

# Economic Trends

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## In Brief

### Articles

This month we feature two articles.

Pam Davies of the ONS outlines Retail Sales Index Development. A number of aspects of the methods and systems used to produce the Retail Sales Index (RSI) are under review. This development and investigatory work covers: rebasing the RSI from 1995=100 to 2000=100, review of the survey methods used for the Retail Sales Inquiry, development of a new index construction system, and seasonal and calendar adjustment methods. This development work will move the RSI onto the standard methods and systems used for other economic statistics. This development work is being considered for implementation in October 2003 at the earliest.

Dean Fletcher and Mark Williams of the ONS describe the impact of redeveloping the Index of Production. The article discusses the breakdown of the IoP methodology concentrating on the changes that have been made to the existing system and their impact on the data. The new system and therefore the methodological changes will replace the existing IoP system in October 2003 and the first new data will be published as part of the September 2003 *Blue Book*. There will be six methodological changes of note and one major system change.

### Changes

The annual article on Jobs in the Public and Private Sectors that previously appeared in the June *Economic Trends* will now be published in *Labour Market Trends*. A copy of the article will also be put on the National Statistics website, and will be publicised nearer the time of publication.

### Recent economic publications

#### Quarterly

*Consumer Trends*: 2002 quarter 4. Available for downloading from the National Statistics website [www.statistics.gov.uk/products/p242.asp](http://www.statistics.gov.uk/products/p242.asp)

*United Kingdom Economic Accounts*: 2002 quarter 4. TSO, ISBN 0 11 621638 7. Price £26. Also available for downloading from the National Statistics website [www.statistics.gov.uk/products/p1904.asp](http://www.statistics.gov.uk/products/p1904.asp)

*UK Trade in Goods analysed in terms of industries* (MQ10): 2003 quarter 1 (published 13 June). Available for downloading from the National Statistics website [www.statistics.gov.uk/products/p731.asp](http://www.statistics.gov.uk/products/p731.asp)

#### Monthly

*Financial Statistics*: May 2003. TSO, ISBN 0 11 621596 8. Price £23.50.

*Focus on Consumer Price Indices*: April 2003. Available for downloading from the National Statistics website [www.statistics.gov.uk/products/p867.asp](http://www.statistics.gov.uk/products/p867.asp)

*Monthly Review of External Trade Statistics* (MM24): April 2003 (published 13 June). Available for downloading from the National Statistics website [www.statistics.gov.uk/products/p613.asp](http://www.statistics.gov.uk/products/p613.asp)

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# Economic Update - June 2003

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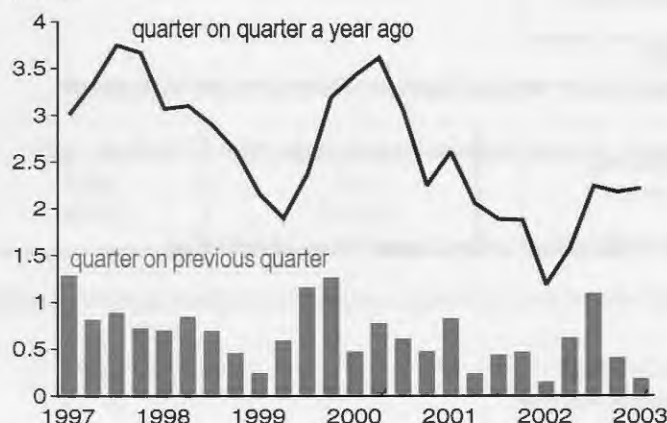
## Overview

Preliminary GDP data shows growth slowed down in the last quarter of 2002 and the first quarter of 2003. Similarly external indices of output show a weaker position than last year, although some of these have improved since the start of the war. Consumer spending clearly slowed during the first quarter but it is difficult to yet tell whether this is the start of a trend. Private investment demand stabilised during 2002 after the recent falls. This stabilisation is set against a background of high indebtedness and an increase in bankruptcies. Government demand has been stronger. However weaker revenues have returned public sector finances to deficit. Trade demand may have stabilised after the falls from the strong second quarter demand. Overall labour market aggregates remain fairly stable, and private sector wage pressures are minimal. Producer price rises have slowed as the oil price has fallen back, while consumer prices remain above target.

## GDP activity – overview

Gross domestic product (GDP) is estimated to have grown by 0.2 percent in the first quarter of 2003, the same as the preliminary estimate published last month. This represents a slowdown from the 0.4 per cent recorded in the fourth quarter of 2002 and 1.0 per cent in the third quarter (figure 1), although the latter was somewhat distorted by the Jubilee holiday. Comparing the first quarter of 2003 with the same quarter a year ago growth was 2.2 per cent, slightly lower than the initial estimate and the same as the 2.2 per cent in the year to the fourth quarter of 2002.

**Figure 1**  
GDP  
growth



The lower GDP growth in the latest quarter reflects a slowdown in growth in the service industries. Manufacturing production fell slightly in the first quarter, whilst construction growth remained strong.

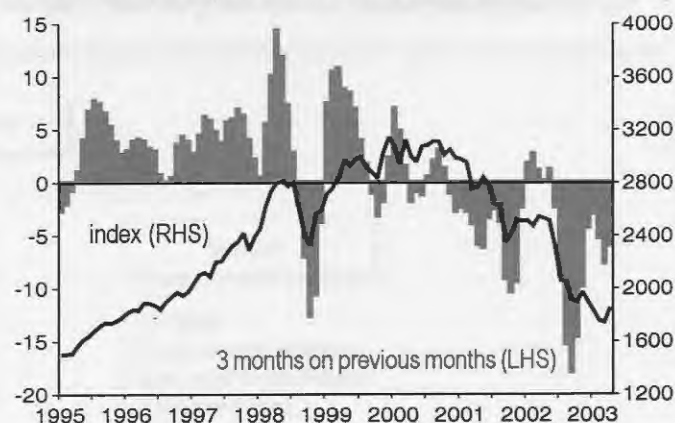
Overall, movements in the UK economy are similar to those around the world. The recovery in the main industrial economies in early 2002 lost momentum in the second half and dwindled further during the first quarter of 2003. In the case of some countries it has even gone into reverse. Much of the recovery was export led, and exports have subsequently

fallen back but domestic activity has clearly slowed as well. What is yet to be clarified is how much of this deceleration is merely due to the extreme uncertainty generated by the lead up to war in the first part of the year and how much it represents other underlying forces. So far UK economic growth could be said to have stood up relatively well in these circumstances, protected in particular by the strength of government demand.

## Financial Market activity

Recent events continue to engender a substantial degree of volatility in world stock markets. Since 2000, the UK FTSE all share index has fallen for three years in a row, nearly halving its value in the process, the largest and most prolonged deterioration in equity values since the decline in the early 1970s. The market this year has been particularly volatile. Initially it continued to decline sharply as war fears grew. However, the period since around mid-March has seen a rebound which has taken the market up some 10% from its lows as of late May (figure 2).

**Figure 2**  
FTSE - all share price index, end month



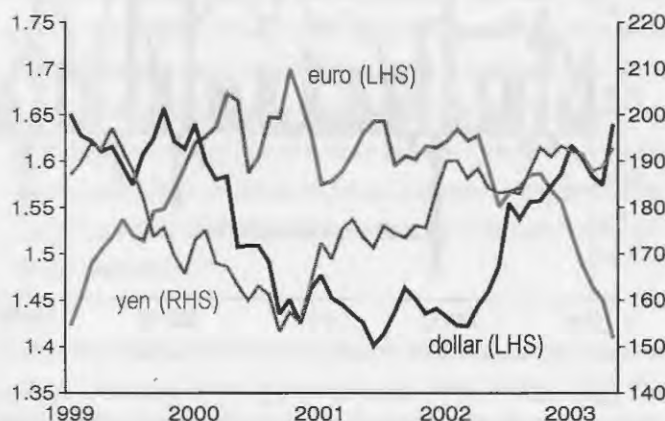
The stock market's volatility has been echoed in the corporate bond market, which, alongside long-term loans from banks, has been the primary



source of corporate borrowing since 2001. Some measures of spreads between corporate and government bonds continue to be near historical highs - particularly for lower rated paper.

It is the currency market though that has seen possibly the most significant price move in recent months. Since the start of the year, sterling has fallen by almost 10% versus the Euro. As a result, even though the pound has appreciated a little against a weak US dollar, the trade weighted exchange rate index is down by some 7% this year (Figure 3).

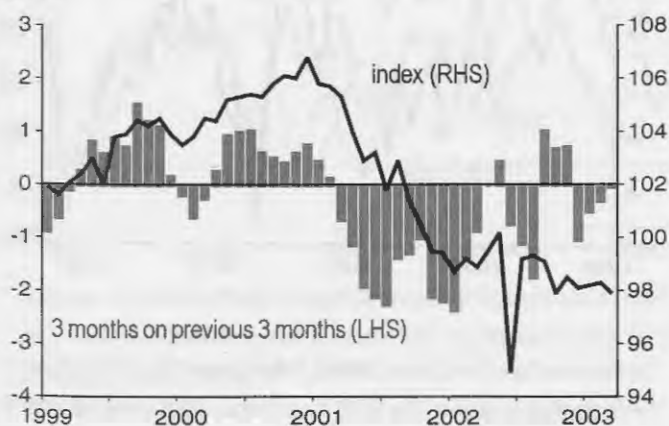
**Figure 3**  
Exchange rates  
£1=



## Output

After rising slightly in January and February, manufacturing output lost all of its gains on the quarter with a fall of 0.4% in March, leaving it slightly down when compared with the fourth quarter of last year. Nevertheless the data does suggest that the sector is now close to stabilising after the falls of the last year (figure 4).

