determinants of firm size within each industry in a sample of 18 OECD countries and 30 manufacturing and non-manufacturing industries. The analysis is based on cross-country regressions with R&D intensity being explained by market size in addition to product and labour market variables.
23. Administrative extension occurs when collective agreements are made legally binding for employers and employees that are not parties to the settlement.
24. A one point increase in the indicator of employment protection (about one fourth of the variation across OECD countries) is estimated to reduce, on average, the share of firms with more than 50 employees by 5 percentage points in manufacturing and 3 percentage points outside manufacturing.

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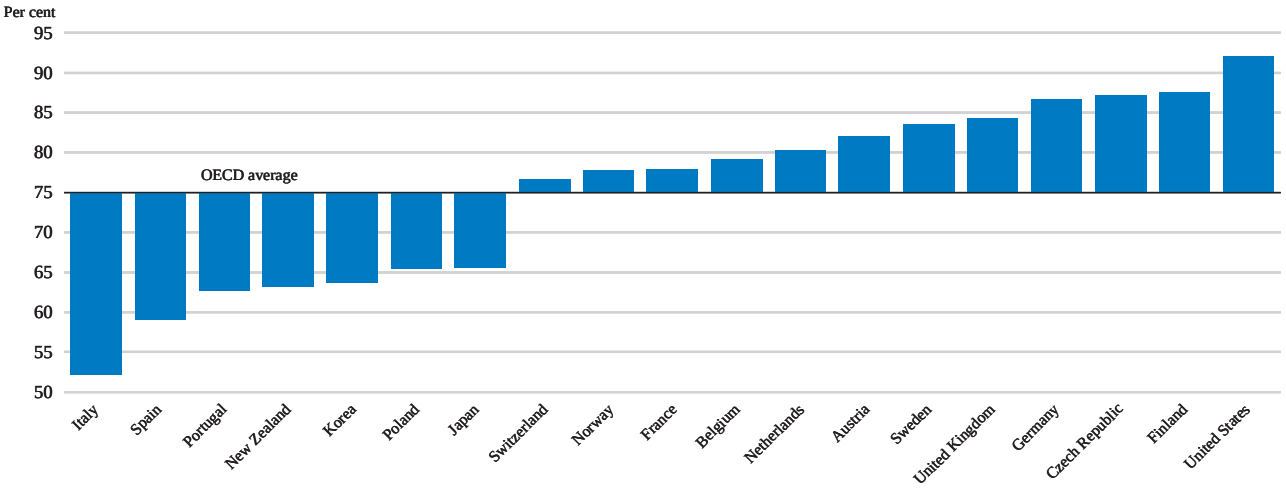
Figure VI.3. **The employment share of large firms[1] in manufacturing, 1996[2]**

Deviation from OECD average



1. Average employment share of firms with more than 50 employees (firms with less than 10 employees are excluded from the denominator).
2. 1994: Netherlands and Spain; 1995: Japan, Korea, New Zealand, Portugal and Switzerland; 1997: Czech Republic.
Source: OECD.

sometimes in a position to avoid many of the costs associated with strict EPL. In many countries there are size thresholds for the application of such provisions. Even when statutory employment protection rules apply, labour is typically less organised in small production units and collective dismissals (which are usually much more costly than individual ones) are less likely to occur.

However, where economies of scale are important, the size of firms is likely to be more determined by technological factors rather than by labour market institutions. In empirical work carried out by the OECD the impact of employment protection is not statistically significant in utilities, telecommunications, financial intermediation and air transport, industries where scale economies are widespread.[25]

Conclusion

Summing up, the empirical evidence reviewed in this paper suggests that product and labour market policies have important cross-market effects. Regulatory reforms in product markets can raise employment rates, and labour market reforms may enhance innovative activity and hence output growth. To make policies more efficient and to avoid unwanted side effects, such cross-market influences should be kept in mind when labour and product market reforms are designed.

25. See Nicoletti *et al.* (2001).

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VII. AGRICULTURAL POLICY REFORM: THE NEED FOR FURTHER PROGRESS

Introduction

Agricultural policies pursue several objectives

Agricultural policies pursue a number of objectives, including *inter alia*, providing adequate food supplies, at reasonable price levels, supporting farm household incomes, contributing to rural community well-being, and ensuring environmental sustainability as well as other societal goals. This chapter[1] reviews recent progress in policy reform, assesses the economic costs and effectiveness of agricultural policies and describes their effects. Notwithstanding recent progress, agricultural policies have not been particularly effective in achieving some of their economic objectives, despite being rather costly to consumers and taxpayers. Moreover, they have side-effects on trade, the environment and developing countries.

Progress in policy reform

Government intervention in agriculture has a long history

Governments in most OECD countries have traditionally pursued a wide range of policies to support farm income and ensure adequate food supplies. Production-linked incentives, operating largely on farm commodity prices, have been complemented, or partly replaced, by income support measures. Import tariffs and quotas, export subsidies and special trade-access arrangements between countries have also been widely used. More recently, policy measures have been taken to pursue aims related to environmental quality, food safety and the welfare of animals; these measures have often consisted of a continuation of existing production-linked measures, with conditions attached, such as environmental compliance or input constraints. A number of OECD countries attach great importance to these and other "non-trade concerns". In OECD analysis, such concerns are encompassed in a concept known as "multifunctionality" (Box VII.1).

Notwithstanding some reform progress…

Some progress in reforming agricultural support policies has been achieved, especially in the early and mid-1990s. For the OECD as a whole, the level of support, as measured by the Producer Support Estimate (PSE), dropped by more than

1. This chapter has been written jointly by the Economics Department and the Directorate for Food, Agriculture and Fisheries. It draws on the substantive work conducted in the latter Directorate – in particular the Monitoring and Evaluation 2001 Report (OECD, 2001*a*), of which Part I (including the Executive Summary) was approved for publication by the OECD Committee for Agriculture and the Trade Committee whereas Part II was published under the responsibility of the Secretary General. The present chapter is not based on consensus reached in OECD committees.

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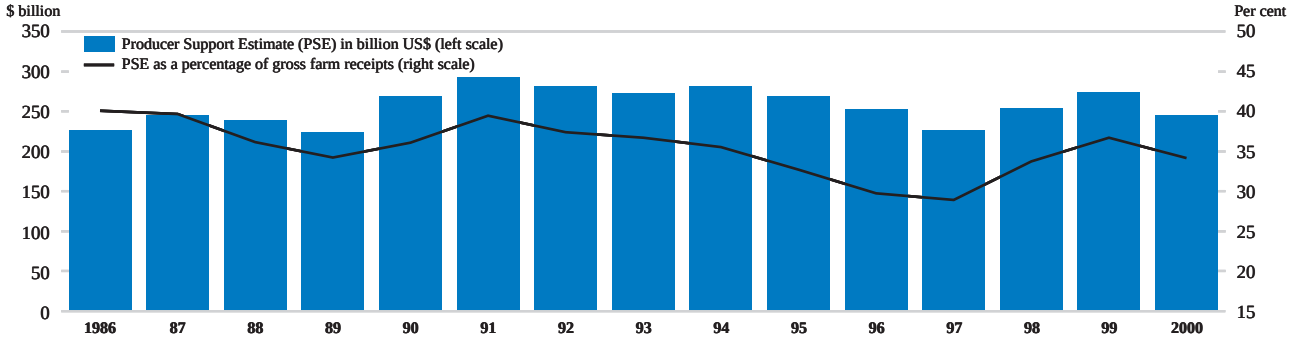
Box VII.1. The "multifunctionality" of agriculture

The notion of agriculture as a "multifunctional" sector although widely invoked, is not always well defined and therefore prone to different interpretations. In particular, there are widely differing views as to its policy implications. Some countries believe that production-linked support and border measures are necessary in order to maintain or increase the multifunctional character of agriculture and that it should be taken into account in the multilateral trade process. Another group of countries promotes targeted production-neutral measures. A further group rejects any role for production or trade related policy instruments and is sceptical of the inclusion of multifunctionality in multilateral trade negotiations. In an attempt to overcome these problems the OECD has elaborated a common terminology, identified the key policy issues at stake and developed a framework to help countries design their domestic policies, including those compatible with further trade liberalisation. From this analysis multifunctionality emerges as a characteristic of the agricultural production process whereby agricultural commodities and certain other "outputs" related to environment, culture, rural development, food security or other societal goals, are joint products. Whether and which policy intervention is justified depends on this jointness – its nature and strength, on whether there are market failures and on the extent to which the "outputs" in question are public goods. This framework should enable governments to weigh the potential benefits of of different policy options against their direct and indirect costs thus narrowing differences between countries concerning policy reform strategies and on-going trade liberalisation efforts.

20 per cent between 1991 and 1997 (Figure VII.1). Furthermore, in the six years to 1997, there was some move away from the more distorting market price support and payments based on output to budgetary payments less linked to production (Figure VII.2). This also implied that the burden of support for agricultural policies, by moving from prices to public budgets, was becoming more transparent. However, since 1997, for the OECD as a whole no major progress has been made in reducing the share of market price support and payments based on output, and the level of support has increased. An important reason for this increase has been the fall in commodity prices on the world market. This has led to an increase in the level of price support to the extent that domestic prices were not reduced at the same rate. For example, in 1997 the average price received by OECD farmers was 29 per cent above the world price.[2] By 1999, the difference had increased to 44 per cent.

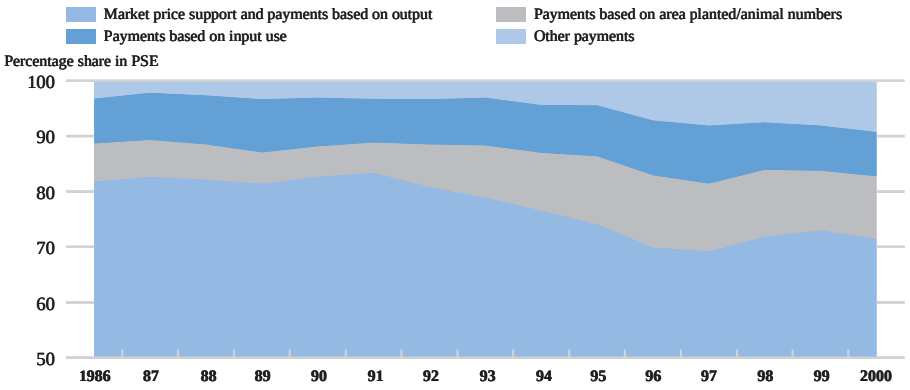
Figure VII.1. Total OECD producer support estimate



Sources: OECD (2001*a*), PSE/CSE database 2001.

2. As measured by the Producer Nominal Protection Coefficient, an indicator of the nominal rate of protection to producers measuring the ratio between the average price received by producers (at farm gate), including payments per tonne of output, and the border price (measured at the farm gate level).

Figure VII.2. **Composition of total OECD producer support estimate**



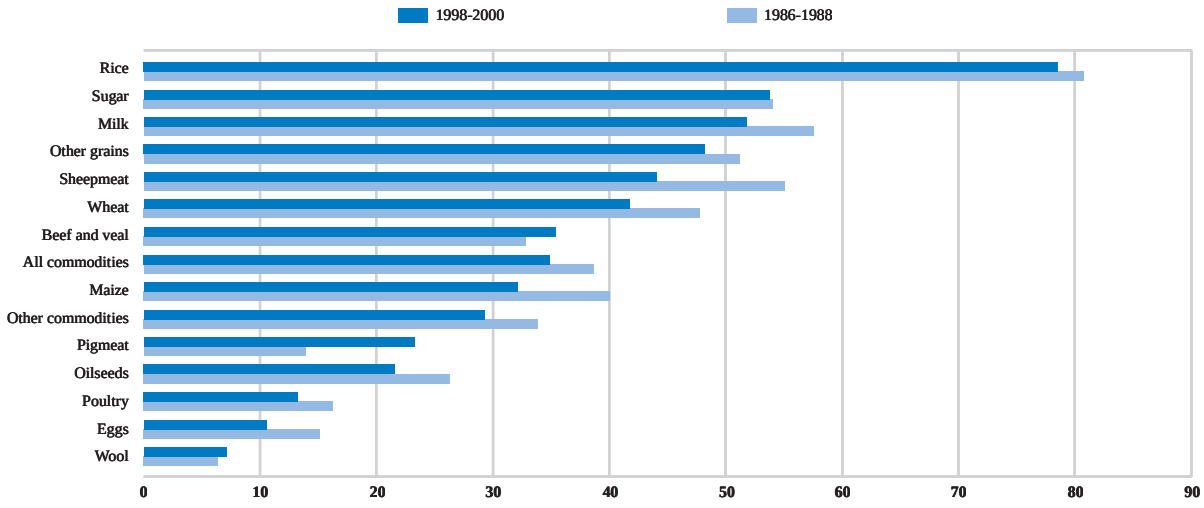
Source: OECD PSE/CSE database 2001.

… support levels remain high and vary between commodities and countries

The level of support to agriculture in OECD countries is not only high, but also very unequal across commodities and countries. While support for rice, sugar and milk remains above 50 per cent of gross farm receipts, payments to wool, eggs and poultry farmers are significantly lower (Figure VII.3). As for the geographical distribution of support, the European Union, Japan and the United States account for around four-fifths of the total. Measured as a per cent of the value of gross farm receipts however, support is greatest in Switzerland, Norway, Korea, Iceland and Japan (Figure VII.4). Among the high-support countries, the European Union and other European countries have made the most progress in moving away from the more distorting types of support since the mid-1980s.

Figure VII.3. **Producer support estimate by commodity**[1]

OECD average as a percentage of value of gross farm receipts



1. Products are ranked according to 1998-2000 levels.
Sources: OECD (2001*a*), OECD PSE/CSE Database, 2001.

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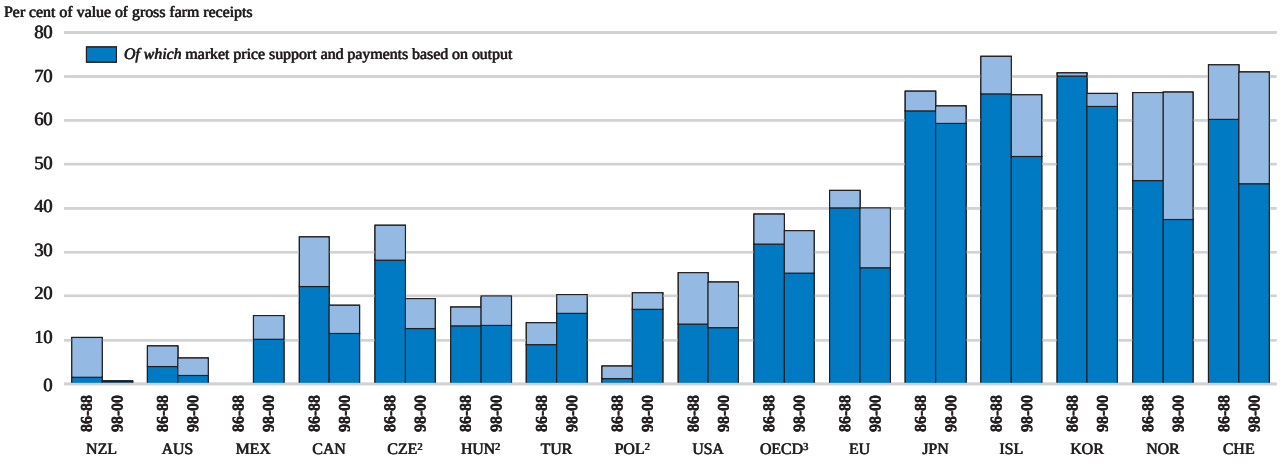
Figure VII.4. **OECD producer support estimate by country**[1]



1. Countries are ranked according to 1998-2000 levels.
2. For the Czech Republic, Hungary and Poland, 1986-88 is replaced by 1991-93.
3. For 1986-88, the Czech Republic, Hungary and Poland are excluded.

Source: OECD PSE/CSE database 2001.

Problems with market access remain

A major factor shaping policy reform was the Uruguay Round of multilateral trade negotiations, concluded in 1994 (Box VII.2). However, notwithstanding its achievements in establishing disciplines on the agricultural sector, the overall effects of the Uruguay Round in terms of levels of protection and trade in agricultural products have been limited (OECD, 2001*j*). Import penetration in food products remains considerably below that of other sectors (Coppel and Durand, 1999), and agricultural tariff rates considerably higher than tariffs on manufactures (OECD, 2002) (Table VII.1).[3] Agricultural tariff schedules also tend to be more complicated, with many specific or complex rates, as well as many "mega-tariffs" exceeding 100 per cent for the more "sensitive" products.

Disciplines on domestic support have reduced distortions

Uruguay Round disciplines had a stronger impact on the composition of domestic support in OECD countries than on its overall level, which has been more influenced by changes in commodity prices. Indeed, as a result of the domestic support disciplines arising from Uruguay Round Agreement on Agriculture, the share of the most distorting form of support (classified as "amber" box and subject to reduction commitments) fell from 70 to 40 per cent of total between 1986-88 and 1995-98, as countries have increasingly used support that falls either into the "green box" (least trade distorting) or the "blue box" (intermediate) category (Figure VII.5).

New policy initiatives are likely to lead to a reduction in export subsidies

The new disciplines on agricultural export subsidies have spurred few policy changes in its first few years, since cuts were required from a relatively high base (OECD, 2000*j*).[4] In more recent years, export subsidy commitments have gradually

3. Recent estimates suggest that agricultural tariff rates average around 60 per cent in the OECD area, as compared to only 4 per cent for manufactures (Gibson *et al.*, 2001).
4. Export subsidy levels in the base period, from which reductions were calculated, were abnormally high. This created the paradoxical situation whereby distortions caused by export subsidies could, for some countries and commodities, have increased relative to the period immediately prior to Uruguay Round implementation. The value of subsidised exports from OECD countries declined by 7 per cent between 1995 and 1998, but this was mostly a result of strong commodity prices. Indeed, for some commodities, the share of notified subsidised exports in total exports has increased substantially during that period. Several countries have actually overshot annual export subsidy commitments, making use of carry-over provisions of the Uruguay Round Agreement.

become more binding, as allowances have declined (as scheduled) and world commodity prices have weakened. This has led to a number of policy initiatives designed specifically to meet Uruguay Round commitments, including the European Union's "Agenda 2000" reforms. These initiatives are likely to translate into a reduction in export subsidies in the next few years.

Box VII.2. Key results of the Uruguay Round Agreement on Agriculture

The Uruguay Round Agreement on Agriculture was an important step towards bringing agricultural markets under similar disciplines as other traded sectors. It was implemented by developed countries between 1995 and 2000, with developing countries having an additional 4 years. The Agreement imposed disciplines on trade distorting policies:

- *Tariffs were bound and subject to reduction commitments.*
- *Non-tariff barriers were converted to tariffs that were also bound and subject to reduction commitments through a process called "tariffication".* Tariff rate quotas (two-tier tariff regimes with different tariffs for in-quota and out-of-quota imports) were established to provide minimum and current access for products that previously were protected by non-tariff barriers. Developed and developing countries agreed to reduce their average tariff by 36 and 24 per cent respectively.
- *Export subsidies on agricultural products were for the first time subject to disciplines.* Developed and developing countries agreed to reduce subsidised export volumes by 24 and 16 per cent respectively and value by 36 and 24 per cent respectively. Regarding other export competition measures, countries undertook to continue negotiations towards an Agreement to govern the use of officially supported export credits in agriculture.
- *Domestic support policies were disciplined according to three broad categories based on their potential to distort trade.* Developed countries agreed to reduce expenditures on trade-distorting domestic policies by 20 per cent, while developing countries agreed to a 13.3 per cent reduction. Expenditures on domestic programmes with minimal trade-distortion effects, those in the so-called "green box", are not subject to reduction commitments. Production-linked support under production limiting programmes is also exempted from the reduction commitments if they satisfy certain criteria ("blue box"). Moreover, domestic support is also exempted from reduction commitments if it is less than 5 per cent (10 per cent for developing countries) of the value of production ("*de minimis*").
- *A new Agreement on the Application of Sanitary and Phytosanitary Measures was signed.* It requires that measures to protect animal or plant life and health should have scientific justification and encourages countries to base them on international standards, guidelines and recommendations. When international standards do not exist or there is a preference for higher standards, countries should apply measures based on science or risk assessment, in order to avoid arbitrary or unjustified discrimination.

Table VII.1. Average tariff in 2000 by in-, out- and non-quota products[a]

	In-quota	Out-of-quota	Non-quota
		Per cent	
Coarse grains	100	218	76
Wheat	73	184	84
Rice	15	198	54
Sugar	16	127	111
Beef	36	167	54
Pig meat	56	180	69
Poultry	39	172	49
Sheep meat	31	153	14
Butter	48	370	50
Cheese	32	121	26
Skim milk powder	48	192	92
Whole milk powder	80	261	112
Whey powder	38	546	129

a) In-quota refers to the tariff applied on imports within a tariff-rate quota; Out-of-quota refers to the tariff applied on imports in excess of the tariff-rate quota volume; and non-quota refers to the tariff applied to goods for which there is no set quota.

Source: OECD (2001*a*), OECD calculations based on the Agriculture Market Access Database.

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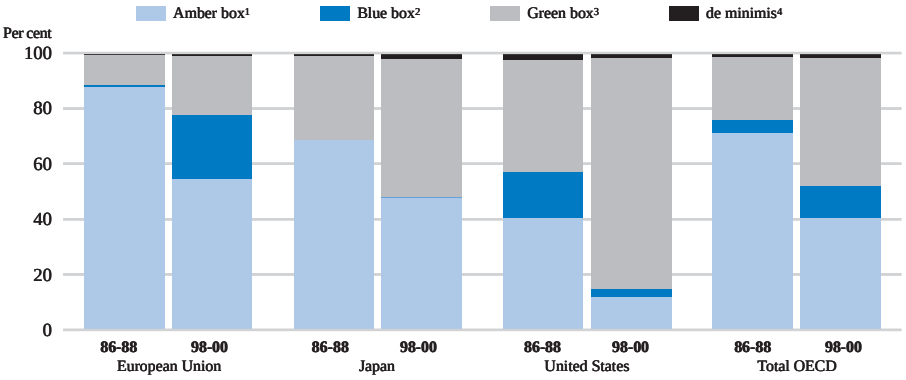
Figure VII.5. **Composition of domestic support, 1986-88 and 1995-98**



1. Most trade-distorting form of support.
2. Intermediate category.
3. Least trade-distorting form of support.
4. Less 5% of total value of production.

Source: OECD (2001*b*).

The cost and effectiveness of agricultural policies

Agricultural support policies are rather costly…

Agricultural support policies remain quite costly. Looked at from the price side, support policies, and border measures in particular, have resulted in higher farm-gate prices, with consumers of agricultural products in the 1998-2000 period paying prices 46 per cent higher than in the world market (on average and across all commodities and OECD countries). Consumers in Japan, Korea, Norway and Switzerland paid on average more than twice the world price.[5] This cost bears most heavily on persons with low earnings, who generally spend a higher share of their incomes on food. Looked at from the angle of agricultural producers, support, including direct income support, has on average amounted to $258 billion a year between 1998 and 2000.[6] In the same period, total support to the sector, as measured by the total support estimate (TSE), which also includes support for general services to agriculture, amounted to $341 billion equivalent to 1.3 per cent of total OECD GDP (Table VII.2).[7] This cost of agricultural policies should be seen in the perspective of the small and declining share of the sector in economic activity in most OECD countries, although this share is much higher than the OECD average in some countries, like Korea, Mexico, Poland and Turkey, as well as in most of the non-OECD area.[8]

5. As measured by the Consumer Nominal Protection Coefficient, which is an indicator of the nominal rate of protection at the consumer level measuring the ratio between the average price paid by consumers (at the farm gate) and the border price (measured at a comparable level).
6. As measured by the Producer Support Estimate (PSE). See definition in Table VII.2.
7. On average, between 1998 and 2000, about 55 per cent of total support cost has been borne directly by consumers and the rest by public budgets.
8. In the late 1990s, agriculture represented on average about 7 per cent of employment, less than 4 per cent of GDP and less than 7 per cent of merchandise exports in the OECD area. On the other hand, agriculture accounts for between 10 and 12 per cent of GDP and merchandise exports of middle-income developing countries and as much as 25 to 30 per cent in the case of least developed countries.

Table VII.2. **OECD: Estimates of support to agriculture**

(US$ billion)

	1986-88	1998-2000	1998	1999	2000p
Producer Support Estimate (PSE)[a]	**236.4**	**257.6**	**253.7**	**273.6**	**245.5**
Market price support	182.4	170.2	170.1	182.1	158.4
Payments based on output	12.0	15.6	12.1	17.7	17.1
Payments based on area planted/animal numbers	15.6	29.3	30.6	29.4	27.8
Payments based on historical entitlements	0.5	12.6	10.6	13.5	13.6
Payments based on input use	20.1	21.3	21.8	22.4	19.6
Payments based on input constraints	3.1	6.3	6.5	6.3	6.2
Payments based on overall farming income	2.3	2.5	2.3	2.5	2.7
General Services Support Estimate (GSSE)[b]	**41.6**	**57.1**	**58.9**	**57.0**	**55.5**
Research and development	4.0	5.2	5.6	5.2	4.8
Agricultural schools	0.7	1.4	1.4	1.4	1.4
Inspection services	1.1	1.7	1.7	1.7	1.7
Infrastructure	12.6	18.3	20.4	17.5	17.2
Marketing and promotion	13.4	23.4	23.0	24.0	23.1
Public stockholding	7.7	3.3	3.4	3.3	3.2
Consumer Support Estimate (CSE)[c]	**–166.9**	**–158.4**	**–156.5**	**–171.7**	**–147.1**
Transfers to producers from consumers	–184.9	–168.4	–168.7	–181.8	–154.6
Other transfers from consumers	–14.3	–19.4	–18.9	–19.7	–19.6
Transfers to consumers from taxpayers	20.4	25.8	26.5	25.4	25.6
Excess feed cost	11.8	3.5	4.7	4.5	1.5
Total Support Estimate (TSE)[d]	**298.5**	**340.5**	**339.1**	**355.9**	**326.6**
Transfers from consumers	199.2	187.8	187.6	201.6	174.2
Transfers from taxpayers	113.6	172.1	170.3	174.1	172.0
Budgets revenues	–14.3	–19.4	–18.9	–19.7	–19.6
Memorandum items:					
Total value of production (at farm gate)	559.2	651.0	668.3	653.1	631.6
Total value of consumption (at farm gate)	528.5	598.0	605.4	600.2	588.3

a) The PSE is an indicator of the monetary value of gross transfers from consumers and public budgets to agricultural producers, measured at the farm-gate level, arising from policy measures that support agriculture. It includes market price support and payments based on different criteria.
b) The GSSE measures gross transfers to services provided collectively to agriculture, for example research, marketing and infrastructure.
c) The CSE is an indicator of the annual monetary value of gross transfers to (from) customers of agricultural commodities, measured at the farm-gate (first consumer) level arising from policy measures which support agriculture. It includes transfers to (from) consumer from (to) producers and the public budget.
d) The TSE is an indicator of the monetary value of all gross transfers from consumers and public budgets arising from policy measures that support the agriculture sector, net of the associated budgetary receipts. When expressed as a percentage of GDP (per cent TSE), it gives an indication of the burden this overall support represents for the economy. The TSE comprises the PSE, the GSSE and part of the CSE (that related to budgetary transfers to the consumers of food products).
Source: OECD (2001*a*), PSE/CSE database 2001.

Beyond the direct observable cost, agricultural support policies pursued in OECD countries have caused distortions in the allocation of resources. Higher domestic prices have given incentives to retain more resources – land, labour and capital – in agriculture than would have been the case if farmers had faced world market prices – which some countries believe is justified on social grounds.

… and not very efficient in supporting farm income

In spite of the cost and the distortions they create, agricultural support policies in OECD countries are relatively inefficient in raising farm income, often a major objective. Production-linked support is largely capitalised into land (or other fixed asset) values, and has hindered structural adjustment and increased the costs of production and the cost of entry to new farmers. Indeed, price support measures, which currently account for over 70 per cent of support to producers, are rather inefficient in transferring income to farmers. It is estimated that the transfer efficiency of price support is around 25 per cent, meaning that $4 of price support only raises farm incomes by $1 (OECD, 1995*a*, 1995*b* and 1996). Indeed, while the policy objective of raising average farm household incomes to levels comparable to those in the rest of the economy has been achieved in many OECD countries, it is questionable

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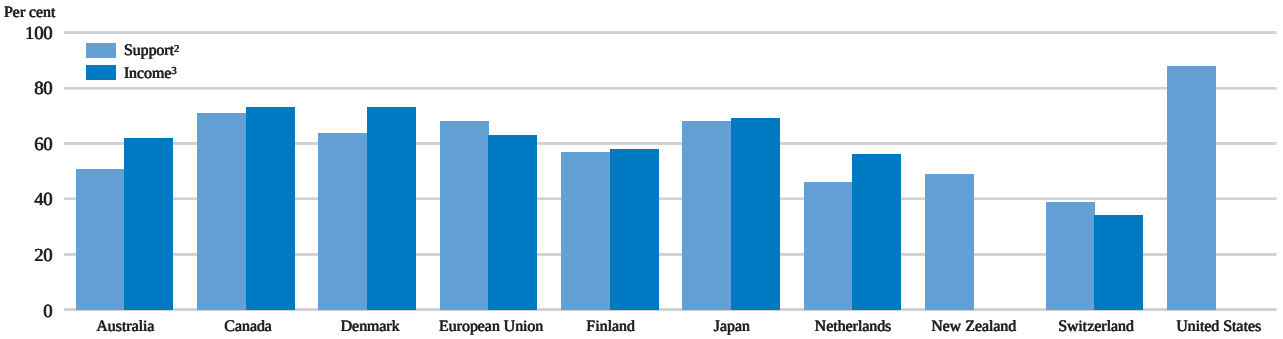
Figure VII.6. **Share of support and income received by the 25% largest farms**[1]



1. Based on gross sales. Data refer to 1994 for Japan, 1995 for the European Union and Switzerland, 1996 for Canada, Netherlands and the United States, and 1996/97 for Australia, Denmark and New Zealand.
2. Market price support plus budgetary payments.
3. Net operating income.

Source: OECD (1999).

whether this is a result of support policies. Farm households have diversified their sources of income and consequently in many countries farm revenue is not the main source of household income.[9] Finally, contrary to the popular view of agricultural policy providing support for the small family farm, in a number of countries it mostly benefits the larger farmers, often the most prosperous ones (Figure VII.6). This is because most policy measures are still strongly linked to production.

Side-effects of agricultural policies

Policies have affected international trade…

Agricultural support policies have had spill-over effects internationally, leading to heightened trade tensions. Trade barriers have restricted imports, while the subsidised exports of production surpluses distorted competition in world markets, driving down world commodity prices.[10] It is estimated that a 10 per cent reduction in support levels by OECD countries would lead to an average increase of 2.2 per cent in the international price of crops, benefiting exporting countries (OECD, 2001*b*).[11] It is

9. On a broad definition of farm households, farm income ranges from 4 per cent of total household income in the United States to 65 per cent in Australia. On a narrower definition, it ranges from 24 per cent in Sweden to 86 per cent in Germany. See OECD (1995*c*, 1998, 2000*a*, 2000*b*, 2001*b* and 2001*c*).
10. From being a beef and cereals importer in the 1970s, the European Union became the largest beef exporter and second largest cereal exporter by the 1980s. In the United States, high producer support prices acting as floor prices for cereals also expanded government stocks. In both cases, exports have been subsidised. The US commodity Credit Corporation provides loans to "participating farmers producing programme crops". The amount of the loan is calculated based on a crop price fixed ex-ante, which in practice acts as a floor price guarantee, since farmers have the choice to reimburse the loan or surrender the crop.
11. The OECD Policy Evaluation Matrix model has been used to estimate the impacts of a 10 per cent reduction in the support rates of the different categories of support to crop producers in six OECD countries and regions. Results indicate an estimated increase in the real incomes of the countries involved of $2.6 billion, or 1.7 per cent of initial farm revenues. It would also lead to an increase in the international price of agricultural commodities of 2.2 per cent. The Policy Evaluation Matrix (PEM) model is a partial equilibrium trade model for crops (wheat, coarse grains, oilseeds and rice) with a detailed representation of inputs and outputs market in six OECD countries: United States, Canada, Mexico, European Union (as a single country), Switzerland and Japan. It also has a specific modelling of most PSE categories of support.

true that some net food importers benefit from buying subsidised food, but these gains need to be set against the losses that have resulted from having local production systems undermined by the disposal of OECD-country surpluses (OECD, 2001*d* and 2001*e*). Despite recent reforms, agricultural policies in OECD countries continue to depress world prices, with domestic OECD producers remaining heavily insulated from international market signals (OECD, 2001*b*).

… and have had an impact on the environment

As a major user of natural resources, accounting for around 40 per cent of total OECD land use and 45 per cent of water use (over 60 per cent in nine countries), agriculture has a major influence on the environment. Although agricultural activity has contributed to providing environmental services, such as flood control, the negative impact of agriculture on the environment has generally predominated, to which government intervention has contributed. Policies, where they have encouraged production-enhancing farm practices, have increased production at the intensive and extensive margins, often accentuating overuse and pollution of water, soil erosion, and loss of wildlife, habitats and landscape features. The demand for water from agriculture has been increasing in many OECD countries, as the price of water paid by farmers is often substantially lower than that paid by industrial and household users. Agriculture is an important source of water pollution, accounting for as much as 40 per cent of nitrogen and 30 per cent of phosphate emissions in surface water in several countries. Pesticide and soil sediment run-off from agricultural land also impairs drinking water quality and harms water-based wildlife. More recently, many countries have introduced specific policy measures to reduce environmental damage or enhance environmental benefits, including through payments to farmers. However, as long as environmental payments add to rather than replace production-linked measures that are a source of environmental damage, the achievement of environmental objectives will be more costly and less certain than need be.[12]

Concluding remarks

Agricultural trade negotiations should be more inclusive of the needs of developing countries

"Overall, progress towards further policy reform agreed to by OECD Ministers has been insufficient and remains fragile" (OECD, 2001*a*). Agriculture remains an important policy concern and the continuation of reforms is necessary to make government intervention in the sector more effective and less costly and distortive. Multilateral trade negotiations underway at the WTO are a good opportunity in that regard. Trade policy reform – in conjunction and compatible with domestic policy reform – continues to be a major challenge facing OECD countries, particularly when market conditions falter. With the Uruguay Round Agreement on Agriculture, some progress was made in terms of reducing tariffs, export subsidies and the most trade-distorting domestic support policies. However, the implementation experience suggests that, overall, reduction in support and protection has been limited, largely because of weaknesses in certain specific features of the Agreement (OECD, 2001*b*, Diakosavvas, 2001). Continued reductions in domestic support, improved market

12. For elaboration of the points raised in this paragraph, see OECD (2001*a*, 2001*b*, 2001*f*, 2001*g*, 2001*h* and 2001*i*).

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access and the tightening of the limits on export enhancement programmes are priorities on the trade reform agenda. In addition, a number of other concerns including notably non-trade issues will also need to be addressed. There is wide recognition, both in OECD and non-OECD countries, that the next Agreement must be more inclusive of the needs of developing countries. Liberalisation in agriculture is for many of them, an important objective in WTO negotiation. "Mutually supportive trade and domestic policies […] through innovative market-based and better targeted measures, and greater coherence among policies, would help to achieve desired outcomes with less distortions to agriculture production, consumption and trade" (OECD, 2001*a*).

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Statistical Annex

This annex contains data on some main economic series, which are intended to provide a background to the recent economic developments in the OECD area described in the main body of this report. Data for 2001-2003 are OECD estimates and projections. The data in some of the tables have been adjusted to internationally-agreed concepts and definitions in order to make them more comparable between countries, as well as consistent with historical data shown in other OECD publications. Regional totals and sub-totals are based on those countries in the table for which data are shown. Aggregate measures contained in the Annex, except the series for the euro area (see below), are computed on the basis of 1995 GDP weights expressed in 1995 purchasing power parities (see following page for weights). Aggregate measures for external trade and payments statistics, on the other hand, are based on current year exchange rates for values and base-year exchange rates for volumes.

Given the uneven progress in the transition of Member countries to the new system of National Accounts (SNA93) and the European System of Accounts (ESA95) (see Table "National accounts reporting systems and base-years" below), the publication of three Annex tables have been temporarily suspended: Annex Table 24, "Capital income shares in the business sector"; Annex Table 25, "Rates of return on capital in the business sector"; Annex Table 58, "Productivity in the business sector". When data homogeneity and country coverage become comprehensive enough to arrive at reasonably consistent data series across countries the OECD will resume their publication.

The OECD projection methods and underlying statistical concepts and sources are described in detail in documentation that can be downloaded from the OECD Internet site:

- *OECD Economic Outlook* Sources and Methods (*www.oecd.org/eco/sources-and-methods*);
- *OECD Economic Outlook* Database Inventory (*www.oecd.org/eco/data/eoinv.pdf*);
- The construction of macroeconomic series of the euro area (*www.oecd.org/eco/data/euroset.htm*).

NOTE ON STATISTICAL TREATMENT OF GERMANY,
THE CZECH REPUBLIC, HUNGARY, POLAND,
THE SLOVAK REPUBLIC AND THE EURO AREA AGGREGATE

In this publication, the following should be noted:

- Data up to end-1990 are for western Germany only; unless, otherwise indicated, they are for the whole Germany from 1991 onwards. In tables showing percentage changes from previous year, data refer to the whole Germany from 1992 onwards. When data are available for western Germany only, a special mention is made in a footnote to the table.
- For the Czech Republic, Hungary, Poland and Slovak Republic data are available from 1993 onwards. In tables showing percentage changes from previous year, the Czech Republic, Hungary, Poland and the Slovak Republic are included from 1994 onwards.
- Greece entered the euro area on 1 January 2001. In order to ensure comparability of the euro area data over time, Greece has been included in the calculation of the euro area throughout.

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Country classification

	OECD
Seven major OECD countries	Canada, France, Germany, Italy, Japan, United Kingdom and United States.
European Union	Austria, Belgium, Denmark, Finland, France, Germany, Greece, Ireland, Italy, Luxembourg, Netherlands, Portugal, Spain, Sweden and United Kingdom.
Euro area	Austria, Belgium, Finland, France, Germany, Greece, Ireland, Italy, Luxembourg, Netherlands, Portugal and Spain.
	Non-OECD
Africa and the Middle East	Africa and the following countries (Middle East): Bahrain, Cyprus, Iran, Iraq, Jordan, Kuwait, Lebanon, Oman, Qatar, Saudi Arabia, Syrian Arab Republic, United Arab Emirates and Yemen.
Dynamic Asian Economies (DAEs)	Chinese Taipei; Hong Kong, China; Indonesia; Malaysia; the Philippines; Singapore and Thailand.
Other Asia	Non-OECD Asia and Oceania, excluding China, the DAEs and the Middle East.
Latin America	Central and South America.
Central and Eastern Europe	Albania, Bulgaria, Romania, the Newly Independent States of the former Soviet Union, and the Baltic States.

Weighting scheme for aggregate measures

Per cent

Australia	1.79	Mexico	2.95
Austria	0.82	Netherlands	1.55
Belgium	1.05	New Zealand	0.29
Canada	3.25	Norway	0.48
Czech Republic	0.60	Poland	1.28
Denmark	0.57	Portugal	0.64
Finland	0.46	Slovak Republic	0.22
France	5.68	Spain	2.82
Germany	8.27	Sweden	0.83
Greece	0.63	Switzerland	0.86
Hungary	0.44	Turkey	1.64
Iceland	0.03	United Kingdom	5.21
Ireland	0.31	United States	35.03
Italy	5.46	Total OECD	100.00
Japan	13.86	*Memorandum items:*	
Korea	2.90	European Union	34.38
Luxembourg	0.06	Euro area	27.77

Note: Based on 1995 GDP and purchasing power parities (PPPs).

National accounts reporting systems and base-years

Many countries are changing from the SNA68/ESA79 methodology for the national accounts data.
In the present edition of the OECD Economic Outlook, *the status of national accounts in the OECD countries is as follows (with starting year in brackets):*

	Expenditure accounts	Household accounts	Government accounts	Use of chain-weighted price indices	Benchmark/ base year
Australia	SNA93 (1959)	SNA93 (1959)	SNA93 (1959)	YES	1999/00
Austria	ESA95 (1988)	ESA95 (1995)	ESA95 (1976)	NO	1995[a]
Belgium	ESA95 (1970)	ESA95 (1995)	ESA95 (1970)	NO	1995
Canada	SNA93 (1955)	SNA93 (1955)	SNA93 (1955)	YES	1997[a]
Czech Republic	SNA93 (1994)	SNA93 (1994)	GFS (adjusted by OECD)	NO	1995
Denmark	ESA95 (1988)	ESA95 (1988)	ESA95 (1988)	NO	1995
Finland	ESA95 (1988)	ESA95 (1988)	ESA95 (1988)	NO	1995
France	ESA95 (1978)	ESA95 (1978)	ESA95 (1978)	NO	1995
Germany[b]	ESA95 (1991)	ESA95 (1991)	ESA95 (1991)	NO	1995
Greece	ESA95 (1960)	Not available	ESA95 (1960)	NO	1995[a]
Hungary	SNA93 (1995)	Not available	Not available	NO	1995
Iceland	SNA93 (1970)	Not available	SNA93 (1970)[c]	NO	1990[a]
Ireland	ESA95 (1990)	ESA95 (1990)	ESA95 (1990)	NO	1995
Italy	ESA95 (1982)	ESA79	ESA95 (1995)	NO	1995
Japan	SNA93 (1980q1)[d]	SNA93 (1990)[d]	SNA93 (1990)[d]	NO	1995
Korea	SNA93 (1970)	SNA93 (1975)	SNA93 (1975)	NO	1995
Luxembourg	ESA95 (1995)	Not available	SNA93 (1990)	NO	1995
Mexico	SNA93 (1980)	Not available	Not available	NO	1993
Netherlands	ESA95 (1995)	ESA95 (1995)	ESA95 (1995)	YES	1995
New Zealand	SNA93 (1987)	SNA68	SNA68	YES	1995/96[a]
Norway	SNA93 (1978)	SNA93 (1978)	SNA93 (1978)	NO	1997[a]
Poland	SNA93 (1991)	SNA93 (1991)	SNA93 (1991)	YES	1995
Portugal	ESA95 (1995)	ESA79	ESA95 (1995)	NO	1995
Slovak Republic	SNA93 (1993)	SNA93 (1996)[c]	Not available	NO	1995
Spain	ESA95 (1995)	ESA95 (1995)	ESA95 (1995)	NO	1995
Sweden	ESA95 (1980)	ESA95 (1993)	ESA95 (1980)	YES	1995
Switzerland	SNA68	SNA68	Not available	NO	1990
Turkey	SNA68	SNA68	SNA68	NO	1987
United Kingdom	ESA95 (1987)	ESA95 (1987)	ESA95 (1987)	NO	1995
United States	NIPA (SNA93) (1959q1)	NIPA (SNA93) (1959q1)	NIPA (SNA93) (1960q1)	YES	1996

Note: SNA: System of National Accounts. ESA: European Standardised Accounts. NIPA: National Income and Product Accounts. GFS: Government Financial Statistics.
a) Change in benchmark/base year since the last edition of *OECD Economic Outlook*.
b) Data prior to 1991 refer to western Germany and are spliced to accord with the new SNA93/ESA95 accounts.
c) Estimated.
d) Spliced to SNA68.

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Annex Table 1. **Real GDP**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	2.8	5.2	1.8	4.8	4.5	4.5	1.3	-0.6	2.4	3.9	4.7	4.1	4.1	3.5	5.4	4.5	3.4	2.0	3.2	4.0
Austria	2.1	2.2	2.3	1.7	3.2	4.2	4.7	3.3	2.3	0.4	2.6	1.6	2.0	1.6	3.5	2.8	3.0	1.2	1.5	2.7
Belgium	1.7	2.0	1.7	2.8	4.6	3.9	2.9	1.8	1.6	-1.5	2.8	2.6	1.2	3.6	2.2	3.0	4.0	1.1	1.4	2.6
Canada	2.9	4.7	2.4	4.2	4.9	2.6	0.2	-2.1	0.9	2.4	4.7	2.8	1.6	4.3	3.9	5.1	4.4	1.3	1.2	3.8
Czech Republic	..	..	..	..	..	..	..	..	..	..	2.6	5.9	4.3	-0.8	-1.2	-0.4	2.9	3.0	2.7	3.7
Denmark	2.1	4.3	3.6	0.3	1.2	0.2	1.0	1.1	0.6	0.0	5.5	2.8	2.5	3.0	2.8	2.1	3.2	1.3	1.3	2.3
Finland	2.7	3.1	2.5	4.2	4.7	5.1	0.0	-6.3	-3.3	-1.1	4.0	3.8	4.0	6.3	5.3	4.0	5.7	0.4	1.2	3.4
France	2.1	1.5	2.3	2.5	4.3	4.3	2.6	1.0	1.3	-0.9	1.8	1.9	1.1	1.9	3.5	3.0	3.4	2.0	1.6	3.0
Germany	1.9	2.0	2.3	1.5	3.7	3.6	5.7	5.0	2.2	-1.1	2.3	1.7	0.8	1.4	2.0	1.8	3.0	0.7	1.0	2.9
Greece	2.5	2.5	0.5	-2.3	4.3	3.8	0.0	3.1	0.7	-1.6	2.0	2.1	2.4	3.6	3.4	3.4	4.3	3.9	4.0	4.3
Hungary	..	..	..	..	..	..	..	..	..	..	2.9	1.5	1.3	4.6	4.9	4.2	5.2	3.8	3.5	4.1
Iceland	4.0	3.3	6.3	8.5	-0.1	0.3	1.1	0.7	-3.3	0.6	4.5	0.1	5.2	4.8	4.6	4.0	5.0	1.5	-0.6	3.0
Ireland	3.8	3.1	-0.4	4.7	5.2	5.8	8.5	1.9	3.3	2.7	5.8	10.0	7.8	10.8	8.6	10.8	11.5	5.6	3.7	6.4
Italy	2.5	3.0	2.5	3.0	3.9	2.9	2.0	1.4	0.8	-0.9	2.2	2.9	1.1	2.0	1.8	1.6	2.9	1.8	1.2	2.8
Japan	3.7	4.4	3.0	4.5	6.5	5.3	5.3	3.1	0.9	0.4	1.0	1.6	3.5	1.8	-1.1	0.8	1.5	-0.7	-1.0	0.8
Korea	7.6	6.5	11.6	11.5	11.3	6.4	7.8	9.2	5.4	5.5	8.3	8.9	6.8	5.0	-6.7	10.9	8.8	2.0	3.2	6.2
Luxembourg	1.4	2.9	7.7	2.3	10.4	9.8	2.2	6.1	4.5	8.7	4.2	3.8	3.6	9.0	5.8	6.0	7.5	4.0	3.4	5.9
Mexico	4.6	2.5	-3.6	1.8	1.3	4.2	5.1	4.2	3.6	2.0	4.5	-6.2	5.1	6.8	4.9	3.8	6.9	0.0	1.5	4.0
Netherlands	1.6	3.1	2.8	1.4	2.6	4.7	4.1	2.3	2.0	0.8	3.2	2.3	3.0	3.8	4.3	3.7	3.5	1.4	1.6	2.6
New Zealand	1.0	1.6	0.6	0.8	2.6	0.6	0.6	-1.9	0.8	4.7	6.1	3.9	3.3	2.9	-0.6	3.7	3.0	1.9	1.8	3.8
Norway	3.9	5.2	3.6	2.0	-0.1	0.9	2.0	3.1	3.3	3.1	5.5	3.8	4.9	4.7	2.4	1.1	2.3	1.7	2.1	2.2
Poland	..	..	..	..	..	..	..	..	..	..	5.2	7.0	6.0	6.8	4.9	4.0	4.0	1.5	1.8	4.0
Portugal	2.2	2.8	4.1	6.4	7.5	5.1	4.4	2.3	2.5	-1.1	2.2	2.9	3.7	3.8	3.8	3.3	3.3	1.9	1.8	2.8
Slovak Republic	..	..	..	..	..	..	..	..	..	..	4.9	6.7	6.2	6.2	4.1	1.9	2.2	2.7	3.1	4.1
Spain	1.4	2.3	3.3	5.5	5.1	4.8	3.8	2.5	0.9	-1.0	2.4	2.8	2.4	4.0	4.3	4.1	4.1	2.7	2.0	3.2
Sweden	1.6	2.2	2.7	3.3	2.6	2.7	1.1	-1.1	-1.7	-1.8	4.1	3.7	1.1	2.1	3.6	4.1	3.6	1.4	1.6	2.8
Switzerland	0.5	3.4	1.6	0.7	3.1	4.3	3.7	-0.8	-0.1	-0.5	0.5	0.5	0.3	1.7	2.4	1.6	3.0	1.7	1.1	2.1
Turkey	3.9	4.2	7.0	9.5	2.1	0.3	9.3	0.9	6.0	8.0	-5.5	7.2	7.0	7.5	3.1	-4.7	7.2	-7.3	2.6	5.4
United Kingdom	1.5	3.8	4.2	4.2	5.2	2.2	0.8	-1.4	0.2	2.5	4.7	2.9	2.6	3.4	3.0	2.1	2.9	2.3	1.7	2.5
United States	3.0	3.8	3.4	3.4	4.2	3.5	1.8	-0.5	3.1	2.7	4.0	2.7	3.6	4.4	4.3	4.1	4.1	1.1	0.7	3.8
Euro area	2.0	2.2	2.4	2.5	4.1	3.9	3.6	2.5	1.4	-0.8	2.3	2.2	1.4	2.3	2.9	2.7	3.5	1.6	1.4	3.0
European Union	2.0	2.5	2.7	2.8	4.2	3.6	3.1	1.8	1.2	-0.3	2.8	2.4	1.7	2.6	2.9	2.6	3.3	1.7	1.5	2.9
Total OECD	2.9	3.6	3.1	3.7	4.6	3.8	3.1	1.2	2.1	1.4	3.2	2.5	3.1	3.5	2.7	3.1	3.7	1.0	1.0	3.2

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)*.

Source: OECD.