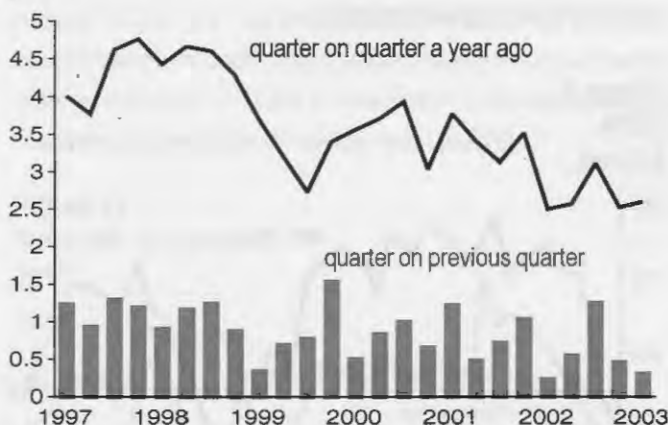
**Figure 4**  
Index of manufacturing  
growth



The source of the weakness in manufacturing since early 2000 has been

the fall in ICT industries. This decline slowed during 2002, and output rose between November 2002 and January 2003, and this area of activity now appears to be stabilising. Particularly encouraging was the fact that output in the investment goods industries rose by 1.6 per cent in the last quarter, providing some evidence that the investment decline of the past couple of years may have now run its course.

**Figure 5**  
Services output  
growth



Much of the slowdown in GDP growth since the third quarter of 2002 is due to a slowdown in the output growth of the service industries. Comparing output with that of the previous quarter shows growth of 0.3 per cent in the first quarter of 2003, down on the growth of 0.5 per cent in the last quarter of 2002, and substantially so on the growth of 1.2 per cent in the third quarter. When compared with the same quarter a year ago annual growth was 2.6 per cent in the first quarter of 2003, the same as in the last quarter of 2002. Apart from the growth of 3.1 per cent in the third quarter of 2002, growth has been 2.5 or 2.6 per cent since the start of 2002 (figure 5).

A broad industrial breakdown shows that in 2001 there was a shift in the driver of growth from 'business services and finance' and 'transport, storage and communications' to 'distribution, hotels and catering, and repairs' and 'government and other services'. In the last quarter of 2002 and the first quarter of 2003 the general slowdown in the service sector has been due to lower growth in all service industries.

Strong construction output growth has continued to support overall GDP growth. Growth in 2002 as a whole was 7.5 per cent, and strong growth has continued into 2003, as output in this sector rose by some 2.1% on the fourth quarter of last year.

## External measures of output

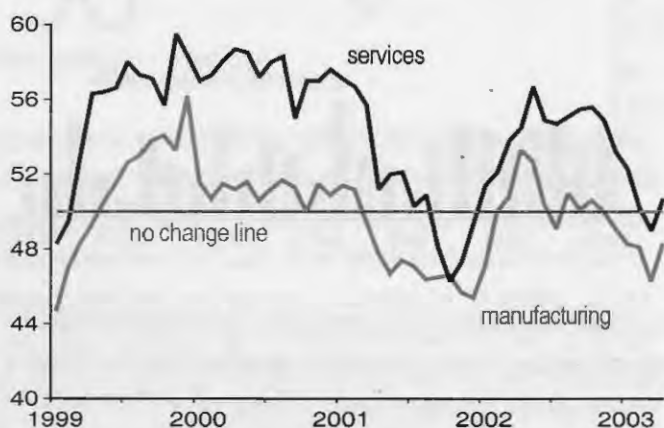
External measures for both the manufacturing and service sectors were consistent with a more significant weakening in the economy in the first quarter of 2003 than were reflected in the official figures.

However some of those that have come out since the war in Iraq have pointed to a bounce back, suggesting that at least some of the weakness was war related.

Figure 6 for example shows the Chartered Institute of Purchasing and Supply (CIPS) indices of output in manufacturing and services. These weakened sharply in the first few months of the war but the last reading seemed to show a small rebound. In contrast, however, the latest Confederation of British Industry (CBI) for April, failed to show any strengthening in manufacturing activity.

**Figure 6**  
CIPS

balances

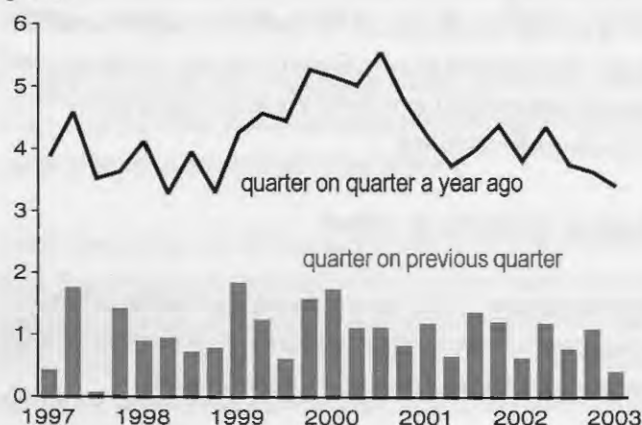


### Household demand

National Accounts figures for the first quarter of 2003 show a slowdown in consumer spending activity to 0.4% when compared with the previous quarter and 3.4% on a year ago (figure 7). This contrasts with quarterly growth of 1.1% for the last quarter of 2002 and 3.9% for last year as a whole. The question now is whether this is just a temporary downward blip or the start of the long awaited adjustment in consumer spending. Other evidence provides mixed signals on this.

**Figure 7**  
Household Consumption

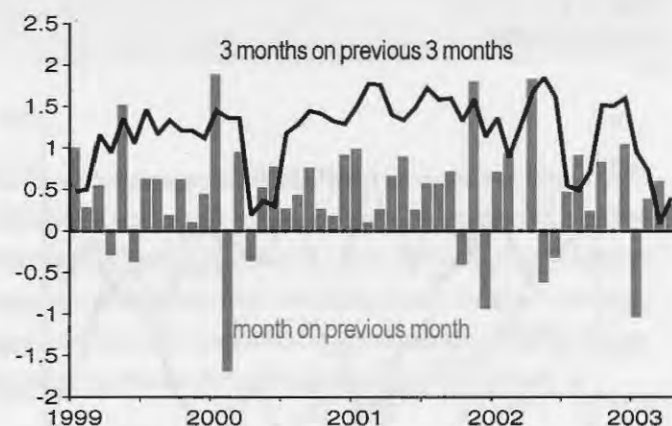
growth



Retail sales data present a mixed message. The sales fell significantly in January but seasonal adjustment around the turn of the year is always difficult and since the numbers have recovered. The latest figure for April showed a rise of 0.3 per cent on the month and 2.7% compared with a year ago. Overall though the pace of growth has clearly slowed from last year, when the annual rate of growth for December was 6 per cent. (Figure 8).

**Figure 8**  
Retail sales

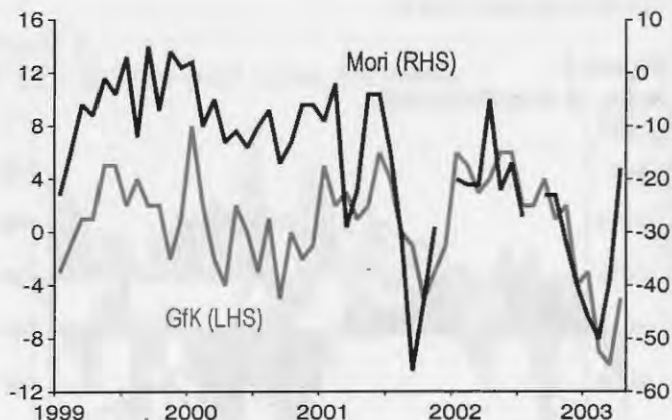
growth



Support for a slowdown in retail sales growth is found in sharply lower consumer confidence figures since the end of 2002. Care has to be used in analysing these however, as there seems to be a pronounced war effect upon confidence and certainly the latest readings showed a pronounced rebound (figure 9).

**Figure 9**  
Consumer Confidence

index



On the other hand the CBI and British Retail Consortium (BRC) surveys fail to clarify the picture. The BRC report retail sales falling sharply in March and note that the numbers were the worst recorded since March 2000. The CBI survey was also weak in March but it shows a strong

bounce back in April, recording the fastest growth rate for 5 months. The fact that Easter was late this year makes it hard to work out whether this rebound is indeed significant.

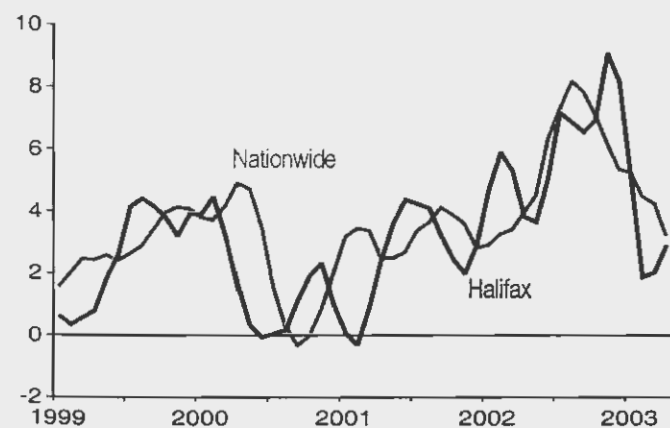
Similarly there is evidence that gross consumer credit growth may be easing, with annual growth of 5.6 per cent in the year to the first quarter, well down from growth of 14.1 per cent in the fourth quarter of 2001. This slowdown began in the second half of 2002 and, with the exception of December, annual growth has been around 5 per cent since October 2002.

Nevertheless, the prolonged period of high growth in consumer credit shows that the present level of consumer demand is supported by continued addition to the stock of household debt. Debt to income ratios remain at historic highs. As a result household demand is at least partly dependent on bank and building societies' willingness to lend and on households continuing to be willing to take on more debt and to be able to meet the interest payments on previous and new borrowing. Many emphasise though that with interest rates low these debt servicing costs continue to remain relatively low.

Part of this continued willingness to take on additional debt appears to be related to the very strong growth of house prices through 2002. The Nationwide and Halifax figures show annual inflation in the year to April at 22.2 per cent and 24.5 per cent in the year to March respectively. Tentative signs of a cooling are based on the three month on previous three month growth rates that are down significantly from their peaks (figure 10).

**Figure 10**  
**House prices**

growth: 3 months on previous 3 months



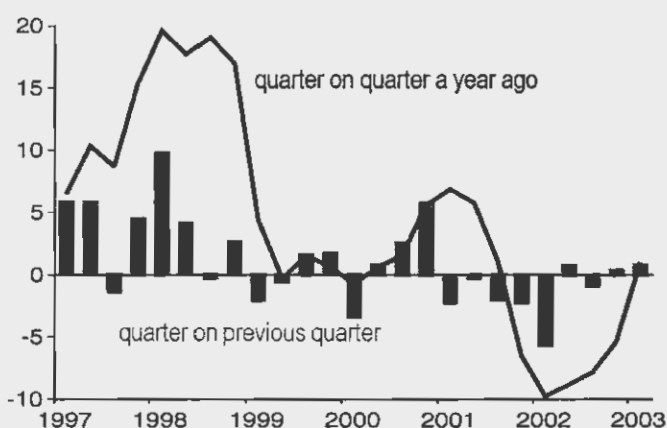
There are quite substantial regional differences in house price inflation, and London in particular appears to have seen a particularly large fall in house price inflation recently.

## Business demand

In contrast to household demand, but echoing the position around the world, UK business investment demand fell sharply in 2001, then stabilised in 2002 before a small rise at the end of the year. This improvement has continued into 2003.

Figure 11 shows business investment rose by 0.8 per cent between the last quarter of 2002 and the first of this year. On an annual basis there was a rise of 1.0 per cent. The first quarter saw a rise of 0.9 per cent in manufacturing investment, concentrated primarily in the public sector, offset by a fall back of 12.6% in construction. Both other production investment, and investment in services were up slightly.

**Figure 11**  
**Business investment**  
growth



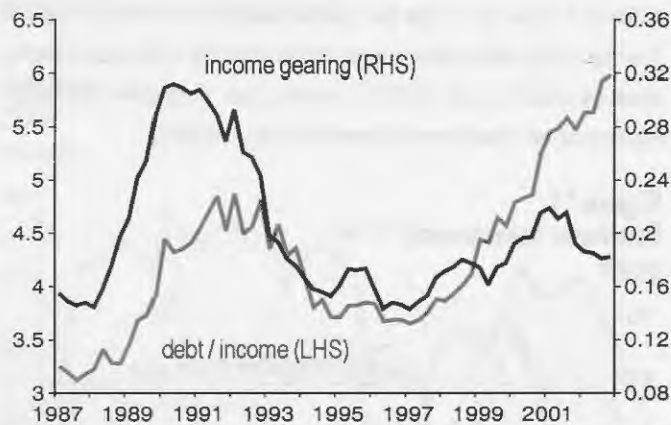
An analysis by asset shows that the investment rebound in manufacturing was in new building work and vehicles, while other capital equipment continued to decline. This latter category accounts for much of the recent weakness in investment. It had showed some signs of stabilising in the fourth quarter but the recent decline means that it is still down by 7.3 per cent when compared with a year ago. Previously the same asset had recorded very high growth, peaking at annual growth of 26.4 per cent in the first quarter of 1998. These assets include high profile investment in information and communications technologies.

External indices have shown a quite sharp weakening in investment intentions recently, with the BCC indicating a fall in investment intentions in the first quarter of 2003, particularly in services.

The cutbacks in investment have seen a recovery in the financial situation of the private non-financial corporation (PNFC) sector (figure 12). Between Q2 2001 and Q4 2002 a net borrowing position of £2.9 billion has given way to net lending of £3.6 billion, as investment has fallen by £1.7 billion and there has been a degree of recovery in profits. Over recent quarters

the overall indebtedness of the sector, while still at a high level, had moderated as net lending was recorded. The latest quarter however saw a rise; although this is related to financial flows associated with direct investment and may be a one-off. Lastly DTI data show fairly sharp increases in both company and individual insolvencies in fourth quarter.

**Figure 12**  
**PNFC**  
debt ratios



## Government demand

Government demand continues to grow at a relatively robust pace, posting 1.4 per cent constant price growth in the first quarter of 2003. Compared with the first quarter of 2002, government demand was up 1.5 per cent. In cash terms government expenditure has grown by 7.6 per cent in the year to the first quarter.

The ongoing growth in government expenditure has come as revenue growth is slowing, reflecting the slowdown in the economy. The effect is that the central Government sector has returned to net borrowing for five consecutive quarters, following thirteen quarters of net lending. The tax rises that come into effect in April may however do something to alleviate this.

Monthly public sector net borrowing data now extend to the April 2003, the first month of the new fiscal year and incorporate in the initial impact of the increases in National Insurance contributions. April saw net borrowing of -£0.6bn (i.e. net lending), which contrasts with a figure for the same month of last year of £1.3bn. This improvement is more than fully accounted for by an improvement in tax receipts.

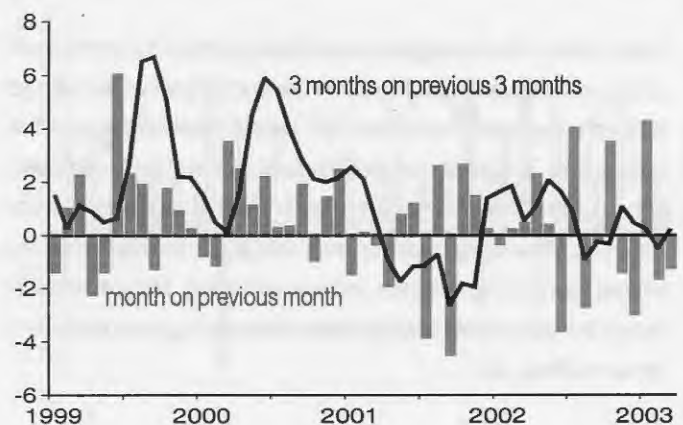
## Imports

Total imports rose at a 0.7 per cent quarterly rate in the first quarter of

2002, adding up to another substantial drag upon GDP.

Monthly goods figures are available up to March, and the figures for the first quarter show a fall of 2.9 per cent in imports from the EU, offset by a 0.9 per cent rise in non-EU imports. The fact that sterling has weakened much more sharply against the euro than against other currencies would point to this trend continuing.

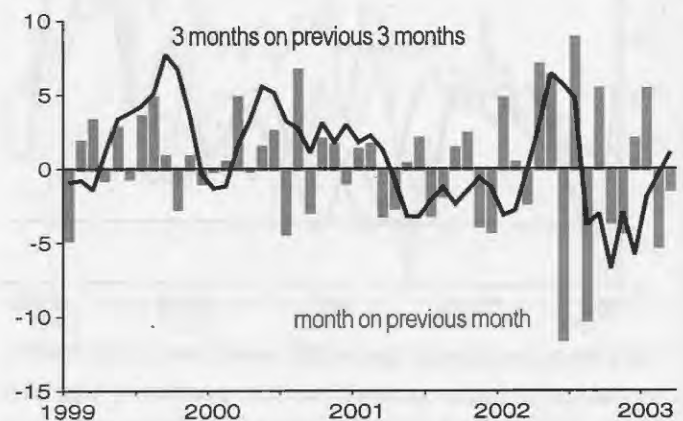
**Figure 13**  
**Goods import (volume)**  
growth



## Overseas Demand

After strengthening in the first half of last year, exports subsequently fell back in the second half. The first quarter of 2003 has only seen tentative signs of an end to this trend as growth was basically flat upon the quarter leaving it 0.8 per cent down on the first quarter of last year.