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Annex Table 2. **Nominal GDP**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	13.2	11.1	8.5	13.1	13.5	11.9	6.2	1.7	3.7	5.1	6.1	5.6	6.5	5.4	5.6	5.4	7.4	5.7	5.5	6.6
Austria	7.4	5.4	5.1	3.8	4.8	7.2	8.2	7.2	6.0	3.4	5.4	4.2	3.3	2.5	4.1	3.5	4.2	3.2	3.3	4.6
Belgium	8.2	6.4	4.7	4.2	7.1	9.0	6.0	4.6	5.3	2.2	4.6	4.4	2.4	5.0	3.9	4.3	5.4	3.6	3.6	4.5
Canada	11.3	8.0	5.5	9.1	9.7	7.3	3.4	0.8	2.2	3.9	5.9	5.1	3.3	5.5	3.5	6.5	8.3	4.0	2.5	5.6
Czech Republic	..	..	..	..	..	..	..	..	..	..	13.9	16.8	13.5	7.2	9.4	2.7	3.8	7.7	6.6	6.8
Denmark	11.3	8.8	8.4	5.0	4.6	5.4	4.6	3.9	3.5	1.4	7.3	4.6	5.1	5.2	4.7	5.2	7.0	4.6	3.1	4.2
Finland	12.9	8.8	6.9	8.6	13.2	11.6	5.5	-4.5	-2.5	1.2	6.0	8.1	3.8	8.5	8.5	3.9	9.3	2.5	2.8	5.5
France	12.8	7.1	7.5	5.4	7.6	7.7	5.6	4.1	3.3	1.5	3.6	3.6	2.5	3.2	4.4	3.4	4.2	3.7	3.4	4.5
Germany	5.9	4.1	5.6	3.4	5.3	6.1	9.1	9.1	7.4	2.5	4.9	3.8	1.8	2.1	3.1	2.3	2.6	2.2	2.1	3.7
Greece	21.7	22.0	19.5	12.6	21.7	18.8	20.7	23.5	15.6	12.6	13.4	12.1	9.9	10.7	8.8	6.5	7.9	7.9	7.5	7.6
Hungary	..	..	..	..	..	..	..	..	..	..	23.0	27.4	22.8	23.9	18.1	12.9	13.0	13.6	9.5	9.1
Iceland	50.3	35.6	33.3	29.7	22.7	20.1	18.2	8.4	0.3	2.9	6.5	2.9	7.2	8.4	10.1	7.5	8.9	10.2	5.3	7.2
Ireland	18.6	8.4	6.1	7.0	8.6	11.6	7.7	3.8	6.2	8.0	7.5	13.3	10.2	15.4	15.1	15.5	16.2	9.8	8.4	10.9
Italy	19.5	12.2	10.6	9.4	11.0	9.5	10.4	9.1	5.3	3.0	5.8	8.1	6.4	4.5	4.5	3.3	5.2	4.8	4.0	4.8
Japan	8.4	6.9	4.7	4.4	7.2	7.3	7.9	6.2	2.6	1.0	1.1	1.2	2.6	2.2	-1.2	-0.6	-0.1	-2.3	-2.4	-0.8
Korea	25.4	11.5	16.7	17.1	18.7	12.0	19.7	21.1	13.5	12.9	16.5	16.7	10.9	8.3	-1.9	8.6	7.1	4.0	5.8	7.3
Luxembourg	7.5	6.0	8.5	5.2	11.1	14.6	7.5	8.6	7.1	9.3	9.1	4.1	5.5	12.1	8.6	8.7	11.5	4.8	4.9	9.6
Mexico	41.1	60.4	67.0	145.2	103.8	31.7	34.6	28.5	18.6	11.6	13.3	29.4	37.3	25.7	21.1	19.2	18.4	6.0	6.9	9.0
Netherlands	7.2	4.9	2.9	0.7	3.8	6.0	6.5	5.0	4.3	2.7	5.6	4.1	4.2	5.9	6.1	5.5	7.3	6.7	4.9	5.1
New Zealand	14.7	17.2	16.0	14.1	10.3	5.7	3.8	-1.4	2.3	7.8	7.3	6.5	5.7	3.0	0.6	3.3	5.6	6.7	3.0	5.7
Norway	12.9	10.7	2.6	9.1	4.8	6.7	5.9	5.7	2.8	4.9	5.3	7.1	9.4	7.8	1.7	7.4	19.0	6.1	2.0	7.4
Poland	..	..	..	..	..	..	..	..	..	..	44.5	36.9	25.9	21.8	17.2	11.1	11.5	6.9	7.7	8.0
Portugal	23.6	25.2	25.4	17.1	19.5	18.2	17.7	14.8	12.8	5.5	8.7	8.1	6.9	7.6	7.7	6.8	6.6	7.0	6.4	6.4
Slovak Republic	..	..	..	..	..	..	..	..	..	..	19.4	17.1	11.0	13.2	9.4	8.6	8.8	8.3	8.6	9.8
Spain	17.2	11.1	14.5	11.8	11.3	12.0	11.4	9.7	7.7	3.4	6.4	7.8	6.0	6.4	6.8	7.1	7.7	6.9	5.1	5.7
Sweden	12.3	8.9	9.5	8.3	9.1	10.9	10.0	6.1	-0.8	0.8	6.6	7.3	2.5	3.8	4.5	4.7	4.4	3.1	3.9	5.4
Switzerland	4.2	5.9	4.8	3.5	6.0	7.5	8.2	5.2	2.6	2.2	2.2	1.6	0.7	1.5	2.3	2.3	4.1	3.5	2.4	3.3
Turkey	45.4	59.5	45.5	46.3	72.9	75.9	72.9	60.3	73.5	81.3	95.2	100.7	90.3	95.2	81.1	48.2	61.4	43.3	58.0	33.0
United Kingdom	14.5	9.6	7.5	9.9	11.6	9.8	8.4	5.2	4.2	5.2	6.1	5.6	6.0	6.4	6.0	4.8	4.7	4.7	4.3	5.1
United States	10.1	7.1	5.7	6.5	7.7	7.5	5.7	3.2	5.6	5.1	6.2	4.9	5.6	6.5	5.6	5.5	6.5	3.2	1.9	5.1
Euro area	11.7	7.8	8.0	6.0	8.0	8.3	8.6	7.5	5.8	2.8	5.2	5.2	3.6	3.9	4.6	3.8	4.8	4.1	3.6	4.7
European Union	12.9	8.6	8.4	7.0	8.9	8.8	8.8	7.3	5.5	3.2	5.5	5.6	4.2	4.5	4.9	4.1	4.9	4.2	3.7	4.8
Total OECD	13.0	10.4	9.6	11.9	12.7	10.1	9.4	7.2	6.7	5.4	8.0	7.9	7.4	7.4	6.0	5.5	6.4	3.9	3.3	4.9
Memorandum item																				
OECD *less* high inflation countries [a]	11.5	7.9	6.9	6.9	8.6	8.2	7.6	5.6	5.2	4.0	5.5	5.1	4.8	5.1	4.0	4.2	5.0	2.9	2.2	4.2

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) High inflation countries are defined as countries which have had 10 per cent or more inflation in terms of the GDP deflator on average during the last 10 years based on historical data. Consequently, Hungary, Mexico, Poland and Turkey are excluded from the aggregate.

Source: OECD.

Annex Table 3. **Real private consumption expenditure**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	2.7	4.6	1.8	1.9	3.9	5.6	2.7	0.6	2.6	1.6	3.7	4.7	3.2	4.0	4.7	5.1	2.8	3.8	3.6	3.6
Austria	2.4	1.9	2.2	3.0	3.2	4.3	4.5	2.5	3.0	0.8	2.4	2.6	3.2	1.7	2.8	2.7	2.5	1.5	1.8	2.4
Belgium	1.9	2.2	3.1	1.8	3.7	3.9	3.2	3.1	2.2	-1.0	2.0	0.7	1.2	2.0	2.9	2.1	3.8	1.8	1.5	2.6
Canada	2.6	4.9	3.7	4.1	4.3	3.4	1.2	-1.6	1.6	1.8	3.0	2.1	2.6	4.6	3.0	3.4	3.6	2.3	2.0	3.2
Czech Republic	..	..	..	..	..	..	..	..	..	..	5.3	5.9	7.9	2.4	-2.0	1.9	1.9	3.5	3.1	3.5
Denmark	1.6	5.0	5.7	-1.5	-1.0	-0.1	0.1	1.6	1.9	0.5	6.5	1.2	2.5	2.9	3.6	0.5	-0.1	0.9	0.9	1.2
Finland	2.5	3.8	4.0	5.1	5.3	4.6	-0.6	-3.8	-4.4	-3.1	2.6	4.4	4.2	3.5	5.1	4.0	3.0	2.0	2.1	2.5
France	2.2	1.4	3.3	2.7	2.3	3.2	2.5	0.8	0.7	-0.1	0.7	1.5	1.3	0.1	3.6	3.2	2.7	2.5	1.7	2.4
Germany	2.1	1.7	3.5	3.4	2.7	2.8	5.4	5.6	2.7	0.1	1.0	2.0	1.0	0.6	1.8	3.1	1.5	1.5	1.4	2.4
Greece	4.1	0.5	-1.5	2.7	6.1	6.3	2.6	2.9	2.3	-0.8	1.9	2.5	2.4	2.7	3.5	2.9	3.2	3.0	3.0	3.2
Hungary	..	..	..	..	..	..	..	..	..	..	0.2	-7.1	-4.3	1.9	4.8	5.4	3.8	4.5	3.9	5.1
Iceland	3.1	4.2	6.9	16.2	-3.8	-4.2	0.5	2.9	-3.1	-4.7	2.9	2.2	5.4	5.5	10.0	7.2	4.2	-1.2	-0.6	1.3
Ireland	2.1	4.6	2.0	3.3	4.5	6.5	1.4	1.8	2.9	3.0	4.4	4.4	6.3	7.3	7.3	8.2	9.9	6.2	5.5	6.5
Italy	3.2	3.1	4.0	3.8	4.0	3.7	2.1	2.9	1.9	-3.7	1.5	1.7	1.2	3.2	3.1	2.3	2.9	1.2	1.4	2.7
Japan	3.4	3.8	3.2	4.1	5.1	4.7	4.4	2.7	2.6	1.8	2.6	1.4	2.4	0.8	0.1	1.2	0.5	0.0	-0.2	0.8
Korea	6.3	6.4	8.1	8.1	9.0	10.8	8.0	8.0	5.5	5.6	8.2	9.6	7.1	3.5	-11.7	11.0	7.1	1.7	2.5	4.4
Luxembourg	2.4	2.7	5.7	4.6	4.6	5.1	5.7	6.3	-0.9	1.7	2.4	2.4	3.7	3.6	4.0	2.1	3.1	3.5	4.0	4.0
Mexico	3.9	3.3	-2.6	-0.1	1.8	7.3	6.4	4.7	4.7	1.5	4.6	-9.5	2.2	6.5	5.4	4.3	9.5	2.8	1.7	4.0
Netherlands	1.8	2.8	2.6	2.7	0.8	3.5	4.2	3.1	2.5	1.0	2.2	1.8	4.0	3.0	4.8	4.5	3.8	1.2	2.0	3.1
New Zealand	0.2	0.5	4.0	2.4	2.7	1.1	0.1	-1.3	0.1	2.8	5.8	4.0	4.5	2.1	1.4	3.5	1.5	1.8	1.3	3.0
Norway	2.9	9.4	5.0	-0.8	-2.0	-0.6	0.7	1.5	2.2	2.3	4.0	3.4	5.3	3.6	3.4	2.2	2.4	1.9	2.8	2.9
Poland	..	..	..	..	..	..	..	..	..	..	4.5	3.2	8.6	6.9	4.8	5.3	2.6	1.7	1.5	2.9
Portugal	0.6	0.6	5.7	5.3	6.8	2.6	5.8	3.8	4.4	1.5	2.2	1.6	3.1	3.1	5.9	5.0	2.5	1.5	1.4	2.2
Slovak Republic	..	..	..	..	..	..	..	..	..	..	1.0	3.4	8.0	5.4	5.8	-0.2	-3.4	2.3	2.5	3.5
Spain	1.1	2.3	3.4	6.0	4.9	5.4	3.5	2.9	2.2	-1.9	1.1	1.7	2.2	3.2	4.5	4.7	4.0	2.8	2.2	3.0
Sweden	0.6	3.2	5.2	5.3	2.6	1.2	-0.4	1.0	-1.3	-3.0	1.8	0.6	1.4	2.0	2.7	3.8	4.1	1.7	2.9	2.5
Switzerland	1.1	1.6	2.3	2.2	1.7	2.3	1.2	1.6	0.1	-0.9	1.0	0.6	0.7	1.4	2.3	2.2	2.0	2.2	1.3	2.1
Turkey	5.6	-0.6	5.8	-0.3	1.2	-1.0	13.1	2.7	3.2	8.6	-5.4	4.8	8.5	8.4	0.6	-2.6	6.4	-6.9	2.5	4.0
United Kingdom	1.7	3.9	6.6	5.0	7.5	3.3	1.0	-1.5	0.6	3.2	3.3	1.9	3.8	3.8	3.8	4.2	4.0	3.7	2.0	2.5
United States	3.2	5.0	4.2	3.3	4.0	2.7	1.8	-0.2	2.9	3.4	3.8	3.0	3.2	3.6	4.8	5.0	4.8	2.7	1.1	3.3
Euro area	2.2	2.1	3.4	3.5	3.2	3.6	3.5	3.0	1.9	-0.9	1.3	1.9	1.6	1.6	3.1	3.3	2.6	1.9	1.7	2.7
European Union	2.1	2.4	4.0	3.7	3.9	3.5	3.0	2.3	1.7	-0.3	1.7	1.8	2.0	2.1	3.3	3.4	2.9	2.1	1.8	2.6
Total OECD	3.0	3.8	3.8	3.5	4.1	3.6	3.1	1.5	2.5	1.8	2.9	2.2	2.9	2.9	2.9	3.8	3.6	1.9	1.3	2.8

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

Source: OECD.

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Annex Table 4. **Real public consumption expenditure**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	4.1	6.0	4.2	2.0	2.3	3.7	3.7	3.1	0.4	0.3	3.1	4.0	2.9	2.6	3.4	4.1	5.4	3.2	3.0	3.0
Austria	2.5	1.3	1.8	0.2	1.1	1.7	2.3	3.2	3.5	3.7	3.0	1.3	1.2	-1.5	2.8	2.2	0.9	-0.6	0.6	0.5
Belgium	2.4	2.9	1.3	2.6	-0.7	1.1	-0.4	3.6	1.5	-0.2	1.4	1.3	2.4	0.3	1.5	3.2	2.5	1.5	1.3	1.4
Canada	2.6	4.2	1.8	1.4	4.5	2.7	3.5	2.9	0.9	0.0	-1.3	-0.6	-1.4	-0.8	1.8	2.6	2.2	2.6	2.0	2.0
Czech Republic	..	..	..	..	..	..	..	..	..	..	-2.4	-4.3	3.6	-4.4	-2.4	-0.1	-1.3	-1.2	-0.5	0.0
Denmark	3.0	2.5	0.5	2.5	0.9	-0.8	-0.2	0.6	0.8	4.1	3.0	2.1	3.4	0.8	3.1	1.4	1.0	1.7	1.1	1.3
Finland	3.8	4.3	3.4	4.4	1.9	2.2	4.0	2.1	-2.4	-4.2	0.3	2.0	2.5	4.1	1.7	1.9	0.7	1.6	1.3	1.3
France	3.5	2.1	2.4	2.2	3.1	1.7	2.5	2.6	3.6	4.3	0.5	0.0	2.2	2.1	-0.1	2.0	2.3	2.2	1.9	2.0
Germany	2.0	2.1	2.5	1.5	2.1	-1.6	2.2	0.4	5.0	0.1	2.4	1.5	1.8	0.4	1.2	1.6	1.2	1.3	1.2	1.2
Greece	4.4	3.8	-1.1	0.2	-5.5	5.4	0.6	-1.5	-3.0	2.6	-1.1	5.6	0.9	3.0	1.7	-0.1	2.3	1.5	1.1	0.7
Hungary	..	..	..	..	..	..	..	..	..	..	-7.4	-5.7	-1.9	3.1	2.8	1.7	1.4	1.0	1.0	2.2
Iceland	5.0	6.5	7.3	6.5	4.7	3.0	4.4	3.1	-0.7	2.3	4.0	1.8	1.2	2.5	3.4	5.1	3.7	3.7	3.2	3.2
Ireland	3.5	1.8	2.6	-4.8	-5.0	-1.3	5.4	2.8	3.0	-0.4	4.1	3.0	3.2	5.5	5.5	6.5	5.4	5.2	5.3	5.3
Italy	2.6	3.0	2.6	4.8	4.0	0.2	2.5	1.7	0.6	-0.2	-0.9	-2.2	1.0	0.2	0.3	1.5	1.6	0.6	0.6	0.6
Japan	5.3	0.1	4.8	3.5	3.4	2.9	2.5	3.2	2.7	3.2	2.9	4.3	2.8	1.3	1.9	4.0	3.6	2.3	2.3	1.4
Korea	4.3	4.8	8.4	6.1	8.0	8.5	3.6	7.2	5.9	4.6	1.9	0.8	8.2	1.5	-0.4	1.3	1.3	0.8	3.0	1.9
Luxembourg	2.3	2.0	2.7	4.7	4.9	3.9	3.1	3.9	1.5	3.7	2.0	2.2	5.5	3.0	1.4	7.7	4.8	3.4	3.0	3.0
Mexico	6.9	1.0	1.4	-1.2	-0.5	2.2	3.3	5.4	1.9	2.4	2.9	-1.3	-0.7	2.9	2.3	3.9	3.5	-2.5	0.7	2.5
Netherlands	2.8	2.4	3.6	2.6	1.4	1.5	1.6	1.5	1.7	1.5	0.6	0.6	-0.4	3.2	3.6	2.8	1.9	3.0	2.4	2.5
New Zealand	2.1	1.5	2.1	0.5	0.2	3.5	1.6	-0.6	1.1	1.2	0.8	4.7	2.6	7.1	0.1	6.1	-3.2	3.0	2.5	2.5
Norway	4.4	2.4	1.9	4.6	-0.1	1.9	4.9	4.3	5.3	3.5	1.4	0.3	2.8	1.9	3.8	3.3	1.4	2.2	2.2	2.5
Poland	..	..	..	..	..	..	..	..	..	..	2.3	3.7	2.0	3.0	1.4	1.0	1.1	0.3	0.9	1.9
Portugal	5.7	6.4	7.2	3.8	8.6	6.6	5.4	10.3	1.1	0.9	2.1	2.2	3.4	2.2	3.0	4.5	3.8	2.2	2.2	2.2
Slovak Republic	..	..	..	..	..	..	..	..	..	..	-11.4	2.1	21.0	4.0	4.0	-6.9	-0.9	2.0	3.0	1.0
Spain	4.4	4.3	4.6	9.2	3.6	8.3	6.3	6.0	3.5	2.7	0.5	2.4	1.3	2.9	3.7	4.2	4.0	1.9	2.0	2.0
Sweden	2.7	1.7	1.8	1.2	1.1	3.0	2.5	3.4	0.2	-0.1	-0.9	-0.6	0.9	-1.2	3.2	1.7	-1.7	1.2	1.6	1.5
Switzerland	1.8	3.4	3.4	1.7	4.5	5.4	5.4	3.5	0.7	-0.1	2.0	-0.1	2.0	0.0	1.3	0.5	-0.4	0.3	0.4	0.3
Turkey	6.0	14.1	9.2	9.4	-1.1	0.8	8.0	3.7	3.6	8.6	-5.5	6.8	8.6	4.1	7.8	6.5	7.1	-5.5	-1.0	1.5
United Kingdom	1.5	-0.2	1.6	-0.4	0.2	1.0	2.2	3.0	0.7	-0.7	1.0	1.7	1.2	0.1	1.5	2.8	1.6	2.1	3.4	3.6
United States	1.7	5.0	4.6	2.4	1.6	2.5	2.6	1.4	0.4	-0.3	0.2	0.0	0.5	1.8	1.4	2.2	2.9	2.9	3.9	2.2
Euro area	2.8	2.5	2.6	2.9	2.5	1.0	2.6	2.1	2.9	1.4	1.0	0.6	1.6	1.3	1.2	2.1	2.0	1.6	1.5	1.5
European Union	2.7	2.2	2.5	2.6	2.1	1.3	2.6	2.4	2.5	1.0	1.0	0.8	1.5	1.0	1.4	2.2	1.8	1.6	1.7	1.8
Total OECD	3.0	3.3	3.9	2.7	2.2	2.3	2.8	2.4	1.8	1.1	0.8	1.0	1.6	1.4	1.6	2.5	2.6	1.9	2.5	1.9

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

Source: OECD.

Annex Table 5. **Real total gross fixed capital formation**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	2.8	11.2	-2.5	3.8	8.9	10.4	-8.2	-7.4	0.8	4.9	11.8	2.9	4.5	9.6	7.4	6.5	0.3	-3.6	3.5	5.0
Austria	0.0	6.9	2.4	4.4	6.8	4.1	6.2	6.6	0.6	-0.9	4.6	1.3	2.2	2.0	3.4	1.5	5.1	-0.5	0.3	3.6
Belgium	-1.6	7.0	3.2	6.2	15.7	12.6	8.5	-4.1	1.7	-3.1	-0.1	5.6	1.3	6.8	4.3	3.3	2.6	0.4	1.7	3.3
Canada	3.4	8.7	4.6	10.5	9.3	5.6	-3.9	-5.4	-2.7	-2.0	7.5	-2.1	4.4	15.2	2.4	7.3	6.7	0.6	1.7	6.2
Czech Republic	..	..	..	..	..	..	..	..	..	..	17.1	19.8	8.2	-2.9	0.1	-0.6	4.2	7.3	5.5	7.5
Denmark	-1.3	12.6	17.1	-3.8	-6.6	-0.8	-2.1	-3.3	-2.0	-4.0	7.6	11.6	4.0	10.9	7.6	1.5	9.9	-3.4	1.4	3.6
Finland	0.6	2.8	1.0	4.9	11.0	13.0	-4.6	-18.6	-16.7	-16.6	-2.7	10.6	8.4	11.9	9.3	3.0	5.5	1.3	-1.3	2.6
France	-0.3	2.7	4.5	5.7	9.1	7.6	3.3	-1.5	-1.8	-6.6	1.5	2.1	0.0	-0.1	7.2	6.2	6.2	2.9	0.8	4.1
Germany	0.7	-0.5	3.3	1.8	4.4	6.3	8.5	6.0	4.5	-4.5	4.0	-0.7	-0.8	0.6	3.0	4.2	2.3	-2.6	-0.7	3.1
Greece	0.3	9.3	0.1	-5.6	2.6	6.1	4.5	4.2	-3.5	-4.0	-3.1	4.1	8.4	6.8	10.6	6.2	7.8	8.5	8.7	9.1
Hungary	..	..	..	..	..	..	..	..	..	..	12.5	-4.3	6.7	9.2	13.3	5.9	6.6	6.0	5.5	5.5
Iceland	0.1	1.0	-1.6	18.8	-0.2	-7.9	3.0	3.3	-11.1	-10.7	0.6	-1.1	25.7	9.6	26.6	-2.5	13.1	-5.5	-13.7	3.3
Ireland	3.2	-7.7	-2.8	-1.1	5.2	10.1	13.4	-6.2	-1.8	-3.5	12.0	12.8	16.5	17.9	16.5	14.0	7.0	2.5	-0.6	5.9
Italy	0.1	0.4	2.3	4.2	6.7	4.2	4.0	1.0	-1.4	-10.9	0.1	6.0	3.6	2.1	4.3	4.6	6.1	1.5	1.3	4.1
Japan	2.2	5.1	5.1	9.4	12.0	8.6	8.8	2.2	-2.5	-3.1	-1.4	0.3	6.8	1.0	-4.0	-0.9	0.6	-2.0	-6.7	-2.2
Korea	11.8	4.3	10.6	17.0	13.7	15.9	28.2	13.3	-0.7	6.3	10.7	11.9	7.3	-2.2	-21.2	3.7	11.0	-2.7	2.6	6.1
Luxembourg	-1.6	-9.5	31.0	17.9	15.0	7.0	2.7	31.6	-9.0	28.4	-14.9	3.5	1.7	14.3	2.8	19.6	-3.0	5.5	4.0	5.5
Mexico	1.9	7.9	-11.8	-0.1	5.8	5.8	13.1	11.0	10.8	-2.5	8.4	-29.0	16.4	21.0	10.3	7.7	10.0	-4.9	3.0	6.1
Netherlands	-0.3	7.0	6.9	0.9	4.5	4.9	1.6	0.2	0.6	-2.8	2.2	5.0	6.3	6.6	4.2	7.8	3.8	-0.6	0.1	1.8
New Zealand	-0.3	4.0	-1.8	-0.2	0.1	4.5	-0.7	-18.3	0.2	14.4	15.3	12.4	8.7	0.8	-4.7	2.7	7.0	-5.2	2.3	6.2
Norway	2.3	-4.0	7.6	0.3	-1.8	-6.9	-10.8	-0.4	-3.1	3.8	4.5	3.4	9.9	13.9	10.6	-8.2	-1.1	-0.1	-0.6	1.4
Poland	..	..	..	..	..	..	..	..	..	..	9.2	16.5	19.7	23.2	15.6	9.2	-1.6	-2.6	2.4	6.8
Portugal	-0.6	-3.5	10.9	18.0	14.8	4.4	7.6	3.5	4.8	-6.0	3.4	4.8	6.3	14.4	9.1	6.6	5.1	2.2	3.2	5.0
Slovak Republic	..	..	..	..	..	..	..	..	..	..	-5.0	5.3	32.0	12.0	11.1	-18.8	-0.7	7.4	6.5	10.0
Spain	-1.9	6.7	10.5	12.2	13.6	12.0	6.5	1.7	-4.1	-8.9	1.9	7.7	2.1	5.0	9.7	8.8	5.7	3.3	1.8	4.5
Sweden	0.7	7.0	1.1	8.0	6.4	12.1	0.2	-8.6	-11.6	-15.0	6.1	9.4	5.0	-1.1	8.5	8.1	4.5	-0.9	-2.0	2.9
Switzerland	0.2	2.8	5.4	4.0	8.1	5.3	3.8	-2.9	-6.6	-2.7	6.5	1.8	-2.4	1.5	4.5	3.7	5.8	1.1	0.9	3.8
Turkey	-1.1	11.5	8.4	45.1	-1.0	2.2	15.9	0.4	6.4	26.4	-16.0	9.1	14.1	14.8	-3.9	-15.7	16.5	-23.0	-1.9	11.8
United Kingdom	0.9	4.0	2.1	9.0	14.9	6.0	-2.6	-8.2	-0.9	0.3	4.7	3.1	4.7	7.1	13.2	0.9	4.9	1.4	-0.7	2.4
United States	3.9	6.7	2.7	1.1	2.9	2.9	-0.2	-5.4	5.3	5.9	7.4	5.5	8.4	8.9	10.3	7.9	6.7	-1.4	-4.2	4.5
Euro area	-0.1	2.1	4.1	4.4	7.5	7.0	5.2	1.3	0.1	-6.4	2.3	2.6	1.4	2.4	5.3	5.4	4.5	0.6	0.7	3.8
European Union	0.1	2.8	4.1	5.3	8.5	6.8	4.0	-0.2	-0.4	-5.6	2.6	3.5	2.4	3.4	6.8	4.8	4.8	0.7	0.5	3.6
Total OECD	2.5	5.2	3.4	5.3	6.8	5.8	3.8	-1.4	1.7	0.3	4.4	3.2	6.3	6.3	5.6	4.8	5.3	-1.1	-1.9	3.6

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

Source: OECD.

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Annex Table 6. **Real gross private non-residential fixed capital formation**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	3.2	14.4	-2.4	7.2	8.8	10.3	-7.6	-11.6	-1.8	2.1	12.4	8.3	10.2	8.5	6.3	6.0	-2.0	-3.5	3.8	5.6
Austria	0.6	13.5	1.0	9.1	9.5	6.3	13.2	6.1	-3.1	-4.4	3.7	-2.2	4.0	10.7	6.9	3.0	10.6	0.9	1.1	4.5
Belgium	-0.5	8.9	6.5	9.0	13.8	17.8	10.7	-3.6	0.1	-6.8	-2.4	7.8	4.9	8.0	5.3	2.7	1.8	0.8	1.5	3.5
Canada	5.3	8.0	1.3	9.3	15.4	5.5	-2.3	-2.8	-7.8	-1.4	9.4	4.8	4.3	22.6	5.3	7.2	8.0	-0.6	1.0	7.4
Denmark	1.1	18.5	18.0	-4.7	-7.2	3.5	2.2	-1.0	-5.4	-7.9	7.5	13.6	2.8	13.7	10.3	1.6	10.2	-1.4	0.6	3.5
Finland	0.7	5.8	4.7	5.3	10.7	16.3	-7.4	-23.1	-18.8	-17.5	-2.9	20.9	9.8	8.1	13.0	1.0	9.0	5.3	-1.7	3.0
France	0.7	4.2	6.6	7.5	9.7	8.2	5.7	-1.1	-2.5	-8.0	0.7	3.2	-0.1	1.0	10.2	6.3	7.4	4.1	1.0	5.2
Germany	2.0	5.0	4.3	3.8	5.6	7.4	10.1	7.5	0.7	-9.0	0.7	1.0	-0.8	2.2	4.9	5.4	5.7	-0.6	-0.1	5.0
Greece	..	..	..	..	..	..	..	..	..	..	..	..	..	5.4	12.0	4.6	13.2	9.6	10.9	11.4
Iceland	0.3	7.0	3.9	22.0	-9.3	-14.0	6.1	5.5	-16.5	-21.9	1.2	8.7	46.1	17.3	38.0	-5.3	16.7	-9.9	-20.6	4.0
Ireland	6.4	-15.1	-4.4	6.5	19.7	9.5	19.0	-10.6	-5.3	-3.1	8.4	13.1	17.7	20.7	22.3	14.1	1.0	4.6	-2.5	6.0
Italy	-0.4	0.6	5.8	7.7	11.0	5.3	5.6	0.3	-1.3	-14.7	4.4	10.4	5.0	4.0	5.1	5.6	8.7	1.4	0.9	4.3
Japan	3.6	12.2	4.9	6.2	15.5	15.0	11.5	4.4	-7.3	-11.6	-6.5	2.4	4.2	13.2	-2.3	-4.2	4.5	0.3	-5.9	0.4
Korea	..	4.6	13.0	20.5	12.7	15.6	18.9	13.4	0.1	5.3	15.1	14.1	7.3	-3.0	-29.2	10.2	18.4	-6.1	0.8	5.9
Mexico	..	15.9	-17.1	8.7	20.3	7.1	19.6	22.6	22.8	-5.6	-0.4	-38.9	45.8	34.0	18.3	9.8	12.0	-4.8	3.5	7.0
Netherlands	0.1	14.8	12.0	0.3	1.2	8.1	2.5	2.2	-3.4	-4.3	0.1	7.7	7.0	9.7	5.2	10.3	4.4	-2.0	0.0	2.2
New Zealand	2.0	2.5	-5.3	12.1	0.2	6.0	-5.1	-18.9	8.2	23.1	16.9	15.1	9.1	-6.7	2.3	1.3	11.3	-0.3	-0.4	6.0
Norway	2.7	-5.4	6.7	-2.1	-1.6	-7.4	-10.3	1.8	-3.5	6.5	2.5	2.3	13.3	14.2	14.0	-10.6	-1.8	-1.0	-2.2	1.5
Spain	-1.6	0.1	17.3	19.6	14.0	12.1	3.9	3.7	-1.0	-13.5	3.5	12.4	3.6	6.9	8.8	10.2	6.9	1.3	0.3	4.5
Sweden	1.2	14.0	3.1	8.6	5.3	14.5	-2.3	-14.6	-15.2	-10.9	18.5	20.0	8.0	2.6	9.6	6.8	6.4	-2.0	-3.4	2.0
Switzerland	0.1	5.2	8.7	4.6	9.7	4.7	6.3	-2.6	-10.6	-5.9	2.0	4.9	2.3	4.3	6.8	4.9	7.6	0.5	0.3	4.3
United Kingdom	2.3	9.2	-3.2	12.2	16.9	13.0	0.6	-7.3	-2.9	-3.5	4.8	7.8	9.1	10.5	18.9	1.7	5.1	0.3	-2.7	1.4
United States	4.6	6.7	-2.7	-0.1	5.4	5.5	0.7	-4.9	3.4	8.4	8.9	9.8	10.0	12.2	12.5	8.2	9.9	-3.7	-7.1	5.9
Euro area	0.6	4.3	6.5	7.1	8.8	8.4	6.6	1.9	-1.2	-9.8	1.4	4.9	2.2	4.4	7.0	6.3	6.7	1.3	0.7	4.8
European Union	0.9	5.5	5.1	7.8	9.8	9.2	5.6	0.1	-2.0	-8.8	2.7	6.4	3.7	5.2	9.0	5.5	6.6	1.1	0.1	4.1
Total OECD	3.3	7.4	1.5	5.0	9.5	8.6	4.9	-0.4	-0.2	-1.7	4.4	5.9	7.7	10.3	7.6	5.3	7.9	-1.4	-3.2	4.5

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence, there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. Some countries, United States, Canada and France use hedonic price indices to deflate current-price values of investment in certain information and communication technology products such as computers. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex. National account data do not always have a sectoral breakdown of investment expenditures, and for some countries data are estimated by the OECD. See also *OECD Economic Outlook* Sources and Methods, *(http://www.oecd.org/eco/sources-and-methods).*

Source: OECD.

Annex Table 7. **Real gross private residential fixed capital formation**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	4.1	2.8	-7.7	-2.2	20.1	8.8	-10.8	-5.7	11.4	12.8	12.1	-7.6	-10.6	15.3	14.7	5.2	3.4	-5.0	3.5	4.0
Austria	0.6	-1.2	2.2	2.6	7.3	-0.6	-8.2	9.4	10.7	4.3	7.7	13.1	2.4	-1.7	-2.5	-2.5	-6.2	-4.0	-2.0	1.4
Belgium	-6.4	20.4	0.0	8.5	25.2	17.6	8.0	-8.9	4.9	1.8	5.3	5.6	-4.1	4.8	2.7	-0.2	2.9	1.9	2.0	2.5
Canada	1.5	8.7	12.4	14.7	2.1	4.1	-10.5	-14.8	7.1	-3.4	4.1	-14.8	9.6	8.2	-3.5	5.3	2.7	3.6	2.6	4.1
Denmark	-3.5	-2.1	21.3	-3.2	-9.4	-8.4	-11.3	-10.1	0.1	6.3	8.9	8.5	5.8	7.1	4.5	2.1	10.9	-14.0	4.5	4.5
Finland	-0.3	-4.2	-7.8	0.9	15.8	17.4	-5.6	-16.6	-20.6	-14.3	-4.5	-2.7	2.6	21.5	7.8	12.7	3.4	-7.5	-2.3	2.1
France	-1.9	-2.7	1.6	2.9	5.6	7.4	-1.7	-6.9	-3.7	-5.2	4.4	2.1	0.4	0.9	3.8	7.6	4.6	0.0	0.5	2.7
Germany	0.5	-10.0	-0.6	-1.3	3.6	4.8	8.4	4.2	10.8	4.7	12.0	0.4	-0.2	0.4	0.3	1.6	-2.9	-6.9	-2.4	-0.2
Greece	0.1	19.3	20.9	-5.8	-0.6	-1.8	5.5	-0.3	-15.6	-10.5	-11.3	2.6	-1.2	6.6	8.8	3.5	-4.3	7.0	3.5	3.2
Iceland	0.1	-13.6	-13.9	14.2	14.9	2.8	-0.6	-4.1	-3.4	-5.2	4.1	-8.7	7.1	-9.7	1.1	0.2	10.9	5.8	2.5	1.5
Ireland	0.7	-0.7	8.1	6.2	0.3	13.2	-0.6	1.1	8.1	-11.7	23.6	14.9	18.4	16.1	5.8	11.3	13.5	-10.0	-5.0	2.0
Italy	-0.5	-3.1	-3.0	-2.1	2.2	3.0	3.7	3.3	1.3	-1.5	-2.3	-0.1	-1.4	-2.8	-0.6	1.8	2.5	1.2	1.2	4.0
Japan	-0.7	2.6	8.1	22.4	11.4	0.9	4.8	-6.7	-5.8	1.7	7.4	-6.1	13.7	-15.7	-13.7	1.1	1.3	-8.4	-2.4	1.1
Korea	5.8	0.8	16.2	9.0	22.7	19.7	62.1	10.8	-7.3	11.2	-1.7	8.3	1.5	-6.3	-7.9	-16.5	-10.9	-0.5	1.6	7.0
Mexico	3.7	8.1	-1.6	4.4	-1.2	5.8	4.4	7.6	2.9	5.2	4.0	-7.9	2.5	4.5	3.4	2.9	5.2	-6.0	2.5	5.5
Netherlands	-0.3	-0.8	4.2	1.6	11.3	0.7	-2.5	-5.4	6.4	-0.3	6.2	0.9	3.9	5.3	1.4	2.0	-0.1	-0.7	0.5	1.0
New Zealand	-3.7	-0.5	-3.1	-3.9	4.7	15.5	2.4	-15.5	3.8	17.1	13.2	3.0	8.1	6.4	-16.1	11.0	-0.3	-15.2	5.7	5.2
Norway	1.8	-0.9	7.8	3.2	-6.9	-12.5	-17.8	-21.7	-10.6	3.1	24.6	9.1	-0.1	7.4	-1.8	-2.5	12.2	8.0	2.5	1.0
Spain	-4.0	6.5	2.1	6.3	11.4	3.3	6.4	-3.7	-4.0	-4.1	0.4	7.1	9.3	1.8	9.8	9.8	6.6	6.7	3.8	4.9
Sweden	0.2	-2.5	-2.2	8.8	8.4	4.8	7.2	-2.4	-11.6	-33.5	-34.1	-23.9	8.9	-11.5	3.2	22.3	7.9	6.0	4.0	10.0
Switzerland	0.7	0.5	-1.6	2.7	4.9	5.8	-3.4	-7.7	-1.6	5.8	19.3	0.0	-10.2	-4.0	-0.6	0.8	2.5	1.7	1.5	3.3
United Kingdom	1.7	-2.7	12.0	8.1	19.0	-11.6	-17.5	-15.1	0.2	8.1	2.5	-3.0	6.9	5.1	-1.9	-1.3	0.8	-2.3	1.5	2.1
United States	2.5	1.4	12.0	0.2	-0.5	-4.1	-8.6	-12.8	16.3	7.3	9.7	-3.6	7.4	2.0	8.0	6.7	0.8	1.1	-1.8	3.6
Euro area	-1.1	-3.4	0.4	0.9	6.0	5.0	3.1	-1.0	2.8	-0.1	6.1	1.8	0.9	1.1	2.0	3.7	0.8	-1.9	0.0	2.1
European Union	-0.4	-2.3	2.7	2.2	7.9	2.2	-0.1	-3.2	1.9	-0.1	3.6	0.8	2.3	1.5	1.7	3.6	1.5	-1.5	0.4	2.4
Total OECD	1.6	0.7	7.3	5.1	5.4	0.5	-1.1	-7.1	6.1	3.6	6.7	-2.5	5.7	-0.5	1.5	3.8	1.1	-1.5	-0.5	3.0

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

Source: OECD.

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Annex Table 8. **Real total domestic demand**

Percentage change from previous period

	Average 1974-84[a]	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	3.1	5.4	0.6	2.8	5.5	6.9	-0.8	-1.8	2.4	2.9	5.0	4.6	3.1	3.3	6.8	5.5	2.1	1.7	3.8	4.0
Austria	1.9	1.9	2.2	2.4	3.1	3.8	4.5	3.2	2.1	0.7	3.2	3.0	1.9	1.4	3.0	2.5	2.4	0.7	1.2	2.3
Belgium	1.2	2.1	2.5	3.6	4.8	4.5	3.0	1.6	1.8	-1.5	1.9	2.0	0.9	2.8	3.3	2.2	3.8	1.2	1.5	2.5
Canada	2.7	5.4	3.3	4.9	5.4	4.1	-0.3	-1.9	0.5	1.6	3.2	1.8	1.2	6.1	2.3	4.0	4.5	1.0	1.8	3.8
Czech Republic	..	..	..	..	..	..	..	..	..	..	6.3	8.4	7.3	-0.7	-2.1	-0.5	3.9	4.6	3.3	4.2
Denmark	1.5	5.1	5.6	-1.7	-0.7	-0.1	-0.7	-0.1	0.9	-0.3	7.0	4.2	2.2	4.9	4.5	-0.6	2.6	0.2	1.1	1.8
Finland	2.1	3.3	2.9	5.1	6.4	6.7	-1.2	-8.5	-5.8	-5.7	3.7	4.4	2.9	6.0	5.8	2.0	4.0	1.7	1.3	2.2
France	1.9	1.9	3.4	3.3	4.3	3.9	2.7	0.5	0.6	-1.6	1.9	1.8	0.7	0.7	4.2	3.0	3.6	1.7	1.6	3.0
Germany	1.7	1.0	3.3	2.4	3.5	2.8	5.2	4.6	2.8	-1.1	2.3	1.7	0.3	0.6	2.4	2.6	2.0	-0.1	1.1	2.7
Greece	2.4	2.9	0.4	-2.7	5.9	5.3	2.2	3.5	-0.5	-1.0	1.1	3.5	3.3	3.5	4.6	2.6	4.4	3.9	4.1	4.3
Hungary	..	..	..	..	..	..	..	..	..	..	2.0	-3.0	0.6	4.0	7.8	4.0	5.1	3.3	3.4	4.3
Iceland	2.4	2.8	4.6	15.7	-0.7	-4.4	1.5	4.5	-4.6	-4.2	2.5	2.2	7.2	5.7	12.4	4.4	6.3	-1.7	-2.7	2.1
Ireland	2.7	1.5	1.0	0.8	2.8	6.9	5.9	0.1	-0.3	1.1	5.6	7.3	7.7	9.8	9.4	7.0	9.2	5.2	3.8	6.3
Italy	2.2	3.2	3.1	4.3	4.1	3.1	2.7	2.1	0.9	-5.1	1.7	2.0	0.9	2.7	3.1	3.0	2.3	1.0	1.3	2.6
Japan	3.3	3.9	3.8	5.3	7.3	5.6	5.3	2.7	0.6	0.3	1.2	2.1	4.0	0.9	-1.5	0.9	1.1	-0.2	-1.6	0.2
Korea	6.9	5.5	8.2	10.6	11.4	12.6	11.6	10.4	3.2	4.6	9.6	9.3	7.8	-0.8	-19.8	14.7	6.7	0.0	2.9	4.8
Luxembourg	1.6	0.5	8.8	7.0	6.8	5.4	4.4	11.1	-2.4	8.5	-2.5	2.6	4.1	6.7	2.9	7.3	1.9	4.0	3.8	4.2
Mexico	3.7	4.1	-4.9	1.1	3.9	5.6	7.0	5.7	6.0	1.1	5.6	-14.0	5.6	9.6	6.1	4.3	8.8	0.2	2.0	4.5
Netherlands	1.3	3.7	3.9	1.4	1.9	4.4	3.2	1.7	1.5	-1.1	2.9	1.9	2.8	3.9	4.8	4.2	3.1	1.3	1.7	2.7
New Zealand	-0.2	-0.6	1.4	1.5	0.8	4.3	0.3	-6.0	2.0	4.9	6.9	5.5	4.5	2.5	-0.6	5.0	0.9	0.2	1.7	3.5
Norway	2.6	5.4	7.1	-0.7	-3.0	-2.0	-0.4	0.8	1.7	3.5	4.0	4.1	4.2	6.3	5.4	-0.7	2.2	1.3	1.8	2.4
Poland	..	..	..	..	..	..	..	..	..	..	4.6	7.2	9.7	9.7	6.9	5.3	1.7	0.0	1.6	3.7
Portugal	1.2	1.7	6.0	8.8	9.9	3.6	5.5	3.7	4.3	-1.2	2.7	2.8	3.2	5.0	6.3	5.5	3.1	1.7	2.0	2.9
Slovak Republic	..	..	..	..	..	..	..	..	..	..	-5.0	10.6	16.1	4.3	9.5	-4.6	-1.3	3.5	3.6	4.5
Spain	0.7	3.2	5.3	7.9	6.8	7.3	4.6	3.0	1.0	-3.3	1.5	3.1	1.9	3.5	5.7	5.6	4.2	2.7	2.0	3.2
Sweden	0.9	4.3	3.0	4.3	3.0	3.7	0.7	-1.6	-1.9	-4.6	3.0	1.9	0.7	0.9	4.3	3.4	3.2	1.0	1.5	2.3
Switzerland	0.6	1.9	4.5	2.0	2.6	4.1	3.9	-0.6	-2.7	-1.0	2.7	1.8	0.4	1.3	4.3	1.5	2.7	1.8	1.1	2.3
Turkey	3.7	3.2	7.0	8.9	-1.3	1.5	14.6	-0.6	5.6	14.2	-12.5	11.4	7.6	9.0	0.6	-3.7	9.6	-14.3	3.2	5.6
United Kingdom	1.4	3.1	4.7	4.6	8.1	2.9	-0.3	-2.5	0.9	2.2	3.8	2.0	3.1	3.9	5.1	3.4	3.4	2.8	1.8	2.7
United States	3.2	4.2	3.6	3.1	3.2	2.9	1.4	-1.1	3.1	3.2	4.4	2.5	3.7	4.7	5.4	5.0	4.8	1.1	0.7	3.9
Euro area	1.8	2.2	3.3	3.4	4.2	3.9	3.7	2.3	1.4	-2.1	2.1	2.0	1.1	1.8	3.6	3.2	2.9	1.2	1.5	2.9
European Union	1.7	2.4	3.7	3.7	4.8	3.7	2.9	1.5	1.3	-1.6	2.4	2.1	1.4	2.3	3.9	3.2	3.0	1.4	1.6	2.8
Total OECD	2.8	3.6	3.5	3.9	4.6	4.0	3.1	0.9	2.1	1.2	3.1	2.3	3.2	3.4	3.1	3.8	3.8	0.7	1.0	3.0

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) Average 1975-84 in the case of Australia.

Source: OECD.

Annex Table 9. **Real exports of goods and services**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	4.7	11.1	4.3	12.2	3.5	2.9	8.5	13.1	5.4	8.0	9.0	5.0	10.6	11.5	-0.2	4.6	10.5	1.8	3.0	7.0
Austria	5.4	7.1	-2.3	3.1	10.2	9.7	7.8	5.2	1.5	-1.4	5.6	3.0	5.2	12.4	7.9	8.7	12.2	5.3	3.8	7.0
Belgium	2.9	0.3	2.8	5.0	9.6	8.3	4.6	3.1	3.6	-0.4	8.4	5.7	2.9	6.1	5.8	5.0	9.7	2.1	3.0	7.0
Canada	5.3	4.8	4.3	2.9	8.9	1.0	4.7	1.8	7.2	10.8	12.7	8.5	5.6	8.3	8.9	9.9	7.6	-2.7	0.7	7.5
Czech Republic	..	..	..	..	..	..	..	..	..	..	0.2	16.7	8.2	9.2	9.1	6.3	18.7	9.3	7.0	10.0
Denmark	4.0	5.0	0.0	5.1	7.8	4.2	6.2	6.1	-0.9	-1.5	7.0	2.9	4.3	4.1	2.4	9.7	11.6	4.2	3.3	6.7
Finland	5.2	0.7	0.7	2.9	3.5	1.6	1.2	-7.3	10.3	16.7	13.1	8.6	5.8	14.1	8.9	6.8	18.1	-3.7	1.0	6.4
France	4.4	2.2	-0.8	2.8	8.5	10.8	4.9	5.4	5.2	-0.1	7.9	7.8	3.1	12.1	8.2	3.9	13.4	2.6	1.6	7.6
Germany	3.7	7.6	-0.6	0.4	5.5	10.2	11.0	12.6	-0.8	-5.5	7.6	5.7	5.1	11.2	6.8	5.6	13.2	5.1	3.0	7.0
Greece	6.5	1.8	16.8	5.9	-2.1	1.9	-3.5	4.1	10.0	-2.6	7.4	3.0	3.5	20.0	5.3	8.1	18.9	5.7	4.3	8.2
Hungary	..	..	..	..	..	..	..	..	..	..	13.7	13.4	8.4	26.4	16.7	13.1	21.8	10.7	3.7	6.6
Iceland	5.4	11.1	5.9	3.3	-3.6	2.9	0.0	-5.9	-1.9	7.0	9.9	-2.1	9.9	5.7	2.1	4.8	6.3	5.5	..	6.5
Ireland	8.9	6.6	2.9	13.7	9.0	10.3	8.7	5.7	13.9	9.7	15.1	20.0	12.2	17.4	21.4	15.7	17.3	5.1	1.2	8.8
Italy	4.5	3.9	0.8	4.5	5.1	7.8	7.5	-1.4	7.3	9.0	9.8	12.6	0.6	6.4	3.6	0.0	10.2	5.9	2.2	6.9
Japan	7.8	5.5	-5.5	-0.5	5.9	9.1	7.0	4.1	3.9	-0.1	3.5	4.1	6.5	11.2	-2.3	1.4	12.1	-5.8	-0.8	8.2
Korea	14.5	4.6	26.5	21.7	12.5	-4.1	3.8	11.2	11.3	11.3	16.1	24.6	11.2	21.4	14.1	15.8	21.6	1.4	3.2	10.8
Luxembourg	1.5	9.5	3.3	4.4	11.7	8.1	3.4	6.7	4.8	2.8	4.4	4.4	5.4	13.4	12.9	13.3	16.4	6.3	4.5	8.5
Mexico	10.3	-4.5	4.5	9.5	5.8	5.7	5.3	5.1	5.0	8.1	17.8	30.2	18.2	10.7	12.1	12.4	16.0	-3.2	0.7	7.5
Netherlands	2.9	5.1	1.8	4.0	9.0	6.6	5.3	4.7	2.9	1.5	6.7	7.1	4.6	8.8	7.4	5.4	9.5	2.5	3.4	7.5
New Zealand	5.3	8.0	-0.4	5.6	6.1	-1.4	4.9	10.8	3.7	4.6	10.0	3.8	3.6	3.7	1.2	7.1	7.6	4.2	1.3	8.0
Norway	5.0	7.2	2.2	1.1	6.4	11.0	8.6	6.1	5.2	3.5	8.7	4.3	9.3	6.1	0.3	2.8	2.7	2.2	1.9	3.2
Poland	..	..	..	..	..	..	..	..	..	..	13.1	22.8	12.0	14.5	17.0	-3.2	32.9	12.5	8.5	11.1
Portugal	5.3	6.7	6.8	11.2	8.2	13.0	10.0	2.6	4.9	-3.6	8.7	9.1	7.1	7.2	7.7	3.4	6.6	3.4	3.3	7.6
Slovak Republic	..	..	..	..	..	..	..	..	..	..	14.2	3.0	0.7	17.6	12.2	3.4	15.9	10.0	7.5	9.6
Spain	7.3	0.7	0.2	5.3	3.8	1.4	4.7	8.2	7.5	7.8	16.7	9.4	10.4	15.3	8.2	7.6	9.6	4.3	3.8	7.4
Sweden	3.5	1.2	3.4	4.3	2.8	3.2	1.8	-1.9	2.2	8.3	14.1	11.3	3.5	13.7	8.4	5.9	9.8	-1.1	1.2	8.2
Switzerland	3.1	8.0	-0.4	2.3	6.5	6.6	2.1	-2.1	3.0	1.5	1.8	1.6	2.5	8.6	5.0	5.9	11.4	0.3	1.0	5.2
Turkey	12.2	-1.9	-5.1	26.4	18.4	-0.3	2.6	3.7	11.0	7.7	15.2	8.0	22.0	19.1	12.0	-7.0	19.3	5.0	7.0	12.0
United Kingdom	2.6	6.0	4.5	6.0	0.6	4.5	5.4	-0.1	4.3	4.4	9.2	9.0	8.2	8.3	3.0	5.4	10.2	3.6	3.4	7.3
United States	3.7	2.7	7.4	11.2	16.1	11.8	8.7	6.5	6.2	3.3	8.9	10.3	8.2	12.3	2.1	3.2	9.5	-3.9	-2.1	7.8
Total OECD	5.4	3.8	3.4	7.1	9.9	8.4	7.2	5.5	5.2	3.1	8.9	9.6	7.4	11.7	4.2	4.2	11.7	-0.5	0.6	7.8

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

Source: OECD.

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Annex Table 10. **Real imports of goods and services**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	3.0	3.5	-3.3	2.7	17.1	20.6	-4.0	-2.4	7.1	4.2	14.3	7.9	8.3	10.5	6.0	9.2	7.1	-2.9	5.4	7.0
Austria	4.5	6.2	-2.9	5.4	10.4	8.0	6.9	5.8	1.4	-1.1	8.2	5.6	4.9	12.0	5.9	8.8	11.1	4.6	3.3	6.3
Belgium	2.0	0.4	4.5	6.7	10.4	9.6	4.8	2.9	4.1	-0.4	7.3	4.9	2.5	5.1	7.5	4.1	9.7	2.4	3.2	7.2
Canada	4.4	8.3	7.2	5.3	13.5	5.9	2.0	2.5	4.7	7.4	8.0	5.7	5.1	14.2	4.9	7.3	8.1	-4.4	2.3	8.0
Czech Republic	..	..	..	..	..	..	..	..	..	..	7.6	21.2	13.4	8.1	6.5	5.4	18.7	10.7	7.2	9.9
Denmark	1.7	8.1	6.8	-2.0	1.5	4.1	1.2	3.0	-0.4	-2.7	12.3	7.3	3.5	10.0	7.4	2.2	10.8	1.8	2.9	6.1
Finland	2.4	6.2	1.5	9.2	10.9	9.0	-0.8	-13.5	0.6	1.3	12.8	7.8	6.4	11.3	8.5	4.0	15.7	-2.2	1.3	4.2
France	2.9	4.7	6.3	7.5	8.5	8.4	5.3	2.6	1.7	-3.9	8.6	7.8	1.4	7.2	11.9	4.2	15.2	1.6	1.7	8.0
Germany	3.5	4.5	2.7	4.2	5.1	8.3	10.3	13.1	1.5	-5.5	7.4	5.6	3.1	8.3	8.9	8.5	10.0	2.9	3.6	6.7
Greece	4.8	4.4	13.9	2.1	7.3	10.5	8.4	5.8	1.1	0.6	1.5	8.9	7.0	14.2	9.2	3.6	15.0	5.2	4.5	7.1
Hungary	..	..	..	..	..	..	..	..	..	..	8.8	-0.7	6.2	24.6	22.8	12.3	21.1	9.8	3.5	6.8
Iceland	1.5	9.4	0.9	23.3	-4.6	-10.3	1.0	5.3	-5.9	-7.7	4.2	4.0	16.7	8.5	23.3	5.7	9.3	-3.0	-5.0	4.0
Ireland	5.2	3.2	5.6	6.2	4.9	13.5	5.1	2.4	8.2	7.5	15.5	16.4	12.5	16.8	25.8	11.9	16.0	4.8	1.0	9.3
Italy	3.0	5.3	4.0	12.2	5.9	8.9	11.5	2.3	7.4	-10.9	8.1	9.7	-0.3	10.1	9.0	5.1	8.3	3.6	2.7	6.5
Japan	1.6	-2.5	3.2	11.3	19.5	15.7	7.0	-1.1	-0.7	-1.4	7.8	12.8	13.2	1.2	-6.8	3.0	9.9	-1.8	-7.9	3.5
Korea	10.6	-0.6	17.9	19.6	12.9	16.3	13.0	19.2	5.3	6.2	21.6	22.4	14.2	3.2	-22.1	28.8	20.0	-3.4	2.5	10.0
Luxembourg	1.9	7.0	3.8	7.5	8.2	6.6	4.5	9.0	-0.8	2.8	-0.1	3.8	6.1	11.8	11.5	15.6	13.8	6.8	4.9	7.6
Mexico	0.8	11.0	-7.6	5.1	36.7	18.0	19.7	15.2	19.6	1.9	21.3	-15.0	22.9	22.7	16.6	13.8	21.4	-2.4	2.2	8.7
Netherlands	2.3	6.3	3.5	4.2	7.6	6.7	4.2	4.1	2.1	-2.1	6.7	7.2	4.4	9.5	8.5	6.3	9.4	2.4	3.7	8.0
New Zealand	0.0	0.6	2.8	8.6	-0.9	13.5	3.6	-5.2	8.3	5.3	13.1	9.0	7.7	2.4	1.4	11.7	1.1	-0.4	1.1	7.5
Norway	2.1	8.9	11.8	-6.5	-2.4	2.2	2.5	0.2	0.7	4.4	4.9	5.6	8.0	11.3	8.0	-1.6	2.5	1.1	1.0	4.1
Poland	..	..	..	..	..	..	..	..	..	..	11.2	24.3	28.0	23.9	19.1	1.1	23.1	7.0	6.8	9.3
Portugal	0.0	1.4	16.9	23.1	18.0	6.1	14.0	7.3	10.7	-3.3	9.0	7.8	4.9	10.0	13.8	8.9	5.1	2.6	3.3	6.8
Slovak Republic	..	..	..	..	..	..	..	..	..	..	-3.4	9.2	17.2	13.1	19.8	-6.0	10.2	11.0	8.0	10.0
Spain	1.5	7.5	17.2	24.8	16.1	17.7	9.6	10.3	6.8	-5.2	11.4	11.1	8.0	13.2	13.3	12.8	9.8	4.2	3.7	7.3
Sweden	1.3	8.0	3.8	7.6	4.5	7.7	0.7	-4.9	1.5	-2.2	12.2	7.2	3.0	12.5	11.2	4.3	9.7	-2.3	1.0	7.6
Switzerland	3.7	3.7	8.1	6.2	5.2	5.9	2.6	-1.6	-4.2	0.1	7.9	5.1	2.7	7.6	9.6	5.3	10.6	0.7	1.1	5.6
Turkey	8.8	-6.6	-3.5	23.0	-4.5	6.9	33.0	-5.2	10.9	35.8	-21.9	29.6	20.5	22.4	2.3	-3.7	25.4	-19.0	9.0	13.0
United Kingdom	2.8	2.5	6.9	7.9	12.8	7.4	0.5	-4.5	6.8	3.3	5.7	5.4	9.6	9.7	9.6	8.9	10.7	4.8	3.3	7.1
United States	5.6	6.5	8.4	6.1	3.8	3.9	3.8	-0.5	6.6	9.1	12.0	8.2	8.6	13.7	11.8	10.5	13.4	-2.9	-1.5	7.4
Total OECD	4.2	4.2	6.1	8.3	9.4	8.7	6.4	2.1	4.9	2.9	9.8	8.8	8.6	10.6	7.3	8.3	12.4	-0.7	0.0	7.0

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

Source: OECD.