**Figure 14**  
**Goods export (volume)**  
growth



Recent export weakness appears to be broadly based. Goods exports by volume to fell by 1.1 per cent to EU countries and by 2 per cent to non-EU countries rose in the first quarter. Sterling's weakness against the



euro holds out the hope that exports to the former area at least may pick up this year, despite the fact that demand in the euro area remains weak.

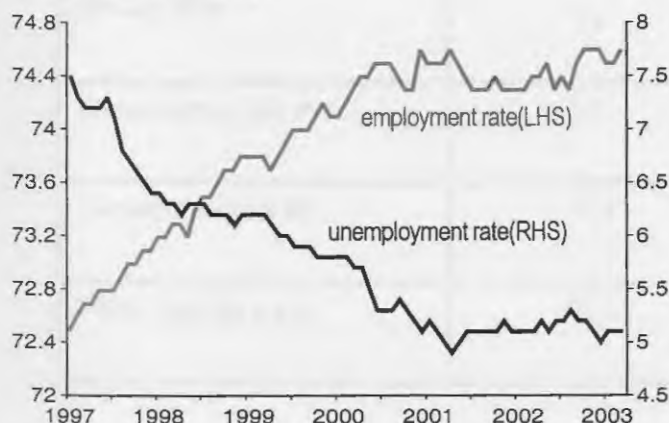
The overall effect of these changes is that the balance of trade in goods in the latest three months only improved marginally when compared with the previous quarter. Trade in services continues to support the current account, although less than in the previous three months. The so called J curve effect of a currency move, where prices adjust before volumes, implies that the trade deficit may if anything initially deteriorate in response to the pound's slide, before showing a more pronounced improvement later in the year.

## Labour Market

Headline labour market statistics continue to remain fairly stable.

From the perspective of employment, the labour force survey (LFS) employment rate was 74.6 per cent in Jan-Mar. little changed over the quarter (figure 15), while the LFS count of employment increased by 28,000 over the same period. Similarly employer survey 'workforce jobs' data has shown a modest rise of 47,000 in December 2002 compared with September. From the perspective of unemployment, the ILO rate was 5.1 per cent in Jan-Mar, the same as a year ago (figure 12), and the claimant count rate, at 3.1 per cent in April, has been unchanged for more than a year.

**Figure 15**  
**Labour Force Survey**



Full-time employment has grown less quickly than part-time employment over the course of the first quarter. Full time employment actually fell by 0.1 percent leaving it up only 0.9 per cent compared with a year ago, while part-time employment rose by 1.3 per cent leaving it also up 1.3 per cent on the year.

The industry dis-aggregation from 'workforce jobs' figures shows that the manufacturing sector continues to lose jobs, whilst echoing the output data

the main sources of job creation have been 'public administration, health and education', construction and 'distribution, hotels and restaurants'. In the year to December manufacturing lost 155,000 jobs, whilst services gained 254,000 of which 152,000 were in 'public administration, health and education' and 95,000 in 'distribution, hotels and restaurants'.

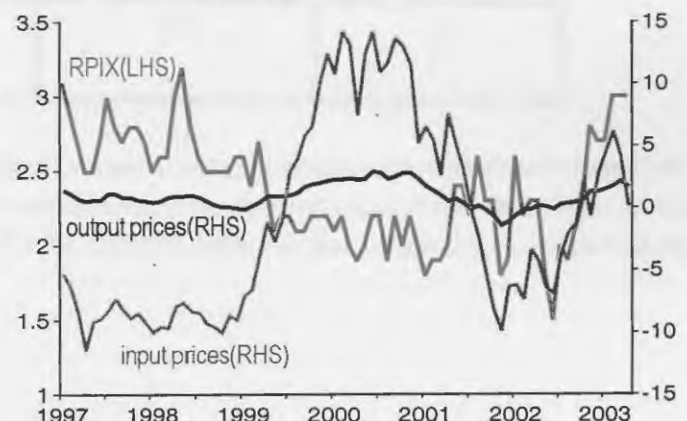
Many recent job gains continue to be in self-employment. According to workforce jobs data, over the year to quarter one, self-employed jobs have increased by 123,000, but 'employee jobs' fell by 83,000, however in comparison with the fourth quarter of last year, self-employed jobs rose by 21,000, and 'employee' jobs rose by 25,000.

The average earnings index points to continued weakness in wage gains. In May 2003 the headline rate was 3.4 per cent, down on the figure of around 3.8 per cent that was the case for much of 2002 and well below the 4.5 per cent figure that the Bank of England consider broadly consistent with their inflation target.

## Prices

After accelerating over the past few months, producer price inflation slowed down in April. Output prices actually fell by 0.1 per cent on the month, leaving them up 1.7 per cent when compared with the same month in the previous year. Input prices fell much more sharply, by 3.6 per cent on the month, leaving them virtually flat compared with a year ago. This sudden slide in input prices is largely explained by a 18 per cent dip over the month in oil prices, excluding this input prices were practically stable and these underlying input prices (i.e. excluding food, beverages, tobacco and petroleum) are up 2.5 per cent compared with a year ago. (Figure 16). Lower out-turns for output price inflation compared with input price inflation suggests that profit margins are still under pressure, although the slide in the pound may help to partially alleviate this.

**Figure 16**  
**Prices**  
growth, month on a year ago



Consumer price inflation has picked up a little in recent months, but the latest data for April held out the hope that this trend may now be peaking. The Government's target measure RPIX was 3.0 per cent in March, unchanged for the third month in a row, while the RPI was also unchanged from 3.1 per cent. The fact that RPI inflation failed to pick up further despite hefty rises in council taxes points to the fact that there is little in the way of underlying inflationary pressure in the economy. Much of the recent increases has been due to increases to the depreciation of housing component that are due to house price increases and to effects from oil price rises. Other sources of price rises include leisure and household services, possibly indicating the recent strength of the service sector, which now seems to be on the wane. In contrast many goods prices continue to fall.

# Forecasts for the UK Economy

## A comparison of independent forecasts, May 2003

The tables below are extracted from HM Treasury's "FORECASTS FOR THE UK ECONOMY" and summarise the average and range of independent forecasts for 2003 and 2004, updated monthly.

	Independent Forecasts for 2003		
	Average	Lowest	Highest
GDP growth (per cent)	1.9	0.4	2.5
Inflation rate (Q4: per cent)			
- RPI	2.6	1.8	3.9
- RPI excl MIPs	2.6	2.0	3.7
Unemployment (Q4, mn)	0.99	0.86	1.09
Current Account (£ bn)	-19.2	-39.3	-7.9
PSNB *(2003-04, £ bn)	30.0	23.8	35.1

	Independent Forecasts for 2004		
	Average	Lowest	Highest
GDP growth (per cent)	2.4	-0.3	3.0
Inflation rate (Q4: per cent)			
- RPI	2.7	1.7	4.0
- RPI excl MIPs	2.4	1.7	3.2
Unemployment (Q4, mn)	1.01	0.75	1.33
Current Account (£ bn)	-19.4	-40.9	-7.2
PSNB* (2004-05, £ bn)	32.4	25.8	43.5

NOTE: "FORECASTS FOR THE UK ECONOMY" gives more detailed forecasts, covering 27 variables and is published monthly by HM Treasury, available on annual subscription, price £75. Subscription enquiries should be addressed to Claire Coast-Smith, Public Enquiry Unit 2/S2, HM Treasury, 1 Horse Guards Road, London SW1A 2HQ (Tel: 020-7270 4558). It is also available at the Treasury's internet site: <http://www.hm-treasury.gov.uk>.

\* PSNB: Public Sector Net Borrowing.

# International Economic Indicators - June 2003

Gladys Asogbon, Marcoeconomic Assessment - National Statistics

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## Overview

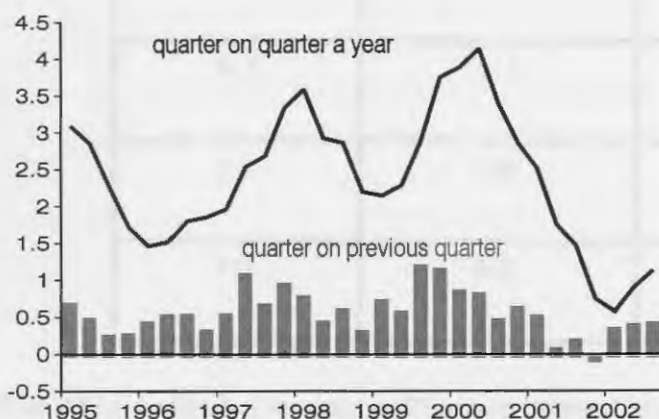
The fourth quarter shows growth in most major economies, although at a lower rate, with the exception of Germany, which did not grow in quarter four and Italy, where growth accelerated throughout 2002. Data on the US for quarter one continues to show a weak economy although growth was higher than in quarter four. With the exception of Italy, consumer demand is weak in most major economies with the USA in particular showing a marked slowdown. Trade also slowed from a strong quarter two and investment demand is still at best weak or in decline in most major economies again except in Italy. Industrial output declined in most major economies in quarter four, reversing growth in the earlier quarters of 2002. Unemployment is at best broadly flat or inching up in most economies and employment growth is weakening. Inflation is rising in most major economies.

## EU15

The latest data for 2002 quarter three shows that the EU economy grew by 0.4 per cent, the same rate of growth as the two preceding quarters.

EU GDP has been subdued since the start of 2001 (figure 1). The main drivers of this have been falls in investment and exports. In 2001 quarter four GDP declined for the first time since 1993 quarter one. A demand breakdown shows a strengthening in consumer expenditure and exports over the last two quarters. Investment demand also made a modest contribution to quarterly GDP after six consecutive quarters of contraction.

**Figure 1**  
GDP: EU15  
growth



As with GDP, industrial production in the EU has been subdued since 2001, when the index grew by just 0.1 per cent. The index contracted in quarter four by 0.4 per cent, following three consecutive quarters of expansion. Annual growth for the year shows the index falling by 1.0 per cent.

Consumer prices in the EU inched up in the second half of 2002, with

growth reaching 2.5 per cent in December up from 1.8 per cent in June. March 2003 figures show consumer price inflation slowing to 2.4 per cent from 2.6 per cent in the previous month which was the highest rate since August 2001 and remains above the rate targeted by the European Central Bank. Prices at the factory gate had been falling for the first half of 2002, but started rising in the second half of 2002. However growth in the index slowed in March to 1.9 per cent from 2.1 per cent which was the highest rate since May 2001.

EU employment figures continue to show growth, although at a lower rate. Annual growth in the year to the third quarter was 0.5 per cent. The unemployment rate however is inching up with 7.9 per cent of the workforce unemployed as at February, up from a trough of 7.3 per cent in the second and third quarters of 2001.

Annual earnings showed growth in the year to the third quarter, of 3.3 per cent, following growth in the second quarter of 2.5 per cent and 3.4 per cent in the first quarter; the figures are volatile.

## Germany

The German economy did not grow in the fourth quarter of 2002, having posted growth of 0.3 per cent in the previous quarter. Overall GDP grew by just 0.2 per cent for 2002 as a whole compared with 0.8 per cent in 2001.

Recently, there has been a lack of any appreciable domestic momentum in the German economy. Household consumption made a negative contribution of 0.3 per cent in 2002 and did not add to quarterly GDP growth in quarter four. Investment expenditure has been in decline, showing contractions in annual growth in both 2001 and 2002 and government demand has made only small contributions in recent years. The impetus that came mainly from exports in quarters two and three

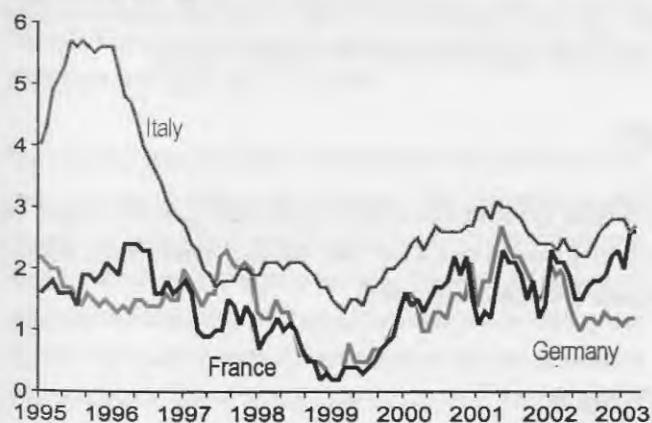


slowed considerably in quarter four. Germany's growth rate remains below the EU average with quarterly GDP being below the quarterly GDP growth rate of the EU as a whole in every quarter of 2002.

Having grown strongly in quarters one and three the IOP contracted by 0.5 per cent in quarter four. This was dominated by a very large contraction in December of 3.0 per cent although this has since rebounded in January and February 2003. Overall in 2002, the index fell by 1.1 per cent. Growth in the index has been subdued since 2001, when it grew by only 0.5 per cent, compared to growth of 6.2 per cent in 2000.

The CPI shows consumer prices growing by 1.2 per cent in the year to March, the same as the previous month and down from growth of 2.1 per cent growth seen at the start of 2002. Figures for the PPI for the same period show prices at the factory gate increasing by 1.7 per cent in the year to March, a slight reduction of 0.2 percentage points over the previous month. However, this is a significant increase when compared to growth in the index of 0.9 per cent in December 2002. The deceleration in the growth of the index may reflect the fall in oil prices. Despite this, Germany has the lowest consumer price inflation of the large Euro economies (figure 2).

**Figure 2**  
CPI: Germany, France & Italy  
month on a year ago



Unemployment in Germany continues to increase steadily, with the rate in February at 8.7 per cent, up from 8.0 per cent at the start of 2002. There has been a gradual increase in the unemployment rate from the recent trough of 7.6 per cent in quarter one 2001. Similarly employment growth contracted for the fifth consecutive quarter in the fourth quarter of 2002, with annual growth figures for the quarter showing a decline of 0.9 per cent, accelerating from a decline of 0.7 per cent in the previous quarter.

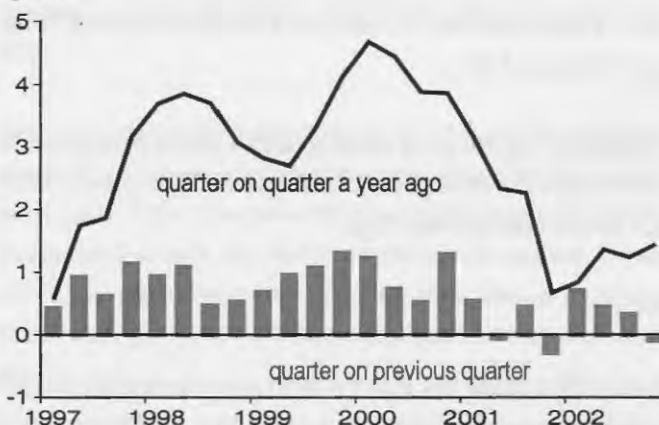
Having hovered between 1.0 per cent and 1.1 per cent between 2001 quarter three and 2002 quarter two and despite the increase in unemployment, earnings growth has picked up in the year to the fourth quarter, growing by 2.4 per cent, the largest growth in earnings since

2000 quarter four.

## France

GDP growth in the fourth quarter of 2002 has been revised down from 0.3 per cent to a contraction of 0.1 per cent (figure 3). Overall in 2002, the economy grew by 1.2 per cent, the lowest growth rate since 1996.

**Figure 3**  
GDP: France  
growth



This revision reflects a larger contraction in investment, which was more than double the initial estimate. This is the largest fall in the contribution to quarterly GDP growth by investment since 1997 quarter one and the largest annual decline since 1993. The accounts also incorporated smaller revisions to the other components of GDP.

The French economy has slowed significantly over the last two years, in line with global trends, although it outperformed the EU in the first two quarters of 2002. Consumer spending (helped by recent income tax cuts of five per cent in September) and government consumption supported the economy in 2002 as a whole and quarter four. This was offset by falls in investment and stocks (which has made a negative contribution to quarterly GDP in five of the last eight quarters).

Industrial production contracted in France in the latest quarter, by 0.1 per cent, the second consecutive quarter of negative growth in the index. Quarter four's contraction was driven by a sharp fall in December, which wiped out the November rise, although the index has rebounded again in January and the month on month growth of 0.6 per cent in February is the highest since February 2001. Overall in 2002, the IOP contracted by 0.9 per cent having made an equivalent positive contribution to annual GDP growth in the previous year.

Consumer price inflation has continued to rise steadily since the second half of 2002. Growth in the index in the year to March remained unchanged over the previous month at 2.6 per cent, the highest growth since June

1992. The increase was due to a rise in the prices of clothing and footwear oil prices and fresh food products. Similarly, producer prices have been rising since the second half of 2002, having fallen in the previous five months. The PPI increased from 0.7 per cent in February to 0.9 per cent in March.

The French unemployment rate, like most major economies has also been rising steadily over the past year and now stands at 9.1 per cent of the workforce in February; this rate was last seen in August 2000. Employment growth also continued its slowdown in the fourth quarter of 2002, with an annual rate of 0.4 per cent, well down on growth of 2.3 per cent at the start of 2001.

Following on from the labour market conditions, annual earnings growth continued to ease, slowing from 4.1 per cent in the fourth quarter of 2001 to 3.4 in the fourth quarter of 2002.

## Italy

Data for 2002 quarter four show the Italian economy growing by 0.4 per cent, following growth of 0.3 per cent in quarter three. The Italian economy is alone in the major economies in seeing a small acceleration of growth through 2002. Overall in 2002, the economy grew by 0.4 per cent compared to growth of 1.8 per cent in the previous year and down from 3.1 per cent in 2000.