Annex Table 11. **Output gaps**

Deviations of actual GDP from potential GDP as a percentage of potential GDP

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	-1.2	0.5	-1.2	-0.1	0.6	1.0	-1.3	-4.7	-4.8	-3.5	-1.6	-1.0	-0.2	-0.5	0.8	1.3	0.7	-0.8	-0.9	-0.3
Austria	-2.5	-2.5	-2.1	-2.3	-1.2	0.8	2.5	2.6	2.4	-0.6	-0.3	-0.8	-0.8	-0.8	0.4	0.7	1.2	-0.1	-1.0	-0.6
Belgium	-2.5	-2.0	-1.8	-0.5	2.3	4.1	4.8	4.1	3.1	-0.8	-0.8	-0.5	-1.7	-0.6	-0.7	-0.2	1.3	-0.1	-1.1	-0.8
Canada	-2.2	0.3	0.6	2.1	4.1	3.5	0.9	-3.8	-5.1	-4.9	-2.9	-2.7	-3.9	-2.9	-2.2	-0.2	1.7	0.2	-1.3	-0.4
Denmark	-0.6	1.5	3.0	1.3	-0.2	-2.0	-3.2	-3.6	-4.3	-5.8	-2.8	-2.2	-1.6	-0.7	-0.1	-0.2	0.6	-0.4	-1.2	-1.1
Finland	-1.2	-0.9	-1.1	0.5	2.7	5.1	3.3	-4.2	-8.2	-10.4	-8.3	-6.5	-5.0	-2.3	-0.7	-0.3	2.2	-0.5	-2.5	-2.3
France	-4.0	-4.3	-3.8	-3.1	-1.1	0.9	1.5	0.6	0.1	-2.4	-2.1	-2.1	-2.8	-2.8	-1.4	-0.6	0.6	0.4	-0.4	0.2
Germany	-2.8	-2.1	-1.1	-1.1	0.8	1.8	4.6	2.0	0.9	-2.0	-1.3	-1.1	-1.8	-1.9	-1.5	-1.3	0.0	-1.1	-2.0	-0.9
Greece	-3.2	-1.6	-1.2	-2.6	0.5	1.4	0.0	0.8	-0.5	-3.7	-3.4	-3.3	-3.2	-1.9	-3.5	-2.8	-0.6	0.3	0.7	1.2
Iceland	-1.7	-1.3	2.1	7.3	3.7	1.5	0.7	-1.0	-5.9	-6.5	-3.5	-4.5	-1.5	0.8	1.7	2.2	3.6	2.4	-0.2	0.8
Ireland	-2.3	-2.0	-5.2	-4.3	-2.7	-0.6	2.9	-0.2	-2.2	-4.6	-4.8	-2.3	-2.0	0.4	0.1	2.2	6.0	4.0	0.0	-1.2
Italy	-2.3	-1.8	-1.4	-0.7	1.1	1.8	1.5	0.7	-0.7	-3.0	-2.2	-0.6	-1.3	-1.4	-1.8	-2.3	-1.6	-1.9	-2.7	-1.9
Japan	-1.8	-1.9	-2.9	-2.6	-0.4	1.0	3.1	3.0	1.1	-0.6	-1.2	-1.4	0.6	1.5	-0.7	-1.0	-0.6	-2.3	-3.9	-4.0
Netherlands	-2.3	-0.7	-0.3	-1.1	-1.1	0.9	2.6	2.1	1.4	-0.2	0.6	0.3	0.4	0.7	1.4	1.8	1.9	0.3	-0.8	-0.7
New Zealand	3.2	2.8	2.5	1.5	-0.4	-0.8	-2.6	-5.4	-5.5	-2.2	1.0	1.6	1.5	0.7	-2.0	-0.5	0.6	0.3	-0.6	0.3
Norway [a]	-1.1	2.3	2.7	2.0	-1.0	-3.9	-3.5	-3.4	-2.8	-2.2	-0.7	-0.3	0.8	2.1	3.0	1.3	0.4	-0.2	-0.8	-0.3
Portugal	-7.1	-7.1	-6.1	-3.4	0.5	2.2	3.3	2.7	2.4	-1.4	-1.9	-1.8	-1.0	-0.2	0.6	0.8	1.0	-0.3	-1.5	-1.8
Spain	-4.8	-4.0	-4.0	-1.6	0.9	2.3	3.0	2.5	0.4	-3.4	-3.8	-4.3	-5.3	-4.3	-2.6	-1.0	0.2	-0.1	-0.8	-0.2
Sweden	-0.7	-0.2	1.0	2.5	3.4	4.0	3.2	0.1	-3.4	-6.0	-3.8	-2.2	-3.0	-3.1	-2.0	-0.5	0.2	-1.0	-1.8	-1.2
Switzerland	-0.6	1.3	0.9	-0.4	0.4	2.9	4.2	0.8	-1.0	-2.3	-2.7	-2.7	-3.2	-2.3	-0.9	-1.4	-0.6	-0.5	-0.9	-0.3
United Kingdom	-4.4	-2.7	-0.4	1.8	4.5	4.4	2.6	-1.7	-3.9	-4.0	-2.0	-1.5	-1.3	-0.4	0.0	-0.5	0.1	-0.1	-0.7	-0.4
United States	-1.3	-0.7	-0.6	-0.2	1.0	1.7	0.5	-2.5	-1.8	-1.8	-0.6	-0.8	-0.4	0.4	1.1	1.4	1.9	-0.5	-2.6	-1.8
Total of above Euro area countries	-2.9	-2.4	-1.9	-1.4	0.5	1.8	2.9	1.4	0.3	-2.4	-1.9	-1.6	-2.2	-1.9	-1.3	-0.9	0.2	-0.5	-1.4	-0.8
Total of above European Union countries	-3.3	-2.6	-1.8	-0.9	1.0	2.1	2.7	0.9	-0.5	-2.8	-2.0	-1.6	-2.0	-1.7	-1.2	-0.9	0.1	-0.5	-1.3	-0.7
Total of above OECD countries	-2.1	-1.5	-1.3	-0.8	0.9	1.8	1.7	-0.4	-1.0	-2.2	-1.3	-1.3	-1.0	-0.4	-0.2	0.1	0.8	-0.8	-2.2	-1.6

Note: Potential output for all countries except Portugal is calculated using the "production function method" described in Giorno et al, "Potential Output, Output Gaps, and Structural Budget Balances", *OECD Economic Studies*, No. 24, 1995/I. Using this methodology, two broad changes have been made to the calculation of potential output since the last *OECD Economic Outlook* . First, the "smoothing parameters" applied in the calculations have been standardised across the OECD countries. Second, as was previously the case for the major seven economies only, the calculations now incorporate trend working hours for other Member economies also, excepting Austria and Portugal where the data span is insufficient. Potential output for Portugal is calculated using a Hodrick-Prescott filter of actual output. See also *OECD Economic Outlook* Sources *and Methods (http://www.oecd.org/eco/sources-and-methods).*

a) Mainland Norway.

Source: OECD.

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Annex Table 12. **Compensation per employee in the business sector**

Percentage change from previous period

	Average 1974-84 [a]	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	9.4	5.0	6.7	5.5	6.5	7.7	8.3	2.4	3.8	3.4	0.9	3.1	6.4	3.3	2.7	2.4	3.6	4.4	3.7	3.8
Austria	7.7	5.5	5.7	4.1	4.2	4.5	5.2	6.0	5.5	4.3	3.7	3.5	0.8	2.3	2.7	1.5	2.4	2.7	2.1	2.9
Belgium	9.6	6.7	4.3	2.5	2.8	3.0	8.2	6.9	5.5	2.8	3.3	2.3	1.6	3.0	1.8	3.4	3.5	3.5	3.3	3.2
Canada	8.8	5.5	2.9	6.9	7.1	4.9	5.0	4.9	3.2	2.3	0.5	2.3	2.9	5.9	2.5	3.9	3.1	2.5	3.2	3.2
Czech Republic	..	..	..	..	..	..	..	..	..	..	17.1	17.1	17.5	8.2	4.8	4.9	7.0	7.4	6.7	6.6
Denmark	10.5	4.9	5.1	7.4	11.3	4.7	4.1	4.0	4.4	2.5	3.2	3.4	2.9	3.8	3.7	3.8	4.0	3.9	3.6	3.7
Finland	12.9	10.4	7.4	8.0	9.6	10.3	9.3	4.9	1.8	1.3	4.6	4.1	2.1	2.8	4.4	2.2	4.3	4.1	4.1	4.0
France	13.1	5.6	4.1	4.7	4.2	4.0	3.6	4.5	4.0	2.1	1.4	1.1	2.1	1.9	1.5	2.4	1.8	2.4	2.7	2.7
Germany	5.8	3.1	3.7	3.3	3.2	3.0	4.2	4.8	10.4	3.7	3.0	3.3	1.0	0.7	1.0	1.0	1.3	2.2	2.7	2.7
Greece	21.8	21.9	12.9	10.7	17.3	22.5	16.3	16.3	12.7	8.7	11.7	12.4	10.6	11.3	4.7	4.6	5.4	5.5	5.8	5.7
Hungary	..	..	..	..	..	..	..	..	..	..	..	25.1	23.9	21.3	16.6	11.6	13.0	13.7	8.7	7.9
Iceland	44.0	39.9	29.1	44.3	28.3	13.2	16.9	25.5	2.8	-3.3	4.3	7.6	5.2	2.5	7.4	4.5	5.5	6.1	6.2	5.1
Ireland	17.5	4.1	6.2	6.1	5.3	6.8	3.3	3.2	7.8	4.9	1.7	2.9	1.8	6.0	0.3	5.6	8.6	8.0	7.5	6.5
Italy	18.5	10.3	6.9	7.4	7.3	9.1	8.1	9.0	6.2	5.2	3.1	4.8	4.8	3.2	-0.9	2.3	2.6	3.1	2.8	2.9
Japan	7.2	3.4	2.5	2.0	3.0	3.8	4.1	4.4	0.8	0.6	1.4	1.0	0.2	1.6	-0.8	-1.1	0.1	-0.8	-1.3	-0.4
Korea	19.9	4.9	10.5	10.2	17.5	10.0	16.3	19.1	11.1	10.8	11.2	15.0	11.2	3.4	2.0	1.9	8.0	6.2	5.6	6.1
Luxembourg	6.9	5.0	4.4	2.4	3.7	7.9	4.8	5.1	6.4	4.9	4.9	1.3	0.9	2.7	2.9	4.1	5.7	5.3	5.1	4.6
Mexico	..	..	..	..	..	26.9	27.9	29.9	24.1	15.2	11.4	17.6	23.1	21.0	18.0	13.5	11.5	9.0	6.5	6.0
Netherlands	6.6	1.8	2.7	1.5	1.3	0.9	3.3	4.5	4.2	3.0	2.8	1.3	1.7	0.9	3.7	3.0	4.9	4.9	4.3	3.8
New Zealand	12.2	12.3	18.8	14.2	11.2	6.9	0.9	1.3	1.1	1.9	1.9	-0.2	1.7	2.6	1.1	2.9	3.9	3.8	3.2	3.1
Norway	9.8	7.1	9.8	9.1	8.5	4.6	5.1	5.5	4.4	2.2	2.9	2.9	2.5	2.4	7.7	5.7	4.2	4.8	5.0	5.0
Poland	..	..	..	..	..	..	..	..	..	..	45.1	30.8	29.4	20.5	15.3	14.0	9.7	8.0	6.3	5.4
Portugal	22.2	19.3	18.8	13.7	9.4	12.8	17.3	18.4	15.7	6.7	5.8	6.3	5.5	5.0	4.5	4.2	5.8	5.9	5.3	5.1
Spain	21.3	8.7	8.7	1.9	5.6	6.7	10.6	11.7	11.7	10.3	4.2	3.7	4.4	3.4	2.5	2.9	3.7	4.4	3.5	3.4
Sweden	11.4	8.5	8.3	7.5	8.1	12.3	9.8	6.2	3.2	8.5	5.7	2.4	6.2	3.5	4.1	0.9	7.6	4.5	4.6	4.8
Switzerland	5.1	4.1	4.2	3.3	3.6	4.6	5.2	6.5	4.6	2.0	2.4	2.8	0.7	3.9	1.0	1.9	1.4	2.8	2.4	2.2
United Kingdom	14.2	5.9	8.4	4.8	6.8	9.1	10.1	8.5	5.1	3.6	4.4	3.2	3.0	3.9	6.0	4.8	4.0	4.9	4.4	4.3
United States	7.7	4.0	3.9	4.5	4.8	3.2	4.9	3.9	5.7	2.8	2.3	1.9	2.5	3.2	5.0	4.3	5.6	5.5	3.3	3.0
Euro area	12.0	6.6	5.8	4.6	4.5	5.8	5.5	6.5	8.1	5.5	3.3	3.8	1.9	1.7	1.1	1.6	1.9	2.8	3.0	3.0
European Union	13.0	6.7	6.2	4.8	5.5	6.3	7.0	7.2	7.2	4.4	3.4	3.3	2.9	2.6	2.1	2.6	2.9	3.5	3.3	3.3
Total OECD	10.6	5.7	5.3	5.2	6.3	8.1	8.1	8.6	7.0	4.8	4.8	5.2	4.8	4.8	4.8	4.2	4.7	4.6	3.5	3.2
Memorandum item																				
OECD less high inflation countries [b]	10.0	5.0	4.8	4.6	5.3	4.8	6.0	5.7	5.5	3.3	2.8	2.8	2.7	2.9	2.8	2.7	3.7	3.7	2.7	2.8

Note: The business sector is in the OECD terminology defined as total economy less the public sector. Hence business sector employees are defined as total employees less public sector employees. See also *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) Average 1975-84 in the case of Korea.

b) High inflation countries are defined as countries which have had 10 per cent or more inflation in terms of the GDP deflator on average during the last 10 years based on historical data. Consequently, Hungary, Mexico, Poland and Turkey are excluded from the aggregate.

Source: OECD.

Annex Table 13. **Labour productivity in the business sector**

Percentage change from previous period

	Average 1974-84[a]	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	1.9	1.9	-2.3	3.0	0.8	-0.4	-0.3	1.6	3.6	4.1	1.5	-0.1	3.1	2.8	4.1	2.3	0.4	0.7	1.7	2.2
Austria	2.4	2.3	2.2	2.0	3.0	3.5	3.6	2.2	2.4	1.2	3.2	2.0	3.0	1.9	3.1	1.6	2.4	0.8	1.9	2.7
Belgium	2.7	1.6	1.3	2.7	3.5	2.7	2.2	1.3	1.9	-1.2	3.1	2.0	0.8	3.4	1.2	1.8	2.7	0.0	0.8	2.1
Canada	0.8	1.9	-0.8	1.7	1.8	0.5	0.3	-0.2	2.1	1.8	2.9	0.8	0.6	1.9	1.3	2.6	2.1	0.1	0.4	2.2
Czech Republic	..	..	..	..	..	..	..	..	..	..	1.5	5.6	4.4	-0.3	0.1	2.1	4.0	2.8	2.9	3.9
Denmark	2.4	1.3	0.1	0.7	-0.5	2.0	0.5	2.1	1.3	3.0	7.6	0.5	1.9	1.8	3.2	1.5	3.0	1.4	1.7	2.5
Finland	2.8	3.8	3.5	4.6	4.6	5.2	0.6	-0.3	5.5	6.6	6.6	2.6	3.0	3.4	3.2	1.1	4.3	-1.1	0.7	2.5
France	2.6	2.1	2.3	2.7	3.5	3.2	1.9	1.5	2.7	0.8	2.2	1.0	1.2	1.4	2.3	1.3	1.0	0.1	1.5	2.6
Germany	2.3	1.5	1.1	0.9	3.3	5.1	2.8	2.6	4.3	0.2	2.7	1.5	1.1	1.6	0.8	0.5	1.4	0.7	1.4	2.6
Greece	1.6	1.7	0.2	-2.4	2.9	3.9	-1.5	6.4	-0.9	-2.7	0.1	1.2	3.1	4.9	-0.9	4.8	5.2	3.9	3.5	3.5
Hungary	..	..	..	..	..	..	..	..	..	..	..	3.6	1.4	4.2	3.4	-0.3	4.3	3.4	2.8	3.3
Iceland	2.3	-0.7	3.5	3.1	4.0	2.1	2.7	1.0	-1.9	1.6	4.7	-1.0	3.2	3.3	1.2	1.1	3.9	1.0	-0.2	2.1
Ireland	4.2	3.0	0.1	4.8	6.5	6.9	4.4	2.5	3.3	1.3	2.7	5.4	4.0	7.6	-1.8	4.7	7.0	3.8	2.9	4.6
Italy	2.0	2.4	1.9	2.9	3.3	2.9	1.1	0.7	1.6	2.5	3.8	3.3	0.8	1.7	0.7	0.8	1.5	1.0	0.9	1.7
Japan	2.7	4.0	2.1	3.7	5.0	3.5	3.8	1.3	-0.2	0.2	1.0	1.3	3.0	0.8	-0.8	1.3	1.7	-0.5	-0.4	0.9
Korea	6.0	3.0	8.8	6.4	8.8	2.4	5.1	6.4	3.8	4.2	5.5	6.5	5.1	3.9	-1.5	10.2	5.0	1.0	3.2	5.0
Luxembourg	..	..	..	..	..	..	..	2.2	1.9	7.5	1.8	1.4	0.9	6.4	1.6	1.1	1.8	-1.1	0.4	1.8
Mexico	..	..	..	..	..	1.3	2.3	1.5	-0.3	-2.0	1.2	-6.5	0.9	0.5	1.5	2.7	2.3	-0.5	-0.2	1.5
Netherlands	2.1	1.2	0.6	-0.5	0.9	2.9	1.8	0.8	0.8	0.7	3.9	0.9	0.4	0.5	1.5	1.3	1.2	-0.3	0.6	1.9
New Zealand	0.2	-2.7	2.0	0.1	3.4	3.9	-1.3	-0.7	-0.2	2.8	1.2	-1.4	-0.1	1.9	0.6	2.7	2.4	0.5	1.4	2.6
Norway	1.9	4.0	-1.3	-0.4	-0.3	2.0	2.9	3.8	3.3	4.0	2.5	0.1	1.2	0.9	1.5	1.1	1.5	1.1	1.4	2.3
Poland	..	..	..	..	..	..	..	..	..	..	8.8	7.1	5.5	6.1	4.0	9.2	6.5	3.5	3.9	3.7
Portugal	0.8	3.8	4.6	4.2	5.5	3.8	2.3	-2.6	2.9	-1.9	4.0	4.4	3.8	2.3	1.3	1.6	1.6	0.9	0.9	1.6
Spain	3.0	3.7	1.2	2.7	2.4	0.9	1.3	2.7	3.4	4.0	3.8	1.1	1.3	1.0	0.4	0.5	1.1	1.3	1.7	1.6
Sweden	1.5	1.4	2.5	2.7	1.4	1.4	0.1	0.5	3.5	6.3	5.6	2.2	1.7	3.5	2.6	1.8	0.6	0.0	2.2	3.2
Switzerland	0.4	1.9	-0.9	-1.7	0.7	0.1	0.5	-3.6	1.0	0.1	2.3	0.1	-0.2	2.4	1.3	0.7	2.0	1.2	1.0	1.6
United Kingdom	2.4	2.0	4.9	1.1	0.0	-0.8	0.3	1.5	2.8	2.3	3.2	1.0	0.8	0.7	1.6	0.8	1.9	1.5	1.6	2.4
United States	1.3	1.2	1.7	0.7	1.1	1.2	0.6	0.4	3.7	0.9	1.3	0.4	1.8	2.2	2.2	2.4	2.5	0.9	1.4	2.6
Euro area	2.4	2.3	1.7	2.0	3.3	2.8	1.9	..	2.9	1.1	3.1	1.8	1.2	1.8	1.1	0.8	1.4	0.5	1.3	2.3
European Union	2.3	2.1	2.1	1.8	2.6	2.7	1.6	1.7	2.8	1.5	3.2	1.7	1.2	1.6	1.3	1.0	1.6	0.8	1.4	2.3
Total OECD	2.0	2.1	2.0	1.9	2.5	2.0	1.7	1.1	2.7	1.4	2.0	1.2	1.9	2.0	1.3	1.9	2.3	0.6	1.2	2.3
Memorandum item																				
OECD less high inflation countries[b]	2.0	2.1	1.9	1.8	2.5	2.1	1.6	1.2	2.7	1.2	2.2	1.2	1.8	1.8	1.3	2.0	2.1	0.6	1.2	2.3

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) Average 1975-84 in the case of Korea.

b) High inflation countries are defined as countries which have had 10 per cent or more inflation in terms of the GDP deflator on average during the last 10 years based on historical data. Consequently, Hungary, Mexico, Poland and Turkey are excluded from the aggregate.

Source: OECD.

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Annex Table 14. **GDP deflators**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	10.2	5.6	6.5	7.9	8.5	7.1	4.9	2.3	1.3	1.2	1.3	1.4	2.3	1.8	0.1	0.9	3.9	3.6	2.3	2.5
Austria	5.2	3.1	2.7	2.1	1.6	2.9	3.3	3.8	3.6	2.9	2.7	2.5	1.3	0.9	0.5	0.7	1.2	2.0	1.8	1.9
Belgium	6.4	4.3	2.9	1.4	2.3	4.9	3.0	2.7	3.6	3.7	1.8	1.8	1.2	1.3	1.6	1.2	1.4	2.5	2.1	1.9
Canada	8.1	3.1	3.0	4.6	4.5	4.6	3.2	3.0	1.4	1.4	1.2	2.3	1.7	1.1	-0.4	1.4	3.7	2.6	1.3	1.7
Czech Republic	..	..	..	..	..	..	..	..	..	..	11.0	10.2	8.8	8.0	10.7	3.1	0.9	4.5	3.8	3.0
Denmark	9.0	4.3	4.6	4.7	3.4	5.2	3.6	2.8	2.9	1.4	1.7	1.8	2.5	2.2	1.9	3.0	3.7	3.2	1.7	1.8
Finland	9.9	5.5	4.3	4.2	8.1	6.1	5.4	1.8	0.9	2.3	2.0	4.1	-0.2	2.1	3.0	-0.1	3.4	2.1	1.6	2.0
France	10.4	5.5	5.2	2.8	3.2	3.3	2.9	3.0	2.0	2.4	1.8	1.7	1.4	1.2	0.9	0.3	0.8	1.7	1.8	1.4
Germany	4.0	2.1	3.2	1.9	1.5	2.4	3.2	3.9	5.0	3.7	2.5	2.0	1.0	0.7	1.1	0.5	-0.4	1.4	1.1	0.8
Greece	18.7	19.0	18.9	15.3	16.7	14.5	20.7	19.8	14.8	14.4	11.2	9.8	7.4	6.8	5.2	3.0	3.4	3.8	3.4	3.1
Hungary	..	..	..	..	..	..	..	..	..	..	19.5	25.6	21.2	18.5	12.6	8.4	7.5	9.4	5.8	4.8
Iceland	44.6	31.3	25.5	19.5	22.8	19.8	16.9	7.6	3.7	2.3	1.9	2.7	1.9	3.5	5.2	3.4	3.7	8.5	6.0	4.0
Ireland	14.2	5.2	6.6	2.2	3.2	5.5	-0.7	1.8	2.8	5.2	1.7	3.0	2.2	4.1	5.9	4.2	4.3	4.0	4.6	4.3
Italy	16.6	8.9	7.9	6.2	6.8	6.5	8.2	7.6	4.5	3.9	3.5	5.0	5.3	2.4	2.7	1.6	2.2	3.0	2.8	1.9
Japan	4.5	2.4	1.6	-0.1	0.7	2.0	2.4	3.0	1.7	0.6	0.1	-0.4	-0.8	0.4	-0.1	-1.4	-1.6	-1.6	-1.4	-1.6
Korea	16.6	4.6	4.6	5.0	6.7	5.3	11.1	10.9	7.7	7.0	7.6	7.1	3.9	3.1	5.1	-2.1	-1.5	2.0	2.5	1.0
Luxembourg	6.0	3.0	0.7	2.8	0.6	4.3	5.2	2.3	2.6	0.6	4.7	0.3	1.8	2.8	2.6	2.5	3.7	0.7	1.4	3.5
Mexico	34.9	56.5	73.4	140.7	101.2	26.4	28.1	23.3	14.4	9.5	8.5	38.0	30.6	17.7	15.4	14.8	10.8	6.0	5.3	4.8
Netherlands	5.5	1.8	0.1	-0.7	1.2	1.2	2.3	2.7	2.3	1.9	2.3	1.8	1.2	2.0	1.7	1.7	3.7	5.3	3.3	2.4
New Zealand	13.5	15.4	15.3	13.2	7.5	5.1	3.3	0.5	1.4	3.0	1.1	2.4	2.4	0.2	1.2	-0.4	2.5	4.7	1.2	1.8
Norway	8.7	5.2	-0.9	6.9	5.0	5.7	3.8	2.5	-0.4	1.8	-0.2	3.1	4.3	3.0	-0.7	6.2	16.3	4.3	-0.1	5.1
Poland	..	..	..	..	..	..	..	..	..	..	37.3	27.9	18.7	14.0	11.8	6.9	7.1	5.3	5.7	3.9
Portugal	20.9	21.7	20.5	10.1	11.2	12.4	12.8	12.2	10.0	6.7	6.3	5.1	3.0	3.7	3.8	3.3	3.2	5.0	4.5	3.5
Slovak Republic	..	..	..	..	..	..	..	..	..	..	13.8	9.7	4.5	6.6	5.1	6.6	6.5	5.4	5.3	5.5
Spain	15.6	8.6	10.9	5.9	5.9	6.9	7.3	6.9	6.7	4.5	3.9	4.9	3.5	2.3	2.4	2.9	3.4	4.1	3.1	2.5
Sweden	10.6	6.5	6.5	4.8	6.4	8.0	8.8	7.3	1.0	2.7	2.4	3.5	1.4	1.7	0.9	0.5	0.8	1.7	2.2	2.5
Switzerland	3.6	2.4	3.1	2.7	2.8	3.1	4.3	6.0	2.7	2.7	1.6	1.1	0.4	-0.2	0.0	0.6	1.1	1.8	1.3	1.1
Turkey	40.0	53.1	36.0	33.6	69.3	75.5	58.3	58.8	63.7	67.8	106.5	87.2	77.8	81.5	75.7	55.6	50.7	54.6	54.0	26.2
United Kingdom	12.8	5.6	3.1	5.5	6.1	7.5	7.5	6.6	4.0	2.6	1.4	2.6	3.3	2.9	2.9	2.6	1.7	2.4	2.5	2.5
United States	6.9	3.2	2.2	3.0	3.4	3.8	3.9	3.6	2.4	2.4	2.1	2.2	1.9	1.9	1.2	1.4	2.3	2.1	1.2	1.3
Euro area	9.4	5.4	5.5	3.5	3.8	4.3	4.9	4.9	4.3	3.6	2.8	2.9	2.1	1.6	1.7	1.1	1.3	2.5	2.1	1.6
European Union	10.7	5.9	5.5	4.1	4.5	5.1	5.6	5.4	4.3	3.5	2.7	3.0	2.5	1.9	1.9	1.4	1.5	2.5	2.2	1.8
Total OECD	9.8	6.6	6.2	7.9	7.7	6.0	6.2	5.9	4.5	3.9	4.6	5.2	4.2	3.7	3.2	2.3	2.6	2.9	2.3	1.7
Memorandum item																				
OECD *less* high inflation countries [a]	8.4	4.2	3.6	3.2	3.7	4.2	4.5	4.4	3.1	2.6	2.2	2.3	1.9	1.7	1.4	0.9	1.4	1.8	1.2	1.1

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) High inflation countries are defined as countries which have had 10 per cent or more inflation in terms of the GDP deflator on average during the last 10 years based on historical data. Consequently, Hungary, Mexico, Poland and Turkey are excluded from the aggregate.

Source: OECD.

Annex Table 15. **Private consumption deflators**

Percentage change from previous period

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	10.4	6.7	8.0	8.6	7.5	5.6	6.4	4.4	2.2	2.2	1.2	2.3	1.9	1.6	1.3	0.8	3.2	3.8	2.4	2.8
Austria	5.7	3.3	1.7	0.7	1.7	2.6	3.3	3.5	3.9	3.5	2.8	2.0	1.9	1.5	0.5	0.7	1.5	2.6	1.8	1.9
Belgium	7.1	5.7	-0.1	2.1	1.0	3.9	2.8	2.6	1.9	2.8	2.9	2.6	2.1	1.8	1.2	1.0	2.2	2.4	1.2	1.5
Canada	8.7	4.1	4.3	3.9	3.9	4.4	4.3	5.0	1.7	2.3	1.0	1.3	1.6	1.6	1.1	1.6	2.0	2.2	1.9	1.6
Czech Republic	..	..	..	..	..	..	..	..	..	..	10.7	9.2	8.1	7.4	9.1	3.8	2.8	4.3	4.0	3.7
Denmark	9.6	4.3	2.9	4.6	4.0	4.7	2.9	2.8	1.9	2.0	3.0	1.9	2.1	2.2	1.8	2.6	3.1	2.1	1.7	1.8
Finland	10.4	5.5	2.8	3.1	4.8	5.3	5.5	5.9	4.1	3.9	0.9	0.4	1.4	1.3	1.7	1.1	3.5	2.6	1.7	1.9
France	10.7	6.0	2.8	3.4	2.9	3.9	3.1	3.5	2.5	2.5	2.2	2.0	1.9	1.4	0.6	0.2	1.2	1.7	1.4	1.7
Germany	4.3	1.8	-0.6	0.5	1.3	2.9	2.7	3.7	4.4	3.9	2.6	1.9	1.7	2.0	1.1	0.4	1.4	1.9	1.0	1.1
Greece	17.4	19.6	22.4	17.3	15.1	13.5	19.8	19.7	15.7	14.1	11.0	9.0	8.2	5.6	4.5	2.1	3.1	3.3	2.6	2.7
Hungary	..	..	..	..	..	..	..	..	..	..	19.4	27.7	23.4	18.0	13.3	10.7	9.6	9.0	5.5	4.6
Iceland	46.7	32.6	20.1	15.9	25.4	23.3	16.7	6.7	3.6	3.6	1.4	1.9	2.4	1.9	1.0	2.7	4.9	7.1	5.9	3.6
Ireland	14.4	5.0	4.6	2.4	3.8	4.1	2.1	2.7	3.0	2.2	2.8	2.8	2.6	2.8	3.5	3.4	4.7	4.3	3.5	3.3
Italy	16.1	9.1	6.4	5.2	5.9	6.7	6.4	7.0	5.5	5.5	4.9	6.0	4.4	2.2	2.1	2.1	2.9	2.8	1.7	1.8
Japan	5.7	1.8	0.7	0.4	0.6	2.1	2.6	2.7	1.6	1.0	0.5	-0.3	-0.1	1.0	-0.1	-0.7	-1.1	-1.3	-1.5	-1.5
Korea	15.9	3.9	1.7	3.3	5.6	5.4	9.4	12.1	8.9	8.0	9.7	7.0	5.7	5.5	7.9	0.5	2.0	4.4	3.3	2.5
Luxembourg	7.5	4.3	-2.4	1.0	0.7	2.0	1.6	2.8	2.6	2.5	3.6	1.1	1.8	1.4	1.3	1.4	2.9	2.6	2.5	2.2
Mexico	33.9	59.2	82.0	135.1	109.1	25.0	27.8	24.4	15.4	10.1	7.6	34.1	30.4	16.5	20.7	13.8	8.9	6.5	5.2	4.5
Netherlands	5.7	2.4	0.3	0.2	0.5	1.2	2.2	3.2	3.1	2.1	2.8	1.6	1.9	2.0	1.7	1.9	2.8	4.6	2.4	1.9
New Zealand	13.8	17.3	12.8	13.0	6.3	6.3	5.6	2.2	1.1	1.2	1.1	2.7	2.1	1.2	1.8	0.3	1.9	2.1	1.9	1.6
Norway	9.0	5.9	6.7	7.8	6.1	4.8	4.7	3.8	2.7	1.9	1.2	2.4	1.5	2.5	2.6	2.0	3.1	3.0	1.7	2.5
Poland	..	..	..	..	..	..	..	..	..	..	37.1	27.9	20.0	14.7	11.5	6.9	9.6	5.4	5.0	4.0
Portugal	22.5	19.5	13.8	9.9	11.5	13.1	12.4	12.3	9.7	6.5	5.6	4.5	3.6	2.9	2.6	2.3	2.9	4.3	3.5	3.0
Slovak Republic	..	..	..	..	..	..	..	..	..	..	13.0	10.2	5.2	6.0	6.1	10.2	11.3	7.0	6.0	6.0
Spain	15.8	8.1	9.3	5.5	4.8	6.7	6.6	6.4	6.6	5.3	4.9	4.8	3.5	2.6	2.2	2.4	3.2	3.7	2.5	2.4
Sweden	10.7	6.9	4.6	5.2	5.9	6.8	9.8	10.5	2.1	5.8	2.8	2.9	1.4	2.3	1.0	0.8	0.9	2.6	3.0	2.5
Switzerland	3.7	3.3	1.3	1.5	1.9	2.9	5.2	6.0	4.2	3.4	1.1	1.7	1.1	0.6	-0.2	0.4	0.9	0.8	0.5	0.5
Turkey	38.1	50.9	30.4	48.8	58.9	83.7	59.8	60.7	65.6	65.9	108.9	92.4	67.8	82.1	83.0	59.0	49.5	54.7	53.6	27.2
United Kingdom	12.1	5.2	4.0	4.7	5.2	6.3	7.5	7.9	4.7	3.2	1.9	3.1	3.1	2.3	2.7	1.5	0.6	1.6	2.3	2.3
United States	6.9	3.5	2.4	3.8	3.9	4.4	4.6	3.8	3.1	2.4	2.0	2.3	2.1	1.9	1.1	1.6	2.7	1.8	1.0	1.4
Euro area	9.8	5.7	3.4	3.1	3.4	4.6	4.5	5.0	4.6	4.1	3.4	3.1	2.5	2.0	1.4	1.1	2.1	2.5	1.6	1.7
European Union	10.7	5.9	3.8	3.6	3.9	5.0	5.2	5.7	4.5	4.0	3.2	3.2	2.7	2.1	1.7	1.2	1.9	2.4	1.8	1.8
Total OECD	9.9	6.7	5.8	8.1	7.7	6.3	6.3	6.2	4.9	4.2	4.9	5.3	4.4	4.0	3.5	2.6	2.9	2.8	2.1	1.8
Memorandum item																				
OECD *less* high inflation countries [a]	8.6	4.2	2.9	3.3	3.5	4.3	4.7	4.7	3.5	3.0	2.5	2.4	2.1	2.0	1.4	1.1	1.8	1.7	1.1	1.2

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) High inflation countries are defined as countries which have had 10 per cent or more inflation in terms of the GDP deflator on average during the last 10 years based on historical data. Consequently, Hungary, Mexico, Poland and Turkey are excluded from the aggregate.

Source: OECD.

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Annex Table 16. **Consumer price index**[a]

Percentage change from previous period

	Average 1971-81	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Australia	10.8	11.2	10.1	3.9	6.7	9.1	8.5	7.3	7.5	7.3	3.2	1.0	1.8	1.9	4.6	2.6	0.3	0.9	1.5	4.5
Austria	6.4	5.4	3.3	5.7	3.2	1.7	1.5	1.9	2.6	3.3	3.3	4.0	3.6	3.0	2.2	1.5	1.3	0.9	0.6	2.4
Belgium	7.7	8.7	7.7	6.3	4.9	1.3	1.6	1.2	3.1	3.4	3.2	2.4	2.8	2.4	1.5	2.1	1.6	1.0	1.1	2.5
Canada	9.0	10.8	5.9	4.3	4.0	4.2	4.3	4.0	5.0	4.8	5.6	1.5	1.9	0.2	2.2	1.6	1.6	1.0	1.7	2.7
Czech Republic	..	..	..	..	..	..	..	..	..	..	..	..	..	10.0	9.1	8.8	8.5	10.7	2.1	3.9
Denmark	10.4	10.1	6.9	6.3	4.7	3.7	4.0	4.5	4.8	2.6	2.4	2.1	1.3	2.0	2.1	2.1	2.2	1.8	2.5	2.9
Finland	11.6	9.6	8.4	7.1	5.2	2.9	4.1	5.1	6.6	6.1	4.3	2.9	2.2	1.1	0.8	0.6	1.2	1.4	1.2	3.4
France	10.4	12.0	9.5	7.7	5.8	2.5	3.3	2.7	3.5	3.6	3.2	2.4	2.1	1.7	1.8	2.0	1.2	0.8	0.5	1.7
Germany	5.2	5.2	3.3	2.4	2.1	-0.1	0.2	1.3	2.8	2.7	3.6	5.1	4.4	2.8	1.7	1.4	1.9	0.9	0.6	1.9
Greece	16.4	21.0	20.2	18.5	19.3	23.0	16.4	13.5	13.7	20.4	19.5	15.9	14.4	10.9	8.9	8.2	5.5	4.8	2.6	3.2
Hungary	..	..	..	..	..	..	..	..	..	..	..	..	..	18.9	28.3	23.5	18.3	14.2	10.0	9.8
Iceland[b]	..	50.2	84.0	30.9	32.0	22.1	18.3	25.7	20.8	15.5	6.8	4.0	4.1	1.6	1.7	2.3	1.8	1.7	3.2	5.1
Ireland	14.8	17.1	10.5	8.6	5.5	3.8	3.1	2.1	4.1	3.3	3.2	3.1	1.4	2.3	2.5	1.7	1.4	2.4	1.6	5.6
Italy[c]	15.2	16.5	14.6	10.8	9.2	5.8	4.7	5.1	6.3	6.5	6.3	5.3	4.6	4.1	5.2	4.0	2.0	2.0	1.6	2.6
Japan	8.8	2.7	1.9	2.3	2.0	0.6	0.1	0.7	2.3	3.1	3.2	1.7	1.3	0.7	-0.1	0.1	1.7	0.7	-0.3	-0.7
Korea	..	..	..	..	..	..	..	..	..	8.6	9.3	6.2	4.8	6.3	4.5	4.9	4.4	7.5	0.8	2.3
Luxembourg	7.0	9.4	8.7	6.4	4.1	0.3	-0.1	1.4	3.4	3.3	3.1	3.2	3.6	2.2	1.9	1.3	1.4	1.0	1.0	3.2
Mexico	18.8	59.0	102.3	65.3	57.8	86.2	131.8	114.2	20.0	26.7	22.7	15.5	9.8	7.0	35.0	34.4	20.6	15.9	16.6	9.5
Netherlands	7.2	5.9	2.7	3.3	2.3	0.1	-0.7	0.7	1.1	2.5	3.2	3.2	2.6	2.8	1.9	2.0	2.2	2.0	2.2	2.5
New Zealand	13.0	16.2	7.3	6.2	15.4	13.2	15.7	6.4	5.7	6.1	2.6	1.0	1.3	1.7	3.8	2.3	1.2	1.3	-0.1	2.6
Norway	9.1	11.3	8.4	6.3	5.7	7.2	8.7	6.7	4.5	4.1	3.4	2.3	2.3	1.4	2.4	1.2	2.6	2.3	2.3	3.1
Poland	..	..	..	..	..	..	..	..	..	..	..	..	..	32.2	27.8	19.9	14.9	11.6	7.3	10.1
Portugal	20.0	22.7	25.1	28.9	19.6	11.8	9.4	9.7	12.6	13.4	10.5	9.4	6.7	5.4	4.2	3.1	2.3	2.8	2.3	2.9
Slovak Republic	..	..	..	..	..	..	..	..	..	..	..	..	..	13.4	9.9	5.8	6.1	6.7	10.6	12.0
Spain	15.9	14.4	12.2	11.3	8.8	8.8	5.2	4.8	6.8	6.7	5.9	5.9	4.6	4.7	4.7	3.6	2.0	1.8	2.3	3.4
Sweden	9.7	8.6	8.9	8.0	7.4	4.2	4.2	6.1	6.6	10.4	9.7	2.6	4.7	2.4	2.9	0.8	0.9	0.4	0.3	1.3
Switzerland	5.0	5.7	2.9	2.9	3.4	0.8	1.4	1.9	3.2	5.4	5.9	4.0	3.3	0.9	1.8	0.8	0.5	0.0	0.8	1.6
Turkey[d]	35.4	29.1	31.4	48.4	45.0	34.6	38.9	68.8	63.3	60.3	66.0	70.1	66.1	105.2	89.1	80.4	85.7	84.6	64.9	54.9
United Kingdom	13.9	8.6	4.6	5.0	6.1	3.4	4.1	4.9	7.8	9.5	5.9	3.7	1.6	2.5	3.4	2.4	3.1	3.4	1.6	2.9
United States[e]	8.4	6.1	3.2	4.3	3.5	1.9	3.7	4.1	4.8	5.4	4.2	3.0	3.0	2.6	2.8	2.9	2.3	1.6	2.2	3.4
European Union	11.1	10.6	8.3	7.2	6.1	3.7	3.3	3.7	5.2	5.8	5.1	4.5	3.6	3.1	3.1	2.5	2.1	1.8	1.3	2.5
Total OECD	10.2	9.6	8.7	7.7	6.8	5.9	8.0	8.3	6.2	7.0	6.2	4.9	4.3	4.9	5.5	5.1	4.4	3.7	3.1	3.8
Memorandum item																				
OECD *less* high inflation countries[f]	9.5	7.6	5.1	5.1	4.4	2.6	3.3	3.6	4.7	5.4	4.6	3.4	3.0	2.6	2.7	2.5	2.2	1.7	1.5	2.6

a) Aggregates were computed using weights based on 1999 consumer expenditure expressed in private consumption purchasing power parities.
b) Excluding rent, but including imputed rent.
c) Index for households of wage and salary earners.
d) Until 1981: Istanbul index (154 items); from 1982, Turkish index.
e) The methodology for calculating the Consumer Price Index has changed considerably over the past years, lowering measured inflation substantially.
f) High inflation countries are defined as countries which have had 10 per cent or more inflation in terms of the GDP deflator on average during the last 10 years based on historical data. Consequently, Hungary, Mexico, Poland and Turkey are excluded from the aggregate.

Source: OECD.

Annex Table 17. **Oil and other primary commodity markets**

	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Oil market conditions[a] (in million barrels per day)																		
Demand																		
OECD[b]	38.6	39.3	40.6	41.2	41.5	41.9	42.9	43.2	44.4	44.9	45.9	46.7	46.8	47.7	47.8	47.6	47.7	..
of which: North America	19.6	20.1	20.8	21.0	20.7	20.5	20.8	21.1	21.7	21.6	22.2	22.7	23.1	23.8	24.1	24.0	24.2	..
Europe[c]	13.1	13.2	13.4	13.5	13.6	14.0	14.2	14.2	14.3	14.6	14.9	15.0	15.3	15.2	15.1	15.1	15.1	..
Pacific	5.8	5.9	6.4	6.7	7.2	7.5	7.9	8.0	8.4	8.7	8.8	9.0	8.4	8.7	8.7	8.5	8.4	..
Non-OECD[d]	22.8	23.5	24.1	24.5	24.5	24.6	24.2	24.4	23.8	24.5	25.4	26.6	26.8	27.6	28.1	28.4	28.8	..
Total	61.3	62.8	64.7	65.7	66.0	66.5	67.1	67.6	68.2	69.4	71.3	73.3	73.6	75.2	75.9	76.0	76.6	..
Supply																		
OECD[b]	19.7	19.8	19.6	18.9	19.0	19.5	19.8	20.0	20.8	21.1	21.7	22.1	21.9	21.4	21.9	21.8	22.2	..
OPEC total	19.9	19.7	21.8	23.8	25.1	25.3	26.5	26.7	27.0	27.6	28.4	29.9	30.8	29.4	30.8	..	..	..
Former USSR	12.3	12.5	12.5	12.2	11.5	10.4	8.9	7.9	7.2	7.1	7.1	7.2	7.3	7.5	7.9	8.5	9.0	..
Other non-OECD[d]	10.0	10.4	10.8	11.2	11.4	11.6	12.1	12.9	13.6	14.4	14.9	15.3	15.6	15.8	16.0	..	..	..
Total	62.0	62.4	64.8	66.1	66.9	66.8	67.2	67.5	68.7	70.2	72.1	74.5	75.6	74.2	76.7	..	..	..
Trade																		
OECD net imports[b]	19.2	19.8	20.8	22.5	22.8	22.4	23.1	23.5	23.8	23.4	24.2	24.9	25.2	25.5	26.1	26.1	25.6	..
Former USSR net exports	3.4	3.6	3.6	3.5	3.1	2.2	2.0	2.0	2.7	2.8	3.1	3.4	3.6	3.8	4.3	4.8	5.3	..
Other non-OECD net exports[a]	15.8	16.2	17.2	19.0	19.7	20.2	21.1	21.4	21.1	20.6	21.1	21.5	21.7	21.7	21.7	21.3	20.3	..
Prices[e,f]																		
OECD crude oil import price (cif, $ per bl)	15.0	17.9	14.9	17.5	22.3	19.3	18.4	16.4	15.6	17.2	20.5	19.1	12.6	17.3	28.0	24.6	21.5	25.0
Prices of other primary commodities[e,f] (US$ indices)																		
Food and tropical beverages	97	80	93	88	79	74	72	73	98	100	99	104	91	74	67	61	59	59
of which: Food	73	71	99	96	85	83	87	88	95	100	118	104	91	77	73	68	68	68
Tropical beverages	114	86	90	82	75	68	62	63	100	100	86	103	91	72	62	56	53	54
Agricultural raw materials	58	72	80	82	90	78	79	75	86	100	86	83	71	71	74	71	70	70
Minerals, ores and metals	69	78	112	107	99	88	85	74	85	100	90	91	78	75	83	78	64	67
Total	71	76	94	92	90	80	79	74	89	100	90	91	78	73	75	71	65	67
Memorandum item																		
Export prices of OECD manufactures (dollar index)	70	79	84	84	91	90	93	89	91	100	97	89	86	83	79	78	79	80

a) Based on data published in International Energy Agency, *Oil Market Report* , November 2001 ; *Annual Statistical Supplement* , August 2001.
b) Excluding Czech Republic, Hungary, Korea, Mexico and Poland.
c) European Union countries and Iceland, Norway, Switzerland and Turkey.
d) Including Czech Republic, Hungary, Korea, Mexico and Poland.
e) Indices through 2000 are based on data compiled by IEA for oil and by Hamburg Institute for Economic Research for the prices of other primary commodities; OECD estimates and projections for 2000 to 2002.
f) By technical assumption, prices are projected to rise broadly in line with OECD manufactured export prices for 2001 and 2002.
Source: OECD.