Unlike France and Germany where consumer demand has been fairly weak, in Italy it was strong in the last two quarters of 2002. It was the main driver of growth in quarters three and four, contributing 0.5 percentage points and 0.6 percentage points to quarterly GDP growth respectively. Also while investment was contracting in most major economies, in Italy investment demand has also supported GDP growth strongly in the last two quarters of 2002 and made a positive contribution to GDP in 2002 of 0.1 per cent.

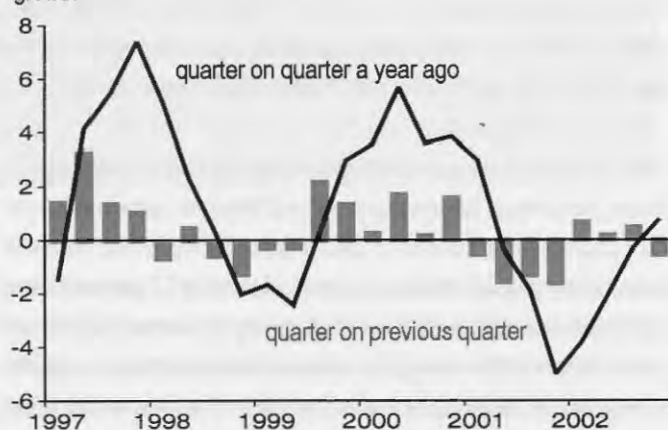
However, these contributions were offset by weak or negative growth in government demand and trade.

Having grown in the first three quarters of the year, the IOP contracted in the fourth quarter by 0.6 per cent (figure 4). Industrial production contracted for all four quarters of 2001. Annual figures show that for 2002 as a whole, the index contracted by 1.3 per cent, following a contraction of 1.0 per cent in the previous year. More generally, the IOP has contracted in Italy in four years out of the last seven.

Inflation in Italy had stabilised at 2.8 per cent for the three months since November. It fell by 0.2 percentage points in February to 2.6 per cent but has increased slightly in March to 2.7 per cent. The PPI grew in the

second half of 2002 and has continued to grow in 2003 with the index growing from 2.4 per cent in January to 2.8 per cent in February and March. Italy has the highest inflation of the largest EU economies.

**Figure 4**  
IOP: Italy  
growth



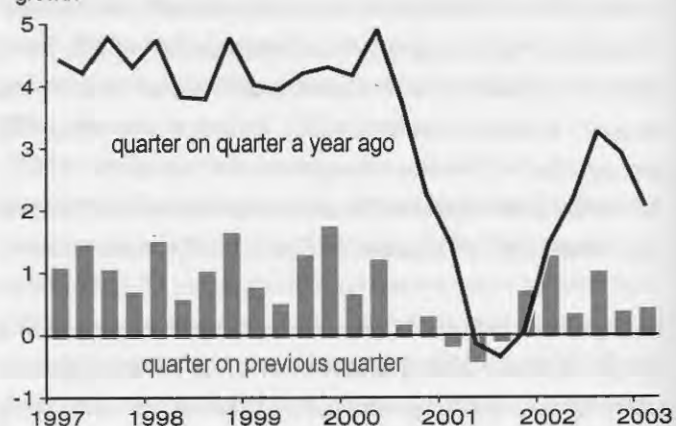
Figures on the Italian labour market show unemployment in 2002 broadly flat at 9.0 per cent, but an improvement on 9.5 per cent in 2001. Employment growth was 0.9 per cent in the year to the fourth quarter of 2002 down from growth of 1.3 per cent in the year to quarter three.

Earnings growth picked up in the year to the fourth quarter to 2.8 per cent, but the figures are volatile from quarter to quarter.

## USA

The latest figures for the US economy for 2003 quarter one show the economy growing by 0.4 per cent, following growth in the previous quarter of 0.3 per cent (figure 5).

**Figure 5**  
GDP : USA  
growth



Growth in 2003 quarter one was driven by personal consumption, which was also the main driver throughout 2002. Growth was also impacted positively by the substantial decline in imports which had been fairly strong especially in 2002 quarter two. However all contributors to quarterly GDP growth were weak or negative and the impetus of the early quarters of 2002 seems to have stalled. More generally, quarterly GDP growth in 2002 has been well below growth rates seen in the 1990s although performance has been better than in every quarter in 2001 except quarter four. Overall, growth in 2002 was 2.4 per cent, driven mainly by strong consumer spending (stimulated in part by interest free credit on car deals) and strong government demand.

The index of production which contracted in quarter four for the first time in 2002, by 0.9 per cent has expanded slightly in quarter one due mainly to fairly strong growth in the index in January of 0.8 per cent. Overall in 2002, the index contracted by 0.8 per cent which although negative is an improvement over the previous year's 3.5 per cent contraction.

Inflationary pressures had remained subdued since January 2002 and only started increasing in October. This increase has been more marked since January 2003. Inflation rose from 2.6 per cent in January to 3.1 per cent in March, the highest rate since June 2001. Much of this increase is due to energy costs. The Producer prices index also shows prices increasing substantially at the factory gate in March by 4.6 per cent (the highest rate since July 2000) compared to an increase in February of 4.3 per cent.

The US saw a sharp increase in unemployment in 2001 from 4.1 per cent in January to 5.8 per cent in December. The deterioration slowed somewhat in the first three months of 2002, but the volatility in the figures since then offers no clear signs of recovery. The latest data shows the unemployment rate rising to 6.0 per cent in December and falling back slightly in 2003, with the rate in March at 5.8 per cent, the same as the previous month. Annual figures show that for 2002, unemployment was 5.8 per cent up from 4.8 per cent in the previous year.

Average earnings growth in the year to the first quarter was 2.7 per cent, the same as the previous quarter but down from growth of 4.0 per cent at the start of 2002. Earnings growth has declined continuously since then possibly due to the deterioration in labour market conditions, which began in 2001.

## Japan

The Japanese economy grew by 0.5 per cent in the fourth quarter of 2002, following growth of 0.8 per cent in the previous quarter.

Japan has had low or negative GDP growth since 1997 (except in 2000 when growth was 2.7 per cent, although this was still below the growth rates for most major economies for that year). Annual figures for 2002 shows the economy growing by just 0.3 per cent, similar to the previous year. The stronger growth in the later quarters of 2002 has been driven by a combination of stronger consumer demand (although this fell back again in 2002 quarter four), substantial stockbuilding in quarters two and three and a fairly strong rebound in exports. Consumer demand had been weak especially in the three years prior to 2001 possibly due to falling prices. Export growth has also been low due in part to the global economic slowdown. Investment spending contracted in 1998, 1999, 2001 and 2002.

The index of production grew by 0.5 per cent in quarter four following growth of 2.0 per cent in the previous quarter. The index has grown in every quarter of 2002. This performance is a significant improvement over the previous year when the index contracted in all four quarters. Overall in 2002, the index contracted by 1.3 per cent, which, although negative, is a substantial improvement over the previous year's contraction of 6.2 per cent.

Consumer and producer price falls continue the deflation that began in mid-1998. Figures for the year to March show the consumer prices index falling by 0.1 per cent although the declines are at a decreasing rate. Producer prices also show a similar story.

The slight improvement in the unemployment rate in February has been reversed in March and the rate is now 0.2 percentage points higher at 5.4 per cent of the workforce (figure 6). Recent rates of unemployment are very high by historical standards for Japan (unprecedented since 1960 when OECD records began). Employment growth is negative, declining by 0.8 per cent in the year to 2003 quarter one.

**Figure 6**  
**Unemployment: Japan**  
percentage of the workforce





Despite the present unemployment situation, earnings growth declines have been reversed in quarter four to show a moderate increase in earnings of 0.1 per cent in the year to the fourth quarter. This is a significant improvement over the previous quarter when earnings were 2.2 per cent lower than in the same quarter of the previous year.

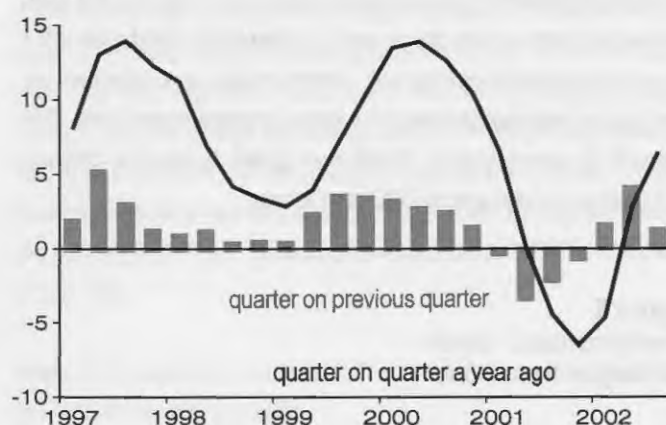
## World Trade

Some data for world trade now extends to quarter three and generally shows a fall back in trade from the levels seen in the first half of 2002.

Growth in total manufactures exports slowed considerably from 3.8 per cent in quarter two to 1.7 per cent in quarter three. The slowdown was primarily due to slowing export growth in OECD countries (figure 7). On the export of goods side, OECD exports slowed from 3.8 per cent in quarter two to just 1.3 per cent in quarter three.