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Annex Table 18. **Labour force**

Percentage change from previous period

	1998 Labour force (thousands)	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	9 360	2.7	3.5	2.2	2.6	3.6	2.4	0.6	0.7	0.6	1.7	2.8	1.3	0.9	1.2	1.4	2.3	2.0	1.4	1.7
Austria	4 196	0.5	0.7	0.3	0.4	1.0	1.9	1.8	0.4	0.1	-0.3	0.0	-0.2	0.5	0.8	1.0	0.2	0.5	0.3	0.2
Belgium	4 261	-0.3	0.5	0.3	0.6	-0.4	0.0	0.0	0.2	1.0	0.9	0.6	0.2	0.4	1.3	0.6	-0.3	0.9	1.0	0.7
Canada	15 417	2.1	1.9	1.9	2.0	1.8	0.7	0.6	0.2	1.0	0.8	0.9	1.0	1.7	1.8	2.0	1.8	1.6	1.2	1.3
Czech Republic	5 153	..	..	..	..	..	..	..	..	..	1.1	0.6	0.0	0.3	0.4	0.2	-0.6	-0.4	0.0	0.0
Denmark	2 832	1.4	1.3	0.2	1.9	0.1	0.9	0.3	0.4	-1.2	-2.7	0.9	0.6	0.4	0.0	0.8	0.2	0.3	0.3	0.3
Finland	2 499	0.8	0.1	-0.6	-0.3	1.5	0.0	-1.6	-1.8	-0.9	-0.5	0.8	0.3	-0.2	0.9	2.0	1.2	0.7	0.9	1.2
France	25 887	0.5	0.6	0.5	0.5	0.8	0.3	0.6	0.4	0.3	0.5	0.1	1.0	0.7	0.6	1.0	0.7	1.2	1.0	0.6
Germany	41 295	0.8	1.0	0.7	0.8	0.7	2.2	1.7	-0.5	0.0	0.4	-0.1	0.4	0.8	0.5	0.5	0.8	0.1	0.2	0.4
Greece	4 435	0.6	-0.1	-0.1	2.0	0.2	0.8	-1.7	2.5	1.9	1.9	1.3	-0.6	-0.6	5.8	0.2	-1.0	0.2	0.4	0.5
Hungary	3 932	..	..	..	..	..	..	..	..	..	-4.6	-2.5	-0.9	-1.0	0.4	2.6	0.3	0.0	0.8	0.9
Iceland	137	3.3	2.9	5.6	-2.8	-0.4	-0.9	-0.3	0.1	0.6	0.9	1.1	1.6	1.3	2.2	1.8	1.0	0.8	0.6	1.1
Ireland	1 646	0.8	0.0	0.4	-0.7	-1.5	1.8	1.7	1.3	2.3	2.1	1.9	3.3	2.1	6.9	4.0	3.3	2.0	2.0	2.0
Italy	22 987	0.4	1.8	0.1	0.8	-0.4	0.0	0.1	-0.8	-1.6	-0.5	0.0	0.5	0.5	1.2	0.8	0.9	0.8	0.6	1.0
Japan	67 931	0.6	1.0	1.0	1.4	1.7	1.8	1.9	1.1	0.6	0.5	0.3	0.7	1.1	0.1	-0.2	-0.2	-0.1	-0.3	-0.1
Korea	21 456	4.0	3.4	4.7	2.6	4.1	2.9	3.1	2.0	2.0	2.6	2.2	1.9	2.0	-1.0	0.8	1.5	0.7	0.6	1.0
Luxembourg	179	0.6	1.0	1.5	1.1	1.3	1.3	1.5	0.4	0.2	1.4	1.2	1.2	1.5	1.5	2.4	2.5	2.4	1.3	1.7
Mexico[a]	18 820	..	..	..	4.3	2.9	1.7	5.4	2.2	2.2	2.3	2.3	5.6	3.4	2.1	0.7	4.2	1.0	1.8	2.5
Netherlands	6 895	-0.2	1.6	1.2	2.0	1.0	2.0	2.0	1.6	1.9	1.0	1.9	1.6	2.2	1.8	1.9	1.7	1.6	1.4	1.3
New Zealand	1 864	2.5	0.1	0.9	-1.6	-1.0	1.6	1.5	0.9	1.7	3.2	3.1	3.5	1.0	0.3	0.7	0.8	1.4	1.1	1.1
Norway	2 324	1.7	2.9	2.0	0.5	-1.3	-0.6	-0.7	0.2	0.1	0.9	1.7	2.4	2.1	1.6	0.4	0.7	0.4	0.4	0.4
Poland	17 171	..	..	..	..	..	..	..	..	..	-1.1	-0.4	0.0	0.1	0.4	-0.1	1.0	0.6	0.2	0.2
Portugal	4 951	-0.3	0.1	1.0	1.2	1.5	1.8	2.4	0.7	-0.6	1.3	-0.2	0.6	1.3	0.6	1.2	1.4	1.2	1.1	1.2
Slovak Republic	2 484	..	..	..	..	..	..	..	..	..	..	1.4	1.3	-0.4	-0.3	2.6	1.5	0.8	0.8	0.8
Spain[b]	16 267	0.8	1.7	2.4	1.6	1.3	1.4	0.4	0.5	1.1	1.0	0.5	0.9	1.1	0.9	1.0	2.6	0.9	0.9	0.9
Sweden	4 256	-0.5	0.4	0.6	1.0	1.2	1.1	-0.7	-1.9	-2.7	-1.2	1.3	-0.2	-1.1	-0.2	1.2	1.2	1.1	0.5	0.5
Switzerland	3 998	1.6	2.3	2.3	2.4	1.9	3.2	3.0	0.1	1.3	-1.5	0.1	0.8	0.1	0.1	-0.7	0.3	0.5	0.5	0.6
Turkey[c]	22 899	1.1	2.7	2.7	1.6	2.7	1.1	2.6	0.6	-4.9	6.9	1.5	1.4	0.1	2.6	3.4	-4.9	-1.5	0.8	2.0
United Kingdom	29 024	1.3	0.3	0.9	1.5	0.5	0.1	-0.5	0.1	-0.3	-0.1	0.4	0.4	0.4	0.5	1.4	0.5	0.5	0.5	0.5
United States	137 675	1.7	2.1	1.7	1.5	1.8	1.6	0.4	1.4	0.8	1.4	1.0	1.2	1.8	1.0	1.2	1.1	0.7	0.9	1.1
Euro area	135 497	0.5	1.1	0.7	0.9	0.6	1.1	0.8	0.0	0.1	0.4	0.2	0.6	0.8	1.0	0.9	1.0	0.7	0.7	0.7
European Union	171 608	0.6	0.9	0.7	1.0	0.6	0.9	0.5	0.0	-0.1	0.2	0.3	0.6	0.7	0.9	1.0	0.9	0.7	0.7	0.7
Total OECD	502 227	1.2	1.5	1.4	1.5	1.5	1.4	1.1	0.8	0.3	1.0	0.7	1.0	1.2	0.9	1.0	0.7	0.5	0.7	0.9

Note: Labour market data are subject to differences in definitions across countries and to many series breaks, though the latter are often of a minor nature. The labour force includes all employed plus all unemployed persons. Unemployment is recorded on the basis of commonly used definitions. (See Annex Table 21). For information about definitions, sources, data coverage, break in series and rebasings, see *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)*.

a) Data based on the National Survey of Urban Employment; see *OECD Economic Outlook* Sources and Methods.

b) Rebased; see *OECD Economic Outlook* Sources and Methods.

c) The figures incorporate important revisions to Turkish data; see *OECD Economic Outlook* Sources and Methods.

Source: OECD.

Annex Table 19. **Labour force participation rate**

	Average 1974-84	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	70.1	70.6	71.7	71.9	72.5	73.8	74.4	74.0	73.7	73.5	74.0	75.2	75.2	74.8	74.7	74.7	75.4	75.8	75.7	75.8
Austria	79.8	76.2	76.6	76.7	76.9	77.5	78.0	78.5	78.4	77.1	76.6	76.5	76.3	76.5	77.0	77.4	77.4	77.6	77.6	77.6
Belgium	61.7	60.7	60.9	61.0	61.2	60.9	60.9	60.9	61.0	61.5	61.9	62.3	62.5	62.7	63.5	63.8	63.6	64.1	64.7	65.1
Canada	71.2	75.1	75.8	76.5	77.3	77.8	77.7	77.2	76.4	76.1	76.0	75.8	75.6	75.9	76.3	76.9	77.4	77.6	77.6	77.7
Czech Republic	..	..	..	..	..	..	..	..	..	72.3	72.6	72.6	72.4	72.4	72.5	72.3	71.6	71.3	71.2	71.1
Denmark	77.5	80.9	81.7	81.4	82.7	82.5	82.9	82.8	82.8	81.5	79.2	79.6	79.7	79.9	79.7	80.3	80.4	80.5	80.6	80.8
Finland	74.4	76.6	76.6	76.1	75.9	77.0	76.8	75.3	73.6	72.7	72.1	72.5	72.6	72.3	72.6	73.7	74.5	74.9	75.4	76.2
France	67.9	66.4	66.5	66.5	66.4	66.6	66.6	66.8	66.9	66.9	67.1	67.0	67.5	67.7	68.0	68.5	68.7	69.2	69.6	69.8
Germany	68.0	67.4	67.9	68.3	68.6	68.5	69.1	73.9	73.1	72.7	72.9	72.8	72.9	73.4	73.8	74.1	74.8	74.9	75.1	75.5
Greece	59.6	62.0	61.5	61.0	61.9	61.5	61.5	59.6	60.5	61.2	61.9	62.5	62.0	61.7	63.9	64.2	64.0	64.0	64.0	64.1
Hungary	..	..	..	..	..	..	..	..	..	61.8	59.0	57.6	57.2	56.7	57.1	58.7	59.1	58.8	59.2	59.9
Iceland	74.6	79.4	81.0	84.2	80.2	78.9	77.5	76.2	75.5	75.4	75.4	75.7	76.3	76.6	77.1	77.3	77.0	76.9	76.7	77.0
Ireland	62.9	62.7	62.5	62.4	61.8	61.1	62.0	62.2	62.0	62.7	63.0	63.1	64.1	64.2	67.2	68.6	69.6	70.0	70.3	70.7
Italy	59.9	59.2	60.2	60.0	60.3	59.9	59.6	59.5	59.0	57.9	57.4	57.4	57.7	58.0	58.8	59.3	60.1	60.8	61.3	62.2
Japan	71.5	72.3	72.2	72.3	72.5	73.1	74.1	75.2	75.7	76.0	76.4	76.5	77.0	78.0	78.2	78.1	78.1	78.2	78.2	78.4
Korea	60.3	58.3	58.9	60.3	60.5	61.9	62.4	63.4	63.7	64.1	64.9	65.4	65.6	66.1	64.7	64.7	65.2	65.1	64.9	64.9
Luxembourg	61.0	60.2	60.4	60.9	61.3	61.7	61.7	62.1	61.8	61.4	61.7	61.8	62.2	62.5	62.8	63.6	64.3	65.2	65.4	65.9
Mexico [a]	..	..	..	51.1	51.6	51.8	51.8	53.3	53.8	55.2	54.7	55.3	55.3	56.2	56.5	55.7	56.9	56.3	56.2	56.4
Netherlands	58.0	56.0	56.4	56.5	57.2	57.4	58.2	59.0	59.6	60.5	60.8	61.7	62.5	63.7	64.5	65.4	66.2	67.0	67.8	68.6
New Zealand	65.8	66.5	66.2	66.1	64.6	63.5	63.8	63.8	63.3	63.3	64.2	64.9	65.8	65.6	65.2	65.3	65.4	65.8	65.9	66.0
Norway	74.4	77.5	79.2	80.2	80.1	78.7	78.0	77.1	76.9	76.5	76.8	77.7	79.2	80.4	81.1	80.7	80.7	80.7	80.6	80.5
Poland	..	..	..	..	..	..	..	..	..	68.8	67.6	66.9	66.5	66.1	65.8	65.1	65.3	65.4	65.2	65.1
Portugal	67.4	68.1	67.9	68.4	69.0	69.9	71.0	72.4	72.0	71.3	71.4	71.1	71.9	73.4	73.3	73.9	74.7	75.3	75.9	76.5
Slovak Republic	..	..	..	..	..	..	..	..	..	..	69.0	69.2	69.5	68.6	67.8	69.0	69.9	70.5	71.0	71.6
Spain [b]	62.4	60.2	60.3	61.2	61.8	61.8	62.2	62.2	62.1	62.3	62.6	62.4	62.2	62.7	63.3	64.2	65.6	66.1	66.5	67.0
Sweden	80.0	81.0	81.2	81.5	82.0	82.5	82.9	82.0	80.1	77.6	76.3	76.9	76.5	75.5	75.2	75.7	76.4	76.9	76.9	77.0
Switzerland	75.5	76.2	77.3	78.5	79.7	80.6	82.5	83.9	83.2	83.8	82.0	81.9	82.3	82.3	82.2	81.4	81.1	81.1	81.1	81.1
Turkey [c]	70.8	63.4	63.2	63.0	62.1	62.0	60.7	60.6	59.3	54.9	57.2	56.7	56.1	54.9	55.1	55.8	51.9	49.9	49.1	48.8
United Kingdom	73.9	74.8	74.8	75.2	76.3	76.6	76.5	76.0	76.0	75.7	75.4	75.3	75.3	75.3	75.3	75.8	75.9	76.0	76.2	76.3
United States	63.0	64.8	65.3	65.6	65.9	66.4	66.5	66.2	66.4	66.3	66.6	66.6	66.8	67.1	67.1	67.1	67.2	66.9	66.9	66.9
Euro area	64.8	63.9	64.2	64.4	64.7	64.6	64.9	66.5	66.2	65.9	66.0	66.0	66.2	66.6	67.2	67.8	68.4	68.8	69.2	69.7
European Union	66.9	66.3	66.6	66.8	67.2	67.3	67.5	68.5	68.3	67.9	67.9	67.9	68.0	68.4	68.8	69.4	69.9	70.3	70.7	71.0
Total OECD	66.6	66.7	67.0	66.6	66.8	67.2	67.4	67.9	67.8	67.6	67.7	67.7	67.8	68.0	68.2	68.3	68.4	68.3	68.3	68.4

Note: Labour market data are subject to differences in definitions across countries and to many series breaks, though the latter are often of a minor nature. Labour force participation rates are not fully comparable across countries mainly because of different definitions of the working-age population. In most countries, the working-age population is defined as all persons of the age of 16 to 64 years, except for Sweden, where it is 15 to 64 years, New Zealand and Turkey, where it is 15 years more, and the United States where it is 16 years of age and more. For information about definitions, sources, data coverage, break in series and rebasings, see *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) Data based on the National Survey of Urban Employment; see *OECD Economic Outlook* Sources and Methods.

b) Rebased; see *OECD Economic Outlook* Sources and Methods.

c) The figures incorporate important revisions to Turkish data; see *OECD Economic Outlook* Sources and Methods.

Source: OECD.

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Annex Table 20. **Employment**

Percentage change from previous period

	1998 Employment (thousands)	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	8 636	3.5	3.7	2.2	3.8	4.7	1.5	-2.0	-0.7	0.3	3.1	4.1	1.4	0.8	1.7	2.3	3.0	1.4	1.6	2.0
Austria	3 956	0.2	0.4	0.0	0.6	1.3	1.6	1.4	0.2	-0.6	-0.1	0.0	-0.6	0.5	0.8	1.4	0.9	0.4	-0.2	0.3
Belgium	3 855	0.5	0.6	0.6	1.7	1.2	0.9	0.1	-0.5	-0.7	-0.4	0.7	0.4	0.8	1.2	1.4	1.6	1.0	0.7	0.5
Canada	14 139	3.0	3.0	2.7	3.2	2.1	0.0	-1.8	-0.7	0.8	2.0	1.9	0.8	2.3	2.7	2.8	2.6	1.1	0.7	1.6
Czech Republic	4 818	..	..	..	..	..	..	..	..	..	1.1	0.9	0.1	-0.6	-1.4	-2.3	-0.7	0.4	0.1	0.1
Denmark	2 684	2.9	3.2	0.1	1.2	-1.3	0.5	-0.6	-0.5	-2.3	-0.6	2.0	1.1	1.6	0.4	0.9	0.7	0.2	0.0	0.2
Finland	2 213	1.0	-0.2	-0.3	0.3	3.1	0.0	-5.1	-7.1	-6.1	-0.8	2.2	1.4	2.0	2.4	3.3	1.7	1.3	0.5	1.2
France	22 891	-0.1	0.5	0.4	1.0	1.5	0.8	0.0	-0.6	-1.2	0.1	0.8	0.1	0.6	1.3	1.8	2.3	1.8	0.5	0.7
Germany	37 611	0.7	1.4	0.7	0.8	1.5	3.0	2.5	-1.5	-1.4	-0.2	0.2	-0.3	-0.2	1.1	1.2	1.6	0.0	-0.3	0.5
Greece	3 940	1.0	0.4	-0.1	1.6	0.4	1.3	-2.3	1.5	0.8	1.9	0.9	-0.4	-0.6	4.1	-0.8	-0.3	0.4	0.7	1.0
Hungary	3 619	..	..	..	..	..	..	..	..	..	-3.4	-1.9	-0.5	0.3	1.5	3.6	0.9	0.6	0.7	0.8
Iceland	133	3.6	3.1	5.8	-3.0	-1.4	-1.1	-0.1	-1.4	-0.8	0.5	0.9	2.3	1.8	3.4	2.7	1.5	0.7	-0.4	1.1
Ireland	1 521	0.6	-0.5	0.7	-0.1	0.0	4.4	-0.2	0.5	1.5	3.2	4.9	3.9	3.6	10.2	6.3	4.7	2.0	1.0	2.0
Italy	20 242	0.3	0.4	-0.3	0.5	-0.1	1.2	0.7	-1.0	-3.1	-1.6	-0.6	0.5	0.4	1.1	1.2	1.9	1.6	0.4	1.3
Japan	65 140	0.7	0.8	1.0	1.7	2.0	2.0	1.9	1.1	0.2	0.1	0.1	0.4	1.1	-0.7	-0.8	-0.2	-0.4	-0.8	-0.1
Korea	19 994	3.7	3.6	5.5	3.2	4.1	3.0	3.3	1.9	1.6	3.0	2.6	1.9	1.4	-5.3	1.4	3.8	0.9	0.2	1.3
Luxembourg	174	0.7	1.2	1.3	1.2	1.5	1.4	1.4	0.2	-0.3	0.8	0.9	0.9	1.2	2.0	2.6	2.8	2.5	1.0	1.7
Mexico[a]	18 218	..	..	..	4.7	3.5	1.9	5.5	2.0	1.5	2.1	-0.6	6.5	5.5	2.7	1.3	4.6	0.7	1.7	2.5
Netherlands	6 609	1.3	2.5	1.6	2.3	1.8	3.0	2.6	1.6	0.7	-0.1	2.4	2.0	3.4	3.3	3.0	2.3	1.8	1.1	1.0
New Zealand	1 725	3.5	-0.4	0.8	-3.1	-2.6	0.9	-1.3	0.8	2.6	4.7	5.2	3.7	0.4	-0.6	1.5	1.6	2.1	0.6	1.4
Norway	2 249	2.3	3.5	1.9	-0.6	-3.0	-0.9	-1.0	-0.3	0.0	1.5	2.2	2.5	3.0	2.5	0.4	0.5	0.4	0.2	0.5
Poland	15 356	..	..	..	..	..	..	..	..	..	-1.6	0.9	1.2	1.4	1.2	-3.9	-1.6	-1.5	-1.5	0.6
Portugal	4 704	-0.4	0.2	2.6	2.6	2.2	2.2	3.0	0.9	-2.0	-0.1	-0.6	0.5	1.9	2.5	1.8	1.8	1.0	0.9	1.2
Slovak Republic	2 167	..	..	..	..	..	..	..	..	..	..	2.1	3.3	-1.1	-1.2	-1.6	-1.4	0.4	1.0	1.5
Spain[b]	13 206	-0.9	2.2	3.1	2.9	4.1	2.6	0.2	-1.9	-4.3	-0.9	1.8	1.5	2.9	3.5	4.6	4.7	1.8	0.5	1.7
Sweden	3 978	-0.3	0.7	1.0	1.4	1.5	1.0	-2.0	-4.3	-5.8	-0.9	1.6	-0.6	-1.1	1.5	2.2	2.2	1.7	0.1	0.3
Switzerland	3 858	1.7	2.5	2.3	2.5	2.0	3.2	2.4	-1.3	-0.5	-1.8	0.6	0.4	-0.4	1.4	0.4	1.0	0.7	0.2	0.7
Turkey[c]	21 372	1.7	1.8	2.2	1.5	2.6	1.7	2.5	0.3	-5.3	7.3	2.5	2.4	-0.1	2.4	2.5	-3.8	-3.0	1.1	2.8
United Kingdom	27 308	1.1	0.1	2.6	4.3	2.4	0.3	-3.0	-2.1	-0.4	1.0	1.4	1.1	2.0	1.1	1.3	1.0	0.9	0.3	0.3
United States	131 471	2.0	2.3	2.6	2.3	2.0	1.3	-0.9	0.7	1.5	2.3	1.5	1.5	2.3	1.5	1.5	1.3	-0.1	-0.6	1.4
Euro area	120 921	0.3	0.9	0.8	1.2	1.5	1.9	0.9	-1.0	-1.8	-0.4	0.6	0.3	0.8	1.8	1.9	2.1	1.1	0.3	0.9
European Union	154 891	0.4	0.8	1.1	1.8	1.6	1.5	0.1	-1.2	-1.7	-0.2	0.7	0.5	0.9	1.6	1.8	1.9	1.1	0.3	0.8
Total OECD	467 785	1.3	1.6	1.9	2.1	2.0	1.6	0.4	0.0	-0.3	1.1	1.1	1.2	1.5	1.0	1.1	1.2	0.2	0.0	1.1

Note: Labour market data are subject to differences in definitions across countries and to many series breaks, though the latter are often of a minor nature. Employment is measured as the number of persons employed full or part time and covers in most cases civilian and military employments. For the United States, only civilian employment is reported. For information about definitions, sources, data coverage, break in series and rebasings, see *OECD Economic Outlook Sources* and Methods *(http://www.oecd.org/eco/sources-and-methods)*.

a) Data based on the National Survey of Urban Employment; see *OECD Economic Outlook* Sources and Methods.

b) Rebased; see *OECD Economic Outlook* Sources and Methods.

c) The figures incorporate important revisions to Turkish data; see *OECD Economic Outlook* Sources and Methods.

Source: OECD.

Annex Table 21. **Unemployment rates: commonly used definitions**

	1998 Unemployment (thousands)	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	723	8.2	7.9	7.9	6.9	5.9	6.8	9.2	10.4	10.6	9.4	8.2	8.1	8.2	7.7	6.9	6.3	6.9	6.7	6.4
Austria	240	3.7	4.0	4.3	4.1	3.8	4.1	4.5	4.7	5.4	5.3	5.3	5.6	5.7	5.7	5.3	4.7	4.8	5.3	5.1
Belgium	406	10.4	10.3	10.0	9.0	7.5	6.7	6.6	7.2	8.8	10.0	9.9	9.7	9.4	9.5	8.8	7.0	6.9	7.2	7.3
Canada	1 278	10.5	9.6	8.8	7.8	7.5	8.1	10.3	11.2	11.4	10.3	9.4	9.6	9.1	8.3	7.6	6.8	7.3	7.8	7.4
Czech Republic	336	..	..	..	..	..	..	..	..	4.3	4.4	4.1	3.9	4.8	6.5	8.8	8.9	8.1	8.0	8.0
Denmark	148	7.1	5.4	5.4	6.1	7.3	7.7	8.4	9.2	10.2	8.3	7.3	6.8	5.6	5.2	5.2	4.7	4.7	5.0	5.0
Finland	286	5.0	5.4	5.1	4.6	3.1	3.1	6.7	11.8	16.4	16.7	15.5	14.6	12.7	11.4	10.2	9.8	9.2	9.6	9.6
France	2 997	10.2	10.4	10.5	10.0	9.3	8.9	9.4	10.4	11.7	12.1	11.4	12.1	12.2	11.6	10.9	9.5	8.9	9.4	9.3
Germany	3 684	8.0	7.7	7.6	7.6	6.9	6.2	5.4	6.4	7.6	8.1	7.9	8.5	9.4	8.9	8.2	7.5	7.5	8.1	8.0
Greece	494	7.8	7.4	7.4	7.7	7.5	7.0	7.7	8.7	9.7	9.6	10.0	9.8	9.8	11.1	12.0	11.4	11.2	10.9	10.4
Hungary	313	..	..	..	..	..	..	..	..	12.1	11.0	10.4	10.1	8.9	8.0	7.1	6.5	5.9	6.0	6.1
Iceland	4	0.9	0.7	0.4	0.6	1.7	1.8	1.5	3.0	4.4	4.8	5.0	4.4	3.9	2.8	1.9	1.4	1.5	2.5	2.5
Ireland	125	16.5	17.0	16.7	16.2	14.9	12.8	14.4	15.1	15.7	14.7	12.2	11.7	10.4	7.6	5.6	4.3	4.3	5.3	5.3
Italy	2 745	8.6	9.9	10.2	10.5	10.2	9.1	8.6	8.8	10.2	11.2	11.7	11.7	11.8	11.9	11.5	10.7	10.0	10.2	10.0
Japan	2 791	2.6	2.8	2.8	2.5	2.3	2.1	2.1	2.2	2.5	2.9	3.1	3.4	3.4	4.1	4.7	4.7	5.0	5.5	5.4
Korea	1 461	4.0	3.8	3.1	2.5	2.6	2.4	2.3	2.4	2.8	2.4	2.0	2.0	2.6	6.8	6.3	4.1	3.9	4.3	4.0
Luxembourg	6	1.7	1.5	1.7	1.6	1.4	1.3	1.4	1.6	2.1	2.7	3.0	3.3	3.6	3.1	2.9	2.6	2.5	2.8	2.8
Mexico[a]	602	..	..	3.8	3.4	2.9	2.7	2.6	2.9	3.5	3.7	6.4	5.7	3.7	3.2	2.6	2.2	2.5	2.6	2.5
Netherlands	286	9.2	8.4	8.0	7.7	6.9	6.0	5.4	5.4	6.6	7.6	7.1	6.6	5.5	4.2	3.2	2.6	2.5	2.8	3.1
New Zealand	139	3.5	4.0	4.1	5.6	7.1	7.8	10.3	10.3	9.5	8.1	6.3	6.1	6.6	7.5	6.8	6.0	5.3	5.8	5.4
Norway	74	2.6	2.0	2.1	3.2	4.9	5.2	5.5	5.9	6.0	5.4	4.9	4.8	4.0	3.2	3.2	3.4	3.5	3.7	3.6
Poland	1 816	..	..	..	..	..	..	..	..	14.0	14.4	13.3	12.3	11.2	10.6	13.9	16.1	17.9	19.3	19.1
Portugal	248	8.8	8.8	7.3	6.0	5.2	4.9	4.3	4.1	5.5	6.9	7.2	7.3	6.8	5.0	4.4	4.0	4.2	4.4	4.4
Slovak Republic	317	..	..	..	..	..	..	..	..	..	13.7	13.1	11.4	11.9	12.8	16.4	18.8	19.1	18.9	18.4
Spain[b]	3 061	20.9	20.5	20.0	19.0	16.7	15.7	15.8	17.9	22.2	23.7	22.7	22.2	20.8	18.8	15.9	14.1	13.3	13.7	13.0
Sweden	278	2.8	2.5	2.1	1.7	1.5	1.7	3.0	5.3	8.2	8.0	7.7	8.0	8.0	6.5	5.6	4.7	4.1	4.5	4.7
Switzerland	140	1.0	0.8	0.8	0.7	0.6	0.5	1.1	2.5	4.5	4.7	4.2	4.7	5.2	3.9	2.7	2.0	1.8	2.2	2.1
Turkey[c]	1 527	6.9	7.7	8.1	8.2	8.4	7.8	7.9	8.1	8.5	8.2	7.3	6.4	6.6	6.7	7.5	6.4	7.9	7.6	6.9
United Kingdom	1 716	11.6	11.8	10.2	7.8	6.1	5.9	8.2	10.2	10.3	9.4	8.5	7.9	6.5	5.9	6.0	5.5	5.1	5.3	5.5
United States	6 204	7.2	7.0	6.2	5.5	5.3	5.6	6.8	7.5	6.9	6.1	5.6	5.4	4.9	4.5	4.2	4.0	4.8	6.2	6.0
Euro area	14 576	10.2	10.3	10.3	10.0	9.2	8.4	8.1	9.0	10.7	11.4	11.1	11.4	11.4	10.8	9.9	8.9	8.5	8.9	8.8
European Union	16 718	10.2	10.3	10.0	9.3	8.3	7.8	8.0	9.1	10.6	10.9	10.5	10.6	10.4	9.7	9.0	8.1	7.8	8.1	8.0
Total OECD	34 442	7.6	7.5	7.1	6.4	5.9	5.8	6.4	7.1	7.9	7.7	7.4	7.3	7.0	6.9	6.7	6.2	6.5	7.2	7.0

Note: Labour market data are subject to differences in definitions across countries and to many series breaks, though the latter are often of a minor nature. For information about definitions, sources, data coverage, break in series and rebasings, see *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) Data based on the National Survey of Urban Employment; see *OECD Economic Outlook* Sources and Methods.

b) Rebased; see *OECD Economic Outlook* Sources and Methods.

c) The figures incorporate important revisions to Turkish data; see *OECD Economic Outlook* Sources and Methods.

Source: OECD.

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Annex Table 22. **Standardised unemployment rates**[a]

Per cent of civilian labour force

	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Australia	7.2	10.0	9.0	8.3	7.9	7.9	7.0	6.0	6.7	9.3	10.5	10.6	9.5	8.2	8.2	8.3	7.7	7.0	6.3
Austria	..	..	..	..	..	..	..	..	..	..	..	4.0	3.8	3.9	4.3	4.4	4.5	4.0	3.7
Belgium	10.1	11.0	11.1	10.4	10.3	10.0	9.0	7.5	6.7	6.6	7.2	8.8	10.0	9.9	9.7	9.4	9.5	8.8	7.0
Canada	11.0	11.9	11.3	10.7	9.6	8.8	7.8	7.5	8.1	10.3	11.2	11.4	10.4	9.4	9.6	9.1	8.3	7.6	6.8
Czech Republic	..	..	..	..	..	..	..	..	..	..	..	4.4	4.4	4.1	3.9	4.8	6.5	8.8	8.9
Denmark	8.4	9.0	8.5	7.1	5.4	5.4	6.1	7.3	7.7	8.4	9.2	10.2	8.3	7.3	6.8	5.6	5.2	5.2	4.7
Finland	..	..	5.9	6.0	6.7	4.9	4.2	3.1	3.2	6.6	11.6	16.4	16.7	15.2	14.5	12.6	11.4	10.2	9.7
France	7.7	8.1	9.7	10.1	10.3	10.5	9.9	9.4	9.0	9.5	10.4	11.7	12.3	11.7	12.3	12.3	11.8	11.2	9.5
Germany[b]	5.7	6.9	7.1	7.2	6.5	6.3	6.2	5.6	4.8	4.2	6.6	7.9	8.4	8.2	8.9	9.9	9.3	8.6	7.9
Hungary	..	..	..	..	..	..	..	..	..	..	9.9	12.1	11.0	10.4	10.1	8.9	8.0	7.1	6.5
Ireland	11.4	13.9	15.5	16.8	16.8	16.6	16.2	14.7	13.4	14.7	15.4	15.6	14.3	12.3	11.7	9.9	7.5	5.6	4.2
Italy	6.4	7.5	8.0	8.3	9.0	9.8	9.8	9.8	9.0	8.6	8.9	10.2	11.2	11.6	11.7	11.7	11.8	11.4	10.5
Japan	2.4	2.7	2.7	2.6	2.8	2.8	2.5	2.3	2.1	2.1	2.2	2.5	2.9	3.1	3.4	3.4	4.1	4.7	4.7
Luxembourg	3.0	3.5	3.1	2.9	2.6	2.5	2.0	1.8	1.7	1.7	2.1	2.6	3.2	2.9	3.0	2.7	2.7	2.4	2.4
Netherlands	8.1	9.7	9.3	8.3	8.3	8.1	7.5	6.9	6.2	5.8	5.6	6.6	7.1	6.9	6.3	5.2	4.0	3.4	2.9
New Zealand	3.5	5.7	5.7	4.2	4.0	4.1	5.6	7.1	7.8	10.3	10.3	9.5	8.1	6.3	6.1	6.6	7.5	6.8	6.0
Norway	2.6	3.5	3.2	2.7	2.0	2.1	3.2	5.0	5.3	5.6	6.0	6.1	5.5	5.0	4.9	4.1	3.3	3.2	3.5
Poland	..	..	..	..	..	..	..	..	..	..	..	14.0	14.4	13.3	12.3	11.2	10.6	..	16.1
Portugal	..	8.2	8.9	9.2	8.8	7.3	5.9	5.2	4.8	4.2	4.3	5.7	6.9	7.3	7.3	6.8	5.2	4.5	4.1
Spain	14.9	17.5	20.2	21.6	21.3	20.6	19.5	17.2	16.2	16.4	18.4	22.7	24.1	22.9	22.2	20.8	18.8	15.9	14.1
Sweden	3.3	3.7	3.3	2.9	2.7	2.2	1.8	1.5	1.7	3.1	5.6	9.0	9.4	8.8	9.6	9.9	8.3	7.2	5.9
Switzerland	..	..	..	..	..	..	..	..	..	2.0	3.1	4.0	3.8	3.5	3.9	4.2	3.5	3.0	..
United Kingdom	10.3	11.1	11.1	11.5	11.5	10.6	8.7	7.3	7.1	8.8	10.0	10.5	9.6	8.7	8.2	7.0	6.3	6.1	5.5
United States	9.7	9.6	7.5	7.2	7.0	6.2	5.5	5.3	5.6	6.8	7.5	6.9	6.1	5.6	5.4	4.9	4.5	4.2	4.0
Euro area	..	..	..	..	..	..	..	..	..	8.3	9.2	10.9	11.6	11.3	11.5	11.6	10.9	10.0	9.0
European Union	..	..	..	..	..	..	..	..	..	8.2	9.2	10.7	11.1	10.7	10.8	10.6	9.9	9.1	8.2
Total OECD	..	..	..	..	..	..	..	..	..	..	..	8.0	7.9	7.5	7.4	7.2	7.1	6.8	6.4

Note: In so far as possible, the data have been adjusted to ensure comparability over time and to conform to the guidelines of the International Labour Office. All series are benchmarked to labour-force-survey-based estimates. In countries with annual surveys, monthly estimates are obtained by interpolation/extrapolation and by incorporating trends in administrative data, where available. The annual figures are then calculated by averaging the monthly estimates (for both unemployed and the labour force). For countries with monthly or quarterly surveys, the annual estimates are obtained by averaging the monthly or quarterly estimates, respectively. For several countries, he adjustment procedure used is similar to that of the Bureau of Labor Statistics, U.S. Department of Labor. For EU countries, the procedures are similar to those used in deriving the Comparable Unemployment Rates (CURs) of the Statistical Office of the European Communities. Minor differences may appear mainly because of various methods of calculating and applying adjustment factors, and because EU estimates are based on the civilian labour force.

a) See technical notes in OECD *Quarterly Labour Force Statistics.*

b) Prior to 1993 data refers to Western Germany.

Source: OECD.

Annex Table 23. **Labour force, employment and unemployment**

Millions

	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Labour force																			
Major seven countries	291.6	295.8	299.2	303.1	307.0	311.0	323.2	325.4	326.6	329.0	330.8	333.6	337.7	340.2	343.1	345.6	347.4	349.4	351.9
Total of smaller countries[a]	95.8	97.6	113.1	115.3	117.7	119.6	121.9	123.1	149.8	154.6	156.4	158.7	160.2	162.0	164.0	165.1	166.0	167.4	169.4
European Union	150.4	151.8	152.9	154.4	155.3	156.7	167.2	167.2	167.1	167.5	168.0	168.9	170.1	171.6	173.3	174.9	176.0	177.2	178.4
Euro area	115.5	116.7	117.5	118.5	119.2	120.5	131.2	131.3	131.4	131.9	132.2	133.1	134.1	135.5	136.7	138.1	139.0	140.0	141.0
Total OECD[a]	387.4	393.4	412.3	418.4	424.7	430.7	445.1	448.5	476.4	483.7	487.2	492.3	498.0	502.2	507.1	510.8	513.4	516.9	521.3
Employment																			
Major seven countries	270.4	274.2	278.9	284.4	289.6	293.6	302.8	302.7	303.1	306.1	308.7	311.2	315.7	318.8	322.2	325.9	326.7	325.6	328.4
Total of smaller countries[a]	87.7	89.5	104.6	107.0	109.9	112.1	113.9	114.1	136.0	140.3	142.4	145.2	147.5	149.0	150.9	153.0	153.4	154.3	156.6
European Union	135.1	136.2	137.7	140.1	142.3	144.5	153.9	152.0	149.4	149.2	150.3	151.0	152.4	154.9	157.6	160.7	162.4	162.8	164.1
Euro area	103.7	104.6	105.4	106.7	108.3	110.3	120.6	119.4	117.3	116.8	117.5	117.9	118.8	120.9	123.2	125.8	127.2	127.5	128.7
Total OECD[a]	358.1	363.8	383.4	391.5	399.5	405.7	416.6	416.7	439.1	446.3	451.1	456.4	463.2	467.8	473.1	479.0	480.2	479.9	485.0
Unemployment																			
Major seven countries	21.2	21.5	20.4	18.7	17.5	17.4	20.4	22.8	23.5	23.0	22.1	22.4	22.0	21.4	21.0	19.7	20.7	23.8	23.5
Total of smaller countries[a]	8.0	8.1	8.5	8.2	7.8	7.5	8.1	9.1	13.8	14.4	14.0	13.5	12.8	13.0	13.1	12.1	12.6	13.2	12.8
European Union	15.3	15.6	15.2	14.3	13.0	12.1	13.4	15.3	17.7	18.3	17.7	18.0	17.7	16.7	15.7	14.2	13.7	14.4	14.3
Euro area	11.8	12.1	12.1	11.8	10.9	10.2	10.6	11.8	14.1	15.1	14.7	15.2	15.3	14.6	13.5	12.2	11.8	12.5	12.3
Total OECD[a]	29.3	29.6	28.9	26.9	25.3	25.0	28.5	31.8	37.3	37.3	36.1	35.9	34.8	34.4	34.0	31.8	33.3	37.0	36.3

Note: See Annex Tables 18 to 20.
a) The aggregate measures include Mexico as of 1987. There is a potential bias in the aggregates thereafter because of the limited coverage of the Mexican National Survey of Urban Employment.
Source: OECD.

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Annex Table 26. **Household saving rates**

Percentage of disposable household income

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	12.5	10.1	9.5	7.5	6.2	8.0	8.6	5.6	5.3	4.1	5.5	4.4	5.5	3.7	2.2	2.0	3.8	3.0	3.6	3.7
Austria	9.9	10.3	12.1	13.7	11.7	12.6	13.8	14.7	11.8	10.7	11.6	11.5	9.6	7.3	8.1	7.8	8.2	7.3	6.6	6.5
Belgium	15.7	13.4	15.8	14.6	15.7	15.7	16.9	18.3	19.5	19.2	18.4	18.0	15.9	14.7	14.0	14.4	12.8	12.8	14.0	13.2
Canada	16.6	15.7	13.4	11.9	12.3	13.0	12.9	13.2	13.0	11.9	9.4	9.2	7.0	4.9	4.4	4.2	3.9	5.7	7.2	6.8
Czech Republic	..	..	..	..	..	..	..	..	..	3.6	-1.1	15.8	16.8	15.5	13.8	13.0	14.8	13.7	13.8	13.7
Denmark	..	..	..	..	7.4	8.4	11.2	10.8	9.7	8.3	4.2	6.9	5.6	3.6	3.6	1.6	2.9	3.4	3.8	4.1
Finland	3.0	2.7	1.6	3.2	-0.4	0.2	2.9	7.8	10.0	7.6	2.6	6.0	2.0	4.4	3.1	4.0	1.7	3.5	4.3	4.0
France	14.1	13.4	12.7	11.2	12.2	12.4	13.0	13.8	14.7	15.2	14.8	15.9	14.8	16.0	15.5	15.1	15.8	16.4	16.8	16.5
Germany	9.5	9.5	10.4	10.7	10.9	10.5	12.0	13.0	12.9	12.4	11.6	11.2	10.8	10.4	10.3	9.9	9.8	10.2	10.2	10.1
Ireland	12.6	10.5	8.6	9.5	6.6	4.6	6.4	7.5	6.9	9.8	5.9	8.8	7.3	8.0	10.6	10.4	7.9	8.3	8.4	8.2
Italy	22.8	21.0	20.2	19.5	18.4	17.0	18.4	18.7	18.4	17.2	17.2	16.6	16.0	14.5	12.7	11.5	10.2	10.1	10.5	10.3
Japan	19.4	19.0	19.0	16.5	15.5	15.7	13.9	15.3	14.6	14.7	12.6	12.3	11.3	10.6	11.8	11.1	11.3	12.5	13.2	13.6
Korea	14.1	14.8	20.0	23.2	25.1	23.6	22.0	24.0	22.8	20.6	19.4	16.8	15.9	15.4	23.0	16.0	16.6	15.2	13.3	13.6
Netherlands	5.6	5.6	8.2	8.3	8.1	9.8	11.6	7.2	8.3	6.8	7.1	14.9	13.6	13.4	12.9	9.5	7.6	10.3	12.2	12.7
New Zealand	6.6	5.7	4.4	7.2	5.8	5.5	3.3	5.5	3.4	3.3	0.4	0.6	0.6	-0.7	-1.5	-0.7	0.1	2.2	2.4	2.2
Norway	5.0	-1.8	-4.7	-4.6	-1.2	1.1	2.2	4.2	5.9	6.9	5.9	5.7	4.7	4.8	6.9	7.3	7.6	8.0	8.4	8.1
Portugal	23.2	24.3	21.8	21.4	16.4	15.1	16.4	17.0	14.8	12.6	10.2	10.3	10.3	10.0	8.5	7.7	8.7	9.0	9.3	9.6
Spain	11.6	11.1	12.1	10.6	11.0	10.2	12.3	13.4	11.9	14.4	11.9	14.4	14.2	12.1	11.1	11.7	11.2	10.7	11.3	11.2
Sweden	2.9	2.7	1.5	-3.0	-5.0	-4.9	-0.4	3.0	7.6	11.4	11.1	8.6	7.1	4.5	3.2	2.1	1.9	4.9	6.1	5.9
Switzerland	..	..	..	..	..	..	8.7	9.9	10.1	10.8	9.1	9.4	8.7	10.1	8.6	9.1	8.8	9.3	9.7	9.8
United Kingdom	10.3	9.8	8.2	6.4	4.9	6.6	8.0	10.0	11.4	10.8	9.3	10.0	9.1	9.5	5.7	4.8	5.0	5.2	5.6	5.8
United States	10.6	9.2	8.2	7.3	7.8	7.5	7.8	8.3	8.7	7.1	6.1	5.6	4.8	4.2	4.7	2.4	1.0	2.0	3.8	2.6

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence, there are breaks in many national series. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).* Countries differ in the way household disposable income is reported (in particular whether private pension benefits less pension contributions are included in disposable income or not), but the calculation of household saving is adjusted for this difference. Most countries are reporting household saving on a net basis (i.e. excluding consumption of fixed capital by households and unincorporated businesses). Six countries, Belgium, Denmark, France, Italy, Spain and the United Kingdom are reporting gross household saving. In most countries thehouseholds saving include saving by non-profit institutions (in some cases referred to as personal saving). Other countries (Czech Republic, Finland, France, Japan and New Zealand) report saving of households only.

Source: OECD.

Annex Table 27. **Gross national saving**

As a percentage of nominal GDP

	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Australia	18.6	20.6	20.2	19.0	19.5	21.3	22.7	21.4	17.7	15.9	16.7	18.0	17.7	18.2	19.0	19.5	19.1	19.4	..
Austria	24.2	22.7	23.6	23.6	23.7	23.9	23.9	24.4	25.0	24.8	23.9	22.4	22.3	21.8	21.5	21.7	21.9	21.0	21.8
Belgium	17.0	17.4	18.3	17.9	19.4	19.9	22.2	22.9	23.7	22.7	23.5	24.6	24.9	25.4	24.3	25.4	25.5	26.0	26.2
Canada	20.1	20.0	20.8	20.2	18.7	20.0	20.8	20.0	17.5	14.9	13.6	14.2	16.4	18.5	19.1	19.9	19.5	21.0	23.7
Czech Republic	..	..	..	..	..	..	..	..	..	..	27.9	28.1	27.3	29.9	27.4	26.1	26.4	25.0	..
Denmark	8.5	11.7	16.2	16.0	19.0	18.2	19.2	19.5	20.7	20.0	20.3	19.2	19.1	20.4	20.4	21.2	20.9	22.4	23.7
Finland	24.7	24.2	25.4	24.4	23.8	23.7	26.1	26.1	24.5	16.8	14.0	14.9	18.4	21.6	20.7	24.1	24.9	25.1	27.6
France	18.8	18.6	18.3	18.1	19.4	19.6	20.8	21.6	21.5	20.9	20.5	19.0	19.2	19.5	19.2	20.4	21.4	21.8	22.0
Germany	20.2	21.2	21.7	22.0	23.8	23.5	24.3	25.7	24.9	23.3	23.1	22.0	22.0	21.9	21.3	21.4	21.5	21.0	21.3
Greece	24.0	21.9	23.0	22.6	22.4	18.9	21.3	19.0	19.1	20.7	20.0	18.5	19.4	18.0	17.4	17.9	17.8	18.7	18.2
Iceland	21.0	20.1	17.8	15.8	19.2	16.8	16.5	16.3	17.5	16.8	16.7	18.4	18.9	18.0	18.2	19.3	18.2	16.0	14.3
Ireland	14.4	14.3	14.1	13.5	13.4	14.5	14.7	15.0	18.0	17.7	15.6	17.7	18.0	20.6	22.1	23.8	25.3	24.3	24.1
Italy	22.8	23.1	23.1	22.6	22.4	21.9	21.8	21.0	20.7	19.6	18.3	19.2	19.7	21.6	21.9	21.6	21.1	20.7	20.6
Japan	31.0	30.3	31.2	32.0	32.2	32.7	33.6	33.6	33.5	34.4	33.6	32.0	30.1	29.6	29.9	30.2	29.1	27.8	..
Korea	25.1	28.8	30.6	30.6	34.6	38.4	40.7	37.6	37.6	37.4	36.5	36.2	35.6	35.4	33.7	33.3	33.7	32.6	32.1
Mexico	26.3	28.4	25.7	25.8	19.1	24.5	21.3	20.3	20.3	18.7	16.6	15.1	14.8	19.3	22.5	24.0	20.5	20.6	..
Netherlands	23.5	24.0	25.2	25.7	25.8	23.8	25.6	27.2	26.0	25.4	24.4	24.6	26.3	27.4	26.7	27.9	25.2	26.7	27.6
New Zealand	17.5	18.8	19.1	18.6	18.9	18.0	18.6	17.8	16.2	13.0	13.9	16.6	17.3	17.2	16.4	15.7	15.8	14.9	..
Norway	29.1	29.6	32.1	31.2	25.5	25.7	25.1	26.2	25.8	25.1	24.2	24.6	25.4	27.0	29.3	30.7	27.3	28.6	36.4
Poland	..	..	..	..	..	..	..	..	..	15.9	15.4	15.8	20.0	21.2	20.8	21.0	22.0	20.9	..
Portugal	6.0	5.8	5.4	6.2	7.6	8.5	8.3	8.6	8.1	7.0	6.6	5.7	5.2	5.3	4.3	4.0	3.5	2.3	1.9
Spain	20.7	20.9	22.0	22.0	22.7	22.7	23.6	22.9	22.6	22.0	20.1	20.1	20.0	22.3	22.1	22.6	22.6	22.2	22.3
Sweden	16.2	18.3	20.5	19.9	20.6	20.7	21.2	21.7	20.0	17.9	15.2	13.4	17.1	20.3	19.4	19.9	20.6	20.9	21.1
Switzerland	28.3	27.4	30.0	30.4	30.0	29.8	31.8	32.5	32.3	30.2	28.4	28.9	27.9	28.5	27.9	30.3	30.7	31.6	..
Turkey	18.4	15.5	16.3	20.7	23.9	24.3	28.9	26.4	21.5	17.7	18.5	18.7	18.9	20.1	22.6	21.6	20.6	13.7	15.6
United Kingdom	18.0	18.3	19.0	19.0	17.6	17.7	17.7	17.6	16.7	15.6	14.5	14.2	16.2	16.4	16.8	18.0	18.0	16.3	16.1
United States	18.5	16.3	18.5	17.2	15.4	15.9	17.2	16.7	15.9	16.1	15.1	15.0	15.8	16.4	16.7	17.6	18.4	18.0	..
European Union	19.7	20.1	20.6	20.6	21.1	20.9	21.6	21.9	21.5	20.5	19.6	19.1	19.8	20.5	20.3	20.9	20.9	20.6	20.8
Total OECD	21.3	20.8	21.9	21.6	21.0	21.5	22.5	22.2	21.5	21.1	20.2	19.8	20.1	20.8	21.0	21.6	21.6	21.1	21.7

Note: Based on SNA93 or ESA95 except for Switzerland and Turkey that report on SNA68 basis.
Source: OECD.

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Annex Table 28. **General government total outlays**

As a percentage of nominal GDP

	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	38.0	37.7	36.3	33.4	32.4	33.2	34.7	36.4	36.5	35.6	35.7	34.9	33.7	33.3	32.9	32.6	33.3	33.2	32.9
Austria	50.3	51.3	51.7	50.8	49.3	48.8	49.9	50.5	53.3	52.6	52.5	52.0	49.8	50.1	49.5	47.9	47.9	47.5	46.6
Belgium	57.1	56.3	54.3	52.2	50.5	50.4	51.5	51.5	53.0	51.1	50.2	50.1	48.6	48.0	47.4	46.7	46.3	46.0	45.7
Canada	45.2	44.6	43.2	42.5	43.0	45.7	48.9	49.9	48.7	46.3	45.0	43.1	40.5	40.2	38.7	37.7	37.8	38.6	38.4
Czech Republic	..	..	..	..	..	..	..	..	43.9	44.8	43.9	43.2	42.6	41.5	43.9	45.8	46.6	48.5	46.2
Denmark	..	..	..	54.2	54.3	53.6	54.5	55.5	58.1	58.0	56.6	56.3	54.4	53.4	51.8	49.9	49.4	49.6	49.4
Finland	42.3	43.3	43.8	42.7	41.0	44.4	52.7	57.7	59.1	57.5	54.3	54.0	51.3	48.1	47.1	43.9	44.6	45.3	44.5
France	51.9	51.2	50.2	49.9	48.9	49.5	50.0	51.7	53.9	53.8	53.5	53.8	52.8	52.1	51.8	51.0	50.8	50.9	50.4
Germany [a]	45.6	45.0	45.3	44.9	43.5	43.8	44.2	45.0	46.2	45.9	46.3	47.3	46.5	46.0	46.2	43.3	45.7	46.2	45.2
Greece	43.8	42.9	43.1	41.4	43.1	47.4	43.8	45.9	48.1	46.0	54.6	52.4	50.8	50.7	52.1	52.3	51.0	50.5	49.7
Hungary	..	..	..	..	..	..	..	..	59.8	63.4	56.2	53.2	52.2	53.1	50.0	48.2	48.1	48.0	48.2
Iceland	35.3	37.3	34.3	39.0	41.5	39.0	40.1	40.5	40.4	39.9	39.2	38.6	37.2	37.7	39.1	38.5	39.9	40.3	39.7
Ireland	50.7	50.6	48.1	45.4	39.2	39.9	41.3	41.7	41.3	41.1	38.0	36.4	34.2	32.2	31.9	29.3	30.0	30.9	31.2
Italy	49.7	49.6	49.4	49.5	50.3	52.9	54.0	53.2	55.4	52.7	51.1	51.3	48.5	47.3	46.7	44.4	45.3	44.7	44.7
Japan [b]	29.4	29.6	30.0	29.4	28.9	30.5	30.3	31.0	32.8	33.3	34.4	34.9	33.8	34.8	35.9	36.6	36.9	37.4	37.4
Korea	17.6	16.9	16.0	16.2	17.3	18.3	19.4	20.6	20.1	19.7	19.3	20.7	21.5	24.1	23.3	23.1	24.6	25.1	24.9
Luxembourg	..	..	..	..	..	41.3	43.3	43.6	44.3	42.4	43.3	43.3	40.8	40.0	40.1	38.1	39.3	40.5	40.1
Netherlands [c]	51.9	52.0	53.3	51.3	48.9	49.4	49.5	50.0	49.9	47.6	47.7	45.6	44.4	43.4	43.3	41.6	41.3	41.6	41.4
New Zealand	..	51.8	48.1	49.1	47.5	48.1	45.3	44.8	41.4	39.3	38.6	37.6	38.4	39.5	39.0	38.6	38.9	39.9	40.0
Norway	41.5	45.4	47.7	49.5	49.1	49.7	50.6	52.0	51.0	49.9	47.6	45.4	43.8	46.3	45.8	40.8	40.8	42.4	41.5
Poland	..	..	..	..	..	..	..	..	54.3	49.4	47.0	46.1	45.6	43.8	43.4	43.8	46.1	46.1	45.9
Portugal	39.9	40.3	38.9	37.5	36.7	39.6	42.0	42.6	44.2	42.7	41.3	41.6	40.0	40.2	40.6	40.8	40.7	40.0	39.7
Spain	39.7	40.6	39.6	39.0	40.7	41.6	42.7	43.9	47.2	45.1	44.0	42.8	41.2	40.6	39.6	38.8	38.1	38.1	37.9
Sweden	60.4	58.6	54.8	55.2	55.1	55.9	58.9	64.3	67.5	64.8	61.9	59.9	58.0	55.5	55.1	52.7	52.9	53.0	52.8
United Kingdom	..	..	40.5	38.1	37.3	39.1	41.1	43.0	43.2	42.6	42.2	40.7	38.9	37.7	37.1	37.0	38.4	39.4	39.8
United States [d]	33.8	34.2	33.9	32.9	32.8	33.6	34.2	34.8	34.1	33.1	32.9	32.4	31.4	30.5	30.2	29.9	30.4	31.2	30.6
Euro area	47.7	47.5	47.2	46.6	46.3	47.3	47.8	48.5	50.4	49.3	49.0	49.2	47.8	47.0	46.7	44.8	45.5	45.5	45.0
Total of above European Union countries	48.3	48.0	46.5	45.8	45.2	46.4	47.3	48.3	49.9	48.8	48.4	48.2	46.6	45.8	45.4	43.9	44.7	44.9	44.5
Total of above OECD countries	37.8	37.9	37.8	37.1	36.7	37.9	38.7	39.5	40.4	39.5	39.3	39.0	37.8	37.4	37.2	36.6	37.2	37.7	37.3

Note: Total outlays are defined as current outlays plus net capital outlays. Data refer to the general government sector, which is a consolidation of accounts for the central, state and local governments plus social security. One off revenues from the sale of mobile telephone licenses are recorded as negative capital outlays. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) The 1995 outlays are net of the debt taken on this year from the Inherited Debt funds.

b) The 1998 outlays would be 5.4 percentage points of GDP higher if account were taken of the assumption by the central government of the debt of the Japan Railway Settlement Corporation and the National Forest Special Account. The 2000 outlays include capital transfers to the Deposit Insurance Company.

c) The 1995 outlays would be 4.9 percentage points of GDP higher if capital transfers to social rental companies were taken into account.

d) These data include outlays net of operating surpluses of public enterprises.

Source: OECD.

Annex Table 29 . **General government current tax and non-tax receipts**

As a percentage of nominal GDP

	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	32.8	33.5	34.1	33.1	32.3	32.0	31.0	30.5	31.0	31.0	32.0	32.8	33.2	33.9	34.0	33.0	33.4	33.5	33.4
Austria	47.7	47.5	47.3	47.3	46.2	46.4	46.9	48.5	49.0	47.6	47.3	48.1	47.9	47.8	47.3	46.8	47.8	47.1	46.7
Belgium	46.8	46.1	46.3	44.9	42.9	43.7	44.1	43.6	45.6	46.0	45.8	46.4	46.6	47.1	46.8	46.7	46.3	46.0	46.0
Canada	36.7	37.5	37.8	38.2	38.4	39.9	40.6	40.8	40.0	39.7	39.7	40.3	40.7	40.7	40.4	40.9	40.7	40.8	40.6
Czech Republic	..	..	..	..	..	..	..	..	43.5	43.5	42.8	41.2	40.2	39.1	40.0	40.3	40.6	39.2	40.3
Denmark	..	..	..	55.7	54.6	52.5	52.1	53.3	55.2	55.6	54.3	55.3	54.8	54.5	54.9	52.7	51.4	51.0	51.1
Finland	45.6	47.0	45.1	46.5	46.9	49.6	51.6	52.0	51.8	51.8	50.6	50.9	49.8	49.4	49.0	50.8	48.3	47.2	46.6
France	48.9	48.0	48.3	47.4	47.1	47.4	47.6	47.5	48.0	48.2	48.0	49.7	49.7	49.5	50.2	49.6	49.3	49.1	49.0
Germany	44.5	43.8	43.5	42.8	43.6	41.8	41.2	42.5	43.0	43.5	43.0	43.9	43.7	43.8	44.6	44.4	43.2	43.7	43.4
Greece	32.2	33.3	33.5	30.0	28.9	31.5	32.5	33.3	34.5	36.1	44.5	44.9	46.8	48.2	50.2	51.2	51.2	51.1	51.0
Hungary	..	..	..	..	..	..	..	..	53.2	52.3	48.7	47.3	45.0	44.9	44.8	45.2	43.2	43.3	43.7
Iceland	33.6	33.3	33.5	37.0	37.0	35.8	37.2	37.7	35.9	35.2	36.2	37.0	37.1	38.2	41.2	40.8	39.6	39.5	38.8
Ireland	40.3	40.4	39.9	41.1	37.5	37.1	38.5	38.8	38.6	39.1	35.9	36.2	35.4	34.5	34.2	33.9	33.2	33.1	33.1
Italy	37.4	38.2	38.5	38.8	40.5	41.2	42.3	42.6	45.2	43.4	43.5	44.2	45.8	44.5	44.9	44.1	43.9	43.6	43.6
Japan [a]	28.8	28.9	30.3	30.5	30.7	32.4	32.1	31.8	30.4	30.5	30.2	30.0	30.0	29.3	28.9	30.0	30.5	30.6	30.8
Korea	18.8	18.4	18.6	19.7	20.8	21.8	21.3	22.0	22.6	22.8	23.5	24.5	25.2	26.1	26.3	30.1	30.2	30.2	30.4
Luxembourg	..	..	..	..	..	46.4	44.8	44.3	46.4	45.4	45.6	45.2	44.2	43.4	43.7	44.2	44.7	43.7	42.9
Netherlands	47.9	46.3	46.7	46.2	43.6	43.7	46.3	45.6	46.3	43.4	43.6	43.8	43.3	42.6	43.7	43.8	42.4	42.2	42.1
New Zealand	..	45.4	46.0	44.5	44.1	43.5	41.7	41.7	41.0	42.4	41.5	40.5	40.1	39.3	39.9	40.6	40.2	40.0	39.7
Norway	51.4	51.3	52.3	52.1	51.0	52.3	50.7	50.2	49.6	50.3	51.1	52.0	51.7	49.8	51.6	55.5	55.0	53.8	53.3
Poland	..	..	..	..	..	..	..	..	49.8	45.9	44.5	43.3	42.8	41.5	41.4	41.6	41.7	41.2	41.0
Portugal	32.6	34.1	33.5	34.1	34.3	34.7	36.2	39.7	38.2	36.9	36.7	37.6	37.3	37.9	38.5	39.2	39.0	38.5	38.3
Spain	34.1	34.5	35.9	35.7	37.2	37.5	38.3	39.9	40.5	39.0	37.4	37.8	38.0	38.0	38.5	38.5	38.1	37.8	37.8
Sweden	56.5	57.3	58.7	58.1	60.0	59.7	57.0	56.5	55.6	54.0	54.2	56.8	56.4	57.6	56.8	56.7	56.7	54.7	54.7
United Kingdom	..	..	38.7	38.6	38.1	37.5	38.0	36.6	35.3	35.9	36.5	36.3	36.7	38.1	38.2	39.0	39.5	39.4	39.1
United States [b]	28.7	28.9	29.6	29.3	29.5	29.3	29.2	28.9	29.2	29.4	29.8	30.2	30.5	30.8	31.1	31.6	31.0	30.0	30.0
Euro area	42.8	42.6	42.7	42.2	42.9	42.6	42.8	43.4	44.6	44.2	44.0	44.9	45.1	44.8	45.4	45.0	44.3	44.2	44.1
Total of above European Union countries	43.1	42.9	42.4	42.3	42.5	42.3	42.6	42.9	43.5	43.2	43.1	43.8	44.1	44.1	44.6	44.5	44.0	43.9	43.7
Total of above OECD countries	33.6	33.7	34.6	34.5	34.7	34.9	35.0	35.0	35.4	35.3	35.4	35.8	36.1	36.1	36.3	36.8	36.4	36.0	36.0

Note: Current receipts exclude capital receipts. Non-tax current receipts include operating surpluses of public enterprises, property income, fees, charges, fines, etc. Data refer to the general government sector, which is a consolidation of accounts for central, state and local governments plus social security. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) Includes deferred tax payments on postal savings accounts in 2000, 2001 and 2002.

b) Excludes the operating surpluses of public enterprises.

Source: OECD.

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Annex Table 30. **General government financial balances**

Surplus (+) or deficit (-) as a percentage of nominal GDP

	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	-5.1	-4.2	-2.2	-0.4	0.0	-1.2	-3.8	-6.0	-5.6	-4.6	-3.7	-2.2	-0.5	0.6	1.1	0.3	0.1	0.2	0.5
Austria	-2.6	-3.8	-4.4	-3.5	-3.1	-2.4	-3.0	-2.0	-4.2	-5.0	-5.2	-3.8	-1.9	-2.4	-2.2	-1.1	0.0	-0.4	0.1
Belgium	-10.2	-10.1	-7.9	-7.3	-7.6	-6.7	-7.3	-7.9	-7.3	-5.0	-4.4	-3.7	-2.0	-0.8	-0.6	0.1	0.0	0.0	0.2
Canada	-8.6	-7.1	-5.4	-4.3	-4.6	-5.8	-8.3	-9.1	-8.7	-6.7	-5.3	-2.8	0.2	0.5	1.6	3.2	2.8	2.1	2.2
Czech Republic	..	..	..	..	..	..	..	..	-0.4	-1.2	-1.1	-2.0	-2.4	-2.4	-3.9	-5.5	-6.0	-9.3	-5.8
Denmark	..	..	..	1.5	0.3	-1.0	-2.4	-2.2	-2.9	-2.4	-2.3	-1.0	0.4	1.1	3.1	2.8	2.0	1.4	1.7
Finland	3.3	3.7	1.3	3.8	6.0	5.3	-1.1	-5.6	-7.3	-5.7	-3.7	-3.2	-1.5	1.3	1.9	6.9	3.7	1.9	2.1
France	-3.0	-3.2	-2.0	-2.5	-1.8	-2.1	-2.4	-4.2	-6.0	-5.5	-5.5	-4.1	-3.0	-2.7	-1.6	-1.4	-1.5	-1.8	-1.4
Germany [a]	-1.1	-1.3	-1.8	-2.1	0.1	-2.0	-3.0	-2.5	-3.1	-2.4	-3.3	-3.4	-2.7	-2.2	-1.6	1.2	-2.5	-2.5	-1.8
Greece	-11.6	-9.6	-9.6	-11.4	-14.2	-15.9	-11.4	-12.6	-13.6	-9.9	-10.2	-7.4	-4.0	-2.4	-1.8	-1.1	0.2	0.6	1.3
Hungary	..	..	..	..	..	..	..	..	-6.6	-11.0	-7.6	-5.9	-7.2	-8.3	-5.2	-3.0	-4.9	-4.8	-4.5
Iceland	-1.6	-4.0	-0.8	-2.0	-4.5	-3.3	-2.9	-2.8	-4.5	-4.7	-3.0	-1.6	0.0	0.5	2.1	2.3	-0.2	-0.8	-0.9
Ireland	-10.3	-10.2	-8.2	-4.2	-1.7	-2.8	-2.9	-3.0	-2.7	-2.0	-2.2	-0.2	1.2	2.3	2.3	4.6	3.2	2.2	1.9
Italy	-12.2	-11.4	-11.0	-10.7	-9.8	-11.8	-11.7	-10.7	-10.3	-9.3	-7.6	-7.1	-2.7	-2.8	-1.8	-0.3	-1.4	-1.1	-1.1
Japan [b]	-0.6	-0.7	0.3	1.1	1.8	1.9	1.8	0.8	-2.4	-2.8	-4.2	-4.9	-3.7	-5.5	-7.0	-6.6	-6.4	-6.7	-6.6
Korea	1.1	1.6	2.6	3.5	3.4	3.5	1.8	1.4	2.5	3.1	4.2	3.8	3.6	1.9	3.1	6.9	5.7	5.1	5.5
Luxembourg	..	..	..	..	..	5.1	1.5	0.7	2.1	2.9	2.3	2.0	3.4	3.4	3.6	6.1	5.3	3.2	2.9
Netherlands [c]	-4.1	-5.7	-6.6	-5.1	-5.3	-5.7	-3.2	-4.4	-3.6	-4.2	-4.2	-1.8	-1.1	-0.8	0.4	2.2	1.1	0.6	0.7
New Zealand	..	-6.4	-2.1	-4.6	-3.4	-4.6	-3.5	-3.1	-0.4	3.1	2.9	2.9	1.6	-0.2	0.9	1.9	1.3	0.1	-0.3
Norway	9.9	5.9	4.6	2.7	1.8	2.6	0.1	-1.7	-1.4	0.4	3.5	6.6	7.9	3.5	5.9	14.8	14.3	11.5	11.7
Poland	..	..	..	..	..	..	..	..	-4.5	-3.5	-2.5	-2.9	-2.8	-2.3	-2.0	-2.2	-4.4	-4.9	-4.9
Portugal	-7.3	-6.2	-5.5	-3.4	-2.3	-5.0	-5.9	-2.9	-6.0	-5.9	-4.6	-4.0	-2.7	-2.3	-2.1	-1.5	-1.7	-1.5	-1.4
Spain	-5.6	-6.1	-3.7	-3.3	-3.6	-4.2	-4.3	-4.0	-6.7	-6.1	-6.6	-4.9	-3.2	-2.6	-1.2	-0.3	0.0	-0.4	0.0
Sweden	-3.9	-1.4	3.9	3.0	4.9	3.8	-2.0	-7.8	-11.9	-10.8	-7.7	-3.1	-1.6	2.1	1.7	4.1	3.8	1.6	1.8
United Kingdom [d]	-2.9	-2.6	-1.8	0.5	0.8	-1.6	-3.1	-6.4	-7.9	-6.7	-5.8	-4.4	-2.2	0.4	1.1	1.9	1.1	0.0	-0.7
United States [e]	-5.0	-5.3	-4.3	-3.6	-3.2	-4.3	-5.0	-5.9	-5.0	-3.6	-3.1	-2.2	-0.9	0.3	0.8	1.7	0.6	-1.1	-0.6
Euro area	-4.8	-4.9	-4.5	-4.4	-3.5	-4.7	-5.0	-5.1	-5.8	-5.1	-5.0	-4.3	-2.6	-2.2	-1.3	0.2	-1.2	-1.3	-0.9
Total of above European Union countries	-4.8	-4.7	-4.1	-3.6	-2.7	-4.1	-4.7	-5.4	-6.4	-5.6	-5.3	-4.3	-2.5	-1.7	-0.8	0.6	-0.7	-1.0	-0.8
Total of above OECD countries	-4.1	-4.1	-3.3	-2.6	-2.0	-3.0	-3.7	-4.5	-5.0	-4.1	-3.9	-3.2	-1.7	-1.3	-0.9	0.2	-0.7	-1.6	-1.3
Memorandum items																			
General government financial balances excluding social security																			
United States	-5.3	-5.4	-4.8	-4.4	-4.2	-5.4	-5.9	-6.7	-5.7	-4.5	-3.9	-3.1	-2.0	-0.9	-0.6	0.2	-1.0	-2.9	-2.4
Japan [f]	-3.1	-3.5	-2.5	-2.0	-1.4	-1.5	-0.7	-1.6	-4.5	-4.7	-6.0	-6.5	-5.3	-6.7	-7.8	-7.3	-7.0	-7.3	-6.6

Note: Financial balances include one-off revenues from the sale of the mobile telephone licenses. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)*.

a) The 1995 outlays are net of the debt taken on this year from the Inherited Debt Funds.

b) The 1998 outlays would be 5.4 percentage points of GDP higher if account were taken of the assumption by the central government of the debt of the Japan Railway Settlement Corporation and the National Forest Special Account. Deferred tax payments on postal savings accounts are included in 2000, 2001 and 2002. The 2000 outlays include capital transfers to the Deposit Insurance Company.

c) The 1995 outlays would be 4.9 percentage points of GDP higher if capital transfers to social rental companies were taken into account.

d) Includes only rents for the use of spectrum for the third generation mobile telephone in 2000 and onwards, as the lump-sum prepayment made in 2000 will be amortised over the next 20 years.

e) The general government sector includes public enterprises.

f) From 1991 onwards data are based on SNA93 and thus exclude private pension funds.

Source: OECD.

Annex Table 31. **General government structural balances**

Surplus (+) or deficit (-) as a percentage of potential GDP

	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	-5.3	-3.9	-2.1	-0.5	-0.3	-0.9	-2.5	-4.6	-4.6	-4.1	-3.5	-2.1	-0.4	0.4	0.8	-0.1	0.1	0.5	0.5
Austria	-1.9	-3.2	-3.7	-3.1	-3.3	-3.1	-3.7	-2.7	-4.1	-4.9	-4.9	-3.6	-1.6	-2.5	-2.4	-1.9	0.0	-0.1	0.3
Belgium	-8.8	-8.8	-7.6	-8.8	-10.2	-9.8	-10.0	-9.9	-6.8	-4.5	-4.0	-2.6	-1.6	-0.4	-0.5	-0.7	-0.2	0.6	0.7
Canada	-8.7	-7.4	-6.3	-6.0	-6.1	-6.2	-6.4	-6.5	-6.3	-5.3	-4.1	-1.1	1.4	1.4	1.7	2.6	2.8	2.6	2.4
Denmark	..	..	..	1.6	1.8	1.4	0.3	1.0	1.8	-0.1	-0.5	0.3	0.9	1.2	3.2	2.4	2.2	2.2	2.5
Finland	3.9	4.3	1.0	2.2	3.1	3.2	1.8	0.6	0.8	0.8	1.0	0.5	0.1	1.8	2.1	5.6	4.0	3.4	3.5
France	-1.2	-1.6	-0.7	-2.0	-2.2	-2.7	-2.7	-4.2	-5.0	-4.6	-4.6	-2.9	-1.8	-2.1	-1.4	-1.6	-1.7	-1.7	-1.4
Germany	-0.1	-0.7	-1.3	-2.5	-0.7	-4.1	-3.5	-3.0	-2.1	-1.7	-2.8	-2.5	-1.8	-1.4	-0.9	-1.3	-2.0	-1.5	-1.4
Greece	-10.9	-9.1	-8.4	-11.6	-15.5	-15.9	-11.7	-12.4	-11.9	-8.3	-8.6	-6.0	-3.2	-0.9	-0.5	-0.8	-0.3	0.3	0.7
Iceland	-1.2	-4.8	-3.3	-3.5	-5.1	-3.6	-2.5	-0.4	-1.9	-3.3	-1.2	-1.0	-0.3	-0.2	1.2	0.9	-1.2	-0.7	-1.2
Ireland	-9.4	-7.7	-6.2	-3.1	-1.5	-3.9	-2.8	-2.1	-0.9	0.0	-1.3	0.5	1.0	2.3	1.6	2.8	2.0	2.2	2.3
Italy	-11.4	-10.7	-10.6	-11.2	-10.7	-12.5	-12.0	-10.3	-8.7	-8.2	-7.3	-6.5	-2.0	-2.0	-0.7	-0.8	-0.6	0.1	-0.2
Japan [a]	-0.2	0.0	0.9	1.2	1.6	1.3	1.4	0.6	-2.3	-2.6	-3.9	-5.1	-4.1	-5.3	-6.7	-6.5	-5.8	-5.7	-5.5
Netherlands	-3.6	-5.4	-5.8	-4.3	-6.0	-7.6	-4.8	-5.4	-3.5	-4.7	-4.4	-2.1	-1.6	-1.6	-0.7	0.3	0.9	1.1	1.1
New Zealand	..	-7.9	-3.0	-4.3	-3.0	-3.1	-0.5	0.0	0.8	2.6	2.1	2.1	1.3	0.8	1.2	1.6	1.1	0.4	-0.4
Norway [b]	-0.9	1.1	0.3	0.8	0.3	-1.4	-4.3	-6.3	-6.6	-5.5	-2.2	-2.2	-1.5	-2.8	-1.1	0.3	-0.3	-1.0	-1.7
Portugal	-4.8	-4.2	-4.4	-3.6	-3.0	-6.1	-6.9	-3.7	-5.4	-5.2	-3.9	-3.6	-2.6	-2.5	-2.4	-2.3	-1.6	-0.9	-0.8
Spain	-4.0	-4.5	-3.1	-3.6	-4.5	-5.4	-5.4	-4.1	-5.2	-4.5	-4.8	-2.7	-1.4	-1.5	-0.8	-0.5	0.0	0.0	0.0
Sweden	-3.7	-2.0	2.3	0.7	2.2	1.7	-2.0	-5.2	-7.1	-7.9	-6.0	-0.9	0.6	3.4	2.1	3.9	4.4	2.8	2.6
United Kingdom	..	..	-2.7	-1.8	-1.3	-2.9	-2.2	-4.2	-5.6	-5.6	-5.0	-3.7	-2.0	0.4	1.4	1.9	1.2	0.4	-0.5
United States	-4.8	-5.1	-4.3	-3.9	-3.7	-4.5	-4.3	-5.3	-4.4	-3.5	-2.8	-2.1	-1.1	0.0	0.5	1.3	0.7	-0.5	-0.2
Euro area	-3.6	-3.9	-3.8	-4.6	-4.4	-6.1	-5.7	-5.2	-4.5	-4.1	-4.2	-3.2	-1.7	-1.5	-0.9	-0.9	-0.9	-0.6	-0.5
Total of above European Union countries	-4.0	-4.2	-3.7	-4.1	-3.8	-5.4	-5.0	-5.1	-4.9	-4.6	-4.6	-3.3	-1.7	-1.1	-0.4	-0.3	-0.5	-0.3	-0.4
Total of above OECD countries	-3.9	-4.0	-3.2	-3.2	-2.9	-3.9	-3.7	-4.3	-4.3	-3.8	-3.7	-3.0	-1.7	-1.2	-0.9	-0.5	-0.7	-1.1	-1.0

Note: Structural balances exclude one-off revenues from the sale of the mobile telephone license. See *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)* for details on the methodology used for estimating the structural component of government balances and Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex.

a) Includes deferred tax payments on postal savings accounts in 2000, 2001 and 2002. The 2000 outlays include capital transfers to the Deposit Insurance Company.

b) As a percentage of mainland potential GDP. The financial balances shown exclude revenues from oil production.

Source: OECD.

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Annex Table 32. **General government primary balances**

Surplus (+) or deficit (-) as a percentage of nominal GDP

	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	-1.4	-0.1	1.8	3.3	3.6	2.1	-0.9	-2.6	-2.7	-0.6	0.1	1.1	2.1	2.7	3.1	2.1	1.8	1.9	2.1
Austria	0.3	-0.9	-1.3	-0.2	0.0	0.8	0.4	1.4	-0.7	-1.5	-1.6	-0.2	1.7	1.2	1.3	2.3	3.1	2.7	3.1
Belgium	0.0	0.6	2.2	2.5	3.2	4.4	3.3	2.6	3.3	4.2	4.5	4.7	5.6	6.4	6.1	6.5	6.2	5.8	5.9
Canada	-4.6	-3.0	-1.3	-0.1	0.1	-0.6	-3.2	-4.1	-3.8	-1.7	0.2	2.4	5.0	5.3	6.0	6.6	5.7	5.0	5.0
Denmark	..	..	..	5.8	4.3	2.8	1.6	1.0	0.6	0.9	0.9	1.9	3.3	3.6	5.4	4.7	3.8	3.1	3.2
Finland	2.4	2.6	0.4	2.9	4.7	3.6	-3.1	-7.6	-7.7	-4.6	-2.8	-1.7	0.4	3.0	3.5	7.9	4.8	3.0	3.0
France	-0.9	-1.0	0.2	-0.3	0.4	0.3	0.1	-1.4	-3.0	-2.4	-2.2	-0.6	0.2	0.5	1.4	1.6	1.4	1.0	1.4
Germany	1.1	1.0	0.4	0.2	2.2	-0.1	-0.8	0.0	-0.5	0.3	-0.2	-0.3	0.3	0.9	1.5	4.0	0.1	0.3	0.9
Greece	-6.6	-4.2	-2.8	-4.0	-6.7	-5.9	-2.1	-1.1	-1.0	4.0	2.6	4.6	5.6	6.6	6.9	7.3	8.0	7.9	8.0
Iceland	-1.5	-3.4	-0.5	-0.8	-3.1	-1.1	-0.8	-0.6	-2.1	-2.2	-0.1	1.0	2.5	2.9	4.1	3.8	1.5	0.7	0.6
Ireland	-5.5	-5.3	-3.2	0.2	4.3	3.4	2.8	2.2	2.1	2.6	1.8	3.0	4.1	4.6	3.7	5.5	3.6	2.4	2.0
Italy	-4.2	-2.9	-3.0	-2.4	-0.6	-1.8	-0.4	1.5	2.3	1.7	3.3	3.8	6.1	4.7	4.3	5.6	4.2	4.0	4.2
Japan	1.8	1.6	2.5	2.9	3.5	3.2	2.9	1.9	-1.3	-2.6	-3.5	-3.8	-2.6	-4.2	-5.7	-5.3	-5.1	-5.4	-5.2
Korea	1.2	1.7	2.7	3.5	3.2	3.2	1.4	1.0	2.1	2.7	3.8	3.2	2.8	0.6	2.0	5.8	4.7	4.2	4.6
Luxembourg	..	..	..	..	..	3.0	-0.6	-1.2	0.5	1.6	1.2	1.1	2.5	2.4	2.8	5.1	4.5	2.4	2.1
Netherlands	0.3	-1.2	-1.9	-0.5	-1.2	-1.6	1.1	0.0	0.8	0.2	0.6	2.9	3.3	3.4	4.3	5.4	3.5	2.7	2.3
New Zealand	..	-2.1	1.9	-1.3	0.4	-0.5	-0.7	-0.2	1.9	4.4	4.4	3.5	2.2	-1.4	1.3	2.3	1.6	0.3	-0.2
Norway	8.7	4.2	2.8	0.3	-0.4	0.4	-2.0	-3.5	-2.7	-0.2	2.9	6.1	7.5	3.2	4.8	13.7	13.2	10.4	10.6
Portugal	0.9	2.2	2.2	3.3	3.7	2.9	1.8	4.1	0.1	0.2	1.7	1.4	1.6	1.2	1.1	1.6	1.3	1.4	1.4
Spain	-4.8	-3.4	-0.5	-0.6	-0.3	-1.0	-1.2	-0.3	-2.2	-1.9	-1.8	0.0	1.2	1.4	2.2	2.7	2.7	2.1	2.4
Sweden	-0.9	0.8	5.6	3.9	5.4	3.9	-1.8	-7.5	-11.0	-8.9	-5.1	-0.1	1.7	4.9	4.3	5.9	5.1	2.8	2.9
United Kingdom	0.5	0.6	1.3	3.2	3.2	0.8	-1.1	-4.4	-5.7	-4.1	-2.8	-1.6	0.8	3.2	3.5	4.1	2.9	1.8	1.0
United States	-1.8	-2.0	-1.0	-0.3	0.2	-0.8	-1.3	-2.2	-1.4	-0.2	0.6	1.3	2.4	3.5	3.7	4.4	2.9	0.9	1.2
Euro area	-1.1	-0.9	-0.5	-0.4	0.7	-0.2	-0.3	0.0	-0.6	-0.2	0.0	0.9	2.0	2.1	2.5	3.9	2.3	2.0	2.3
Total of above European Union countries	-1.1	-0.7	-0.1	0.3	1.2	0.0	-0.4	-0.8	-1.5	-0.9	-0.4	0.6	1.9	2.4	2.8	4.0	2.5	2.0	2.2
Total of above OECD countries	-0.9	-0.8	0.0	0.6	1.2	0.3	-0.3	-1.0	-1.4	-0.8	-0.3	0.4	1.6	1.9	2.0	2.9	1.7	0.7	0.9

Note: The primary balance is the difference between the financial balance and net interest payments. For more details see footnotes of Annex Tables 30 and 33, *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)* and Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex.

Source: OECD.

Annex Table 33. **General government net debt interest payments**

As a percentage of nominal GDP

	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	3.7	4.1	3.9	3.6	3.7	3.3	2.9	3.4	2.9	4.0	3.9	3.2	2.6	2.1	2.0	1.8	1.8	1.7	1.6
Austria	2.8	2.9	3.1	3.3	3.2	3.2	3.3	3.4	3.6	3.5	3.6	3.6	3.6	3.6	3.5	3.4	3.2	3.1	3.0
Belgium	10.3	10.7	10.1	9.8	10.7	11.1	10.7	10.6	10.6	9.2	8.9	8.4	7.6	7.2	6.7	6.5	6.2	5.8	5.7
Canada	4.0	4.1	4.1	4.3	4.7	5.2	5.1	5.0	4.9	5.0	5.5	5.2	4.8	4.8	4.4	3.3	2.9	2.9	2.8
Denmark	..	..	..	4.3	4.0	3.8	4.0	3.2	3.5	3.3	3.1	2.9	2.9	2.5	2.3	1.9	1.8	1.8	1.5
Finland	-0.9	-1.0	-0.9	-0.9	-1.2	-1.7	-1.9	-1.9	-0.3	1.1	0.9	1.5	1.9	1.7	1.6	1.0	1.1	1.1	0.9
France	2.1	2.2	2.2	2.1	2.2	2.4	2.6	2.7	3.0	3.1	3.3	3.4	3.3	3.2	3.0	2.9	2.9	2.9	2.8
Germany [a]	2.2	2.3	2.3	2.3	2.1	1.9	2.2	2.5	2.6	2.7	3.1	3.1	3.1	3.1	3.1	2.8	2.7	2.7	2.7
Greece	5.0	5.4	6.8	7.4	7.5	10.0	9.3	11.5	12.6	13.9	12.7	12.0	9.6	9.0	8.7	8.4	7.8	7.2	6.7
Iceland	0.1	0.6	0.4	1.2	1.4	2.2	2.1	2.2	2.4	2.5	2.9	2.6	2.5	2.4	2.0	1.6	1.7	1.5	1.4
Ireland	7.0	6.9	7.6	6.4	6.0	6.2	5.7	5.2	4.8	4.5	4.0	3.2	3.0	2.3	1.3	0.9	0.4	0.2	0.1
Italy	8.0	8.4	8.0	8.3	9.2	9.9	11.3	12.2	12.6	11.0	10.9	10.9	8.8	7.5	6.1	6.0	5.7	5.1	5.3
Japan [b]	2.4	2.2	2.1	1.8	1.7	1.2	1.0	1.1	1.1	0.2	0.7	1.1	1.2	1.3	1.3	1.3	1.3	1.4	1.4
Korea	0.1	0.1	0.1	0.0	-0.2	-0.4	-0.5	-0.5	-0.4	-0.4	-0.4	-0.6	-0.9	-1.3	-1.1	-1.1	-1.0	-0.9	-0.9
Luxembourg	..	..	..	..	..	-2.2	-2.1	-1.9	-1.6	-1.3	-1.1	-0.9	-0.8	-0.9	-0.7	-0.9	-0.9	-0.8	-0.7
Netherlands	4.4	4.4	4.7	4.6	4.1	4.1	4.3	4.4	4.4	4.4	4.7	4.7	4.4	4.2	3.9	3.2	2.5	2.1	1.7
New Zealand	..	4.3	4.0	3.3	3.9	4.1	2.9	2.9	2.3	1.3	1.4	0.7	0.6	-1.2	0.4	0.3	0.3	0.2	0.1
Norway	-1.2	-1.7	-1.8	-2.4	-2.3	-2.1	-2.2	-1.8	-1.3	-0.6	-0.6	-0.5	-0.4	-0.3	-1.0	-1.1	-1.1	-1.1	-1.1
Portugal	8.1	8.4	7.6	6.8	6.1	7.9	7.7	7.0	6.1	6.1	6.2	5.4	4.2	3.5	3.2	3.1	3.0	2.9	2.8
Spain	0.8	2.7	3.2	2.7	3.3	3.2	3.1	3.7	4.5	4.2	4.9	5.0	4.4	4.0	3.4	3.1	2.8	2.5	2.4
Sweden	2.9	2.2	1.7	0.9	0.5	0.1	0.1	0.2	1.0	1.9	2.6	3.0	3.3	2.8	2.6	1.9	1.3	1.2	1.1
United Kingdom	3.4	3.2	3.1	2.7	2.4	2.3	2.0	2.0	2.2	2.6	2.9	2.8	3.0	2.8	2.4	2.2	1.8	1.7	1.7
United States	3.2	3.3	3.3	3.3	3.4	3.5	3.7	3.7	3.5	3.5	3.6	3.5	3.3	3.2	2.8	2.7	2.3	2.1	1.9
Euro area	3.7	4.0	4.0	4.0	4.2	4.4	4.8	5.1	5.2	4.9	5.0	5.2	4.6	4.3	3.9	3.7	3.4	3.3	3.2
Total of above European Union countries	3.8	4.0	4.0	3.9	4.0	4.1	4.3	4.6	4.9	4.7	4.9	4.9	4.4	4.1	3.7	3.4	3.2	3.0	3.0
Total of above OECD countries	3.2	3.3	3.3	3.2	3.3	3.3	3.4	3.5	3.6	3.4	3.6	3.6	3.3	3.1	2.8	2.6	2.4	2.2	2.1

Note: In the case of Japan, Ireland and New Zealand where net interest payments are not available, net property income paid is used as a proxy. For Denmark, net interest payments including dividends received are used. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) Includes interest payments on the debt of the Inherited Debt Funds from 1995 onwards.

b) Includes interest payments on the debt of the Japan Railway settlement Corporation and the National Forest Special Account from 1998 onwards.

Source: OECD.

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Annex Table 34. **General government gross financial liabilities**

As a percentage of nominal GDP

	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	..	..	..	26.0	23.9	22.7	23.9	28.3	31.7	41.4	43.3	40.3	38.5	33.2	26.4	26.7	26.2	26.2	25.0
Austria	49.2	53.7	57.6	58.9	58.1	57.2	57.5	57.2	61.9	64.8	69.2	69.2	64.7	63.9	64.9	63.5	61.5	59.9	57.4
Belgium	118.1	123.3	127.6	127.6	123.7	124.1	126.1	127.5	134.1	132.3	129.3	130.1	124.7	119.3	115.0	109.3	105.4	101.8	97.5
Canada	84.0	88.7	89.1	88.6	89.8	92.8	101.8	109.7	116.2	116.6	119.8	120.0	116.4	114.4	109.6	103.2	98.3	95.1	89.9
Denmark	74.9	71.8	68.6	66.7	65.0	65.8	66.7	70.6	83.8	77.7	73.9	68.1	64.4	59.3	54.5	49.4	46.2	44.2	41.7
Finland	..	..	..	..	..	14.3	22.7	45.3	56.0	58.0	57.2	57.1	54.1	48.8	47.3	44.0	42.1	42.0	41.7
France	38.0	38.8	40.1	40.0	39.9	39.5	40.3	44.7	51.6	55.3	59.3	62.3	64.7	65.0	64.6	64.1	64.9	65.4	65.0
Germany [a]	41.6	41.5	42.2	42.2	39.9	42.0	38.8	41.8	47.4	47.9	57.1	60.3	61.8	63.2	60.9	60.8	60.9	62.5	62.8
Greece	47.1	47.7	53.0	62.7	65.7	88.9	91.1	97.4	110.1	107.9	108.7	111.3	108.2	105.0	103.9	102.7	99.8	97.6	94.5
Iceland	32.7	30.2	27.8	31.2	36.8	36.5	38.6	46.3	53.4	55.8	59.3	56.7	53.3	48.6	43.7	41.1	46.4	41.1	40.6
Ireland	99.5	110.6	111.8	108.2	98.9	92.4	92.1	89.7	93.6	87.7	79.8	74.2	65.1	54.8	49.3	38.6	32.1	27.4	22.9
Italy	81.9	86.2	90.4	92.5	95.3	103.7	107.4	116.1	117.9	124.0	123.1	121.8	119.6	117.2	115.7	110.8	107.7	105.2	102.0
Japan [b]	67.7	71.2	71.6	69.6	66.7	64.6	61.1	63.5	69.0	73.9	80.4	86.5	92.0	103.0	115.3	123.2	132.0	141.5	148.6
Korea	16.3	14.4	12.6	9.8	9.1	8.2	7.2	6.9	5.9	6.1	6.3	6.3	9.2	15.2	18.7	19.8	17.5	16.5	16.1
Luxembourg	..	..	..	..	..	..	..	..	..	..	..	6.2	6.0	6.2	5.9	5.3	4.5	3.7	1.0
Netherlands	68.7	70.6	73.1	76.0	76.0	75.6	75.7	76.4	77.6	74.0	75.5	75.2	69.9	66.8	63.1	56.1	53.9	50.9	48.4
New Zealand	..	..	..	..	..	..	..	..	70.6	63.9	57.2	51.8	49.8	50.5	48.6	45.8	43.0	42.4	41.6
Norway	32.5	40.9	33.9	33.0	33.0	29.5	27.8	32.4	40.8	37.2	34.8	31.4	27.9	26.6	27.8	29.3	27.1	26.8	26.0
Portugal	56.6	54.8	61.6	61.9	59.5	56.1	57.7	55.3	61.4	62.2	64.2	62.8	59.1	55.4	55.1	54.2	52.8	51.7	50.0
Spain	49.0	49.8	49.0	45.3	46.9	48.8	49.9	52.4	63.5	79.4	86.2	85.9	86.9	80.7	77.3	74.4	71.4	69.8	67.7
Sweden	64.7	64.1	57.0	51.2	46.5	42.7	51.5	69.0	73.7	77.9	76.9	74.5	73.6	72.6	67.9	62.1	56.2	52.5	50.6
United Kingdom	59.2	58.4	56.1	49.7	43.0	44.4	44.3	49.2	58.1	55.8	60.6	60.1	60.5	61.4	56.4	53.8	52.2	50.9	50.1
United States	59.0	62.6	64.1	64.7	65.0	66.6	71.4	74.1	75.8	75.0	74.5	73.9	71.4	68.3	65.3	59.4	57.6	58.0	56.5
Euro area	53.2	54.9	56.9	57.3	57.8	60.3	60.4	64.3	68.8	71.6	75.5	78.2	78.5	77.1	75.3	73.1	71.9	71.4	70.0
Total of above European Union countries	57.1	58.2	59.2	58.4	57.0	58.8	58.9	63.6	69.8	72.3	76.3	76.9	76.6	75.6	73.1	70.7	69.2	68.4	67.1
Total of above OECD countries	59.0	61.6	62.5	61.3	60.5	61.4	63.0	66.6	70.7	72.2	74.6	75.5	75.1	75.2	74.8	72.7	72.5	73.6	73.4

Note: Gross debt measures are not always comparable across countries due to different definition or treatment of debt components by countries. Notably, the treatment of government liabilities in respect of their employee pension plans may differ depending on the degree to which the pension liabilities are explicit in the government's balance sheet. Such liabilities are included in government debt whereas unfunded liabilities are treated as a memorandum item in the ESA95/SNA93. General government financial liabilities presented here are defined according to ESA95/SNA93 for all countries with the exception of Austria, Belgium, Finland, Greece, Ireland, Luxembourg, Netherlands and Portugal where debt measures follow the definition of debts applied under the Maastricht Treaty as of 1996 . Maastricht debt for EU countries is shown in Annex Table 60. For more details see "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) Includes the debt of the Inherited Debt Fund from 1995 onwards.

b) Includes the debt of the Japan Railway Settlement Corporation and the National Forest Special Account from 1998 onwards.

Source: OECD.

Annex Table 35. **General government net financial liabilities**

As a percentage of nominal GDP

	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	..	..	..	15.4	11.4	10.7	11.6	16.2	22.2	26.7	27.3	21.7	21.9	16.6	13.9	12.4	11.8	11.7	10.6
Austria	30.1	33.3	36.3	38.4	38.1	37.5	37.4	38.7	43.5	45.8	50.5	50.2	47.8	47.7	48.3	47.5	46.1	45.0	42.9
Belgium	108.2	113.5	117.6	117.8	114.3	116.0	117.4	119.5	126.0	125.7	124.9	121.8	117.5	112.2	107.5	102.2	98.4	94.8	90.5
Canada	52.5	57.5	57.0	55.7	58.5	61.2	69.2	78.4	83.8	86.2	88.0	87.5	82.7	80.2	73.9	65.0	59.7	56.1	51.0
Denmark	45.3	37.9	33.7	35.4	33.2	33.0	37.5	41.2	45.2	45.8	46.2	42.4	38.4	35.6	30.7	25.9	22.8	20.8	18.3
Finland	-27.1	-28.0	-27.9	-29.2	-33.3	-35.5	-34.2	-25.8	-17.3	-17.4	-13.3	-15.5	-16.1	-27.1	-28.4	-32.9	-35.8	-36.7	-36.9
France	10.6	13.6	12.9	13.9	14.6	16.1	16.3	18.4	26.6	29.4	35.9	41.5	41.4	42.4	42.6	42.2	42.2	42.6	42.2
Germany[a]	18.7	19.0	20.4	20.7	18.0	17.8	20.2	24.4	27.9	29.1	39.4	42.2	43.0	45.4	43.6	41.5	41.5	43.2	43.4
Iceland	6.0	8.9	8.1	9.8	17.7	19.1	19.9	26.6	34.7	37.7	39.7	39.6	37.5	31.3	23.7	23.7	27.3	25.8	24.9
Italy	79.6	84.0	88.3	90.6	93.5	83.7	88.6	97.3	105.4	110.7	108.7	108.8	106.8	105.0	103.5	98.7	95.5	93.0	89.8
Japan[b]	35.0	33.7	27.9	23.7	19.4	12.4	6.4	7.3	10.1	12.1	16.9	21.6	27.9	38.0	44.4	51.1	58.7	66.8	74.0
Korea	-6.5	-8.1	-10.2	-13.6	-16.3	-17.2	-15.9	-15.3	-15.5	-15.2	-18.0	-19.4	-22.5	-24.5	-25.6	-28.3	-32.9	-36.2	-39.2
Netherlands	40.6	43.7	27.1	30.9	34.5	35.4	36.2	39.6	40.6	41.9	53.2	53.7	55.3	53.7	50.5	44.8	40.9	38.4	35.9
New Zealand	..	..	..	..	..	..	..	..	48.0	42.0	35.5	31.2	28.9	26.8	24.6	22.2	19.4	18.8	18.1
Norway	-36.9	-41.4	-42.8	-43.0	-42.2	-42.0	-38.3	-35.9	-32.7	-31.2	-32.9	-36.9	-43.4	-47.6	-53.8	-60.0	-70.8	-80.9	-87.1
Spain	26.1	29.3	29.9	30.6	30.7	31.8	33.2	35.4	42.3	53.1	56.6	55.6	55.3	49.3	45.6	42.7	39.9	38.4	36.3
Sweden	13.9	12.5	6.4	0.2	-6.0	-7.8	-5.0	4.6	10.7	21.0	22.7	19.5	18.1	15.2	12.9	8.3	4.2	2.5	0.5
United Kingdom	30.8	31.2	29.5	23.8	19.1	15.1	15.3	21.6	30.9	31.1	36.9	38.7	40.1	41.9	36.7	33.1	30.5	29.2	28.5
United States	41.9	45.4	47.4	48.5	48.7	49.9	53.6	57.1	59.1	59.7	59.2	58.8	56.7	53.0	48.6	43.4	41.1	41.4	40.0
Euro area	32.4	35.2	35.9	37.2	38.6	37.5	39.4	43.5	48.2	50.8	56.0	59.3	59.4	58.9	57.4	54.7	53.4	53.1	51.8
Total of above European Union countries	34.3	36.3	36.2	36.0	35.1	33.0	34.5	39.2	45.7	48.7	54.1	55.7	55.5	55.2	53.0	50.0	48.3	47.7	46.5
Total of above OECD countries	36.4	38.4	38.2	37.3	36.3	35.0	36.4	40.1	44.0	45.8	48.2	49.2	48.9	48.7	46.8	44.2	43.4	44.3	44.1

Note: Net debt measures are not always comparable across countries due to different definition or treatment of debt (and asset) components by countries. First, the treatment of government liabilities in respect of their employee pension plans may be different (see footnote of Annex Table 34). Second while general government financial liabilities presented here for most countries are defined by ESA95/SNA93, for some EU countries, i.e. Austria, Belgium, Finland, Greece, Ireland, Luxembourg, Netherlands and Portugal as of 1996, debt measures follow the definition of debts applied under the Maastricht Treaty. Third, a range of items included as general government assets differs across countries. For example, equity participation is excluded from government assets in some countries, whereas foreign exchange, gold and SDR holdings are considered as assets of the government in the United States and the United Kingdom. For details see "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)* .

a) Includes the debt of the Inherited Debt Fund from 1995 onwards.

b) Includes the debt of the Japan Railway Settlement Corporation and the National Forest Special Account from 1998 onwards.

Source: OECD.

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Annex Table 36. **Short-term interest rates**

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	12.2	16.2	16.4	13.5	12.9	17.7	14.4	10.2	6.5	5.2	5.7	7.7	7.2	5.4	5.0	5.0	6.2	5.0	4.0	5.0
Austria	6.5	6.2	5.3	4.3	4.6	7.5	9.0	9.5	9.5	7.0	5.1	4.6	3.4	3.5	3.6	3.0	4.4	4.2	3.0	3.8
Belgium	11.4	9.5	8.1	7.1	6.7	8.8	9.6	9.4	9.4	8.2	5.7	4.8	3.2	3.4	3.6	3.0	4.4	4.2	3.0	3.8
Canada	10.0	8.6	8.1	7.8	9.5	12.1	12.7	8.8	6.6	5.0	5.5	7.1	4.4	3.5	5.0	4.9	5.8	4.0	2.6	3.8
Czech Republic	..	..	..	..	..	..	..	..	..	13.1	9.1	10.9	12.0	15.9	14.3	6.9	5.4	5.3	5.6	6.4
Denmark	11.7	10.2	9.1	10.1	8.5	9.8	10.8	9.7	11.5	10.3	6.2	6.0	3.9	3.7	4.1	3.3	5.0	4.5	3.3	4.1
Finland	16.5	13.5	12.7	10.0	10.0	12.6	14.0	13.1	13.3	7.8	5.4	5.8	3.6	3.2	3.6	3.0	4.4	4.2	3.0	3.8
France	11.7	9.9	7.7	8.3	7.9	9.4	10.3	9.6	10.3	8.6	5.8	6.6	3.9	3.5	3.6	3.0	4.4	4.2	3.0	3.8
Germany	6.0	5.4	4.6	4.0	4.3	7.1	8.5	9.2	9.5	7.3	5.4	4.5	3.3	3.3	3.5	3.0	4.4	4.2	3.0	3.8
Greece	17.8	18.4	18.5	19.0	19.2	19.0	23.0	23.3	21.7	21.3	19.3	15.5	12.8	10.4	11.6	8.9	6.1	4.2	3.0	3.8
Hungary	..	..	..	..	..	..	..	..	..	17.2	26.9	32.0	24.0	20.1	18.0	14.7	11.0	11.0	10.2	9.7
Iceland	..	..	..	..	31.0	27.9	14.8	14.6	10.5	8.8	4.9	7.0	7.0	7.1	7.4	8.6	11.2	11.2	10.5	9.5
Ireland	13.2	11.9	12.5	10.8	8.0	10.0	11.3	10.4	14.3	9.1	5.9	6.2	5.4	6.1	5.4	3.0	4.4	4.2	3.0	3.8
Italy	17.3	15.2	13.4	11.3	10.8	12.6	12.2	12.2	14.0	10.2	8.5	10.5	8.8	6.9	5.0	3.0	4.4	4.2	3.0	3.8
Japan	6.5	6.6	5.2	4.2	4.5	5.4	7.7	7.4	4.5	3.0	2.2	1.2	0.6	0.6	0.7	0.2	0.2	0.1	0.0	0.0
Korea	..	..	..	..	..	..	..	18.3	16.4	13.0	13.3	14.1	12.7	13.4	15.2	6.8	7.1	5.2	4.1	4.6
Luxembourg	11.4	9.5	8.1	7.1	6.7	8.8	9.6	9.4	9.4	8.2	5.7	4.8	3.2	3.4	3.6	3.0	4.4	4.2	3.0	3.8
Mexico	..	..	..	..	..	..	35.0	19.8	15.9	15.5	14.5	47.8	32.9	21.3	26.1	22.4	16.2	12.6	10.2	9.5
Netherlands	6.1	6.3	5.7	5.4	4.8	7.4	8.7	9.3	9.4	6.9	5.2	4.4	3.0	3.3	3.5	3.0	4.4	4.2	3.0	3.8
New Zealand	15.0	23.3	19.1	21.1	15.4	13.5	13.9	10.0	6.7	6.3	6.7	9.0	9.3	7.7	7.3	4.8	6.5	5.8	4.8	5.4
Norway	13.0	12.5	14.4	14.7	13.5	11.4	11.5	10.6	11.8	7.3	5.9	5.5	4.9	3.7	5.8	6.5	6.7	7.2	6.5	6.5
Poland	..	..	..	..	..	..	..	..	..	34.9	31.8	27.7	21.3	23.1	19.9	14.7	18.9	15.9	12.4	10.0
Portugal	24.9	22.4	15.6	13.9	13.0	14.9	16.9	17.7	16.1	12.5	11.1	9.8	7.4	5.7	4.3	3.0	4.4	4.2	3.0	3.8
Slovak Republic	..	..	..	..	..	..	..	..	..	..	..	..	11.8	21.7	21.1	15.7	8.6	8.1	7.7	7.3
Spain	14.9	12.2	11.7	15.8	11.7	15.0	15.2	13.2	13.3	11.7	8.0	9.4	7.5	5.4	4.2	3.0	4.4	4.2	3.0	3.8
Sweden	11.9	14.2	9.8	9.4	10.1	11.5	13.7	11.6	12.9	8.4	7.4	8.7	5.8	4.1	4.2	3.1	4.0	4.2	4.2	4.6
Switzerland	4.3	4.9	4.2	3.8	3.1	7.3	8.9	8.2	7.9	4.9	4.2	2.9	2.0	1.6	1.5	1.4	3.2	2.9	1.5	2.3
Turkey	..	..	..	..	..	40.7	51.9	109.6	97.8	90.3	150.6	136.3	143.6	119.2	115.7	96.6	37.0	91.0	56.0	35.1
United Kingdom	9.9	12.2	10.9	9.7	10.3	13.9	14.8	11.5	9.6	5.9	5.5	6.7	6.0	6.8	7.3	5.4	6.1	5.0	3.8	4.6
United States	10.8	8.3	6.8	7.1	7.9	9.2	8.2	5.9	3.8	3.2	4.7	6.0	5.4	5.7	5.5	5.4	6.5	3.8	2.1	3.1
Euro area	11.1	9.9	8.5	8.2	7.7	10.0	10.7	10.6	11.1	8.6	6.3	6.6	4.9	4.2	3.8	3.0	4.4	4.2	3.0	3.8

Note : Three-month money market rates where available, or rates on proximately similar financial instruments. See *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*
Source: OECD.

Annex Table 37. **Long-term interest rates**

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	13.5	14.0	13.4	13.2	12.1	13.4	13.2	10.7	9.2	7.3	9.0	9.2	8.2	6.9	5.5	6.1	6.3	5.6	5.1	5.5
Austria	8.0	7.8	7.3	6.9	6.7	7.1	8.7	8.5	8.1	6.7	7.0	7.1	6.3	5.7	4.7	4.7	5.6	5.1	4.9	5.3
Belgium	12.2	11.0	8.6	8.2	8.0	8.6	10.1	9.3	8.7	7.2	7.7	7.4	6.3	5.6	4.7	4.7	5.6	5.1	4.9	5.3
Canada	12.7	11.1	9.5	9.9	10.2	9.9	10.8	9.8	8.8	7.9	8.6	8.4	7.5	6.5	5.5	5.7	5.9	5.6	5.1	5.3
Denmark	14.5	11.6	10.1	11.3	9.6	9.8	10.6	9.3	8.9	7.2	7.9	8.3	7.1	6.2	4.9	5.0	5.6	5.2	5.0	5.4
Finland	11.1	10.7	8.9	7.9	10.3	12.1	13.2	11.9	12.1	8.8	9.0	8.8	7.1	6.0	4.8	4.7	5.5	5.0	4.8	5.2
France	13.4	11.9	9.1	10.2	9.2	9.2	10.3	9.0	8.6	6.8	7.2	7.5	6.3	5.6	4.7	4.6	5.4	5.0	4.8	5.2
Germany	8.1	7.2	6.3	6.4	6.6	7.1	8.7	8.5	7.9	6.5	6.9	6.9	6.2	5.7	4.6	4.5	5.3	4.8	4.6	5.0
Greece	..	..	..	..	..	..	..	..	..	..	..	..	..	9.8	8.5	6.3	6.1	5.3	5.0	5.4
Iceland	..	..	..	..	..	..	..	..	13.1	13.4	7.0	9.7	9.2	8.7	7.7	8.5	11.2	10.5	10.0	9.5
Ireland	..	12.8	11.2	11.3	9.4	9.2	10.3	9.4	9.3	7.6	8.0	8.2	7.2	6.3	4.7	4.8	5.5	5.0	4.8	5.2
Italy	15.6	13.7	11.5	10.6	10.9	12.8	13.5	13.3	13.3	11.2	10.5	12.2	9.4	6.9	4.9	4.7	5.6	5.2	4.9	5.3
Japan	7.3	6.5	5.1	5.0	4.8	5.1	7.0	6.3	5.3	4.3	4.4	3.4	3.1	2.4	1.5	1.7	1.7	1.3	1.4	1.5
Korea	14.3	13.9	11.9	12.4	13.0	14.2	15.1	16.5	15.1	12.1	12.3	12.4	10.9	11.8	12.8	8.7	8.5	6.4	5.9	6.4
Luxembourg	..	..	..	..	..	..	..	..	..	..	7.2	7.2	6.3	5.6	4.7	4.7	5.5	5.1	4.9	5.2
Mexico	..	..	..	..	..	..	34.8	19.7	16.1	15.5	13.8	39.8	34.4	22.5	24.8	24.1	16.9	14.3	12.2	11.5
Netherlands	8.1	7.3	6.3	6.4	6.4	7.2	8.9	8.7	8.1	6.4	6.9	6.9	6.2	5.6	4.6	4.6	5.4	4.9	4.7	5.1
New Zealand	12.6	17.7	16.4	15.7	13.1	12.8	12.4	10.1	8.4	6.9	7.6	7.8	7.9	7.2	6.3	6.4	6.9	6.4	6.0	6.0
Norway	12.2	12.6	13.3	13.3	12.9	10.8	10.7	10.0	9.6	6.9	7.4	7.4	6.8	5.9	5.4	5.5	6.3	6.2	5.9	6.3
Portugal	..	..	..	..	..	..	..	..	..	..	10.4	11.5	8.6	6.4	4.9	4.8	5.6	5.2	5.0	5.4
Slovak Republic	..	..	..	..	..	..	..	..	..	..	..	10.4	9.7	9.4	21.7	15.9	8.5	7.9	7.5	7.1
Spain	16.5	13.4	11.4	12.8	11.7	13.8	14.6	12.8	11.7	10.2	10.0	11.3	8.7	6.4	4.8	4.7	5.5	5.1	4.9	5.3
Sweden	12.5	13.2	10.5	11.7	11.4	11.2	13.2	10.7	10.0	8.5	9.5	10.2	8.0	6.6	5.0	5.0	5.4	5.2	5.4	5.8
Switzerland	4.6	4.7	4.2	4.0	4.0	5.2	6.4	6.2	6.4	4.6	5.0	4.5	4.0	3.4	3.0	3.0	3.9	3.4	3.2	3.6
Turkey	..	..	55.0	47.0	62.4	58.3	51.9	71.9	79.6	86.6	138.5	111.5	124.9	106.0	113.6	106.6	35.8	95.1	61.6	36.4
United Kingdom	11.1	11.0	10.1	9.6	9.7	10.2	11.8	10.1	9.1	7.5	8.2	8.2	7.8	7.0	5.5	5.1	5.3	4.9	4.7	5.1
United States	12.4	10.6	7.7	8.4	8.8	8.5	8.6	7.9	7.0	5.9	7.1	6.6	6.4	6.4	5.3	5.6	6.0	4.9	4.5	5.0
Euro area	..	10.8	9.0	9.1	8.9	9.8	11.2	10.5	10.0	8.3	8.2	8.6	7.1	6.0	4.8	4.7	5.4	5.0	4.8	5.2

Note: 10-year benchmark government bond yields where available or yield on proximately similar financial instruments (for Korea a 5-year bond is used). See also *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*
Source: OECD.