Import data for quarter three is only available for OECD countries and shows that import of manufactures also slowed considerably from 3.7 per cent to 1.9 per cent. Similarly, imports of goods data shows OECD imports slowing from 3.2 per cent in quarter two to 1.7 per cent in quarter three.

**Figure 7**  
OECD exports of manufactures  
growth



## Notes

The series presented here are taken from the OECD's Main Economic Indicators and are shown for each of the G7 (except the UK) economies and for the European Union (EU15) countries in aggregate. The definitions and methodologies used conform to SNA 93.

Comparisons of indicators over the same period should be treated with caution, as the length and timing of the economic cycles varies across countries. For world trade, goods includes manufactures, along with food, beverages and tobacco, basic materials and fuels.

Data for EU15, France, Germany, Italy, the USA and Japan are all available on an SNA93 basis. Cross country comparisons are now

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# 1 European Union 15

Contribution to change in GDP

	GDP	PFC	GFC	GFCF	ChgStk <sup>1</sup>	Exports	less Imports	IoP	Sales	CPI	PPI	Earnings	Empl	Unempl
Percentage change on a year earlier														
	ILGB	HUDS	HUDT	HUDU	HUDV	HUDW	HUDX	ILGV	ILHP	HYAB	ILAI	ILAR	ILIJ	GADR
1998	2.9	1.9	0.3	1.3	0.4	2.1	3.1	3.8	2.8	1.7	-0.3	2.8	1.9	9.4
1999	2.8	2.1	0.4	1.1	-0.2	1.8	2.4	1.8	1.9	1.2	-	2.7	1.9	8.7
2000	3.6	1.8	0.4	1.0	-0.1	4.3	3.9	4.6	2.3	2.4	4.6	3.3	1.9	7.8
2001	1.6	1.3	0.4	-	-0.4	0.9	0.6	0.1	2.1	2.4	1.2	3.0	1.3	7.3
2002	-	-	-	-	-	-	-	-1.0	1.1	2.1	0.2	-	-	7.6
1999 Q4	3.8	2.1	0.4	1.2	-	3.3	3.4	4.3	2.5	1.6	2.3	2.7	1.8	8.4
2000 Q1	3.9	1.8	0.4	1.1	-0.1	4.3	3.7	4.2	2.3	2.1	4.1	3.6	1.7	8.1
Q2	4.1	2.2	0.4	1.2	-	4.4	4.1	5.5	3.5	2.1	4.7	3.6	1.9	7.9
Q3	3.4	1.8	0.4	1.0	-	4.3	4.1	4.7	2.1	2.5	4.8	2.6	1.8	7.7
Q4	2.9	1.5	0.4	0.9	-0.2	4.2	3.9	4.1	1.6	2.6	4.8	3.5	2.1	7.5
2001 Q1	2.5	1.4	0.4	0.5	-0.3	3.1	2.6	4.1	2.8	2.4	3.2	2.6	1.9	7.4
Q2	1.8	1.2	0.3	0.2	-0.2	1.5	1.3	0.6	2.1	2.8	2.3	3.4	1.4	7.3
Q3	1.5	1.2	0.4	-0.1	-0.4	0.2	-0.2	-0.7	2.1	2.5	0.8	3.4	1.2	7.3
Q4	0.8	1.2	0.4	-0.4	-0.7	-1.1	-1.4	-3.4	1.4	2.0	-0.9	2.5	0.8	7.4
2002 Q1	0.6	0.7	0.5	-0.6	-0.1	-1.1	-1.2	-3.0	0.9	2.2	-0.6	3.4	0.7	7.4
Q2	0.9	0.7	0.6	-0.7	-0.3	0.2	-0.4	-1.1	0.9	1.9	-0.3	2.5	0.7	7.6
Q3	1.1	0.8	0.5	-0.4	-0.1	1.1	0.8	-0.4	1.2	1.9	0.4	3.3	0.5	7.6
Q4	-	-	-	-	-	-	-	0.8	1.2	2.4	1.2	-	-	7.7
2003 Q1	-	-	-	-	-	-	-	-	-	2.5	1.9	-	-	-
2002 Apr	-	-	-	-	-	-	-	-1.0	0.9	2.1	-0.2	-	-	7.5
May	-	-	-	-	-	-	-	-1.0	0.9	1.9	-0.3	-	-	7.6
Jun	-	-	-	-	-	-	-	-1.2	0.9	1.8	-0.5	-	-	7.6
Jul	-	-	-	-	-	-	-	0.1	0.9	1.9	0.2	-	-	7.6
Aug	-	-	-	-	-	-	-	-1.1	0.9	1.9	0.4	-	-	7.6
Sep	-	-	-	-	-	-	-	-0.3	1.8	1.9	0.6	-	-	7.7
Oct	-	-	-	-	-	-	-	1.0	2.7	2.2	1.0	-	-	7.7
Nov	-	-	-	-	-	-	-	1.7	0.9	2.5	1.1	-	-	7.7
Dec	-	-	-	-	-	-	-	-0.2	-	2.5	1.4	-	-	7.8
2003 Jan	-	-	-	-	-	-	-	0.7	1.8	2.4	1.7	-	-	7.9
Feb	-	-	-	-	-	-	-	1.5	1.8	2.6	2.1	-	-	7.9
Mar	-	-	-	-	-	-	-	-	-	2.4	1.9	-	-	-
Percentage change on previous quarter														
	ILGL	HUDY	HUDZ	HUEA	HUEB	HUEC	HUED	ILHF	ILHZ				ILIT	
1999 Q4	1.2	0.6	0.1	0.3	0.3	1.0	1.0	1.7	1.2				0.1	
2000 Q1	0.9	0.5	0.1	0.2	-0.2	1.2	1.0	0.1	-0.3				-0.4	
Q2	0.8	0.5	0.1	0.3	-	1.0	1.0	1.9	0.9				1.3	
Q3	0.5	0.2	0.1	0.2	-0.1	1.0	0.9	1.0	0.3				0.7	
Q4	0.6	0.2	0.1	0.2	0.1	0.9	0.9	1.1	0.6				0.4	
2001 Q1	0.5	0.5	0.1	-0.1	-0.3	0.1	-0.2	0.1	0.9				-0.6	
Q2	0.1	0.3	0.1	-0.1	-	-0.5	-0.3	-1.5	0.3				0.8	
Q3	0.2	0.2	0.1	-0.1	-0.3	-0.3	-0.6	-0.3	0.3				0.6	
Q4	-0.1	0.2	0.2	-0.1	-0.2	-0.4	-0.3	-1.7	-				-	
2002 Q1	0.4	-	0.1	-0.2	0.3	-	-0.1	0.5	0.4				-0.6	
Q2	0.4	0.3	0.1	-0.1	-0.1	0.8	0.5	0.4	0.3				0.8	
Q3	0.4	0.3	0.1	0.1	-0.1	0.6	0.6	0.4	0.6				0.3	
Q4	-	-	-	-	-	-	-	-0.4	-				-	
2003 Q1	-	-	-	-	-	-	-	-	-				-	
Percentage change on previous month														
								ILKF	ILKP					
2002 Apr								-	-					
May								-	-					
Jun								-	-					
Jul								0.4	-					
Aug								0.1	0.9					
Sep								-0.3	-					
Oct								-0.1	-					
Nov								0.3	-					
Dec								-1.2	-0.9					
2003 Jan								1.0	0.9					
Feb								0.7	0.9					
Mar								-	-					

GDP = Gross Domestic Product at constant market prices  
PFC = Private Final Consumption at constant market prices  
GFC = Government Final Consumption at constant market prices  
GFCF = Gross Fixed Capital Formation at constant market prices  
ChgStk = Change in Stocks at constant market prices  
Exports = Exports of goods and services  
Imports = Imports of goods and services  
IoP = Industrial Production

Sales = Retail Sales Volume  
CPI = Consumer Prices, measurement not uniform among countries  
PPI = Producer Prices (manufacturing)  
Earnings = Average Wage Earnings (manufacturing), definitions of coverage and treatment vary among countries  
Empl = Total Employment not seasonally adjusted  
Unempl = Standardised Unemployment rates: percentage of total labour force  
Source: OECD - SNA93