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Annex Table 38. **Nominal exchange rates (*vis-à-vis* the US dollar)**

Average of daily rates

	Monetary unit	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and assumptions[a] 2001	2002	2003
Australia	*Dollar*	1.265	1.282	1.284	1.362	1.473	1.369	1.350	1.277	1.348	1.592	1.550	1.727	1.941	1.972	1.972
Austria	*Schilling*	13.23	11.37	11.67	10.99	11.63	11.42	10.08	10.58	12.20	12.38	12.91	14.93	15.33	15.24	15.24
Belgium	*Franc*	39.40	33.42	34.16	32.15	34.55	33.46	29.50	30.98	35.76	36.30	37.86	43.77	44.94	44.67	44.67
Canada	*Dollar*	1.184	1.167	1.146	1.209	1.290	1.366	1.372	1.364	1.385	1.483	1.486	1.485	1.550	1.592	1.592
Czech Republic	*Koruny*	..	..	..	..	29.15	28.79	26.54	27.15	31.70	32.28	34.59	38.64	38.06	37.18	37.18
Denmark	*Krone*	7.310	6.186	6.393	6.038	6.482	6.360	5.604	5.798	6.604	6.699	6.980	8.088	8.299	8.226	8.226
Finland	*Markka*	4.288	3.823	4.043	4.486	5.721	5.223	4.367	4.592	5.187	5.345	5.580	6.452	6.624	6.584	6.584
France	*Franc*	6.380	5.446	5.641	5.294	5.662	5.552	4.991	5.116	5.837	5.899	6.157	7.118	7.308	7.264	7.264
Germany	*Deutschemark*	1.880	1.616	1.659	1.562	1.653	1.623	1.433	1.505	1.734	1.759	1.836	2.122	2.179	2.166	2.166
Greece	*Drachma*	162.1	158.2	182.1	190.5	229.1	242.2	231.6	240.7	272.9	295.3	305.7	365.5	379.6	377.4	377.4
Hungary	*Forint*	..	..	..	..	91.9	105.1	125.7	152.6	186.6	214.3	237.1	282.3	286.8	282.1	282.1
Iceland	*Krona*	57.11	58.38	59.10	57.62	67.64	69.99	64.77	66.69	70.97	71.17	72.43	78.84	97.38	104.22	104.22
Ireland	*Pound*	0.706	0.605	0.622	0.588	0.683	0.670	0.624	0.625	0.660	0.703	0.739	0.855	0.877	0.872	0.872
Italy	*Lira*	1 372	1 198	1 241	1 232	1 572	1 613	1 629	1 543	1 703	1 736	1 817	2 101	2 157	2 144	2 144
Japan	*Yen*	138.0	144.8	134.5	126.7	111.2	102.2	94.1	108.8	121.0	130.9	113.9	107.8	121.0	121.9	121.9
Korea	*Won*	669.2	708.0	733.2	780.0	802.4	804.3	771.4	804.4	950.5	1 400.5	1 186.7	1 130.6	1 292.4	1 296.6	1 296.6
Luxembourg	*Franc*	39.40	33.42	34.16	32.15	34.55	33.46	29.50	30.98	35.76	36.30	37.86	43.77	44.94	44.67	44.67
Mexico	*Peso*	2.495	2.841	3.022	3.095	3.115	3.389	6.421	7.601	7.924	9.153	9.553	9.453	9.362	9.295	9.295
Netherlands	*Guilder*	2.121	1.821	1.870	1.759	1.857	1.820	1.605	1.686	1.951	1.983	2.068	2.391	2.455	2.440	2.440
New Zealand	*Dollar*	1.674	1.678	1.729	1.860	1.851	1.687	1.524	1.454	1.513	1.869	1.892	2.205	2.384	2.420	2.420
Norway	*Krone*	6.903	6.258	6.484	6.214	7.094	7.057	6.337	6.457	7.072	7.545	7.797	8.797	8.965	8.800	8.800
Poland	*Zloty*	..	..	..	..	1.814	2.273	2.425	2.695	3.277	3.492	3.964	4.346	4.104	4.100	4.100
Portugal	*Escudo*	157.1	142.3	144.4	134.8	160.7	166.0	149.9	154.2	175.2	180.1	188.2	217.5	223.4	222.0	222.0
Slovak Republic	*Koruna*	..	..	..	..	30.8	32.0	29.7	30.7	33.6	35.2	41.4	46.2	48.3	48.2	48.2
Spain	*Peseta*	118.4	101.9	103.9	102.4	127.2	134.0	124.7	126.7	146.4	149.4	156.2	180.5	185.4	184.3	184.3
Sweden	*Krona*	6.446	5.918	6.045	5.823	7.785	7.716	7.134	6.707	7.635	7.947	8.262	9.161	10.337	10.582	10.582
Switzerland	*Franc*	1.635	1.389	1.434	1.406	1.477	1.367	1.182	1.236	1.450	1.450	1.503	1.688	1.683	1.630	1.630
Turkey	*Lira*	2 120	2 606	4 169	6 861	10 964	29 778	45 738	81 281	151 595	260 473	418 984	624 325	1250 126	1 797 192	1 946 622
United Kingdom	*Pound*	0.611	0.563	0.567	0.570	0.666	0.653	0.634	0.641	0.611	0.604	0.618	0.661	0.692	0.684	0.684
United States	*Dollar*	1.000	1.000	1.000	1.000	1.000	1.000	1.000	1.000	1.000	1.000	1.000	1.000	1.000	1.000	1.000
Euro area	*Euro*	..	..	..	..	..	..	..	..	..	..	0.939	1.085	1.114	1.107	1.107
	SDR	0.780	0.738	0.731	0.710	0.716	0.699	0.659	0.689	0.726	0.737	0.731	0.759	0.784	0.781	0.781

Note: Greece became a member of the euro area on the 1st of January 2001. In order to ensure comparability of the euro data over time, Greece has been included in the calculation of the euro data throughout.
a) On the technical assumption that exchange rates remain at their levels of 12 April 2001, except for Hungary and Turkey, where exchange rates vary according to official exchange rate policy.
Source: OECD.

Annex Table 39. **Effective exchange rates**[a]

Indices 1995 = 100, average of daily rates

	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and assumptions[b] 2001	2002	2003
Australia	99.4	106.7	106.9	107.7	100.9	95.7	103.1	100.0	109.7	111.0	103.5	103.6	96.2	89.9	88.8	88.8
Austria	84.5	84.5	88.0	88.2	90.3	93.3	95.5	100.0	99.1	97.2	99.1	99.8	97.6	98.0	98.2	98.2
Belgium	79.4	79.6	85.1	86.0	88.7	90.6	94.7	100.0	98.4	94.4	96.7	96.3	92.4	93.4	93.8	93.8
Canada	102.5	109.7	113.2	116.5	110.7	105.6	100.8	100.0	101.9	102.2	97.4	97.0	98.0	95.0	92.5	92.5
Czech Republic	..	..	..	..	..	95.9	99.3	100.0	101.6	98.6	100.3	100.0	101.4	106.0	108.1	108.1
Denmark	81.3	80.0	86.4	86.0	88.7	92.9	95.1	100.0	99.1	96.8	99.3	98.7	94.6	96.4	97.3	97.3
Finland	91.9	96.1	99.9	97.0	85.2	76.7	87.0	100.0	97.6	95.4	98.2	101.2	96.6	98.6	99.4	99.4
France	80.6	80.5	86.4	85.9	89.5	93.2	96.1	100.0	100.4	97.6	100.0	99.3	95.6	96.4	96.8	96.8
Germany	72.7	73.2	79.4	80.0	83.9	88.6	92.9	100.0	98.6	95.2	98.7	98.6	94.3	95.4	96.0	96.1
Greece	151.4	141.9	133.4	120.4	113.3	105.7	101.1	100.0	98.4	96.7	94.0	94.9	88.6	89.3	90.0	90.1
Hungary	..	..	..	..	..	137.8	125.1	100.0	85.2	78.9	71.5	69.0	65.5	66.5	67.4	67.4
Iceland	142.9	121.9	110.4	110.9	110.5	104.0	99.6	100.0	99.5	101.6	104.4	106.2	107.4	91.2	84.7	84.7
Ireland	91.4	90.8	98.6	97.5	101.7	96.6	98.2	100.0	102.6	102.4	99.4	96.4	89.6	90.7	90.9	90.9
Italy	114.5	118.6	126.1	127.3	126.2	108.7	108.6	100.0	110.0	111.5	113.9	113.6	109.4	110.7	111.3	111.4
Japan	55.3	53.9	53.2	59.9	64.9	80.4	93.4	100.0	87.2	83.3	86.6	99.4	108.2	100.2	99.8	99.8
Korea	99.4	114.9	111.5	107.6	100.3	98.7	99.7	100.0	101.6	94.1	68.1	77.9	83.4	76.8	77.0	77.0
Luxembourg	79.4	79.6	85.1	86.0	88.7	90.6	94.7	100.0	98.4	94.4	96.7	96.3	92.4	93.4	93.8	93.8
Mexico	220.4	212.4	193.5	186.8	187.1	196.5	190.3	100.0	84.9	83.3	74.0	70.6	72.1	73.9	74.6	74.6
Netherlands	75.4	75.7	81.4	81.9	85.2	89.3	93.6	100.0	98.6	93.9	97.2	97.1	92.1	93.4	93.9	94.0
New Zealand	96.8	91.9	92.0	89.5	83.3	87.3	93.6	100.0	106.3	108.9	97.8	94.4	85.6	84.6	84.0	84.0
Norway	93.8	94.5	95.9	95.0	96.8	95.7	96.4	100.0	100.1	101.0	98.0	97.8	95.7	99.0	101.0	101.1
Poland	..	..	..	..	..	139.0	113.5	100.0	93.2	86.6	84.8	79.1	81.5	89.7	89.6	89.6
Portugal	92.3	91.8	93.3	95.8	101.3	97.7	96.9	100.0	99.6	98.3	98.2	97.7	95.3	96.2	96.5	96.5
Slovak Republic	..	..	..	..	..	103.3	99.7	100.0	100.6	105.2	104.9	97.4	99.2	96.5	95.9	95.9
Spain	103.6	109.6	116.8	118.2	117.0	104.5	99.6	100.0	101.0	96.9	98.1	97.3	94.3	95.2	95.6	95.6
Sweden	113.3	115.2	115.7	116.7	119.5	98.4	99.6	100.0	110.1	106.6	106.3	106.0	106.2	97.4	94.8	94.9
Switzerland	77.3	74.3	80.5	80.2	79.7	83.5	91.9	100.0	98.7	93.1	97.1	97.9	96.1	100.0	103.1	103.1
Turkey	2 818.9	2010.1	1548.5	1024.7	611.5	428.0	173.5	100.0	58.6	34.9	21.1	14.1	10.3	5.7	3.7	3.4
United Kingdom	110.3	108.1	109.1	111.2	108.4	100.3	103.4	100.0	102.3	119.2	127.0	127.4	130.7	129.5	131.3	131.4
United States	73.7	79.1	83.3	85.4	87.0	92.6	98.0	100.0	105.6	113.1	124.8	124.3	127.4	134.1	135.3	135.3
Euro area	67.3	69.4	82.4	82.9	88.3	87.2	92.6	100.0	101.9	95.6	101.2	100.0	91.1	93.4	94.5	94.6

Note: Greece became a member of the euro area on the 1st of January 2001. In order to ensure comparability of the euro data over time, Greece has been included in the calculation of the euro data throughout.
a) For details on the method of calculation, see the section on exchange rates and competitiveness indicators in *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*
b) On the technical assumption that exchange rates remain at their levels of 12 April 2001, except for Hungary and Turkey, where exchange rates vary according to official exchange rate policy.
Source: OECD.

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Annex Table 40. **Export volumes**

Total goods, customs basis, percentage changes from previous year

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	17.7	9.0	3.1	8.1	0.1	4.8	7.2	16.2	6.3	6.2	6.3	3.0	12.3	7.9	0.1	4.8	9.7	1.2	2.8	7.1
Austria	9.5	9.5	1.2	2.0	7.6	15.0	10.7	7.1	3.7	-2.8	10.7	9.3	12.0	20.0	12.1	15.0	16.4	7.9	3.7	7.5
Belgium[a]	5.0	4.1	7.9	6.9	4.6	8.1	3.1	4.0	0.0	7.5	9.0	6.2	2.2	7.4	5.6	5.0	9.3	1.1	2.5	7.4
Canada	18.6	6.4	5.8	3.6	9.7	1.2	4.7	2.6	7.9	11.3	13.2	9.5	5.6	9.8	8.5	11.0	8.7	-3.4	0.6	7.6
Czech Republic	..	..	..	..	..	..	..	..	..	..	5.7	15.0	2.6	15.0	13.3	7.7	16.0	13.6	7.2	9.7
Denmark	5.5	4.6	1.4	2.4	7.6	7.4	6.5	7.1	5.3	0.1	7.5	5.5	3.7	6.1	0.9	6.9	6.6	0.9	3.2	6.9
Finland	9.7	1.0	0.6	1.4	3.2	-0.2	2.8	-8.7	9.0	18.6	13.9	7.0	6.0	12.0	7.0	6.1	9.1	-4.0	1.3	6.4
France[b]	7.3	2.6	0.0	4.2	9.6	10.2	5.1	5.2	4.8	0.0	9.9	9.6	2.3	12.1	9.2	4.0	14.0	2.1	1.6	7.9
Germany	9.1	5.9	1.3	2.9	6.6	8.1	1.4	1.4	0.8	-6.3	9.0	6.7	7.1	10.7	5.7	6.2	12.5	3.9	3.1	7.3
Hungary	..	..	..	..	..	..	..	..	..	..	16.7	9.9	24.2	29.7	21.9	16.3	25.7	5.7	3.9	6.8
Iceland[c]	-3.6	12.7	34.5	25.2	0.8	-2.1	13.5	-1.2	-2.8	-4.7	10.8	11.7	5.3	-0.2	-3.1	5.8	2.2	2.0	-2.1	7.5
Ireland	18.4	6.5	4.0	14.2	7.1	11.2	8.5	5.6	13.7	11.1	14.8	20.1	9.9	14.9	24.4	14.9	20.1	3.0	0.8	8.7
Italy	6.7	7.4	1.8	2.4	5.7	8.6	3.2	0.2	3.8	9.0	11.7	13.2	1.2	3.8	2.6	1.8	10.2	2.9	2.2	7.4
Japan	15.8	5.0	-0.5	0.4	4.4	4.5	5.5	2.5	1.5	-2.1	1.7	4.4	0.8	11.8	-1.2	2.1	9.4	-10.0	-1.3	8.8
Korea	18.1	10.7	24.5	23.2	19.3	-0.1	8.2	11.1	8.7	12.1	13.7	21.9	19.6	15.3	22.0	10.5	19.8	1.4	3.0	11.1
Luxembourg	..	..	..	..	..	12.8	2.2	3.7	-0.5	-0.2	6.6	3.6	1.3	12.5	16.1	5.4	16.9	1.3	1.4	10.8
Mexico	10.4	-3.2	18.0	11.7	16.8	5.9	8.1	14.3	8.1	16.6	8.6	23.9	18.4	16.3	13.3	11.4	13.6	-3.0	0.6	7.6
Netherlands	7.4	5.9	2.1	4.5	9.2	6.4	5.2	4.8	2.6	1.1	6.5	7.2	5.4	6.5	8.4	5.6	10.7	2.3	3.5	7.5
New Zealand	4.9	10.7	-2.0	2.9	3.9	-2.7	5.7	10.4	2.6	4.2	10.1	2.9	4.8	5.6	-1.0	1.6	6.1	1.8	1.7	8.1
Norway	9.1	3.5	1.8	13.9	4.4	15.0	6.7	6.7	8.0	5.3	12.4	5.5	12.9	4.6	0.2	3.0	4.1	2.1	2.4	3.3
Poland	..	..	..	..	..	..	..	..	..	..	19.6	17.1	9.9	13.8	8.8	2.8	25.1	13.6	8.4	11.3
Portugal	14.5	10.6	7.8	11.7	9.3	20.5	12.7	0.6	7.5	-4.2	14.4	14.2	9.6	10.0	6.6	5.1	6.7	3.6	2.7	8.1
Slovak Republic	..	..	..	..	..	..	..	..	..	..	5.7	15.0	6.6	3.9	16.4	6.2	15.8	10.2	7.6	9.6
Spain	17.5	2.8	-3.7	7.6	6.0	4.8	11.9	11.3	4.9	11.7	21.2	9.7	12.0	14.5	6.6	6.4	12.2	2.7	3.2	7.8
Sweden	8.2	3.4	2.9	2.7	3.7	2.1	0.2	-2.2	1.0	9.8	16.9	10.8	6.1	10.7	8.5	6.1	11.3	-4.5	0.8	8.6
Switzerland	7.9	7.8	-0.0	1.8	7.2	7.7	3.4	-2.8	3.5	1.0	3.4	2.2	2.6	7.9	4.0	4.7	9.4	-1.1	0.7	5.5
Turkey	29.5	14.5	-20.8	21.9	8.8	-1.6	1.1	6.4	6.5	7.6	22.0	5.8	12.8	18.5	6.7	5.8	19.9	2.1	8.4	11.7
United Kingdom	8.6	5.7	4.0	5.5	2.5	5.4	6.5	0.5	2.2	0.1	13.0	10.6	8.2	7.6	1.5	3.7	9.4	2.9	3.1	7.4
United States[b]	7.9	3.6	5.1	11.4	18.8	12.6	8.3	7.1	6.8	3.0	9.7	11.9	8.7	14.5	2.1	3.9	11.3	-5.2	-3.0	8.4
Total OECD	10.3	5.2	2.5	4.9	7.9	7.4	5.0	3.7	3.8	2.0	9.4	9.3	6.5	11.1	5.7	5.6	11.9	-0.3	1.4	8.0

Note: Regional aggregates are calculated *inclusive* of intra-regional trade. Data are on a national account basis for the United States and France, otherwise from international trade statistics. See also *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)*.

a) Including Luxembourg until 1994.

b) Volume data use hedonic price deflators for certain components.

c) OECD estimates.

Source: OECD.

Annex Table 41. **Import volumes**

Total goods, customs basis, percentage changes from previous year

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	18.9	7.9	-1.3	1.5	13.2	22.8	-7.3	-1.3	6.7	4.3	11.8	10.1	7.0	6.2	7.1	7.2	5.6	-3.2	5.5	7.1
Austria	8.3	5.4	5.2	5.3	7.7	10.6	11.0	3.3	2.8	-1.3	12.9	6.7	12.4	15.8	12.4	13.3	11.3	7.3	3.6	6.7
Belgium[a]	4.9	3.8	10.6	8.3	4.9	6.8	5.2	4.1	1.0	1.1	7.7	5.0	4.3	4.5	8.1	3.3	8.1	1.7	2.9	7.5
Canada	19.7	10.4	9.1	5.4	13.5	5.2	0.6	3.1	7.6	8.7	10.6	7.5	6.0	17.1	6.2	8.7	9.5	-4.4	2.3	8.2
Czech Republic	..	..	..	..	..	..	..	..	..	..	18.8	26.6	10.9	8.8	11.1	2.5	14.5	14.9	7.5	9.4
Denmark	3.4	7.9	7.0	-1.7	0.0	2.4	4.5	4.7	4.7	-3.6	12.3	7.0	1.2	9.1	3.3	1.8	6.0	-2.1	2.7	6.3
Finland	-0.4	6.0	5.7	8.9	8.7	10.7	-4.0	-16.7	-2.1	-3.7	20.4	8.1	7.7	10.1	8.9	2.1	4.4	-2.6	1.2	3.9
France[b]	2.2	5.5	6.5	8.9	11.2	9.7	5.3	2.9	1.0	-4.3	10.5	8.6	-0.0	7.5	12.6	5.2	16.7	1.2	1.1	8.5
Germany	5.2	4.9	5.4	5.3	6.4	7.3	11.4	13.2	1.3	-9.8	7.9	6.9	5.5	6.1	10.9	6.4	10.2	1.8	3.9	7.3
Hungary	..	..	..	..	..	..	..	..	..	..	14.9	-3.1	17.9	26.2	24.6	14.2	24.6	3.5	3.3	6.8
Iceland[c]	0.7	10.1	23.4	41.8	0.6	-12.3	18.6	5.1	-3.3	-16.3	4.6	19.4	16.2	8.5	24.0	5.6	6.2	-4.7	-5.6	4.5
Ireland	10.5	3.3	3.0	6.2	4.7	13.0	6.8	0.8	4.8	7.0	13.2	14.4	10.0	14.9	18.1	6.5	17.4	2.1	-0.0	9.3
Italy	9.1	8.8	4.5	10.1	7.0	8.3	4.4	4.6	3.3	-10.1	12.4	9.8	-3.0	8.9	8.5	7.9	8.3	0.5	2.8	6.7
Japan	10.6	0.7	9.7	9.0	16.9	7.7	5.5	3.9	-0.7	3.7	13.4	13.8	5.0	1.7	-5.3	9.6	10.9	-3.7	-10.4	2.8
Korea	18.6	5.6	1.6	17.8	20.0	15.8	15.2	23.0	3.3	4.6	23.5	24.4	16.1	2.3	-22.2	28.1	16.8	-3.5	2.1	9.6
Luxembourg	..	..	..	..	..	5.8	4.9	10.5	-2.9	2.5	4.9	2.9	-0.5	12.9	10.4	14.2	5.0	10.6	5.7	8.0
Mexico	30.1	14.6	-6.9	8.9	41.1	18.8	17.4	19.7	23.2	3.8	18.5	-13.2	22.7	22.0	15.3	13.8	19.5	-3.4	2.1	8.5
Netherlands	5.5	7.2	3.7	4.7	8.0	6.8	4.7	4.3	1.3	-2.7	7.1	7.8	6.1	7.6	7.9	6.5	10.2	2.6	3.8	8.3
New Zealand	20.1	-0.0	-1.4	10.4	-7.8	21.7	7.3	-9.6	10.7	4.3	16.3	6.5	3.4	3.6	2.4	13.4	-2.7	1.5	1.6	7.7
Norway	13.5	11.7	14.4	-2.0	-9.5	-5.7	10.3	2.6	3.3	0.7	16.1	8.1	10.4	7.9	10.5	-1.8	5.1	5.5	-0.2	3.9
Poland	..	..	..	..	..	..	..	..	..	..	15.2	20.8	28.2	22.2	15.1	4.2	10.8	4.4	6.7	9.1
Portugal	-5.7	6.6	19.2	28.0	22.2	8.4	15.8	5.9	13.0	-9.5	12.2	9.4	5.1	12.8	15.0	6.8	5.1	2.1	3.2	7.0
Slovak Republic	..	..	..	..	..	..	..	..	..	..	18.8	26.6	5.4	1.9	18.6	-5.5	10.8	11.4	8.3	10.3
Spain	-1.0	8.4	20.3	27.7	19.2	16.8	9.9	11.5	6.8	-5.7	15.2	11.0	7.5	12.4	13.1	13.9	8.3	5.3	3.5	7.5
Sweden	6.7	9.2	3.7	8.9	5.4	7.1	0.2	-6.4	-0.8	2.5	14.9	9.0	2.4	10.5	10.3	2.9	12.2	-4.9	-0.0	8.2
Switzerland	8.5	3.8	8.5	6.0	4.5	7.0	1.9	-1.5	-4.9	-0.8	8.3	4.1	2.4	8.5	9.1	5.8	10.0	0.4	0.4	5.5
Turkey	24.0	7.9	-5.0	14.1	-0.5	5.7	34.2	-2.0	10.6	37.2	-21.1	29.8	30.8	21.9	-1.8	-5.9	33.5	-19.1	9.2	13.4
United Kingdom	11.1	3.8	7.2	6.9	13.8	8.0	0.5	-5.2	6.2	0.4	6.3	6.0	9.8	8.7	9.4	7.3	9.7	3.2	3.2	6.9
United States[b]	24.2	6.3	10.3	4.8	4.1	4.2	3.0	-0.1	9.3	10.1	13.3	9.0	9.4	14.2	11.7	12.4	13.5	-3.7	-1.9	7.6
Total OECD	10.9	5.8	7.3	7.1	8.5	7.7	5.4	3.8	4.1	0.4	11.0	8.8	7.0	9.7	8.3	8.7	11.9	-0.5	1.0	7.4

Note: Regional aggregates are calculated *inclusive* of intra-regional trade. Data are on a national account basis for the United States and France, otherwise from international trade statistics. See also *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)*.

a) Including Luxembourg until 1994.

b) Volume data use hedonic price deflators for certain components.

c) OECD estimates.

Source: OECD.

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Annex Table 42. **Export prices (average unit values)**
Total goods, percentage changes from previous year, national currency terms

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	0.3	12.5	1.2	4.0	11.8	5.5	1.2	-9.1	2.1	1.3	-2.8	7.4	-4.1	1.8	4.9	-7.0	15.7	7.9	3.1	3.2
Austria	3.7	2.6	-4.3	-1.9	4.0	-2.6	-1.9	-4.1	-1.8	-1.4	-1.0	3.7	-6.1	-2.6	-3.3	-8.1	-0.8	3.1	1.5	2.1
Belgium[a]	7.8	1.7	-9.9	-6.1	4.7	7.9	-3.1	-1.9	-1.4	-1.5	1.1	1.8	2.7	5.4	-0.1	-0.6	9.7	2.3	1.1	2.2
Canada	3.7	0.5	-2.4	1.4	-0.5	1.2	-1.2	-5.3	2.5	4.6	6.0	6.2	-0.0	-1.3	-0.9	0.9	6.4	6.0	-1.2	1.1
Czech Republic	..	..	..	..	..	..	..	..	..	..	4.7	7.2	1.0	5.5	4.0	-0.9	6.3	1.1	0.6	2.6
Denmark	6.2	3.4	-4.5	-1.0	-0.1	5.6	-1.6	-0.4	-1.7	-3.0	1.9	0.6	0.8	2.2	-0.3	0.4	8.6	4.5	-0.3	1.5
Finland	5.9	2.8	-2.4	2.2	5.2	7.6	-1.2	0.5	6.1	5.3	0.8	6.9	-0.1	1.7	1.6	-4.9	13.4	-1.0	-2.4	1.2
France[b]	8.7	3.8	-4.5	-1.3	2.1	3.7	-1.9	-1.5	-2.3	-3.2	-0.6	0.4	1.7	2.1	-1.9	-1.2	1.3	0.9	-0.1	1.0
Germany	3.4	3.9	-3.3	-2.7	0.9	4.5	-1.1	-0.6	0.7	0.0	1.0	1.7	0.2	1.6	0.1	-1.7	4.0	3.7	0.2	1.5
Hungary	..	..	..	..	..	..	..	..	..	..	18.0	31.2	18.9	15.1	13.1	3.5	9.8	3.7	1.5	2.0
Iceland[c]	27.7	30.9	-1.0	-5.9	11.3	32.5	2.2	1.4	-2.5	17.6	3.1	-7.3	3.0	3.9	7.4	0.3	0.9	24.1	5.2	2.3
Ireland	8.5	2.8	-7.2	-0.1	7.0	6.7	-9.4	-0.9	-2.6	6.8	1.0	1.3	-0.7	1.2	2.6	1.6	4.4	2.5	-1.2	1.6
Italy	9.5	8.0	-4.7	1.2	5.0	6.3	2.1	2.9	0.8	11.3	3.7	9.2	0.8	0.5	0.9	-0.1	5.7	3.2	0.5	1.5
Japan	-0.2	-0.7	-15.4	-6.0	-2.5	6.9	3.6	-0.3	-0.1	-4.6	-1.0	-1.8	6.9	1.9	0.7	-8.0	-0.8	5.8	-1.5	-0.0
Korea	1.3	-6.0	-8.4	10.5	8.6	-5.3	2.1	3.1	4.3	-1.5	2.8	2.4	-9.3	7.9	17.1	-17.0	-4.5	-0.5	-0.4	0.8
Luxembourg	..	..	..	..	..	15.7	5.1	-1.0	8.4	11.4	-11.0	2.7	-7.0	0.8	-7.1	16.1	-7.7	5.1	-4.6	4.7
Mexico	25.9	60.7	35.6	152.2	53.3	18.4	22.2	-2.5	2.5	-3.0	17.9	100.0	20.3	3.1	8.7	8.2	6.5	0.3	4.4	4.6
Netherlands	5.9	1.3	-17.0	-5.7	0.4	5.1	-1.2	-0.6	-2.9	-3.4	2.0	1.5	0.7	3.0	-2.3	-0.6	9.5	4.6	0.4	2.2
New Zealand	13.1	9.3	-2.6	6.0	6.2	13.1	-1.2	-4.2	8.1	2.7	-4.1	-1.7	-3.5	-2.6	4.8	1.4	17.0	10.2	-3.3	1.1
Norway	9.4	4.9	-24.8	-3.4	-0.1	12.3	4.1	-3.7	-8.4	0.6	-3.7	3.7	7.4	2.2	-11.3	12.6	45.8	0.3	-8.2	7.8
Poland	..	..	..	..	..	..	..	..	..	..	29.0	20.8	8.0	12.7	6.5	8.0	-7.3	6.1	9.7	6.1
Portugal	30.7	15.7	3.3	8.4	10.4	5.8	2.9	0.2	-2.2	4.3	5.1	3.0	-1.1	0.4	-0.3	-0.9	7.3	5.5	1.0	2.9
Slovak Republic	..	..	..	..	..	..	..	..	..	..	4.7	7.2	3.0	1.2	3.0	5.4	10.8	5.8	5.1	4.7
Spain	12.4	6.9	-3.9	2.5	5.4	4.6	-1.8	-0.9	1.1	5.1	4.2	6.3	1.0	3.2	0.1	-0.8	6.1	2.4	-0.0	2.0
Sweden	6.6	3.8	-1.2	3.5	4.5	6.9	2.1	0.2	-3.0	8.4	3.9	5.4	-4.3	0.4	-2.5	-1.8	2.0	2.2	1.9	1.6
Switzerland	4.7	2.0	0.5	-1.0	2.2	5.7	1.3	2.5	1.2	0.2	-0.6	-1.8	-0.1	3.8	-0.7	1.1	3.0	1.0	-1.7	1.3
Turkey	51.6	35.9	25.7	45.6	59.5	50.3	35.8	58.2	66.9	55.4	163.7	72.1	69.6	77.6	64.0	50.2	22.7	106.9	44.4	3.4
United Kingdom	6.9	5.2	-10.6	3.8	0.4	8.3	3.9	0.6	1.2	9.7	0.4	3.7	1.1	-5.1	-5.6	-2.2	1.8	1.6	0.7	2.1
United States[b]	0.9	-5.0	-3.3	2.2	6.5	1.4	-0.9	-0.1	-1.5	-0.5	1.1	2.4	-2.6	-2.7	-3.1	-1.4	1.1	-0.8	-0.7	0.7
Total OECD	5.3	2.9	-5.9	1.8	3.8	5.0	0.8	-0.3	0.2	1.0	2.3	4.5	1.2	1.2	-0.1	-2.0	3.8	3.1	0.1	1.4

Note: Regional aggregates are calculated *inclusive* of intra-regional trade. Data are national accounts price deflators in the case of the United States and France.
a) Including Luxembourg until 1994.
b) Certain components are estimated on a hedonic basis.
c) OECD estimates.
Source: OECD.

Annex Table 43. **Import prices (average unit values)**

Total goods, percentage changes from previous year, national currency terms

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	2.5	18.7	9.3	6.1	-2.4	-1.0	3.9	1.0	4.6	8.1	-2.4	3.6	-5.4	-0.1	8.4	-2.3	9.2	7.3	3.6	2.8
Austria	4.1	3.8	-9.9	-4.1	1.8	3.0	-2.6	3.1	-2.5	-3.5	-1.2	-1.2	-5.2	-3.8	-5.3	-6.7	1.1	2.5	-0.4	1.9
Belgium[a]	8.3	-0.0	-16.2	-7.0	5.7	7.1	-1.8	-1.3	-3.2	-5.6	2.0	3.1	3.3	6.1	-1.6	1.2	12.0	2.1	-0.1	2.2
Canada	4.6	1.7	0.1	-1.8	-2.0	-0.3	0.7	-3.3	2.0	5.5	6.1	3.0	-2.5	-0.2	2.9	-0.9	1.5	2.9	-0.0	1.3
Czech Republic	..	..	..	..	..	..	..	..	..	..	-0.9	5.6	1.3	5.1	-2.8	1.9	12.0	-1.0	-1.1	2.7
Denmark	8.7	2.4	-9.6	-4.1	1.8	7.1	-2.9	0.0	-2.9	-2.9	2.5	3.2	0.9	3.2	0.4	-0.4	8.1	3.5	0.3	2.6
Finland	4.8	3.0	-10.0	-1.9	2.2	3.6	1.7	2.2	10.5	12.8	-2.9	-1.3	2.6	2.4	0.0	-1.4	14.9	-0.5	0.3	1.3
France[b]	11.3	0.9	-14.9	-2.3	0.7	6.0	-2.1	-0.6	-3.7	-4.1	0.1	0.4	2.5	1.6	-3.1	-0.8	4.9	1.0	-1.0	1.8
Germany	5.9	2.5	-15.9	-6.1	0.9	7.4	-2.5	1.9	-2.4	-1.5	0.8	0.5	0.5	3.2	-3.1	-1.3	11.0	1.5	-1.7	1.5
Hungary	..	..	..	..	..	..	..	..	..	..	15.2	30.6	21.3	13.6	11.3	5.5	12.9	2.3	0.0	1.8
Iceland[c]	27.7	30.9	-1.0	-5.9	11.3	32.4	2.4	1.2	-2.5	17.4	3.3	-7.3	3.0	-2.9	-0.5	-2.0	5.2	20.3	5.6	1.5
Ireland	9.5	2.6	-11.2	-0.1	6.4	6.5	-4.9	2.1	-1.9	5.4	2.4	4.5	-1.0	0.4	2.2	4.8	6.3	5.2	-3.9	1.0
Italy	11.3	7.4	-17.6	-1.5	4.0	7.7	-0.7	-0.8	-0.5	11.7	4.1	12.2	-1.3	1.4	-2.7	-0.9	14.1	3.0	-2.3	2.2
Japan	-2.6	-4.4	-36.5	-8.0	-5.4	11.9	10.7	-9.1	-6.9	-12.3	-7.7	-1.4	14.6	6.0	-5.4	-12.2	4.6	7.1	-1.5	1.4
Korea	-1.4	-3.6	-0.2	10.1	3.1	-5.9	4.4	-1.7	3.2	0.8	-0.9	1.7	0.2	10.8	22.6	-15.4	9.5	5.6	-0.5	0.5
Luxembourg	..	..	..	..	..	6.1	-2.6	-3.5	4.7	8.6	3.0	-3.9	2.5	-1.4	-4.8	4.2	0.4	-6.3	-3.9	1.6
Mexico	28.4	70.7	92.1	129.8	69.7	14.3	16.2	6.6	3.3	2.0	11.7	99.7	18.9	4.8	14.7	3.3	1.9	2.4	3.8	4.0
Netherlands	5.7	0.9	-18.0	-3.1	-0.6	5.2	-1.7	-0.3	-2.7	-3.2	2.0	0.2	0.7	2.6	-2.5	0.4	9.3	0.9	-0.5	2.2
New Zealand	13.7	10.5	-2.5	-4.3	-0.8	7.9	0.7	1.0	6.7	-0.6	-3.4	-0.1	-2.7	-0.9	3.8	2.3	16.5	2.3	0.3	2.4
Norway	3.1	6.5	0.0	2.8	2.9	6.0	0.9	-1.7	-2.1	1.0	0.7	0.9	-0.9	-1.0	1.4	-1.9	4.7	-0.6	-2.4	1.2
Poland	..	..	..	..	..	..	..	..	..	..	28.3	18.6	11.2	13.3	2.1	7.2	-3.5	5.2	7.6	6.5
Portugal	35.3	7.3	-8.6	6.1	7.1	7.8	3.2	0.2	-5.1	5.0	3.6	1.8	2.7	0.3	-2.1	2.6	9.7	2.4	-0.3	2.1
Slovak Republic	..	..	..	..	..	..	..	..	..	..	-0.9	5.6	5.5	2.6	-3.4	7.7	14.9	10.8	4.4	4.5
Spain	11.8	1.2	-19.1	-4.4	-2.1	2.1	-3.4	-2.7	-1.2	5.2	5.8	4.4	0.3	3.6	-2.4	0.0	12.9	-1.6	-0.8	2.0
Sweden	2.3	2.4	-8.3	1.7	3.4	5.2	2.2	-0.6	-2.7	12.0	4.2	0.8	-3.8	0.9	-3.3	1.5	5.0	4.8	3.9	2.0
Switzerland	4.2	4.4	-9.3	-3.7	4.9	8.0	-0.4	-0.1	2.1	-1.9	-4.9	-2.0	-0.1	5.0	-3.6	-2.1	5.4	-1.7	-3.0	1.5
Turkey	56.2	44.3	8.3	37.5	64.6	55.2	29.6	54.6	61.6	50.0	171.4	82.2	65.2	71.5	62.9	53.2	44.8	69.6	46.2	7.1
United Kingdom	8.0	3.9	-5.8	2.7	-0.5	5.9	3.0	-0.5	-0.3	7.8	3.6	6.7	-0.0	-6.6	-7.2	-3.0	1.3	1.8	0.8	2.0
United States[b]	-0.7	-4.0	-2.2	6.9	4.8	2.8	1.8	-1.4	-0.4	-1.1	0.8	2.7	-2.4	-4.1	-6.0	0.1	4.8	-1.9	-2.2	1.1
Total OECD	5.5	2.0	-10.7	1.2	2.9	5.7	1.4	-0.7	-0.9	0.1	2.1	4.3	1.7	1.5	-1.8	-1.6	7.0	2.0	-0.6	1.7

Note: Regional aggregates are calculated *inclusive* of intra-regional trade. Data are national accounts price deflators in the case of the United States and France.
a) Including Luxembourg until 1994.
b) Certain components are estimated on a hedonic basis.
c) OECD estimates.
Source: OECD.

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Annex Table 44. **Competitive positions: relative unit labour costs**

Indices, 1995 = 100

	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Australia	284.6	290.2	224.2	180.7	164.3	161.2	163.2	149.1	132.3	115.3	101.5	102.9	100.0	103.3	105.0	93.0	96.9	93.6
Austria	92.8	92.3	91.7	106.2	114.5	108.5	102.6	101.7	100.7	102.6	106.1	99.4	100.0	101.7	92.1	81.6	79.0	73.7
Belgium-Luxembourg	86.7	87.4	88.7	92.6	95.9	93.2	91.1	96.6	96.6	96.7	96.5	96.9	100.0	94.6	87.9	89.2	88.4	85.8
Canada	118.4	110.2	105.1	99.1	105.2	115.2	119.5	121.9	126.9	116.3	104.9	97.8	100.0	104.5	105.6	101.6	103.3	107.4
Czech Republic	..	..	..	..	..	..	..	..	..	..	90.3	98.2	100.0	107.0	104.8	115.3	117.0	118.1
Denmark	77.9	77.1	78.6	82.5	90.1	95.3	89.3	97.3	93.5	95.9	101.3	96.9	100.0	104.0	98.5	101.9	103.8	104.1
Finland	126.6	131.7	133.8	128.9	127.5	131.5	137.8	144.5	138.5	107.6	82.3	87.2	100.0	93.7	87.9	89.6	88.1	80.2
France	107.1	107.0	107.2	108.2	107.1	102.6	98.3	104.1	99.3	97.7	101.6	100.5	100.0	99.7	90.9	87.2	86.5	82.3
Germany	74.2	71.8	70.1	77.5	83.4	82.8	79.8	81.7	82.5	88.8	91.5	92.5	100.0	97.3	92.8	95.3	96.0	90.1
Greece	99.2	104.8	103.0	87.8	84.6	93.1	98.3	103.7	95.8	92.7	88.3	92.1	100.0	102.6	106.0	101.5	103.4	99.3
Hungary	..	..	..	..	..	..	..	..	..	..	122.6	121.3	100.0	92.2	92.0	85.3	85.4	80.2
Iceland	85.9	90.4	97.3	94.4	115.6	125.7	111.1	109.1	112.9	110.5	101.3	99.4	100.0	98.7	104.0	113.3	124.7	135.7
Ireland	170.8	158.4	153.5	164.1	151.5	138.9	127.6	132.9	127.1	122.5	113.0	108.9	100.0	99.1	92.0	85.4	81.5	75.0
Italy	138.6	136.8	135.4	138.0	138.8	137.5	143.1	150.3	152.0	145.6	120.0	114.1	100.0	111.8	113.9	119.7	121.1	114.8
Japan	48.8	48.2	49.4	65.4	69.1	71.4	64.6	60.4	65.7	72.9	89.0	98.5	100.0	84.5	80.7	87.7	98.3	102.2
Korea	90.0	92.9	86.0	68.6	72.6	88.9	104.0	99.6	100.1	91.6	87.4	90.0	100.0	106.5	91.3	63.8	65.0	69.2
Mexico	110.4	141.5	134.4	103.4	104.9	108.9	120.6	122.6	137.1	152.7	164.7	160.6	100.0	101.7	111.9	108.3	113.5	124.5
Netherlands	110.4	100.5	99.1	106.7	112.4	108.7	100.8	101.9	98.9	102.0	101.6	97.5	100.0	96.8	94.3	97.5	97.4	93.2
New Zealand	93.3	79.4	78.3	80.5	90.4	100.4	93.7	93.4	93.0	83.0	85.8	93.4	100.0	111.6	116.6	105.1	102.9	93.3
Norway	93.6	93.0	93.5	94.1	95.3	100.4	98.5	97.2	95.3	93.2	90.6	94.4	100.0	101.0	107.1	109.0	115.8	119.4
Poland	..	..	..	..	..	..	..	..	..	..	87.4	93.3	100.0	102.7	102.4	108.3	101.5	102.4
Portugal	98.2	86.3	89.3	87.0	83.3	86.4	93.7	88.4	90.5	99.5	91.5	95.0	100.0	91.3	93.0	94.6	96.7	98.2
Slovak Republic	..	..	..	..	..	..	..	..	..	..	82.5	89.5	100.0	109.0	127.5	135.2	131.5	149.0
Spain	77.2	79.4	79.2	82.6	83.7	89.0	95.5	106.6	108.0	111.1	102.3	99.1	100.0	104.3	103.8	107.4	107.5	108.3
Sweden	117.5	121.5	127.9	128.8	129.7	134.4	140.7	144.8	147.5	144.8	103.9	97.2	100.0	113.1	108.7	105.9	104.3	103.4
Switzerland	71.4	70.0	69.5	76.5	81.7	83.1	78.2	83.7	84.3	82.7	82.7	91.2	100.0	96.5	92.8	96.3	96.4	96.7
Turkey	134.8	118.1	121.9	96.7	88.0	80.2	120.8	170.5	187.9	170.0	171.5	111.5	100.0	100.2	112.5	126.6	148.8	173.3
United Kingdom	111.3	107.8	110.8	104.6	107.6	114.7	110.7	113.7	116.5	110.4	98.1	100.9	100.0	102.9	124.8	136.8	137.5	141.0
United States	159.5	165.0	169.6	149.5	126.4	116.7	117.5	114.3	111.7	107.7	106.7	105.6	100.0	101.1	106.5	114.8	111.8	114.4
Euro area	92.1	87.4	85.0	96.5	104.1	99.8	95.3	105.7	103.0	106.6	100.2	97.3	100.0	100.6	91.0	93.2	92.9	83.7

Note: Competitiveness-weighted relative unit labour costs in the manufactoring sector in dollar terms. Competitiveness weights take into account the structure of competition in both export and import markets of the manufacturing sector of 41 countries. An increase in the index indicates a real effective appreciation and a corresponding deterioration of the competitive position. For details on the method of calculation see Durand, M., C. Madaschi and F. Terribile (1998), "Trends in OECD Countries' International Competitiveness: The Influence of Emerging Market Economies', *OECD Economics Department Working Papers*, No. 195.

Source: OECD.

Annex Table 45. **Competitive positions: relative export prices**

Indices, 1995 = 100

	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Australia	121.2	121.5	108.6	98.1	101.0	118.3	123.5	116.3	105.7	96.9	91.1	96.1	100.0	100.4	102.2	95.6	97.4	102.7
Austria	106.5	104.4	103.7	107.9	109.8	112.6	102.7	104.6	99.3	98.6	99.4	96.0	100.0	92.3	86.1	83.6	77.4	72.4
Belgium-Luxembourg	90.0	89.6	89.8	93.5	93.0	92.8	95.2	97.3	95.0	96.0	94.3	95.9	100.0	100.1	100.1	102.3	101.8	104.2
Canada	100.7	100.8	100.1	97.4	99.3	102.8	105.6	103.1	100.4	96.3	95.3	95.6	100.0	101.3	102.3	99.5	100.0	101.8
Czech Republic	..	..	..	..	..	..	..	..	..	..	94.3	98.4	100.0	102.7	103.2	108.6	107.2	108.7
Denmark	88.0	86.1	88.9	95.5	98.0	94.9	92.6	98.0	96.5	98.1	98.0	99.2	100.0	99.4	97.8	102.0	103.7	101.5
Finland	86.0	87.1	88.6	88.7	91.3	94.7	99.5	99.4	98.0	90.1	79.5	85.2	100.0	95.3	94.5	98.4	94.2	99.8
France	104.5	104.1	105.9	109.1	109.4	107.9	104.4	106.9	102.5	103.0	100.5	99.8	100.0	101.7	99.5	99.1	97.9	91.8
Germany	82.6	79.4	80.8	90.0	93.1	90.7	89.2	93.0	91.4	94.9	96.5	96.7	100.0	97.7	93.3	95.0	93.8	90.5
Hungary	..	..	..	..	..	..	..	..	..	..	103.2	102.4	100.0	101.2	105.7	107.9	107.0	107.6
Iceland	169.7	176.3	175.5	144.1	127.6	120.2	121.4	110.1	111.1	107.8	115.4	111.8	100.0	102.6	117.0	126.2	127.9	113.9
Ireland	106.7	106.0	108.8	111.1	103.8	108.5	108.9	103.9	102.0	104.6	100.9	99.5	100.0	102.4	106.2	106.6	107.5	100.3
Italy	101.3	101.8	102.3	104.4	104.8	101.0	107.8	113.1	114.1	112.6	100.7	98.5	100.0	105.8	105.2	108.8	109.4	108.3
Japan	70.3	70.2	71.8	80.8	79.4	81.6	79.5	74.8	80.4	84.1	94.6	100.8	100.0	92.7	89.7	90.1	98.1	104.5
Korea	108.5	111.0	100.8	87.0	99.5	112.5	123.9	116.6	110.1	103.5	101.3	99.0	100.0	104.1	105.2	84.4	81.2	83.9
Mexico	96.6	100.9	103.5	101.0	97.6	97.6	95.8	93.8	94.0	91.7	92.3	99.5	100.0	103.6	110.0	113.8	114.5	118.1
Netherlands	99.4	94.6	91.4	92.0	98.6	98.8	95.1	96.7	95.1	95.3	95.0	96.2	100.0	98.7	95.0	94.7	93.9	88.3
New Zealand	97.3	96.6	92.7	88.5	94.6	106.0	104.0	98.7	92.1	89.2	93.0	97.4	100.0	102.1	101.7	92.8	91.5	95.1
Norway	98.3	103.2	99.7	95.7	96.4	112.1	116.4	105.9	100.3	94.8	90.6	89.3	100.0	95.8	95.4	95.1	94.2	97.1
Poland	..	..	..	..	..	..	..	..	..	..	100.8	99.4	100.0	100.2	102.4	106.2	107.7	107.1
Portugal	107.6	110.0	111.0	108.5	106.3	106.5	101.7	102.2	103.7	105.6	101.1	99.9	100.0	98.5	95.2	94.3	93.4	92.3
Slovak Republic	..	..	..	..	..	..	..	..	..	..	103.1	99.7	100.0	102.3	104.9	106.6	103.0	110.7
Spain	82.5	84.9	87.8	95.9	98.2	102.0	102.1	107.7	112.2	111.9	102.5	98.5	100.0	100.9	99.8	101.4	100.2	99.5
Sweden	100.5	102.7	105.0	107.6	109.1	110.8	112.7	113.3	114.5	113.1	98.3	99.0	100.0	105.6	100.8	97.6	95.9	93.3
Switzerland	78.3	77.0	74.7	84.6	88.6	88.1	84.1	90.8	92.5	91.8	93.7	99.6	100.0	99.3	97.0	99.9	102.8	101.6
Turkey	162.4	157.1	142.8	112.9	120.1	109.0	106.6	105.0	104.7	102.3	101.0	98.6	100.0	97.2	99.2	96.5	95.5	82.9
United Kingdom	101.0	98.3	101.1	97.1	98.0	102.9	101.5	103.4	104.9	102.8	102.5	104.1	100.0	101.5	110.4	111.3	109.0	107.0
United States	153.9	153.8	151.5	134.2	123.6	119.3	119.6	114.9	114.5	111.3	112.6	108.7	100.0	98.9	101.4	105.2	105.4	106.5

Note: Competitiveness-weighted relative unit labour costs in the manufactoring sector in dollar terms. Competitiveness weights take into account the structure of competition in both export and import markets of the manufacturing sector of 41 countries. An increase in the index indicates a real effective appreciation and a corresponding deterioration of the competitive position. For details on the method of calculation see Durand, M., C. Madaschi and F. Terribile (1998), "Trends in OECD Countries' International Competitiveness: The Influence of Emerging Market Economies', *OECD Economics Department Working Papers*, No. 195.

Source: OECD.

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Annex Table 46. **Export performance for total goods**

Total goods, percentage changes from previous year

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	6.9	7.1	2.3	-1.9	-8.9	-2.0	2.0	11.0	0.5	2.8	-4.6	-5.5	8.1	3.2	-0.2	-0.1	-2.3	2.4	1.9	-1.7
Austria	3.1	5.1	-4.7	-3.7	0.7	6.8	4.1	0.5	2.5	-0.3	0.3	-0.1	5.4	9.9	1.3	7.9	3.1	5.4	0.4	-0.3
Belgium[a]	-0.1	0.5	-0.9	0.3	-1.0	0.5	-2.7	-1.4	-2.5	10.4	0.1	-2.5	-2.8	-1.3	-3.5	-1.0	-2.5	-1.2	-0.4	-0.5
Canada	-0.7	-0.8	-2.8	-1.3	2.5	-4.0	4.0	1.5	-0.9	1.4	0.6	1.2	-2.3	-2.9	-0.8	-0.2	-4.7	0.8	1.5	-0.1
Czech Republic	..	..	..	..	..	..	..	..	..	..	-5.1	2.7	-4.6	5.9	1.0	3.4	5.5	9.8	2.7	1.4
Denmark	-0.4	-0.0	-3.4	-2.7	2.3	1.3	2.1	2.5	2.4	1.3	-2.0	-1.4	-3.6	-1.3	-6.2	2.3	-3.9	-1.1	0.5	-0.4
Finland	1.6	-2.7	-5.0	-3.8	-2.7	-6.2	-0.2	-12.1	7.6	19.8	8.4	-10.5	-3.0	2.0	-0.1	0.2	-2.9	-5.8	-1.3	-1.6
France	0.6	2.0	-4.5	-0.9	1.1	1.2	-0.8	-1.2	1.0	1.5	-1.6	0.6	-3.5	1.9	0.1	-1.9	1.7	-0.7	-1.4	0.0
Germany	1.9	1.5	-4.5	-3.3	-1.9	0.3	-2.6	-1.1	-2.5	-8.0	-1.8	-2.8	0.0	0.4	-2.8	-0.4	-0.3	2.1	0.7	-0.8
Hungary	..	..	..	..	..	..	..	..	..	..	8.2	0.1	16.3	19.8	12.2	13.2	13.4	1.0	-0.4	-0.7
Iceland	-8.7	10.4	27.4	18.5	0.2	-6.4	9.7	-3.5	-6.0	-4.4	4.1	7.6	0.5	-4.8	-6.9	2.3	-4.5	-1.2	-4.9	1.0
Ireland	9.4	2.3	-1.3	9.2	-3.2	3.7	4.0	2.9	8.4	11.0	6.8	10.8	2.6	4.1	14.4	7.9	7.9	1.3	-1.3	1.1
Italy	0.2	4.0	-4.9	-1.8	0.8	-1.8	-3.4	-4.4	0.1	11.9	2.2	-1.4	-2.1	-4.8	-6.6	-4.1	-2.6	0.9	-0.6	-0.9
Japan	2.0	-0.5	-6.0	-6.3	-5.9	-3.7	-0.3	-5.3	-6.4	-9.6	-10.5	-6.6	-7.3	0.7	-3.1	-7.5	-6.6	-9.2	-2.6	-1.4
Korea	2.7	3.8	10.8	11.9	6.8	-12.9	2.8	5.8	1.7	0.6	2.8	7.7	-3.0	1.5	25.1	2.5	-0.6	2.4	2.3	1.1
Luxembourg	..	..	..	..	..	-3.2	-9.8	-2.8	-13.9	-11.5	11.8	-5.1	2.9	1.9	16.3	-15.3	13.9	-0.8	-1.3	2.7
Mexico	-5.8	-7.4	1.3	5.1	9.4	3.2	7.6	10.3	-2.2	3.7	-3.9	16.6	8.3	0.5	-0.4	2.2	1.5	0.9	1.6	0.0
Netherlands	3.1	2.4	-2.0	-1.1	2.8	-0.2	-0.1	-0.3	-0.2	3.6	-2.3	0.2	-0.2	-0.7	0.2	1.1	0.8	0.1	0.3	0.0
New Zealand	-4.8	9.0	-1.7	-5.1	-4.5	-11.6	4.3	8.7	-3.7	-0.3	0.7	-5.4	0.2	-0.1	-1.4	-3.5	-3.6	1.6	-0.3	0.4
Norway	2.4	0.2	-5.1	6.3	-0.8	9.1	2.9	3.3	3.6	5.2	4.5	-0.2	6.6	-1.8	-4.4	-0.9	-4.7	-0.2	-0.8	-3.6
Poland	..	..	..	..	..	..	..	..	..	..	8.0	7.2	3.6	5.5	-0.2	-0.8	12.2	10.4	4.3	3.4
Portugal	8.7	6.5	1.5	4.0	-0.3	11.5	6.9	-4.0	4.0	-0.9	4.1	5.7	4.7	0.9	-3.2	-2.1	-4.2	1.3	-0.1	0.4
Slovak Republic	..	..	..	..	..	..	..	..	..	..	-7.1	-0.5	-2.7	-5.9	3.9	4.8	1.4	1.7	2.0	1.1
Spain	13.6	-2.1	-13.0	-0.2	-0.3	-0.1	2.5	1.0	0.7	14.5	10.8	1.2	6.8	4.5	-2.7	1.5	0.5	0.9	0.4	-0.1
Sweden	0.2	-1.9	-3.7	-2.1	-2.7	-4.3	-4.2	-5.1	-2.4	9.7	5.2	1.6	-1.2	1.3	0.2	0.6	0.1	-5.6	-1.3	0.9
Switzerland	-2.6	6.2	-4.2	-4.8	-0.6	-0.1	-2.0	-9.1	0.9	1.7	-6.4	-5.5	-4.8	-3.3	-3.0	-2.9	-5.2	-2.0	-1.3	-2.5
Turkey	25.5	15.9	-22.8	18.7	4.0	-4.8	-2.3	3.1	5.9	11.5	11.9	-4.2	7.0	11.8	-0.6	2.8	8.0	-2.2	4.3	3.5
United Kingdom	1.8	3.2	-0.9	1.3	-2.9	-1.2	1.1	-3.8	-2.0	0.9	2.5	1.1	2.4	-1.6	-6.6	-2.5	-2.5	2.1	1.1	-0.7
United States	-1.3	0.8	0.8	8.5	5.2	4.0	3.3	-0.0	-0.6	-2.1	-2.3	3.2	1.2	3.6	-1.0	-2.0	-1.3	-4.6	-4.7	-0.2
Total OECD	1.6	1.5	-3.3	-0.7	-0.4	-0.4	0.1	-1.4	-1.2	-0.4	-1.5	-0.4	-0.8	0.8	-1.1	-1.3	-1.2	-0.9	-0.6	-0.4
Memorandum items																				
China	2.2	14.5	6.2	2.0	0.7	-3.0	0.6	8.1	10.0	2.8	19.3	-6.7	5.9	17.0	9.3	1.6	12.0	12.0	9.2	9.2
Dynamic Asia[b]	2.0	-4.2	15.2	10.0	4.6	2.3	4.7	5.1	3.4	3.7	2.4	0.3	-1.3	-0.2	1.6	-0.3	1.6	-4.7	-1.5	1.0
Other Asia	-3.0	-3.1	5.2	3.8	-1.8	5.7	5.5	0.9	7.3	7.8	1.1	6.6	5.5	-4.2	2.1	1.7	1.6	2.4	1.7	-0.1
Non-OECD Asia	1.4	-1.0	12.4	8.0	3.3	1.7	4.1	5.3	4.9	3.9	5.2	-0.6	0.6	2.8	3.1	0.2	3.9	-0.3	1.3	3.0
Latin America	2.9	0.6	-8.6	-2.0	6.5	2.4	-2.9	-1.6	-4.1	3.4	-4.2	-6.8	1.3	-0.0	2.8	1.5	-0.4	1.8	2.6	0.5
Africa and Middle-East	-8.0	-0.7	21.1	-8.9	-1.3	-0.7	-6.0	0.4	-0.8	1.7	-5.3	-7.0	8.7	1.6	1.4	-1.0	-7.3	0.5	1.1	-0.3
Central and Eastern Europe	2.2	-8.3	2.1	-1.1	-3.8	-4.1	-3.4	-13.2	-13.4	-1.0	11.9	0.2	-4.5	-11.9	-6.9	6.0	-4.3	2.3	1.8	-3.4
Total of non-OECD countries	-1.7	-3.2	8.5	-0.4	0.3	-0.2	-0.9	-0.1	-0.1	2.7	2.4	-2.4	1.5	0.6	1.7	0.9	0.9	0.1	1.3	1.7
World	0.8	0.3	-0.4	-0.6	-0.2	-0.3	-0.1	-1.1	-1.0	0.4	-0.5	-0.9	-0.2	0.7	-0.3	-0.7	-0.6	-0.6	-0.1	0.2

Note: Regional aggregates are calculated *inclusive* of intra-regional trade. Export performance is the ratio between export volumes and export markets for total goods. The export volume concept employed is the sum of the exports of non-manufactured goods and manufactures. The calculation of export markets is based on a weighted average of import volumes in each exporting country's markets, with weights based on trade flows in 1995. The export markets for total goods facing each country is calculated as the weighted sum of the individual export markets for non-manufactured goods and manufactures, where the weights correspond to the commodity export structure of the exporting country in 1995.

a) Including Luxembourg until 1994.

b) Dynamic Asia includes Chinese Taipei; Hong Kong, China; Indonesia; Malaysia; Philippines; Singapore and Thailand.

Source: OECD.

Annex Table 47. **Shares in World exports and imports**

Percentage, values for total goods, customs basis

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
A. Exports																				
Canada	4.8	4.8	4.5	4.2	4.3	4.2	3.9	3.8	3.7	4.1	4.0	3.9	3.9	4.0	4.1	4.5	4.6	4.6	4.4	4.3
France	5.3	5.4	6.1	6.1	6.0	5.9	6.3	6.2	6.3	5.8	5.6	5.7	5.5	5.4	5.8	5.5	4.9	5.0	5.0	5.0
Germany	9.7	10.2	12.3	12.7	12.2	11.8	12.2	11.7	11.8	10.5	10.2	10.5	10.2	9.7	10.2	9.9	8.9	9.6	9.8	9.6
Italy	4.0	4.2	4.8	4.8	4.7	4.7	5.0	4.9	4.8	4.6	4.5	4.6	4.7	4.3	4.5	4.2	3.8	4.0	4.1	4.0
Japan	9.4	9.7	10.5	9.8	9.8	9.4	8.7	9.3	9.4	10.0	9.6	8.9	7.9	7.8	7.3	7.6	7.8	6.8	6.4	6.3
United Kingdom	5.1	5.4	5.2	5.4	5.3	5.1	5.4	5.3	5.1	4.8	4.9	4.8	5.0	5.1	5.1	4.8	4.5	4.6	4.7	4.7
United States	11.7	11.4	10.6	10.2	11.3	11.9	11.2	11.7	11.6	11.9	11.5	11.0	11.1	12.0	12.0	11.9	11.9	11.4	10.9	10.7
Other OECD countries	19.3	19.5	20.4	21.4	21.7	21.3	22.2	21.9	21.9	21.4	22.5	23.4	23.6	23.2	24.3	24.3	23.5	24.0	24.6	24.6
Total OECD	69.3	70.6	74.5	74.7	75.3	74.4	75.0	74.8	74.7	73.1	72.7	72.8	71.9	71.6	73.4	72.7	69.8	69.9	70.0	69.3
Non-OECD Asia	10.2	9.9	9.8	10.6	11.3	11.8	11.8	13.1	14.2	15.7	16.3	16.4	16.5	16.8	16.2	16.6	17.8	17.3	17.3	17.9
Latin America	4.8	4.5	3.7	3.3	3.4	3.4	3.2	3.0	2.9	3.0	3.0	2.9	3.0	3.2	3.1	2.9	3.2	3.3	3.4	3.4
Other non-OECD countries	15.8	15.0	12.1	11.4	10.1	10.4	10.1	9.0	8.3	8.2	8.0	7.9	8.6	8.4	7.3	7.7	9.2	9.5	9.2	9.4
Total of non-OECD countries	30.7	29.4	25.5	25.3	24.7	25.6	25.0	25.2	25.3	26.9	27.3	27.2	28.1	28.4	26.6	27.3	30.2	30.1	30.0	30.7
B. Imports																				
Canada	3.5	3.7	3.7	3.4	3.6	3.6	3.3	3.2	3.1	3.5	3.3	3.1	3.1	3.4	3.5	3.6	3.6	3.4	3.4	3.3
France	5.5	5.6	6.0	6.4	6.3	6.3	6.7	6.4	6.3	5.5	5.4	5.5	5.2	4.8	5.3	5.1	4.8	4.8	4.8	4.8
Germany	8.1	8.3	9.1	9.4	9.0	8.9	9.9	10.9	10.7	9.2	8.9	9.0	8.7	8.0	8.6	8.3	7.8	7.9	8.0	7.9
Italy	4.1	4.4	4.4	4.7	4.5	4.7	4.9	4.8	4.6	3.7	3.7	3.8	3.6	3.5	3.7	3.6	3.4	3.5	3.5	3.4
Japan	6.4	6.1	5.5	5.5	6.0	6.2	6.1	6.0	5.5	5.9	5.8	5.9	5.9	5.6	4.6	4.9	5.3	5.0	4.3	4.1
United Kingdom	5.4	5.6	5.9	6.2	6.7	6.5	6.4	5.9	5.8	5.5	5.3	5.2	5.4	5.6	5.8	5.7	5.2	5.3	5.5	5.5
United States	17.9	18.1	17.8	17.1	16.3	16.1	14.9	14.3	14.6	16.3	16.1	15.1	15.4	16.4	17.4	18.8	19.8	19.0	18.0	17.7
Other OECD countries	19.8	20.4	21.6	22.9	23.1	23.4	24.5	24.2	23.9	22.5	23.9	24.4	24.9	24.2	24.8	24.9	23.9	24.0	24.6	24.6
Total OECD	70.7	72.1	74.0	75.5	75.3	75.6	76.7	75.6	74.6	72.0	72.4	72.0	72.2	71.6	73.6	75.0	73.8	72.9	72.1	71.3
Non-OECD Asia	9.8	10.2	9.6	9.9	11.2	11.6	11.4	12.6	13.8	16.1	16.2	16.5	16.1	16.1	14.1	14.4	15.9	15.5	15.7	16.5
Latin America	3.9	3.7	3.8	3.5	3.1	3.0	2.8	3.0	3.3	3.7	3.8	3.8	3.9	4.4	4.5	3.7	3.6	4.0	4.1	4.1
Other non-OECD countries	15.6	13.9	12.6	11.1	10.4	9.8	9.1	8.8	8.2	8.2	7.6	7.7	7.8	7.9	7.7	6.8	6.6	7.6	8.1	8.2
Total of non-OECD countries	29.3	27.9	26.0	24.5	24.7	24.4	23.3	24.4	25.4	28.0	27.6	28.0	27.8	28.4	26.4	25.0	26.2	27.1	27.9	28.7

Note: Regional aggregates are calculated *inclusive* of intra-regional trade.
Source: OECD.

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Annex Table 48. **Trade balances**
Billions US dollars

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	-0.8	-1.0	-1.9	0.5	-0.7	-3.4	0.4	3.5	1.6	-0.1	-3.3	-4.2	-0.6	1.8	-5.4	-9.7	-4.7	-1.5	-3.7	-3.8
Austria	-3.2	-3.1	-4.0	-4.8	-4.8	-5.6	-7.0	-8.6	-7.7	-6.5	-7.9	-6.7	-7.3	-4.3	-3.7	-3.6	-2.7	-2.1	-0.8	-0.1
Belgium[a]	0.4	1.1	3.0	2.2	3.7	3.6	3.2	3.6	5.4	7.4	8.7	11.8	10.5	9.4	9.3	8.9	5.0	4.3	5.8	6.2
Canada	15.6	11.9	7.2	9.2	8.8	6.5	9.5	6.1	7.4	10.2	14.8	25.8	31.1	18.6	15.3	25.9	39.9	48.3	40.4	42.1
Czech Republic	..	..	..	..	..	..	..	..	..	-0.5	-1.4	-3.7	-5.9	-4.6	-2.6	-1.9	-3.1	-3.3	-3.0	-3.4
Denmark	-0.2	-0.7	-1.0	0.8	2.4	2.7	5.0	5.1	7.4	7.8	7.6	6.7	7.7	5.8	3.8	6.7	7.7	9.3	9.6	10.2
Finland	1.5	0.9	1.7	1.5	1.2	-0.2	0.7	2.2	4.0	6.4	7.7	12.4	11.3	11.6	12.5	12.2	13.7	12.2	11.3	12.9
France	-4.4	-5.0	-1.4	-7.8	-7.6	-10.3	-13.3	-9.7	2.4	7.2	7.2	11.0	15.1	26.6	25.4	18.6	1.5	3.4	7.6	3.9
Germany	21.4	28.3	54.6	67.6	76.3	74.9	68.4	19.5	28.2	41.2	50.9	65.1	70.6	71.3	77.8	70.9	58.3	77.3	86.5	94.1
Greece	-4.9	-5.9	-5.3	-6.4	-7.2	-8.4	-11.7	-11.6	-13.3	-12.1	-13.0	-16.6	-17.8	-17.3	-16.7	-18.0	-20.6	-20.6	-21.4	-23.6
Hungary	..	..	..	..	..	..	..	..	..	-3.3	-3.6	-2.4	-2.7	-2.0	-2.4	-2.2	-2.1	-1.6	-1.1	-1.1
Iceland	-0.0	-0.0	0.1	-0.1	-0.0	0.1	0.1	-0.1	0.0	0.2	0.3	0.2	0.0	0.0	-0.3	-0.3	-0.5	-0.3	-0.2	-0.1
Ireland	0.2	0.6	1.1	2.6	3.8	4.0	3.9	4.3	7.0	8.1	9.3	13.5	15.7	18.6	23.3	24.3	25.8	25.1	26.9	29.8
Italy	-5.1	-5.4	4.8	0.1	-0.6	-2.9	-1.6	-2.3	-0.4	28.9	31.4	38.7	54.0	40.0	36.4	23.6	12.2	18.1	24.0	26.1
Japan	44.3	54.9	90.7	91.3	92.3	80.3	69.2	96.2	124.7	139.4	144.1	132.1	83.7	101.6	122.5	123.3	116.6	73.8	98.9	120.1
Korea	-1.1	-0.0	4.3	7.5	11.3	4.4	-2.5	-6.8	-1.8	2.3	-2.9	-4.4	-15.0	-3.2	41.6	28.4	16.6	13.8	15.5	20.0
Luxembourg	..	..	..	..	..	..	..	..	..	..	..	-1.8	-2.0	-2.0	-1.9	-2.5	-2.2	-2.2	-2.6	-2.4
Mexico	13.2	8.4	5.0	8.8	2.6	0.4	-0.9	-7.3	-15.9	-13.5	-18.5	7.1	6.5	0.6	-7.9	-5.6	-8.0	-9.8	-12.0	-14.0
Netherlands	6.6	6.8	7.4	6.3	10.1	9.8	12.0	12.0	12.3	16.9	18.7	23.8	22.8	20.9	21.0	17.9	18.6	25.7	28.3	29.3
New Zealand	-0.5	-0.0	0.1	0.6	2.2	1.0	0.9	2.1	1.6	1.7	1.4	0.9	0.5	0.8	0.9	-0.4	0.6	1.7	1.2	1.2
Norway	3.5	3.0	-3.8	-2.6	-2.1	1.1	4.6	6.0	8.3	6.9	7.5	8.6	12.9	11.5	1.8	10.1	25.5	26.8	24.5	29.3
Poland	..	..	..	..	..	..	..	..	..	-2.5	-0.6	-1.6	-7.3	-9.8	-12.8	-15.1	-14.4	-14.7	-15.1	-16.6
Portugal	-2.0	-1.4	-1.5	-3.4	-5.2	-4.6	-6.5	-7.5	-9.2	-7.8	-8.1	-8.7	-9.0	-9.9	-12.2	-13.8	-14.0	-13.0	-13.3	-14.0
Slovak Republic	..	..	..	..	..	..	..	..	..	-0.9	0.1	-0.2	-2.3	-2.1	-2.4	-1.1	-0.9	-1.9	-2.1	-2.5
Spain	-4.6	-4.7	-7.2	-13.7	-18.7	-25.4	-29.1	-30.4	-30.4	-15.1	-14.8	-18.4	-16.3	-13.5	-20.7	-30.4	-32.8	-30.9	-31.3	-34.0
Sweden	3.4	2.4	5.1	4.5	4.8	4.0	3.4	6.3	6.2	7.2	9.4	16.9	18.7	19.0	17.5	16.9	15.2	12.2	11.6	12.8
Switzerland	-4.2	-3.9	-4.3	-6.0	-6.3	-7.4	-7.1	-6.0	-1.0	1.7	1.6	0.9	0.9	-0.3	-1.7	-0.3	-2.8	-1.3	0.1	-0.1
Turkey	-2.9	-3.0	-3.1	-3.2	-1.8	-4.2	-9.6	-7.3	-8.2	-14.2	-4.2	-13.2	-10.6	-15.4	-14.2	-10.4	-22.3	-4.7	-5.3	-7.9
United Kingdom	-7.1	-4.2	-14.1	-19.4	-38.3	-40.6	-32.8	-18.2	-22.8	-19.6	-17.0	-19.0	-21.4	-20.2	-36.2	-44.6	-46.0	-50.2	-53.5	-56.4
United States	-112.5	-122.2	-145.1	-159.6	-127.0	-117.7	-111.0	-76.9	-96.9	-132.5	-165.8	-174.2	-191.0	-198.1	-246.7	-345.4	-452.2	-429.4	-409.2	-443.0
Euro area	5.9	12.1	53.3	44.2	51.0	34.9	19.2	-28.5	-1.7	74.7	90.1	124.3	147.7	151.5	150.5	108.1	62.8	97.3	121.0	128.1
European Union	2.0	9.6	43.2	30.2	19.9	1.1	-5.2	-35.2	-10.9	70.1	90.1	128.9	152.8	156.1	135.6	87.1	39.7	68.7	88.7	94.6
Total OECD	-43.4	-42.4	-7.6	-23.4	-0.8	-37.9	-51.5	-25.6	9.0	65.1	59.6	100.4	53.1	55.6	21.5	-117.7	-272.0	-235.2	-182.4	-185.2

a) Including Luxembourg until 1994.
Source: OECD.

Annex Table 49. **Non-factor services, net**

Billions US dollars

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	-3.7	-3.5	-2.9	-2.6	-2.4	-4.3	-3.6	-2.5	-2.6	-1.5	-1.3	-1.0	-0.0	-0.4	-1.1	-0.9	0.3	1.7	1.4	1.3
Austria	3.4	3.3	5.0	5.5	5.4	6.8	9.1	10.1	9.4	7.5	7.3	4.6	4.6	1.0	2.4	1.8	0.9	0.8	0.8	0.9
Belgium[a]	0.3	0.2	0.5	1.1	0.7	-0.8	0.0	-0.2	0.5	1.1	1.2	0.1	0.4	1.4	1.1	1.8	2.5	2.3	2.8	2.8
Canada	-3.9	-4.1	-4.1	-4.6	-5.4	-6.9	-9.1	-10.0	-10.1	-10.5	-8.5	-7.4	-6.7	-6.4	-4.5	-4.3	-4.5	-4.7	-5.2	-5.4
Czech Republic	..	..	..	..	..	..	..	..	..	1.0	0.5	1.8	1.9	1.8	1.8	1.1	1.3	1.1	1.0	1.1
Denmark	0.8	0.7	0.3	0.5	0.8	0.7	1.8	2.8	2.3	1.6	0.5	0.7	1.3	0.1	-0.3	1.7	2.2	2.7	2.8	3.1
Finland	-0.2	-0.5	-0.7	-1.2	-1.7	-2.1	-3.0	-3.2	-2.9	-2.2	-1.8	-2.2	-1.7	-1.6	-1.1	-1.4	-2.3	-1.9	-1.9	-2.0
France	8.9	9.6	10.0	10.4	10.7	13.6	14.9	16.6	19.5	17.3	17.8	14.3	15.1	16.5	17.6	18.0	19.2	17.6	18.0	20.0
Germany	-5.4	-4.5	-7.0	-10.7	-14.4	-13.7	-18.6	-22.6	-31.6	-33.8	-41.1	-47.0	-45.4	-42.5	-47.0	-54.7	-51.0	-55.5	-59.2	-63.2
Greece	2.3	2.2	2.6	3.6	4.1	3.7	5.1	5.5	6.5	6.1	6.9	7.1	6.8	6.5	6.8	7.3	7.9	8.9	9.1	10.4
Hungary	..	..	..	..	..	..	..	..	..	0.2	0.2	0.6	1.5	2.3	1.8	1.4	1.8	1.9	1.6	1.7
Iceland	0.0	0.0	0.1	0.0	-0.0	0.0	0.0	-0.0	-0.0	0.0	0.0	0.0	0.0	0.0	-0.0	-0.1	-0.1	-0.0	0.1	0.1
Ireland	-0.3	-0.3	-0.6	-0.9	-1.4	-1.8	-1.7	-2.0	-3.1	-3.0	-4.1	-6.3	-7.7	-9.0	-13.3	-11.1	-12.3	-11.9	-12.7	-14.5
Italy	3.3	3.4	3.4	3.5	1.5	2.5	3.6	3.3	0.7	3.3	5.2	6.3	7.2	7.8	4.8	1.2	-0.1	-1.5	-0.8	-1.1
Japan	-12.0	-9.6	-12.9	-20.4	-30.3	-36.7	-42.9	-41.9	-44.0	-43.0	-48.0	-57.3	-62.3	-54.1	-49.5	-54.1	-47.6	-46.6	-44.4	-47.2
Korea	0.4	0.5	1.4	2.3	2.3	0.4	-0.6	-2.2	-2.9	-2.1	-1.8	-3.0	-6.2	-3.2	1.0	-0.7	-4.0	-3.5	-4.6	-7.1
Luxembourg	..	..	..	..	..	..	..	..	..	..	..	2.4	2.5	2.8	3.0	3.4	3.3	3.0	3.3	3.5
Mexico	-0.3	-0.6	-0.4	0.3	0.0	-0.5	-1.9	-1.8	-2.3	-2.1	-2.0	0.7	0.5	-0.5	-0.9	-1.8	-2.3	-3.7	-5.1	-6.6
Netherlands	-0.6	-1.2	-1.3	-1.5	-2.3	-1.4	-0.4	-0.8	-0.1	-0.1	0.2	1.1	2.0	3.2	2.5	2.5	-0.2	-1.8	-3.3	-3.2
New Zealand	-0.3	-0.3	-0.5	-0.5	-0.6	-0.8	-0.8	-0.8	-0.9	-0.6	-0.3	-0.2	-0.3	-0.6	-0.8	-0.3	-0.2	0.0	-0.0	0.1
Norway	2.0	1.8	1.2	0.6	1.6	2.6	3.2	3.5	0.4	0.8	0.2	0.2	0.6	0.2	-0.5	-0.8	0.5	0.4	0.0	-0.3
Poland	..	..	..	..	..	..	..	..	..	0.4	2.8	3.5	3.4	3.2	4.2	1.4	0.8	1.6	2.4	2.9
Portugal	0.4	0.6	0.8	0.9	0.6	0.8	0.9	0.6	0.5	1.2	1.0	1.3	1.4	1.5	1.9	1.8	1.8	1.9	2.1	2.2
Slovak Republic	..	..	..	..	..	..	..	..	..	0.3	0.7	0.5	0.0	0.1	0.2	0.2	0.4	0.4	0.4	0.5
Spain	7.9	8.1	11.8	13.4	13.9	12.7	11.9	12.1	12.4	11.7	14.9	18.6	20.4	20.0	21.9	23.0	22.3	24.3	27.2	29.6
Sweden	-0.0	-0.6	-1.8	-1.7	-2.2	-3.0	-3.3	-2.6	-2.3	0.1	0.2	-0.6	-1.3	-1.8	-2.6	-2.3	-3.2	-1.6	-2.4	-2.5
Switzerland	4.4	4.8	6.6	8.3	8.3	8.0	9.4	10.3	10.7	11.4	11.5	12.9	12.4	13.1	13.5	13.2	13.4	14.0	14.2	14.9
Turkey	0.9	1.5	1.6	2.1	3.7	3.9	4.9	5.2	5.8	6.7	7.0	9.6	6.6	10.9	13.5	7.4	11.3	9.6	10.6	13.9
United Kingdom	5.8	8.6	9.5	11.1	7.9	6.0	7.7	7.2	9.6	9.9	9.8	13.4	15.0	20.5	21.0	18.9	22.2	22.2	24.6	25.8
United States	3.4	0.3	6.5	7.9	12.4	24.6	30.2	45.8	60.4	63.7	69.2	77.8	89.2	90.4	79.9	83.6	76.5	88.9	85.0	91.2
Euro area	20.0	21.0	24.4	24.3	17.3	20.3	21.8	19.4	11.7	9.1	7.6	0.4	5.7	7.6	0.6	-6.7	-7.9	-13.9	-14.7	-14.6
European Union	26.5	29.8	32.4	34.3	23.8	23.9	27.9	26.8	21.3	20.7	18.1	13.9	20.7	26.4	18.6	11.5	13.3	9.4	10.2	11.8
Total OECD	17.5	20.6	29.0	27.7	13.4	14.4	16.7	32.5	36.0	45.2	48.2	52.8	61.6	82.9	77.2	56.8	60.9	70.4	67.7	72.7

Note: The classification of non-factor services and investment income is affected by the change in reporting system to the International Monetary Fund, *Fifth Balance of Payments Manual*.
a) Including Luxembourg until 1994.
Source: OECD.

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Annex Table 50. **Investment income, net**

Billions US dollars

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	-4.1	-4.5	-4.9	-5.8	-8.6	-10.4	-13.2	-12.2	-10.1	-8.1	-12.4	-14.0	-15.2	-13.8	-11.3	-12.3	-10.9	-10.8	-11.1	-12.0
Austria	-0.3	-0.2	-0.6	-0.8	-0.9	-0.9	-0.9	-1.4	-1.4	-1.5	-1.7	-2.4	-0.9	-1.5	-2.0	-2.9	-2.3	-2.1	-2.3	-2.4
Belgium[a]	0.2	0.2	0.3	0.5	0.6	3.4	4.0	4.9	5.4	6.0	6.4	6.4	6.0	5.7	6.5	6.6	7.3	4.6	5.0	5.1
Canada	-12.4	-12.8	-14.0	-17.1	-17.5	-20.5	-19.4	-17.4	-17.5	-20.8	-18.9	-22.7	-21.5	-20.9	-19.7	-21.1	-18.3	-19.0	-18.9	-19.3
Czech Republic	..	..	..	..	..	..	..	..	..	-0.1	-0.0	-0.1	-0.7	-0.8	-1.0	-1.3	-0.8	-0.9	-1.1	-1.5
Denmark	-2.3	-2.6	-3.5	-4.1	-3.7	-3.8	-5.1	-5.1	-4.9	-3.8	-3.8	-3.8	-3.7	-3.4	-2.8	-2.4	-3.0	-3.8	-4.0	-4.3
Finland	-1.1	-1.0	-1.3	-1.6	-1.7	-2.7	-3.8	-4.7	-5.4	-4.9	-4.4	-4.4	-3.6	-2.4	-3.1	-2.0	-1.9	-2.2	-2.1	-2.2
France	-2.4	-2.3	-1.7	-1.7	-1.0	-0.3	-1.6	-3.3	-6.0	-6.6	-6.0	-8.4	-1.9	7.4	9.1	12.0	13.3	11.7	12.3	12.5
Germany	4.7	4.7	5.3	5.2	9.4	14.3	20.6	20.3	21.8	16.6	2.9	0.1	1.0	-1.4	-7.2	-8.8	-1.1	-8.3	-8.0	-8.2
Greece	-1.0	-1.2	-1.4	-1.5	-1.6	-1.7	-1.8	-1.8	-2.1	-1.5	-1.3	-1.6	-1.9	-1.6	-1.6	-0.7	-0.9	-1.7	-2.1	-2.3
Hungary	..	..	..	..	..	..	..	..	..	-1.2	-1.4	-1.8	-1.5	-1.4	-1.9	-1.7	-1.6	-2.2	-2.3	-2.4
Iceland	-0.2	-0.1	-0.2	-0.2	-0.2	-0.2	-0.2	-0.2	-0.2	-0.1	-0.2	-0.2	-0.2	-0.2	-0.2	-0.2	-0.2	-0.3	-0.4	-0.4
Ireland	-1.8	-2.1	-2.6	-3.1	-3.9	-4.3	-5.0	-4.6	-5.6	-5.3	-5.4	-7.3	-8.2	-9.7	-10.7	-14.0	-15.0	-16.1	-17.2	-18.3
Italy	-2.5	-2.7	-4.2	-4.9	-5.5	-7.3	-14.7	-17.6	-22.0	-17.3	-16.7	-15.9	-15.2	-10.3	-11.1	-11.1	-11.9	-14.3	-14.3	-14.3
Japan	4.2	6.8	9.3	16.3	20.6	22.9	22.7	26.0	35.7	40.7	40.4	44.1	53.4	55.7	56.8	50.0	57.5	67.2	71.1	77.5
Korea	-1.3	-2.1	-2.3	-1.6	-1.3	-0.6	-0.1	-0.2	-0.4	-0.4	-0.5	-1.3	-1.8	-2.5	-5.6	-5.2	-2.2	-1.1	-0.7	-0.3
Luxembourg	..	..	..	..	..	..	..	..	..	..	..	2.2	2.0	1.4	1.0	0.6	0.3	0.1	0.0	-0.0
Mexico	-10.1	-9.0	-7.5	-6.8	-7.2	-8.3	-8.6	-8.6	-9.6	-11.4	-13.0	-13.3	-13.9	-12.8	-13.3	-13.3	-15.1	-13.8	-14.3	-14.9
Netherlands	1.4	-0.2	-0.2	1.4	1.2	2.9	-0.6	0.4	-1.0	0.9	3.7	7.3	3.5	7.1	-3.0	1.1	1.6	-3.2	-2.3	-1.8
New Zealand	-1.1	-1.3	-1.5	-2.0	-2.1	-1.9	-1.6	-2.5	-2.5	-2.9	-3.4	-4.0	-4.7	-4.9	-2.6	-3.1	-3.4	-3.4	-3.3	-3.4
Norway	-1.7	-1.2	-1.3	-1.4	-2.5	-2.8	-3.4	-4.0	-2.8	-2.8	-2.2	-1.9	-1.8	-1.6	-1.1	-1.7	-1.5	-1.5	-0.7	-0.5
Poland	..	..	..	..	..	..	..	..	..	-3.4	-2.6	-2.0	-1.1	-1.1	-1.2	-1.0	-1.1	-1.6	-2.1	-2.4
Portugal	-1.2	-1.1	-1.0	-0.8	-0.8	-0.6	-0.1	0.2	0.6	0.2	-0.6	-0.0	-1.0	-1.5	-1.6	-1.6	-2.0	-2.3	-2.9	-2.9
Slovak Republic	..	..	..	..	..	..	..	..	..	-0.0	-0.1	-0.0	-0.0	-0.1	-0.2	-0.3	-0.4	-0.3	-0.3	-0.3
Spain	-2.3	-1.7	-1.8	-2.6	-3.3	-2.8	-3.5	-4.3	-5.8	-3.6	-7.8	-4.1	-6.1	-6.8	-7.5	-9.5	-8.3	-9.8	-10.9	-11.5
Sweden	-1.9	-2.0	-2.0	-1.6	-1.8	-2.3	-4.5	-6.4	-10.0	-8.8	-5.9	-5.5	-6.3	-4.9	-3.2	-2.0	-2.0	-2.6	-2.2	-1.9
Switzerland	5.0	5.0	5.8	6.8	8.9	8.1	8.8	8.9	8.4	9.1	7.9	11.8	12.6	16.2	17.5	21.1	23.8	21.7	21.2	21.7
Turkey	-1.5	-1.6	-1.9	-2.1	-2.5	-2.3	-2.5	-2.7	-2.6	-2.7	-3.3	-3.2	-2.9	-3.0	-3.0	-3.5	-4.0	-5.6	-5.8	-5.5
United Kingdom	3.1	-0.0	4.2	1.4	1.3	-1.2	-5.1	-5.9	0.2	-0.3	5.1	3.3	1.8	6.4	20.8	6.5	9.3	16.9	12.4	10.2
United States	35.1	25.7	15.5	14.3	18.7	19.8	28.5	24.1	23.0	23.9	16.7	20.5	21.0	8.8	-6.2	-13.6	-14.8	-22.3	-28.1	-32.9
Euro area	-6.3	-7.7	-9.3	-9.8	-7.4	0.1	-7.4	-11.9	-21.5	-17.0	-30.9	-28.1	-26.4	-13.6	-31.2	-30.1	-20.9	-43.7	-44.7	-46.1
European Union	-7.4	-12.3	-10.6	-14.1	-11.6	-7.3	-22.0	-29.3	-36.2	-29.8	-35.4	-34.1	-34.5	-15.6	-16.3	-28.0	-16.7	-33.3	-38.6	-42.1
Total OECD	4.5	-7.4	-13.5	-13.7	-5.4	-3.5	-11.1	-18.0	-14.8	-10.1	-28.4	-22.1	-13.0	2.0	-9.2	-35.2	-9.6	-27.3	-35.4	-38.6

Note: The classification of non-factor services and investment income is affected by the change in reporting system to the International Monetary Fund, *Fifth Balance of Payments Manual.*
a) Including Luxembourg until 1994.
Source: OECD.

Annex Table 51. **Current account balances**

Billions US dollars

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	-8.9	-9.2	-9.8	-8.0	-11.6	-17.9	-15.9	-11.0	-11.1	-9.7	-17.1	-19.3	-15.8	-12.4	-18.1	-23.0	-15.3	-10.6	-13.3	-14.4
Austria	-0.2	-0.1	0.3	-0.2	-0.3	0.3	1.2	-0.0	-0.7	-1.4	-3.3	-6.1	-5.4	-6.5	-5.2	-6.7	-5.3	-4.8	-3.7	-3.1
Belgium[a]	0.2	0.9	3.0	2.6	3.4	4.4	5.3	6.3	8.8	12.0	13.1	14.3	13.0	12.9	12.8	13.0	10.8	7.7	9.9	10.4
Canada	-1.3	-5.7	-11.2	-13.5	-14.9	-21.8	-19.8	-22.4	-21.1	-21.7	-13.0	-4.4	3.4	-8.2	-8.3	1.2	18.1	26.1	17.7	18.8
Czech Republic	..	..	..	..	..	..	..	..	..	0.5	-0.8	-1.4	-4.3	-3.3	-1.4	-1.6	-2.2	-2.8	-2.9	-3.5
Denmark	-1.7	-2.7	-4.5	-3.0	-1.6	-1.7	0.6	1.2	3.2	3.9	2.3	1.2	2.7	0.7	-1.5	3.0	3.7	5.3	5.4	5.9
Finland	-0.0	-0.8	-0.7	-1.7	-2.7	-5.8	-7.0	-6.7	-5.1	-1.1	1.1	5.4	5.1	6.8	7.3	7.7	9.0	8.0	7.3	8.5
France	-0.8	-0.2	2.4	-4.5	-4.6	-4.6	-9.8	-5.7	4.8	9.6	7.4	11.0	20.8	37.8	39.3	35.6	20.6	20.5	24.3	22.5
Germany	10.0	18.3	40.2	45.8	52.7	57.1	48.6	-18.4	-14.5	-9.7	-24.3	-20.7	-7.9	-3.1	-6.7	-20.1	-18.8	-12.9	-8.0	-5.1
Greece	-2.0	-3.2	-1.7	-1.2	-1.0	-2.4	-3.6	-1.6	-2.5	-1.0	-0.4	-3.1	-4.8	-5.0	-3.8	-5.2	-8.0	-6.1	-6.5	-6.9
Hungary	..	..	..	..	..	..	..	..	..	-3.5	-4.0	-2.5	-1.7	-1.0	-2.3	-2.1	-1.5	-1.5	-1.4	-1.4
Iceland	-0.1	-0.1	0.0	-0.2	-0.2	-0.1	-0.1	-0.3	-0.2	0.0	0.1	0.1	-0.1	-0.1	-0.6	-0.6	-0.8	-0.6	-0.5	-0.4
Ireland	-1.0	-0.8	-0.9	-0.1	-0.0	-0.6	-0.4	0.3	0.5	1.8	1.5	1.7	2.0	1.9	0.8	0.4	-0.5	-2.0	-2.0	-2.0
Italy	-3.1	-4.2	2.2	-2.5	-6.8	-11.6	-16.7	-24.0	-29.6	7.6	12.8	24.9	39.4	33.4	22.7	8.3	-4.6	1.0	7.4	8.4
Japan	35.0	50.7	85.4	84.1	79.2	63.3	44.2	68.3	112.6	131.9	130.3	111.2	65.8	94.3	121.0	107.0	116.7	86.8	117.7	140.5
Korea	-1.3	-0.8	4.7	10.1	14.5	5.4	-2.0	-8.3	-3.9	1.0	-3.9	-8.5	-23.0	-8.2	40.4	24.5	11.0	9.3	10.1	12.3
Luxembourg	..	..	..	..	..	..	..	..	..	..	..	2.3	2.0	1.7	1.7	1.1	1.1	0.8	0.6	1.0
Mexico	4.2	0.8	-1.4	4.2	-2.4	-5.8	-7.5	-14.6	-24.4	-23.4	-29.7	-1.6	-2.3	-7.4	-16.1	-14.5	-18.4	-18.2	-22.0	-25.6
Netherlands	6.3	4.4	4.3	4.2	7.1	9.4	8.1	7.5	6.8	13.2	17.3	25.8	21.4	25.1	13.3	15.1	13.6	13.8	15.6	17.1
New Zealand	-1.9	-1.6	-1.8	-1.7	-0.4	-1.6	-1.4	-1.2	-1.7	-1.7	-2.1	-3.1	-4.0	-4.4	-2.2	-3.6	-2.8	-1.5	-1.9	-2.0
Norway	3.3	3.0	-4.7	-4.4	-4.0	-0.1	3.1	4.3	4.4	3.6	3.8	4.9	10.2	8.7	-1.3	6.0	23.0	24.0	21.8	26.4
Poland	..	..	..	..	..	..	..	..	..	-4.6	1.0	0.9	-3.3	-5.7	-6.9	-12.5	-11.8	-11.0	-10.9	-11.8
Portugal[b]	-0.6	0.4	1.2	0.4	-1.0	0.2	-0.2	-0.7	-0.3	0.3	-2.3	-0.2	-4.2	-6.1	-7.8	-9.7	-10.8	-10.1	-10.5	-11.0
Slovak Republic	..	..	..	..	..	..	..	..	..	-0.6	0.7	0.4	-2.1	-2.0	-2.0	-1.0	-0.7	-1.6	-1.7	-2.0
Spain	1.8	2.8	3.9	-0.2	-3.7	-10.9	-18.1	-19.9	-21.6	-5.7	-6.4	0.8	0.4	2.5	-3.0	-13.9	-17.4	-13.9	-12.3	-12.9
Sweden	0.7	-1.0	0.0	-0.0	-0.6	-3.1	-6.3	-4.7	-7.5	-2.6	2.5	8.1	8.5	9.0	8.2	8.9	6.6	4.8	3.8	5.2
Switzerland	4.4	5.1	6.9	7.6	9.1	7.0	8.7	10.6	15.2	19.5	17.5	21.4	21.9	25.5	25.8	29.9	31.1	30.5	31.5	32.0
Turkey	-1.4	-1.0	-1.5	-0.8	1.6	0.9	-2.6	0.3	-1.0	-6.4	2.6	-2.3	-2.4	-2.6	2.0	-1.4	-9.8	3.3	3.3	4.2
United Kingdom	-0.6	0.5	-3.5	-12.7	-35.4	-43.1	-39.1	-19.0	-22.9	-17.9	-10.3	-14.3	-13.5	-2.9	-8.0	-31.0	-27.8	-25.5	-30.3	-35.1
United States	-94.3	-118.2	-147.2	-160.7	-121.2	-99.5	-79.0	3.7	-48.5	-82.5	-118.2	-109.9	-120.9	-139.8	-217.5	-324.4	-444.7	-413.6	-404.1	-438.0
Euro area	10.5	17.5	54.2	42.5	43.1	35.4	7.4	-63.0	-53.2	25.6	16.5	56.1	81.9	101.6	71.3	25.7	-10.4	1.9	22.1	27.1
European Union	9.0	14.2	46.2	26.8	5.5	-12.4	-37.3	-85.5	-80.5	9.0	11.0	51.2	79.5	108.3	70.0	6.7	-27.8	-13.6	1.0	3.0
Total OECD	-53.5	-62.8	-34.2	-56.5	-44.7	-82.6	-109.6	-56.0	-60.2	11.2	-21.8	36.8	0.8	41.6	-17.4	-209.4	-335.9	-295.0	-255.5	-261.8

Note: The balance-of-payments data in this table are based on the concepts and definition of the International Monetary Fund, *Fifth Balance of Payments Manual*.
a) Including Luxembourg until 1994.
b) Break between 1995 and 1996, reflecting change in methodology to the International Monetary Fund, *Fifth Balance of Payments Manual* (capital transfers from European Union are excluded from the current account as from 1996).
Source: OECD.

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Annex Table 52. **Current account balances as a percentage of GDP**

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Australia	-4.8	-5.6	-5.7	-3.9	-4.5	-6.1	-5.2	-3.5	-3.7	-3.3	-5.1	-5.4	-3.9	-3.1	-5.0	-5.9	-4.0	-3.0	-3.6	-3.7
Austria	-0.3	-0.1	0.3	-0.2	-0.2	0.2	0.7	0.0	-0.4	-0.8	-1.6	-2.6	-2.3	-3.2	-2.5	-3.2	-2.8	-2.5	-1.9	-1.5
Belgium[a]	0.2	1.1	2.6	1.8	2.1	2.8	2.7	3.1	3.9	5.5	5.6	5.2	4.8	5.3	5.1	5.2	4.7	3.3	4.1	4.1
Canada	-0.4	-1.6	-3.0	-3.2	-3.0	-3.9	-3.4	-3.7	-3.6	-3.9	-2.3	-0.8	0.5	-1.3	-1.3	0.2	2.5	3.7	2.5	2.5
Czech Republic	..	..	..	..	..	..	..	..	..	1.3	-1.9	-2.6	-7.4	-6.1	-2.4	-2.9	-4.5	-5.1	-4.8	-5.4
Denmark	-3.1	-4.6	-5.3	-2.9	-1.4	-1.6	0.4	0.9	2.2	2.8	1.5	0.7	1.4	0.4	-0.9	1.7	2.3	3.2	3.1	3.3
Finland	-0.1	-1.5	-1.0	-1.9	-2.5	-5.0	-5.1	-5.4	-4.7	-1.3	1.1	4.1	4.0	5.6	5.6	6.0	7.4	6.6	5.9	6.5
France	-0.1	-0.1	0.3	-0.5	-0.5	-0.5	-0.8	-0.5	0.4	0.8	0.5	0.7	1.3	2.7	2.7	2.5	1.6	1.6	1.8	1.6
Germany	1.6	2.8	4.4	4.0	4.3	4.7	3.2	-1.0	-0.7	-0.5	-1.1	-0.8	-0.3	-0.1	-0.3	-1.0	-1.0	-0.7	-0.4	-0.3
Greece	-4.9	-7.9	-3.4	-2.2	-1.5	-3.6	-4.3	-1.7	-2.5	-1.1	-0.5	-2.7	-3.9	-4.1	-3.1	-4.1	-7.1	-5.2	-5.1	-5.0
Hungary	..	..	..	..	..	..	..	..	..	-9.0	-9.5	-5.5	-3.8	-2.1	-4.9	-4.4	-3.3	-2.9	-2.4	-2.3
Iceland	-4.6	-3.8	0.5	-3.3	-3.6	-1.9	-2.1	-4.0	-2.3	0.8	1.9	0.8	-1.8	-1.7	-6.9	-6.9	-9.9	-8.0	-6.1	-4.8
Ireland	-5.3	-3.7	-3.1	-0.2	-0.0	-1.5	-0.8	0.7	1.0	3.7	2.7	2.6	2.8	2.4	0.9	0.4	-0.7	-2.0	-1.8	-1.6
Italy	-0.8	-1.0	0.3	-0.3	-0.8	-1.3	-1.5	-2.1	-2.4	0.8	1.2	2.3	3.2	2.9	1.9	0.7	-0.4	0.1	0.6	0.7
Japan	2.7	3.7	4.2	3.4	2.7	2.1	1.5	2.0	3.0	3.0	2.7	2.1	1.4	2.2	3.1	2.4	2.5	2.1	2.9	3.5
Korea	-1.4	-0.8	4.3	7.4	7.9	2.4	-0.8	-2.8	-1.2	0.3	-1.0	-1.7	-4.4	-1.5	12.8	6.0	2.4	2.2	2.3	2.6
Luxembourg	..	..	..	..	..	..	..	..	..	..	..	12.6	11.0	9.7	9.2	5.8	5.7	4.1	3.1	4.5
Mexico	2.5	0.8	-0.8	2.8	-1.3	-2.7	-2.9	-4.7	-6.7	-5.8	-7.1	-0.5	-0.7	-1.9	-3.8	-3.0	-3.2	-3.0	-3.3	-3.5
Netherlands	4.8	3.2	2.4	1.8	2.9	4.0	2.7	2.5	2.0	4.1	4.9	6.2	5.2	6.7	3.4	3.8	3.7	3.6	3.8	4.0
New Zealand	-8.4	-7.2	-6.2	-4.9	-1.0	-3.8	-3.2	-2.8	-4.2	-4.0	-4.0	-5.1	-6.0	-6.7	-4.0	-6.7	-5.5	-3.1	-3.9	-3.8
Norway	5.4	4.8	-6.2	-4.8	-4.1	-0.1	2.6	3.7	3.5	3.0	3.0	3.3	6.5	5.6	-0.9	3.9	14.3	14.2	12.5	14.0
Poland	..	..	..	..	..	..	..	..	..	-5.2	1.0	0.7	-2.3	-4.0	-4.4	-8.1	-7.5	-6.2	-5.7	-5.7
Portugal[b]	-2.6	1.5	3.3	1.0	-2.0	0.3	-0.3	-0.8	-0.2	0.4	-2.4	-0.1	-3.7	-5.7	-7.0	-8.6	-10.3	-9.2	-9.0	-8.8
Slovak Republic	..	..	..	..	..	..	..	..	..	-4.9	4.5	2.1	-10.6	-9.5	-9.3	-5.0	-3.8	-7.8	-8.0	-8.4
Spain	1.1	1.6	1.6	-0.0	-1.0	-2.8	-3.5	-3.6	-3.6	-1.1	-1.3	0.1	0.1	0.4	-0.5	-2.3	-3.1	-2.4	-2.0	-2.0
Sweden	0.7	-1.0	0.0	-0.0	-0.3	-1.6	-2.6	-1.9	-3.0	-1.3	1.2	3.4	3.2	3.8	3.4	3.7	2.9	2.3	1.8	2.3
Switzerland	4.6	5.2	5.0	4.4	4.9	3.9	3.8	4.6	6.2	8.2	6.7	6.9	7.4	10.0	9.8	11.6	13.0	12.2	12.0	11.8
Turkey	-2.4	-1.5	-1.9	-0.9	2.0	0.9	-1.7	0.1	-0.6	-3.6	2.2	-1.5	-1.3	-1.3	1.1	-0.9	-4.9	2.4	2.1	2.2
United Kingdom	-0.1	0.1	-0.6	-1.8	-4.3	-5.1	-4.0	-1.8	-2.1	-1.9	-1.0	-1.3	-1.1	-0.2	-0.6	-2.1	-1.9	-1.8	-2.0	-2.2
United States	-2.4	-2.8	-3.3	-3.4	-2.4	-1.8	-1.4	0.1	-0.8	-1.2	-1.7	-1.5	-1.5	-1.7	-2.5	-3.5	-4.5	-4.1	-3.9	-4.0
Euro area	0.5	0.8	1.7	1.1	1.0	0.8	0.1	-1.1	-0.8	0.4	0.3	0.8	1.1	1.6	1.1	0.4	-0.2	0.0	0.3	0.4
European Union	0.3	0.5	1.2	0.6	0.1	-0.2	-0.6	-1.2	-1.0	0.1	0.1	0.6	0.9	1.3	0.8	0.1	-0.4	-0.2	0.0	0.0
Total OECD	-0.6	-0.7	-0.3	-0.4	-0.3	-0.5	-0.6	-0.3	-0.3	0.1	-0.1	0.2	0.0	0.2	-0.1	-0.8	-1.3	-1.2	-1.0	-1.0

a) Including Luxembourg until 1994.
b) Break between 1995 and 1996, reflecting change in methodology to the International Monetary Fund, *Fifth Balance of Payments Manual* (capital transfers from European Union are excluded from the current account as from 1996).
Source: OECD.

Annex Table 53. **Structure of current account balances of major world regions**

Billions US dollars

	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections 2001	2002	2003
Trade balance																				
OECD	-43	-42	-8	-23	-1	-38	-52	-26	9	65	60	100	53	56	22	-118	-272	-235	-182	-185
Non-OECD *of which:*	63	53	16	51	33	48	69	54	29	-0	31	11	41	53	47	155	276	194	142	161
Non-OECD Asia *of which:*	0	-9	-1	13	2	3	8	10	4	-13	-4	-15	-11	27	96	105	94	78	73	73
China	0	-13	-9	-2	-5	-6	9	9	5	-11	7	18	20	46	47	36	34	26	18	19
Dynamic Asia[a]	12	18	22	28	21	22	11	11	8	8	3	-13	-6	1	69	85	82	76	79	80
Other Asia	-12	-13	-14	-13	-14	-13	-12	-9	-10	-11	-14	-20	-24	-21	-20	-16	-23	-24	-25	-26
Latin America	26	25	12	12	22	28	31	19	10	2	3	-7	-6	-19	-33	-6	12	-0	-2	2
Africa and Middle-East	24	31	-4	15	4	22	53	23	14	11	23	25	54	48	-11	33	118	74	35	49
Central and Eastern Europe	13	5	8	12	6	-6	-23	1	2	-0	10	8	4	-3	-4	23	52	42	36	37
World[b]	20	10	9	28	32	11	17	28	38	65	90	111	94	109	69	37	4	-41	-41	-24
Services and private transfers																				
OECD	17	9	9	2	-6	-4	-12	-1	1	17	-2	5	22	58	42	-13	17	9	-2	-5
Non-OECD *of which:*	-89	-83	-67	-68	-74	-83	-85	-102	-90	-91	-82	-110	-105	-110	-125	-113	-127	-116	-128	-143
Non-OECD Asia *of which:*	-5	-5	-1	-2	-4	-4	-3	-1	-0	-2	3	-16	-6	1	-20	-18	-10	-6	-8	-12
China	2	2	2	2	2	1	3	4	1	-1	0	-17	-13	-10	-15	-21	-14	-16	-16	-17
Dynamic Asia[a]	-11	-9	-5	-6	-6	-5	-4	-4	-1	-1	-1	-2	1	1	-13	-6	-8	-0	-2	-5
Other Asia	4	3	3	2	0	-0	-1	-1	-0	1	4	3	6	10	8	9	11	10	10	10
Latin America	-33	-30	-30	-28	-31	-33	-27	-24	-21	-27	-27	-30	-33	-43	-45	-38	-43	-42	-44	-46
Africa and Middle-East	-56	-49	-38	-40	-39	-47	-57	-73	-58	-56	-54	-54	-61	-58	-48	-48	-63	-54	-59	-64
Central and Eastern Europe	5	1	1	1	1	1	1	-4	-10	-6	-5	-10	-5	-10	-12	-9	-12	-14	-17	-20
World[b]	-72	-74	-59	-66	-79	-87	-97	-103	-89	-74	-84	-105	-82	-52	-83	-126	-110	-107	-130	-147
Official transfers																				
OECD	-27	-29	-35	-35	-38	-40	-46	-29	-71	-71	-80	-69	-75	-72	-81	-78	-81	-68	-71	-72
Non-OECD *of which:*	6	10	12	10	13	12	4	-9	18	18	14	15	14	13	12	12	11	13	13	13
Non-OECD Asia *of which:*	2	2	3	3	3	2	2	3	3	3	3	4	3	3	2	1	1	2	3	2
China	0	0	0	-0	0	0	0	0	0	0	-1	1	0	0	0	0	0	0	0	0
Dynamic Asia[a]	0	0	0	0	0	0	1	0	1	0	1	1	0	0	1	1	1	1	1	1
Other Asia	2	2	2	2	2	2	2	2	2	2	3	3	3	2	2	0	0	1	2	2
Latin America	1	2	2	2	2	2	2	2	2	2	2	2	2	1	1	2	2	2	2	2
Africa and Middle-East	3	6	7	6	8	8	-1	-20	10	10	8	7	7	6	6	6	6	7	7	7
Central and Eastern Europe	0	0	0	0	0	0	1	6	4	4	2	2	2	2	2	3	2	2	2	2
World[b]	-20	-19	-24	-25	-25	-28	-42	-38	-52	-52	-65	-54	-61	-59	-69	-67	-70	-56	-58	-59
Current account balance																				
OECD	-53	-63	-34	-56	-45	-83	-110	-56	-60	11	-22	37	1	42	-17	-209	-336	-295	-255	-262
Non-OECD *of which:*	-19	-20	-40	-6	-28	-22	-12	-58	-43	-73	-37	-85	-51	-44	-65	54	160	91	27	32
Non-OECD Asia *of which:*	-2	-11	1	14	0	2	8	12	6	-12	2	-27	-14	31	78	89	85	74	67	63
China	2	-11	-7	0	-4	-4	12	13	6	-12	7	2	7	37	31	16	21	10	3	2
Dynamic Asia[a]	2	8	17	22	16	17	7	7	8	7	3	-14	-5	3	57	80	75	77	78	75
Other Asia	-6	-8	-9	-9	-11	-11	-12	-8	-8	-8	-8	-15	-16	-9	-11	-7	-11	-12	-14	-14
Latin America	-6	-4	-16	-14	-8	-3	6	-3	-9	-23	-22	-35	-37	-60	-76	-43	-29	-40	-44	-43
Africa and Middle-East	-29	-12	-35	-19	-27	-17	-4	-70	-35	-35	-23	-22	-0	-4	-53	-9	62	27	-17	-8
Central and Eastern Europe	18	6	10	13	7	-4	-21	3	-4	-3	6	-0	0	-11	-14	17	43	30	22	19
World[b]	-73	-83	-74	-63	-73	-105	-122	-114	-103	-62	-59	-48	-50	-3	-83	-155	-176	-204	-228	-230

Note: Historical data for the OECD area are aggregates of reported balance-of-payments data of each individual country. Because of various statistical problems as well as a large number of non-reporters among non-OECD countries, trade and current account balances estimated on the basis of these countries' own balance-of-payments records may differ from corresponding estimates shown in this table.

a) Dynamic Asia includes Chinese Taipei; Hong Kong, China; Indonesia; Malaysia; Philippines; Singapore and Thailand.

b) Reflects statistical errors and asymmetries. Given the very large gross flows of world balance-of-payments transactions, statistical errors and asymmetries easily give rise to world totals (balances) that are significantly different from zero.

Source: OECD.

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Annex Table 54. **Semiannual demand and output projections**

Percentage changes from previous period, seasonally adjusted at annual rates, volume

	2001	2002	2003	2001		2002		2003	
				I	II	I	II	I	II
Private consumption									
Canada	2.3	2.0	3.2	2.2	1.0	2.0	3.0	3.2	3.4
France	2.5	1.7	2.4	3.0	1.7	1.3	2.5	2.4	2.3
Germany	1.5	1.4	2.4	2.5	1.2	1.2	2.0	2.5	2.6
Italy	1.2	1.4	2.7	1.1	0.6	1.3	2.5	2.8	2.8
Japan	0.0	-0.2	0.8	1.1	-1.7	0.2	0.5	0.8	1.0
United Kingdom	3.7	2.0	2.5	4.1	3.0	1.5	2.1	2.6	2.8
United States	2.7	1.1	3.3	2.9	1.2	0.1	2.9	3.3	3.5
Euro area	1.9	1.7	2.7	2.4	1.4	1.5	2.4	2.7	2.8
European Union	2.1	1.8	2.6	2.6	1.6	1.6	2.3	2.7	2.7
Total OECD	1.9	1.3	2.8	2.3	0.8	1.0	2.5	2.8	3.0
Public consumption									
Canada	2.6	2.0	2.0	3.2	2.0	2.0	2.0	2.0	2.0
France	2.2	1.9	2.0	2.1	2.1	1.9	1.8	2.0	2.2
Germany	1.3	1.2	1.2	2.8	0.0	1.6	1.6	1.0	1.0
Italy	0.6	0.6	0.6	0.5	0.5	0.6	0.6	0.6	0.6
Japan	2.3	2.3	1.4	1.7	2.7	2.2	2.1	1.2	1.0
United Kingdom	2.1	3.4	3.6	2.0	2.6	3.5	3.9	3.5	3.3
United States	2.9	3.9	2.2	3.5	3.1	3.8	4.9	1.4	1.1
Euro area	1.6	1.5	1.5	2.0	1.1	1.6	1.6	1.5	1.5
European Union	1.6	1.7	1.8	1.9	1.4	1.9	1.9	1.7	1.7
Total OECD	1.9	2.5	1.9	1.9	2.2	2.5	3.0	1.6	1.4
Investment									
Canada	0.6	1.7	6.2	0.2	0.1	1.1	4.4	6.5	7.2
France	2.9	0.8	4.1	3.0	-0.7	0.1	3.7	4.2	4.1
Germany	-2.6	-0.7	3.1	-4.4	-2.4	-0.9	1.7	3.3	4.0
Italy	1.5	1.3	4.1	1.2	0.5	0.5	3.5	4.2	4.5
Japan	-2.0	-6.7	-2.2	0.2	-6.7	-7.7	-4.8	-1.6	-0.6
United Kingdom	1.4	-0.7	2.4	-1.0	-2.0	-1.0	1.3	2.6	3.2
United States	-1.4	-4.2	4.5	0.4	-8.6	-5.9	4.0	4.4	5.1
Euro area	0.6	0.7	3.8	0.2	-0.3	0.2	2.8	4.0	4.4
European Union	0.7	0.5	3.6	-0.1	-0.6	0.0	2.6	3.8	4.2
Total OECD	-1.1	-1.9	3.6	-0.5	-4.7	-2.7	2.8	3.7	4.2
Total domestic demand									
Canada	1.0	1.8	3.8	0.6	0.5	1.7	3.6	3.9	3.9
France	1.7	1.6	3.0	1.1	1.0	1.3	3.0	3.1	2.9
Germany	-0.1	1.1	2.7	-1.0	0.1	1.1	2.2	2.9	2.9
Italy	1.0	1.3	2.6	2.5	0.5	1.1	2.4	2.6	2.7
Japan	-0.2	-1.6	0.2	1.0	-2.5	-1.6	-0.5	0.4	0.6
United Kingdom	2.8	1.8	2.7	2.6	2.0	1.4	2.3	2.8	3.0
United States	1.1	0.7	3.9	1.0	-0.8	-0.1	4.0	3.8	3.8
Euro area	1.2	1.5	2.9	1.0	0.9	1.3	2.5	3.0	3.0
European Union	1.4	1.6	2.8	1.3	1.1	1.3	2.5	2.9	2.9
Total OECD	0.7	1.0	3.0	0.8	-0.4	0.7	3.0	3.0	3.1
Export of goods and services									
Canada	-2.7	0.7	7.5	-3.1	-5.9	1.2	6.5	7.8	7.9
France	2.6	1.6	7.6	0.7	-2.7	1.3	6.8	7.9	7.8
Germany	5.1	3.0	7.0	3.8	0.6	2.6	6.0	7.0	7.8
Italy	5.9	2.2	6.9	3.0	-0.4	1.8	6.0	7.3	7.3
Japan	-5.8	-0.8	8.2	-9.0	-10.0	1.0	5.5	9.0	9.4
United Kingdom	3.6	3.4	7.3	2.6	1.8	2.7	6.5	7.5	7.5
United States	-3.9	-2.1	7.8	-4.7	-12.9	-0.1	6.0	8.3	8.7
Total OECD [a]	-0.5	0.6	7.8	-2.2	-6.1	1.5	6.1	8.3	8.6

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence, there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)*.

a) Includes intra-regional trade.

Source : OECD.

Annex Table 54. *(cont'd)* **Semiannual demand and output projections**

Percentage changes from previous period, seasonally adjusted at annual rates, volume

	2001	2002	2003	2001		2002		2003	
				I	II	I	II	I	II
Import of goods and services									
Canada	-4.4	2.3	8.0	-6.7	-3.5	2.7	7.5	8.1	8.2
France	1.6	1.7	8.0	-2.5	-2.0	1.0	6.8	8.5	8.0
Germany	2.9	3.6	6.7	-1.9	2.2	3.2	5.8	6.8	7.5
Italy	3.6	2.7	6.5	2.8	1.2	1.8	5.9	6.8	6.8
Japan	-1.8	-7.9	3.5	-1.9	-14.0	-7.8	-1.5	4.8	6.0
United Kingdom	4.8	3.3	7.1	3.2	2.4	2.3	6.3	7.3	7.3
United States	-2.9	-1.5	7.4	-4.8	-11.1	-0.6	7.2	7.4	7.7
Total OECD[a]	-0.7	0.0	7.0	-2.7	-6.2	0.5	5.9	7.2	7.6
GDP									
Canada	1.3	1.2	3.8	1.5	-0.8	1.1	3.4	3.9	4.0
France	2.0	1.6	3.0	2.0	0.8	1.4	3.1	3.1	2.9
Germany	0.7	1.0	2.9	0.9	-0.4	0.9	2.4	3.1	3.1
Italy	1.8	1.2	2.8	2.5	0.0	1.1	2.5	2.9	3.0
Japan	-0.7	-1.0	0.8	0.1	-2.3	-0.9	0.2	0.9	1.1
United Kingdom	2.3	1.7	2.5	2.3	1.8	1.5	2.1	2.6	2.8
United States	1.1	0.7	3.8	1.2	-0.6	-0.1	3.8	3.8	3.8
Euro area	1.6	1.4	3.0	1.8	0.4	1.4	2.7	3.1	3.2
European Union	1.7	1.5	2.9	1.9	0.7	1.4	2.5	3.0	3.1
Total OECD	1.0	1.0	3.2	1.1	-0.3	0.7	2.9	3.2	3.3
	Per cent of GDP								
Current account balance									
Canada	3.7	2.5	2.5	4.3	3.1	2.6	2.4	2.5	2.6
France	1.6	1.8	1.6	1.5	1.6	1.8	1.8	1.6	1.6
Germany	-0.7	-0.4	-0.3	-0.7	-0.7	-0.5	-0.3	-0.3	-0.2
Italy	0.1	0.6	0.7	0.0	0.2	0.5	0.8	0.7	0.7
Japan	2.1	2.9	3.5	2.0	2.2	2.8	3.1	3.4	3.7
United Kingdom	-1.8	-2.0	-2.2	-1.1	-2.4	-2.0	-2.0	-2.2	-2.2
United States	-4.1	-3.9	-4.0	-4.3	-3.8	-3.8	-3.9	-3.9	-4.1
Euro area	0.0	0.3	0.4	0.0	0.1	0.3	0.4	0.4	0.4
European Union	-0.2	0.0	0.0	-0.1	-0.3	0.0	0.1	0.0	0.1
Total OECD	-1.2	-1.0	-1.0	-1.2	-1.0	-0.9	-0.9	-0.9	-0.9
	$ billions								
Current account balance									
Canada	26.1	18	19	30.5	21.8	18	17	18	19
France	20.5	24	23	19.5	21.5	24	25	23	22
Germany	-12.9	-8	-5	-13.0	-12.8	-10	-6	-6	-4
Italy	1.0	7	8	0.2	1.8	6	9	8	9
Japan	86.8	118	141	84.3	89.3	111	124	136	145
United Kingdom	-25.5	-30	-35	-15.7	-35.3	-29	-31	-34	-36
United States	-413.6	-404	-438	-436.6	-390.6	-394	-414	-425	-451
Euro area	1.9	22	27	0.3	3.4	18	27	25	29
European Union	-13.6	1	3	-5.0	-22.1	-2	4	1	5
Total OECD	-295.0	-255	-262	-313.1	-276.8	-253	-258	-258	-265

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence, there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) Includes intra-regional trade.

Source : OECD.

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Annex Table 55. **Semiannual price, cost and unemployment projections**

Percentage changes from previous period, seasonally adjusted at annual rates

	2001	2002	2003	2001 I	2001 II	2002 I	2002 II	2003 I	2003 II
Private consumption deflator									
Canada	2.2	1.9	1.6	2.1	2.2	1.9	1.7	1.6	1.6
France	1.7	1.4	1.7	1.8	1.7	1.3	1.5	1.7	1.9
Germany	1.9	1.0	1.1	2.1	1.4	0.9	0.9	1.1	1.3
Italy	2.8	1.7	1.8	2.9	2.5	1.5	1.5	1.8	1.9
Japan	-1.3	-1.5	-1.5	-0.2	-2.1	-1.2	-1.4	-1.5	-1.4
United Kingdom	1.6	2.3	2.3	1.3	2.3	2.4	2.3	2.3	2.3
United States	1.8	1.0	1.4	2.4	0.3	1.1	1.4	1.5	1.3
Euro area	2.5	1.6	1.7	2.7	2.3	1.4	1.5	1.7	1.8
European Union	2.4	1.8	1.8	2.5	2.3	1.6	1.7	1.8	1.9
Total OECD	2.8	2.1	1.8	3.3	2.2	2.2	1.9	1.8	1.7
Total OECD *less* high inflation countries [a]	1.7	1.1	1.2	2.2	1.0	1.1	1.2	1.3	1.2
GDP deflator									
Canada	2.6	1.3	1.7	3.3	1.0	1.4	1.7	1.8	1.8
France	1.7	1.8	1.4	1.8	2.2	1.7	1.4	1.3	1.5
Germany	1.4	1.1	0.8	2.1	1.4	1.1	0.9	0.7	0.8
Italy	3.0	2.8	1.9	3.3	3.5	2.6	2.3	1.7	2.0
Japan	-1.6	-1.4	-1.6	-0.7	-2.6	-0.9	-1.4	-1.8	-1.5
United Kingdom	2.4	2.5	2.5	2.4	2.6	2.4	2.6	2.5	2.5
United States	2.1	1.2	1.3	2.6	1.3	0.9	1.4	1.3	1.1
Euro area	2.5	2.1	1.6	2.9	2.6	2.0	1.8	1.6	1.7
European Union	2.5	2.2	1.8	2.8	2.6	2.1	1.9	1.7	1.8
Total OECD	2.9	2.3	1.7	3.4	2.5	2.3	2.1	1.6	1.5
Total OECD *less* high inflation countries [a]	1.8	1.2	1.1	2.3	1.3	1.2	1.3	1.1	1.1
Unit labour cost (total economy)									
Canada	3.4	3.4	0.6	3.3	5.6	3.5	1.1	0.5	0.5
France	2.1	1.5	0.3	2.2	2.4	1.8	0.1	0.3	0.6
Germany	1.4	1.1	0.2	1.7	1.7	1.2	0.3	0.0	0.3
Italy	2.3	2.0	1.3	2.1	3.6	1.8	0.7	1.6	1.5
Japan	0.3	-0.6	-1.1	1.0	-0.7	-0.4	-1.0	-1.2	-1.2
United Kingdom	3.3	3.1	2.1	3.8	3.3	3.3	2.6	2.0	1.8
United States	4.2	2.1	1.0	4.6	3.1	2.4	0.4	1.1	1.1
European Union	2.6	2.1	1.2	2.9	2.9	2.1	1.2	1.1	1.2
Total OECD	4.0	2.6	1.2	4.3	3.8	2.7	1.2	1.3	1.2
Total OECD less high inflation countries [a]	3.0	1.8	0.8	3.3	2.6	1.9	0.6	0.8	0.8
				Per cent of labour force					
Unemployment									
Canada	7.3	7.8	7.4	7.0	7.5	7.8	7.7	7.6	7.3
France	8.9	9.4	9.3	8.8	9.1	9.4	9.5	9.4	9.2
Germany	7.5	8.1	8.0	7.4	7.7	8.0	8.1	8.1	7.9
Italy	10.0	10.2	10.0	10.0	10.0	10.1	10.3	10.1	9.9
Japan	5.0	5.5	5.4	4.8	5.2	5.4	5.6	5.5	5.4
United Kingdom	5.1	5.3	5.5	5.1	5.1	5.2	5.4	5.5	5.5
United States	4.8	6.2	6.0	4.4	5.2	6.2	6.3	6.1	5.9
Euro area	8.5	8.9	8.8	8.3	8.7	8.8	9.0	8.9	8.6
European Union	7.8	8.1	8.0	7.6	7.9	8.1	8.2	8.1	8.0
Total OECD	6.5	7.2	7.0	6.3	6.7	7.1	7.2	7.1	6.9

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence, there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*

a) High inflation countries are defined as countries which have had, on average, 10 per cent or more inflation in terms of the GDP deflator during the last 10 years, based on historical data. Consequently, Hungary, Mexico, Poland and Turkey are excluded from the aggregate.

Source : OECD.

Annex Table 56. **Contributions to changes in real GDP in OECD countries**

As a per cent of real GDP in the previous period, seasonally adjusted at annual rates

	2000	2001	2002	2003
Australia				
Final domestic demand	2.7	2.0	3.5	3.8
Stockbuilding	-0.5	-0.3	0.3	0.2
Net exports	0.5	1.0	-0.5	-0.1
GDP	3.4	2.0	3.2	4.0
Austria				
Final domestic demand	2.8	0.6	1.2	2.3
Stockbuilding	-0.3	0.1	0.0	0.0
Net exports	0.5	0.4	0.3	0.4
GDP	3.0	1.2	1.5	2.7
Belgium				
Final domestic demand	3.1	1.4	1.4	2.3
Stockbuilding	0.5	-0.2	0.0	0.0
Net exports	0.5	-0.1	0.0	0.2
GDP	4.0	1.1	1.4	2.6
Canada				
Final domestic demand	3.8	1.9	1.8	3.4
Stockbuilding	0.5	-1.0	-0.1	0.2
Net exports	0.2	0.5	-0.6	0.1
GDP	4.4	1.3	1.2	3.8
Czech Republic				
Final domestic demand	2.2	4.1	3.5	4.6
Stockbuilding	2.0	0.9	0.1	0.1
Net exports	-1.3	-1.9	-0.9	-0.9
GDP	2.9	3.0	2.7	3.7
Denmark				
Final domestic demand	2.3	0.1	1.0	1.7
Stockbuilding	0.2	0.1	0.0	0.0
Net exports	0.7	1.1	0.3	0.6
GDP	3.2	1.3	1.3	2.3
Finland				
Final domestic demand	2.7	1.5	1.1	2.0
Stockbuilding	0.9	-0.1	0.1	0.0
Net exports	2.7	-1.0	0.0	1.5
GDP	5.7	0.4	1.2	3.4
France				
Final domestic demand	3.2	2.4	1.5	2.6
Stockbuilding	0.3	-0.8	0.1	0.4
Net exports	-0.1	0.3	0.0	0.1
GDP	3.4	2.0	1.6	3.0

	2000	2001	2002	2003
Germany				
Final domestic demand	1.6	0.5	0.9	2.3
Stockbuilding	0.4	-0.6	0.2	0.4
Net exports	1.1	0.8	-0.1	0.3
GDP	3.0	0.7	1.0	2.9
Greece				
Final domestic demand	4.4	4.3	4.4	4.6
Stockbuilding	0.4	0.0	0.0	0.0
Net exports	-0.4	-0.3	-0.4	-0.3
GDP	4.3	3.9	4.0	4.3
Hungary				
Final domestic demand	3.8	3.9	3.5	4.3
Stockbuilding	1.5	-0.4	0.0	0.0
Net exports	-0.1	0.3	0.0	-0.3
GDP	5.2	3.8	3.5	4.1
Iceland				
Final domestic demand	6.5	-1.4	-2.9	2.2
Stockbuilding	0.3	-0.4	0.1	0.0
Net exports	-1.7	3.4	2.2	0.9
GDP	5.0	1.5	-0.6	3.0
Ireland				
Final domestic demand	7.3	4.3	3.3	5.2
Stockbuilding	0.6	0.1	-0.1	0.1
Net exports	3.6	1.2	0.4	1.1
GDP	11.5	5.6	3.7	6.4
Italy				
Final domestic demand	3.2	1.1	1.2	2.6
Stockbuilding	-1.0	-0.1	0.0	0.0
Net exports	0.6	0.8	-0.1	0.3
GDP	2.9	1.8	1.2	2.8
Japan				
Final domestic demand	1.0	-0.2	-1.5	0.1
Stockbuilding	0.1	0.0	0.0	0.1
Net exports	0.4	-0.5	0.6	0.6
GDP	1.5	-0.7	-1.0	0.8
Korea				
Final domestic demand	6.7	0.2	2.2	4.0
Stockbuilding	-0.9	-0.2	0.2	0.0
Net exports	3.5	1.9	0.8	2.2
GDP	8.8	2.0	3.2	6.2

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence, there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods)*.
and/or statistical discrepancy.

Source : OECD.

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Annex Table 56. *(cont'd)* **Contributions to changes in real GDP in OECD countries**

As a per cent of real GDP in the previous period

	2000	2001	2002	2003
Luxembourg				
Final domestic demand	1.4	3.2	3.0	3.4
Stockbuilding	0.2	0.0	0.0	0.0
Net exports	5.4	0.6	0.3	2.7
GDP	7.5	4.0	3.4	5.9
Mexico				
Final domestic demand	8.8	0.7	1.9	4.3
Stockbuilding	0.1	-0.5	0.2	0.3
Net exports	-1.9	-0.2	-0.6	-0.7
GDP	6.9	0.0	1.5	4.0
Netherlands				
Final domestic demand	3.1	1.1	1.6	2.5
Stockbuilding	-0.2	0.2	0.0	0.0
Net exports	0.6	0.1	0.0	0.1
GDP	3.5	1.4	1.6	2.6
New Zealand				
Final domestic demand	1.6	0.6	1.7	3.4
Stockbuilding	-0.6	0.0	0.0	0.0
Net exports	2.0	1.5	0.1	0.4
GDP	3.0	1.9	1.8	3.8
Norway				
Final domestic demand	1.2	1.3	1.7	2.3
Stockbuilding	0.8	-0.1	0.0	0.0
Net exports	0.2	0.5	0.4	-0.1
GDP	2.3	1.7	2.1	2.2
Poland				
Final domestic demand	1.3	0.4	1.7	3.8
Stockbuilding	0.5	-0.4	0.0	0.0
Net exports	1.6	1.8	0.6	0.7
GDP	4.0	1.5	1.8	4.0
Portugal				
Final domestic demand	3.7	2.0	2.2	3.2
Stockbuilding	-0.3	-0.1	0.0	0.0
Net exports	-0.1	0.0	-0.4	-0.5
GDP	3.3	1.9	1.8	2.8
Slovak Republic				
Final domestic demand	-2.1	3.6	3.7	5.0
Stockbuilding	0.8	-0.1	-0.1	-0.4
Net exports	3.6	-0.8	-0.5	-0.5
GDP	2.2	2.7	3.1	4.1
Spain				
Final domestic demand	4.5	2.8	2.1	3.3
Stockbuilding	-0.1	0.0	0.0	0.0
Net exports	-0.2	0.0	-0.1	-0.1
GDP	4.1	2.7	2.0	3.2
Sweden				
Final domestic demand	2.4	1.0	1.5	2.1
Stockbuilding	0.6	-0.1	-0.1	0.0
Net exports	0.9	0.4	0.2	1.0
GDP	3.6	1.4	1.6	2.8
Switzerland				
Final domestic demand	2.7	1.6	1.1	2.3
Stockbuilding	0.1	0.2	0.1	0.0
Net exports	0.3	-0.2	-0.1	-0.2
GDP	3.0	1.7	1.1	2.1
Turkey				
Final domestic demand	9.2	-11.6	1.2	5.5
Stockbuilding	0.8	-3.7	2.0	0.1
Net exports	-2.9	9.3	-0.5	-0.1
GDP	7.2	-7.3	2.6	5.4
United Kingdom				
Final domestic demand	3.9	3.1	1.9	2.8
Stockbuilding	-0.3	-0.2	0.0	0.0
Net exports	-0.7	-0.7	-0.2	-0.3
GDP	2.9	2.3	1.7	2.5
United States				
Final domestic demand	5.1	2.0	0.5	3.5
Stockbuilding	-0.1	-1.0	0.3	0.6
Net exports	-0.9	0.0	0.0	-0.3
GDP	4.1	1.1	0.7	3.8
Euro area				
Final domestic demand	2.8	1.5	1.4	2.6
Stockbuilding	0.0	-0.4	0.1	0.2
Net exports	0.6	0.4	0.0	0.2
GDP	3.5	1.6	1.4	3.0
European Union				
Final domestic demand	3.0	1.7	1.5	2.6
Stockbuilding	-0.1	-0.3	0.1	0.1
Net exports	0.4	0.3	-0.1	0.1
GDP	3.3	1.7	1.5	2.9
Total OECD				
Final domestic demand	3.8	1.3	0.8	2.8
Stockbuilding	0.0	-0.6	0.1	0.3
Net exports	-0.1	0.3	0.0	0.1
GDP	3.7	1.0	1.0	3.2

Note: The adoption of new national account systems, SNA93 or ESA95, has been proceeding at an uneven pace among OECD member countries, both with respect to variables and the time period covered. As a consequence, there are breaks in many national series. Moreover, some countries are using chain-weighted price indices to calculate real GDP and expenditures components. See Table "National Account Reporting Systems and Base-years" at the beginning of the Statistical Annex and *OECD Economic Outlook* Sources and Methods *(http://www.oecd.org/eco/sources-and-methods).*
and/or statistical discrepancy.

Source : OECD.

Annex Table 57. **Household wealth and indebtedness**[a]

	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Canada													
Net wealth	426.0	426.4	420.4	431.7	446.3	458.7	476.4	478.5	490.9	502.2	505.6	507.3	503.5
Net financial wealth	184.9	184.6	184.4	193.7	203.3	209.0	217.3	224.4	234.0	242.0	243.1	242.8	240.3
Non-financial assets	241.1	241.8	236.0	238.1	242.9	249.7	259.1	254.1	256.9	260.2	262.5	264.5	263.3
Financial assets	273.5	274.7	276.9	286.8	299.0	307.4	319.3	326.8	339.4	349.7	352.8	354.0	350.8
of which: Equities	56.0	54.5	54.0	56.7	58.5	65.3	69.4	72.5	79.4	87.7	94.2	95.7	95.7
Liabilities	88.7	90.1	92.5	93.1	95.7	98.4	102.0	102.4	105.3	107.7	109.7	111.2	110.5
of which: Mortgages	55.7	57.3	58.9	61.2	64.2	66.0	68.3	68.5	70.3	70.8	71.2	70.9	70.1
France													
Net wealth	439.1	447.7	417.9	439.7	437.9	466.9	452.5	478.2	502.3	524.4	543.4	614.6	619.3
Net financial wealth	138.0	155.6	130.6	150.6	156.4	189.8	178.2	182.5	205.9	226.0	245.1	298.1	292.5
Non-financial assets	301.2	292.1	287.3	289.1	281.6	277.2	274.3	295.8	296.4	298.4	298.3	316.6	326.8
Financial assets	223.5	243.4	218.9	234.2	238.5	267.1	254.2	246.2	270.4	290.9	314.0	368.3	363.3
of which: Equities	90.1	108.7	87.3	103.0	102.3	121.9	101.8	83.5	97.1	108.8	128.1	171.7	165.8
Liabilities	85.5	87.8	88.3	83.6	82.1	77.4	76.0	63.7	64.5	64.9	68.9	70.2	70.8
of which: Long-term loans	52.1	51.6	51.9	50.7	48.4	51.9	50.6	50.8	51.6	52.0	51.6	54.0	54.7
Germany													
Net wealth	..	..	535.6	472.8	531.1	547.1	553.8	563.7	571.7	580.8	586.8	596.3	585.8
Net financial wealth	182.1	185.4	130.8	123.3	124.2	133.6	130.4	136.0	141.3	150.7	157.2	169.3	165.0
Non-financial assets	..	..	404.8	349.5	406.9	413.5	423.4	427.7	430.4	430.1	429.6	427.0	420.8
Financial assets	199.2	203.1	200.7	208.2	210.1	224.5	227.5	236.7	246.1	258.3	268.1	284.3	280.2
of which: Equities	12.9	15.1	11.6	30.4	30.8	37.7	40.8	42.5	46.8	55.8	62.0	77.4	75.5
Liabilities	17.1	17.8	70.0	84.9	85.8	90.9	97.1	100.6	104.8	107.6	110.9	114.9	115.1
of which: Mortgages	11.6	12.1	53.6	45.7	49.2	52.6	57.3	60.5	63.7	66.5	68.6	70.6	71.3
Italy													
Net wealth	355.7	417.1	430.9	435.5	447.4	487.5	468.6	496.5	502.3	517.0	531.6	553.8	..
Net financial wealth	162.5	195.6	196.3	202.4	207.0	229.2	224.1	224.0	231.3	245.0	264.5	286.6	286.5
Non-financial assets	193.2	221.5	234.6	233.2	240.3	258.3	244.5	272.5	271.0	272.1	267.1	267.3	..
Financial assets	174.3	223.9	225.4	232.2	237.7	261.0	256.0	254.6	263.3	278.8	301.5	327.3	329.4
of which: Equities	17.0	48.7	46.0	47.9	47.9	54.4	49.3	46.5	50.9	73.7	108.3	147.8	141.8
Liabilities	11.7	28.3	29.1	29.8	30.6	31.8	31.9	30.6	32.0	33.8	37.0	40.7	42.9
of which: Medium and long-term loans	8.5	13.0	13.7	14.3	14.4	14.9	15.2	18.6	19.1	20.0	21.7	24.5	25.6
Japan													
Net wealth	832.3	901.0	937.5	853.2	783.0	755.9	761.2	749.4	754.9	752.8	738.8	752.9	..
Net financial wealth	232.4	261.7	260.3	256.9	249.5	255.0	274.6	283.8	296.2	306.8	303.5	335.4	336.8
Non-financial assets	599.9	639.4	677.2	596.3	533.5	500.9	486.6	465.7	458.4	446.0	438.0	419.7	..
Financial assets	344.6	377.6	390.9	386.6	377.3	386.2	407.6	421.4	428.2	442.7	437.8	468.2	469.0
of which: Equities	73.2	93.5	51.4	47.9	34.3	35.6	43.5	43.2	39.5	37.6	28.1	47.3	39.4
Liabilities	112.2	116.0	130.7	129.7	127.7	131.2	133.0	137.6	132.0	135.8	134.3	132.8	132.2
of which: Mortgages	44.5	47.6	50.4	50.3	51.3	53.0	55.9	58.3	59.4	54.2	54.7	57.0	58.1
United Kingdom													
Net wealth	673.5	682.8	611.0	579.8	551.7	586.9	548.4	555.6	570.8	628.3	675.9	750.2	725.3
Net financial wealth	217.5	240.3	209.5	220.0	234.4	278.5	254.9	282.3	293.6	338.4	351.7	395.0	338.4
Non-financial assets	458.5	445.1	396.9	359.9	317.2	308.2	291.1	274.3	283.9	286.1	319.8	345.6	347.4
Financial assets	328.1	354.8	325.2	333.3	343.7	384.7	362.2	388.6	398.7	443.4	461.0	507.8	455.5
of which: Equities	48.7	54.7	56.3	58.9	61.1	73.5	70.1	75.6	80.1	95.6	91.9	115.9	105.8
Liabilities	110.6	114.5	115.7	113.3	109.2	106.2	107.3	106.4	105.1	105.0	109.3	112.8	117.2
of which: Mortgages	99.2	103.2	104.7	102.2	98.7	96.2	97.7	96.6	95.7	95.5	99.6	103.1	107.6
United States													
Net wealth	487.5	499.9	475.8	488.7	477.7	483.7	474.6	502.0	523.3	560.2	580.6	632.1	582.6
Net financial wealth	262.9	272.8	258.6	277.6	274.0	282.9	276.6	304.7	326.2	360.4	379.2	423.6	365.3
Non-financial assets	224.6	227.2	217.2	211.1	203.7	200.8	198.0	197.3	197.1	199.8	201.4	208.6	217.3
Financial assets	347.1	359.2	345.8	366.1	361.7	372.9	368.8	399.0	422.0	457.7	478.2	527.5	471.3
of which: Equities	52.9	60.0	52.1	69.7	75.2	85.3	79.3	98.5	112.2	136.6	150.3	186.6	143.5
Liabilities	84.2	86.4	87.3	88.5	87.7	90.0	92.1	94.3	95.8	97.3	99.0	104.0	106.0
of which: Mortgages	56.7	59.0	60.9	62.7	62.8	63.9	64.3	64.1	64.7	65.4	67.0	70.3	71.6

a) Assets and liabilities are amounts outstanding at the end of the period, in per cent of nominal disposable income. Vertical lines between columns indicate breaks in the series due to changes in the definitions or accounting systems. Figures after the most recent breaks in the series are based mainly on the UN System of National Accounts 1993 (SNA 93) (for Japan 1990-99 only) and, more specifically, for European Union countries, on the corresponding European System of Accounts 1995 (ESA 95). Definitions apply to those most recent data.

Households include non-profit institutions serving households (according to SNA 93 and ESA 95, households also include self-employed persons and sole proprietors). Net wealth is defined as non-financial and financial assets minus liabilities; net financial wealth is financial assets minus liabilities. Non-financial assets include stock of durable goods and dwellings, at replacement cost and at market value, respectively. Financial assets comprise currency and deposits, securities other than shares, loans, shares and other equity, insurance technical reserves; and other accounts receivable/payable. Not included are assets with regard to social security pension insurance schemes. Equities comprise shares and other equity, including quoted, unquoted and mutual fund shares.

Sources: Canada: Statistics Canada, *National Balance Sheet Accounts.* France: INSEE, *Rapport sur les Comptes de la Nation* and *25 ans de Comptes de Patrimoine* (1969-1993); Banque de France, *Flow of Funds Accounts.* Germany: Deutsche Bundesbank, *Monthly Report* and *Financial accounts for Germany 1991 to 1999*, Special Statistical Publication, 2000. Italy: Banca d'Italia, *Supplements to the Statistical Bulletin*; Ando, A., L.Guiso, I.Visco (eds.), *Saving and the Accumulation of Wealth*, Cambridge University Press, 1994; OECD, *Financial Accounts of OECD countries*. Japan: Economic Planning Agency, Government of Japan, *Annual Report on National Accounts.* United Kingdom: Office for National Statistics, *United Kingdom National Accounts*, and *Financial Statistics.* United States: Federal Reserve Statistical Release, *Flow of Funds Accounts* of the United States.

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Annex Table 59. **Central government financial balances**

Surplus (+) or deficit (-) as a percentage of nominal GDP

	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections		
									2001	2002	2003
Canada	-5.4	-4.5	-3.9	-2.0	0.7	1.0	0.9	1.8	1.6	1.1	1.2
France	-4.9	-4.9	-4.2	-3.7	-2.8	-3.0	-2.5	-2.4	-2.3	-2.8	-2.4
Germany	-1.9	-1.2	-1.4	-2.2	-1.6	-1.8	-1.6	1.3	-2.0	-2.1	-1.6
Italy	-9.8	-9.2	-7.7	-6.9	-2.7	-2.6	-1.6	-1.0	-1.9	-1.1	-1.1
Japan [a]	-2.8	-3.5	-3.9	-4.2	-3.7	-5.2	-6.8	-6.1	-5.9	-6.4	-6.3
United Kingdom	-8.2	-6.7	-5.5	-4.7	-2.0	0.6	1.3	2.1	1.3	0.2	-0.5
United States	-4.4	-3.2	-2.6	-1.9	-0.6	0.5	1.2	2.1	1.1	-0.5	0.1
excluding social security	-5.1	-4.0	-3.4	-2.8	-1.7	-0.7	-0.3	0.6	-0.5	-2.3	-1.7
Total of above countries	-4.6	-3.9	-3.5	-3.0	-1.6	-1.2	-1.0	0.0	-0.9	-1.9	-1.5

Note: Central government financial balances include one-off revenues from the sale of the mobile telephone licenses.

a) For the fiscal years beginning April 1 of the year shown. The 1998 deficit would have risen by 5.4 percentage points of GDP if account were taken of the assumption by the central government of the debt of the Japan Railway Settlement Corporation and the National Forest Special Account.

Source: OECD.

Annex Table 60. **Maastricht definition of general government gross public debt**

As a percentage of nominal GDP

	1993	1994	1995	1996	1997	1998	1999	2000	Estimates and projections		
									2001	2002	2003
Austria	61.9	64.8	69.2	69.2	64.7	63.9	64.9	63.5	61.5	59.9	57.4
Belgium	..	..	..	130.1	124.7	119.3	115.0	109.3	105.4	101.8	97.5
Denmark	..	..	..	65.1	61.2	55.6	52.0	46.1	43.1	41.2	38.8
Finland	56.0	58.0	57.2	57.1	54.1	48.8	47.3	44.0	42.1	42.0	41.7
France	..	..	54.6	57.0	59.3	59.5	58.6	57.5	58.5	59.3	59.1
Germany	47.1	49.4	57.1	59.8	61.0	60.9	61.3	60.3	60.4	62.0	62.3
Greece	..	..	108.7	111.3	108.2	105.0	104.0	102.7	99.8	97.6	94.5
Ireland	..	..	..	74.2	65.1	54.8	49.3	38.6	32.1	27.4	22.9
Italy	118.1	123.8	123.2	122.1	120.2	116.4	114.6	110.5	107.4	104.9	101.7
Luxembourg	..	..	..	6.2	6.0	6.2	5.9	5.3	4.5	3.7	1.0
Netherlands	..	..	..	75.2	69.9	66.8	63.1	56.1	53.9	50.9	48.4
Portugal	..	..	..	62.8	59.1	55.4	55.1	54.2	52.8	51.7	50.0
Spain	..	..	..	68.1	66.6	64.5	63.1	60.4	58.3	57.3	55.9
Sweden	..	..	..	76.0	73.1	70.5	65.3	55.7	50.0	46.5	44.9
United Kingdom	45.4	48.5	51.8	52.3	50.8	47.6	45.2	42.4	41.3	40.5	40.2

Note: Debt figures are based on ESA95 definitions. For the period 1996-2000, they are provided by Eurostat, the Statistical Office of the European Communities. Where available, debt figures for years prior to 1996 as well as GDP figures for the whole period are provided by National Authorities. The 2001 to 2003 debt ratios are projected forward in line with the OECD projections for general government gross financial liabilities and GDP.

Source: OECD.

Annex Table 61. **Monetary and credit aggregates: recent trends**

Annualised percentage change, seasonally adjusted

		Annual change (to 4th quarter)					Latest twelve months	
		1996	1997	1998	1999	2000		
Canada	M2	2.4	-1.2	1.3	3.8	6.1	5.0	(Sep. 2001)
	BL[a]	5.4	9.3	7.5	5.7	6.8	4.9	(Aug. 2001)
Japan	M2+CD	3.3	3.3	4.5	3.0	2.1	3.6	(Oct. 2001)
	BL[a]	0.4	1.2	-1.0	-0.6	2.5	0.1	(Aug. 2001)
United Kingdom	M0	6.9	6.6	5.2	9.2	7.8	6.3	(Sep. 2001)
	M4	10.3	5.4	8.7	3.6	8.8	7.8	(Sep. 2001)
	BL[a]	11.7	12.6	5.4	8.4	13.5	11.0	(Aug. 2001)
United States	M2	4.5	5.6	8.5	6.3	6.2	10.8	(Oct. 2001)
	M3	7.1	9.1	11.0	7.7	9.3	12.2	(Oct. 2001)
	BL[a]	6.1	8.6	9.8	4.5	12.0	2.3	(Oct. 2001)
Euro area	M2	5.1	3.9	5.7	6.6	4.0	5.3	(Sep. 2001)
	M3	4.5	4.7	5.0	6.7	5.4	7.6	(Sep. 2001)
	BL[a]	..	..	..	6.6	5.9	7.1	(Sep. 2001)

a) Commercial bank lending.

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Annex Table 62. **Export market growth and performance in manufactured goods**

Percentage changes from previous year

	Import volume				Export market growth				Export volume				Export performance[a]			
	2000	2001	2002	2003	2000	2001	2002	2003	2000	2001	2002	2003	2000	2001	2002	2003
Australia	6.7	-2.7	5.8	7.3	15.7	-1.8	-0.5	9.8	3.8	0.8	1.5	8.0	-10.3	2.7	1.9	-1.6
Austria	10.9	7.9	3.7	6.8	13.6	2.4	3.2	7.9	16.0	7.8	3.6	7.7	2.2	5.3	0.4	-0.3
Belgium	8.5	0.7	2.3	8.1	12.9	1.9	2.6	8.3	9.4	0.3	2.0	7.7	-3.1	-1.6	-0.5	-0.5
Canada	9.9	-5.7	2.1	8.3	15.6	-4.8	-2.0	8.1	9.4	-5.8	-1.0	7.9	-5.4	-1.0	1.0	-0.1
Czech Republic	22.6	17.5	7.4	9.4	12.4	3.9	4.3	8.3	19.5	15.5	7.1	9.2	6.3	11.2	2.6	0.9
Denmark	6.5	-3.4	2.6	6.4	12.2	1.0	2.0	7.7	7.8	-0.1	2.7	7.2	-3.9	-1.1	0.7	-0.5
Finland	5.8	-5.0	0.4	3.6	12.9	1.2	2.3	8.3	9.6	-4.2	1.3	6.7	-2.9	-5.3	-1.0	-1.5
France	18.1	0.7	0.7	9.4	11.6	1.8	2.7	8.1	14.6	2.2	1.5	8.3	2.7	0.4	-1.2	0.2
Germany	12.9	1.7	3.6	7.6	13.1	1.6	2.3	8.3	13.2	3.9	3.0	7.3	0.1	2.3	0.7	-0.9
Hungary	26.6	4.7	3.2	6.8	12.3	3.7	3.7	7.9	28.6	5.2	3.3	6.4	14.5	1.4	-0.4	-1.4
Iceland	6.0	-6.6	-7.5	4.4	11.9	0.6	1.0	7.0	2.9	15.6	5.3	9.4	-8.1	14.9	4.3	2.3
Ireland	18.8	0.6	-1.7	9.7	12.4	0.6	1.6	7.7	20.3	2.1	0.4	8.9	7.0	1.5	-1.2	1.2
Italy	10.5	1.4	2.7	6.6	13.4	1.6	2.6	8.5	10.4	2.9	2.0	7.5	-2.7	1.3	-0.5	-0.9
Japan	16.9	-5.3	-15.9	1.2	16.8	-1.8	1.3	10.3	9.3	-11.1	-1.4	8.8	-6.4	-9.4	-2.7	-1.3
Korea	29.8	-1.4	2.3	9.8	16.2	-0.7	0.5	9.9	15.9	1.8	2.9	11.1	-0.2	2.5	2.3	1.1
Luxembourg	8.5	17.2	6.3	9.4	13.1	1.3	2.5	8.3	29.3	0.7	1.0	11.9	14.3	-0.5	-1.4	3.4
Mexico	20.6	-3.3	2.0	8.5	15.0	-4.9	-1.9	7.8	16.4	-3.2	-0.3	7.9	1.3	1.7	1.6	0.0
Netherlands	10.2	2.4	3.3	9.2	12.4	1.3	2.5	8.0	12.0	1.5	3.2	8.1	-0.4	0.2	0.7	0.1
New Zealand	-4.1	1.1	1.7	7.9	12.7	-2.5	-0.0	7.4	5.5	-2.9	2.2	7.6	-6.4	-0.4	2.2	0.2
Norway	5.8	5.5	-1.1	3.7	12.5	-0.2	1.8	8.1	3.6	0.1	-1.6	4.6	-7.9	0.3	-3.4	-3.3
Poland	11.9	4.4	6.7	9.2	12.8	2.6	3.5	7.9	29.1	13.4	8.0	11.7	14.4	10.6	4.4	3.4
Portugal	4.5	1.1	2.6	7.2	11.9	1.8	2.5	7.9	6.7	3.5	2.4	8.3	-4.7	1.7	-0.1	0.4
Slovak Republic	9.6	12.0	8.8	10.7	16.6	8.8	5.4	8.5	16.7	10.8	7.5	9.7	0.0	1.8	2.0	1.1
Spain	8.5	4.6	3.1	7.5	12.7	1.5	2.5	8.3	13.0	2.3	3.0	8.2	0.2	0.9	0.5	-0.1
Sweden	13.5	-6.0	-0.9	8.5	12.0	0.8	1.9	7.7	11.9	-5.0	0.8	9.1	-0.1	-5.8	-1.1	1.3
Switzerland	6.8	-0.1	-0.3	5.6	13.6	0.8	2.0	8.3	7.5	-1.2	0.5	5.4	-5.3	-2.0	-1.5	-2.6
Turkey	36.2	-19.4	8.6	12.9	12.1	3.4	3.6	8.3	22.5	-0.2	8.1	12.3	9.3	-3.5	4.3	3.6
United Kingdom	10.4	3.0	3.1	6.9	13.2	0.4	1.6	8.5	10.6	3.6	2.7	7.7	-2.2	3.2	1.2	-0.7
United States	15.7	-5.6	-2.6	7.9	14.0	-1.4	1.4	8.7	12.6	-6.3	-3.8	8.7	-1.3	-5.0	-5.1	0.0
Total OECD	13.8	-1.2	0.5	7.6	13.9	0.0	1.7	8.6	12.4	-0.9	1.0	8.2	-1.3	-0.9	-0.7	-0.4
Memorandum items																
China	33.4	14.2	12.6	19.4	16.0	-2.9	-1.7	8.8	29.5	9.3	7.7	19.1	11.6	12.5	9.6	9.5
Dynamic Asia[b]	19.1	-5.7	-0.0	13.8	17.6	-0.5	1.2	10.8	19.5	-5.4	-0.3	11.8	1.6	-5.0	-1.5	0.9
Other Asia	15.2	5.3	3.2	7.4	13.8	-0.5	0.9	8.6	14.5	1.8	3.1	8.5	0.6	2.3	2.2	-0.0
Non-OECD Asia	21.9	0.4	3.9	14.8	17.1	-0.9	0.7	10.3	21.5	-1.4	2.1	13.7	3.8	-0.5	1.4	3.0
Latin America	7.4	4.5	5.0	7.0	12.6	-0.3	1.2	7.9	11.4	3.0	5.0	9.0	-1.1	3.3	3.7	1.0
Africa and Middle-East	5.2	11.7	7.0	10.4	13.0	1.2	1.8	8.8	8.6	1.8	3.4	8.9	-3.9	0.5	1.5	0.1
Central and Eastern Europe	10.9	15.6	8.9	8.5	14.8	4.7	4.8	9.3	10.0	10.8	9.9	4.9	-4.2	5.8	4.9	-4.0
Total of non-OECD countries	16.3	3.6	4.9	12.6	16.3	-0.2	1.2	9.9	19.3	-0.2	2.9	12.5	2.6	-0.0	1.6	2.3
World	14.4	-0.0	1.6	8.9	14.4	-0.0	1.6	8.9	14.0	-0.7	1.4	9.2	-0.4	-0.7	-0.1	0.3

Note: Regional aggregates are calculated *inclusive* of intra-regional trade. The calculation of export markets is based on a weighted average of import volumes in each exporting country's market, with weights based on manufacturing trade flows in 1995.

a) Export performance is calculated as the percentage change in the ratio of export volumes to export markets.

b) Dynamic Asia includes Chinese Taipei; Hong Kong, China; Indonesia; Malaysia; Philippines; Singapore and Thailand.

Sources: OECD; Direction of trade data - United Nations Statistical Office; OECD, *International Trade by commodity Statistics*.

Annex Table 63. **Geographical structure of OECD trade**
Percentage of nominal GDP

Area or country	Source/destination		Source of imports						Destination of exports					
			1962	1972	1982	1992	1999	2000	1962	1972	1982	1992	1999	2000
OECD[a]	**OECD**		**5.92**	**7.90**	**10.46**	**11.23**	**13.16**	**13.88**	**5.61**	**7.73**	**9.96**	**11.02**	**13.23**	**13.91**
	of which:	European Union	3.58	5.04	6.33	6.62	7.09	7.11	3.49	4.95	6.55	6.74	7.28	7.28
		United States	0.90	0.85	1.22	1.66	2.20	2.38	0.57	0.92	1.13	1.85	2.80	3.17
		Other	1.43	2.01	2.91	2.94	3.87	4.39	1.54	1.86	2.28	2.43	3.15	3.46
	Non-OECD		**2.27**	**2.39**	**4.70**	**3.08**	**3.98**	**4.91**	**2.27**	**2.24**	**4.18**	**2.98**	**3.22**	**3.56**
	of which:	DAEs + China[b]	0.25	0.35	0.77	1.20	1.93	2.27	0.27	0.38	0.75	1.15	1.40	1.65
		OPEC	0.58	0.80	2.18	0.71	0.64	0.97	0.28	0.41	1.43	0.54	0.39	0.42
United States	**OECD**		**1.80**	**3.45**	**4.94**	**5.76**	**7.48**	**8.18**	**2.22**	**2.93**	**4.22**	**5.09**	**5.56**	**5.87**
	of which:	European Union	0.69	1.15	1.45	1.60	2.11	2.24	0.96	1.13	1.69	1.71	1.64	1.67
		Other	1.11	2.30	3.49	4.16	5.37	5.94	1.26	1.80	2.53	3.38	3.92	4.19
	Non-OECD		**0.99**	**1.03**	**2.55**	**2.67**	**3.58**	**4.16**	**1.46**	**1.08**	**2.29**	**2.00**	**1.95**	**2.05**
	of which:	DAEs + China[b]	0.14	0.30	0.72	1.45	2.09	2.30	0.12	0.18	0.54	0.83	0.89	1.00
		OPEC	0.24	0.21	0.90	0.49	0.45	0.67	0.17	0.21	0.67	0.33	0.22	0.21
Japan	**OECD**		**5.35**	**4.15**	**4.66**	**3.30**	**3.48**	**3.67**	**4.12**	**5.59**	**6.59**	**5.42**	**5.67**	**5.94**
	of which:	European Union	0.88	0.72	0.78	0.89	0.95	0.99	0.97	1.40	1.79	1.76	1.66	1.66
		United States	2.93	1.92	2.18	1.37	1.49	1.53	2.27	2.91	3.28	2.52	2.86	2.99
		Other	1.54	1.50	1.69	1.04	1.03	1.15	0.89	1.28	1.52	1.14	1.15	1.29
	Non-OECD		**3.78**	**3.56**	**7.27**	**2.83**	**3.44**	**4.33**	**3.84**	**3.82**	**5.96**	**3.51**	**3.65**	**4.16**
	of which:	DAEs + China[b]	1.08	0.75	1.43	1.22	1.96	2.38	1.24	1.50	2.09	2.34	2.72	3.20
		OPEC	1.09	1.48	4.39	1.02	0.91	1.32	0.51	0.60	1.95	0.49	0.29	0.33
European Union[c]	**OECD**		**12.47**	**13.59**	**18.13**	**17.90**	**20.92**	**23.03**	**11.50**	**13.64**	**17.25**	**17.13**	**21.99**	**24.18**
	of which:	European Union	8.48	10.32	13.34	13.63	15.27	16.43	8.20	10.29	13.46	13.61	16.42	17.69
		United States	1.96	1.44	2.06	1.53	2.10	2.43	1.17	1.37	1.56	1.31	2.25	2.69
		Other	2.02	1.83	2.74	2.73	3.55	4.17	2.13	1.98	2.22	2.21	3.32	3.80
	Non-OECD		**4.35**	**3.73**	**6.25**	**3.42**	**4.30**	**5.55**	**3.43**	**3.08**	**5.52**	**3.20**	**3.75**	**4.35**
	of which:	DAEs + China[b]	0.31	0.28	0.57	0.94	1.59	1.96	0.30	0.25	0.44	0.65	0.90	1.09
		OPEC	1.11	1.37	2.82	0.71	0.60	0.97	0.46	0.58	2.06	0.70	0.54	0.63

a) OECD includes Korea from 1988. Trade data for Greece in 2000 are partially OECD estimates.
b) DAEs are the Dynamic Asian Economies (Chinese Taipei; Hong Kong, China; Malaysia; Philippines; Singapore and Thailand).
c) Trade data for Greece in 2000 are partially OECD estimates.
Source: OECD.

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OECD PUBLICATIONS, 2, rue André-Pascal, 75775 PARIS CEDEX 16
PRINTED IN FRANCE
(12 2001 70 1 P) ISBN 92-64-19101-1 – No. 52267 2001
ISSN 0474-5574