1 This series has been discontinued

## 2 Germany

### Contribution to change in GDP

	GDP	PFC	GFC	GFCF	ChgStk	Exports	Imports	less Imports	IoP	Sales	CPI	PPI	Earnings	Empl <sup>1</sup>	Unempl
<b>Percentage change on a year earlier</b>															
	ILFY	HUBW	HUBX	HUBY	HUBZ	HUCA	HUCB	ILGS	ILHM	HVLL	ILAF	ILAO	ILIG	GABD	
1998	1.7	0.9	0.4	0.5	0.3	1.8	2.2	4.2	1.0	1.0	-0.4	1.8	1.5	9.1	
1999	1.9	2.0	0.2	0.8	-0.4	1.5	2.3	1.5	0.4	0.6	-1.0	2.6	0.9	8.4	
2000	3.1	0.9	0.2	0.7	0.1	4.4	3.3	6.2	1.4	1.5	3.4	2.7	0.6	7.8	
2001	0.8	0.9	0.2	-1.1	-0.6	1.8	0.4	0.5	0.2	1.9	2.9	1.5	0.4	7.8	
2002	0.2	-0.3	0.3	-1.4	-	0.9	-0.7	-1.1	-2.2	1.5	-0.4	1.7	-0.6	8.2	
1999 Q4	3.3	1.9	0.2	1.2	-0.2	3.3	3.0	4.3	0.7	1.0	0.6	3.0	0.8	8.2	
2000 Q1	2.9	0.5	0.2	0.8	-0.1	4.4	2.8	5.1	-0.2	1.5	2.3	2.8	0.5	7.9	
Q2	4.5	1.9	0.3	0.9	0.2	4.2	2.9	6.7	4.4	1.1	2.6	2.4	0.8	7.8	
Q3	3.0	1.1	0.1	0.6	0.2	4.0	3.0	7.1	1.6	1.3	3.7	3.3	0.5	7.7	
Q4	1.9	0.3	0.4	0.4	0.3	4.9	4.4	5.8	-0.1	1.8	4.5	2.4	0.8	7.6	
2001 Q1	1.8	1.1	0.2	-0.4	-0.3	3.5	2.3	6.0	1.0	1.7	4.8	2.0	0.7	7.6	
Q2	0.7	0.8	0.2	-1.0	-0.3	2.3	1.4	1.4	-	2.5	4.7	2.0	0.6	7.7	
Q3	0.4	0.8	0.2	-1.5	-1.0	1.8	-0.1	-1.3	0.6	2.2	2.6	1.1	0.2	7.8	
Q4	0.1	0.9	-	-1.6	-0.9	-0.2	-1.8	-3.7	-0.7	1.6	0.3	1.0	-0.1	7.9	
2002 Q1	-0.2	-0.3	0.2	-1.4	-0.8	-	-2.0	-3.7	-3.2	1.9	-0.2	1.1	-0.2	8.0	
Q2	-0.1	-0.7	0.4	-1.8	0.1	0.6	-1.3	-1.9	-2.4	1.3	-0.9	1.0	-0.5	8.2	
Q3	0.5	-0.4	0.4	-1.4	0.5	1.3	-	-0.3	-1.5	1.1	-1.0	2.1	-0.7	8.3	
Q4	0.7	-0.1	0.2	-1.0	0.4	1.8	0.6	1.5	-1.9	1.2	0.5	2.4	-0.9	8.4	
2003 Q1	..	..	..	..	..	..	..	..	..	1.2	1.7	..	..	..	
2002 Apr	..	..	..	..	..	..	..	-1.6	-1.6	1.5	-0.8	..	..	8.0	
May	..	..	..	..	..	..	..	-3.1	-2.6	1.2	-0.9	..	..	8.2	
Jun	..	..	..	..	..	..	..	-1.2	-3.0	1.0	-1.1	..	..	8.3	
Jul	..	..	..	..	..	..	..	-	-1.7	1.2	-1.0	..	..	8.2	
Aug	..	..	..	..	..	..	..	-0.4	-2.0	1.2	-1.0	..	..	8.3	
Sep	..	..	..	..	..	..	..	-0.5	-0.8	1.1	-0.9	..	..	8.3	
Oct	..	..	..	..	..	..	..	0.8	1.0	1.3	0.3	..	..	8.4	
Nov	..	..	..	..	..	..	..	3.8	-4.0	1.2	0.4	..	..	8.4	
Dec	..	..	..	..	..	..	..	-	-2.6	1.2	0.9	..	..	8.5	
2003 Jan	..	..	..	..	..	..	..	1.7	1.3	1.1	1.6	..	..	8.6	
Feb	..	..	..	..	..	..	..	2.6	0.9	1.2	1.9	..	..	8.7	
Mar	..	..	..	..	..	..	..	..	..	1.2	1.7	..	..	..	
<b>Percentage change on previous quarter</b>															
	ILGI	HUCC	HUCD	HUCE	HUCF	HUCG	HUCH	ILHC	ILHW					ILIQ	
1999 Q4	1.1	0.5	0.1	-0.1	0.2	0.7	0.3	1.5	1.8					0.6	
2000 Q1	0.7	-	0.1	0.3	-	1.4	1.1	0.7	-0.1					-1.8	
Q2	1.1	0.8	-0.1	0.2	-	0.9	0.8	2.6	1.1					1.1	
Q3	-	-0.1	-0.1	0.2	-	0.9	0.8	2.1	-1.3					0.7	
Q4	0.1	-0.3	0.4	-0.2	0.3	1.6	1.7	0.3	0.1					0.9	
2001 Q1	0.6	0.8	-0.1	-0.6	-0.5	-	-1.0	0.9	1.0					-1.9	
Q2	-	0.5	-	-0.3	-0.1	-0.2	-0.1	-1.8	0.2					1.0	
Q3	-0.2	-0.1	-	-0.4	-0.7	0.3	-0.7	-0.6	-0.7					0.3	
Q4	-0.3	-0.3	0.2	-0.3	0.4	-0.4	-	-2.2	-1.1					0.6	
2002 Q1	0.3	-0.4	0.1	-0.4	-0.4	0.2	-1.1	0.9	-1.6					-2.0	
Q2	0.1	0.1	0.1	-0.7	0.7	0.4	0.5	-	1.0					0.7	
Q3	0.3	0.2	-	-	-0.3	1.0	0.7	1.1	0.2					0.1	
Q4	-	-	-0.1	0.2	0.3	0.1	0.6	-0.5	-1.5					0.4	
2003 Q1	..	..	..	..	..	..	..	..	..					..	
<b>Percentage change on previous month</b>															
								ILKC	ILKM						
2002 Apr								-	1.0						
May								-1.2	0.1						
Jun								1.8	-1.1						
Jul								-0.1	0.6						
Aug								1.2	0.2						
Sep								-1.2	0.5						
Oct								-0.4	-0.2						
Nov								2.1	-2.4						
Dec								-3.0	-0.3						
2003 Jan								2.6	2.3						
Feb								0.6	0.1						
Mar								..	..						

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Sales = Retail Sales volume  
CPI = Consumer Prices measurement not uniform among countries  
PPI = Producer Prices (manufacturing)  
Earnings = Average Earnings (manufacturing), definitions of coverage and treatment vary among countries  
Empl = Total Employment not seasonally adjusted  
Unempl = Standardised Unemployment rates: percentage of total workforce  
Source: OECD - SNA93

1 Excludes members of armed forces

# 3 France

## Contribution to change in GDP

	GDP	PFC	GFC	GFCF	ChgStk	Exports	less Imports	IoP	Sales	CPI	PPI <sup>1</sup>	Earnings	Empl <sup>2</sup>	Unempl
<b>Percentage change on a year earlier</b>														
	ILFZ	HUBK	HUBL	HUBM	HUBN	HUBO	HUBP	ILGT	ILHN	HXAA	ILAG	ILAP	ILIH	GABC
1998	3.6	1.9	—	1.3	0.8	2.1	2.6	5.2	2.6	0.8	-0.9	2.2	2.0	11.4
1999	3.3	1.9	0.3	1.6	-0.3	1.1	1.5	1.9	2.4	0.5	-1.6	2.5	2.2	10.7
2000	4.2	1.6	0.7	1.7	0.5	3.6	3.8	3.6	0.5	1.7	2.1	5.2	2.8	9.3
2001	2.1	1.6	0.6	0.4	-0.7	0.5	0.4	0.9	-0.2	1.7	1.5	4.2	1.7	8.5
2002	1.2	0.8	1.0	-0.3	-0.4	0.4	0.2	-0.9	—	1.9	0.1	3.6	0.5	8.7
1999 Q4	4.1	1.9	0.6	1.7	—	2.2	2.3	4.3	2.1	1.0	—	3.4	2.5	10.2
2000 Q1	4.7	2.1	0.6	1.9	0.3	3.1	3.2	3.8	1.9	1.5	1.2	5.2	2.6	9.8
Q2	4.5	1.7	0.7	1.8	0.2	3.9	3.8	3.8	1.4	1.5	2.1	5.4	2.9	9.4
Q3	3.9	1.4	0.7	1.4	1.0	3.4	4.1	3.7	0.1	1.9	2.7	5.2	2.8	9.1
Q4	3.9	1.2	0.7	1.5	0.5	3.8	4.0	2.7	-1.3	1.9	2.4	5.0	2.7	8.8
2001 Q1	3.2	1.5	0.6	1.0	-0.3	2.7	2.4	2.7	1.1	1.2	2.5	4.3	2.3	8.6
Q2	2.3	1.5	0.6	0.5	—	0.8	0.9	1.7	-0.4	2.1	1.8	4.2	1.9	8.5
Q3	2.3	1.7	0.8	0.4	-1.0	0.1	-0.3	1.5	-0.7	1.9	1.1	4.2	1.4	8.5
Q4	0.7	1.5	0.7	-0.2	-1.4	-1.4	-1.5	-2.1	-0.8	1.4	0.6	4.1	1.1	8.6
2002 Q1	0.8	0.9	0.9	-0.3	-0.5	-0.8	-0.6	-1.7	-1.6	2.2	-0.2	3.9	0.7	8.6
Q2	1.4	0.9	1.0	-0.1	-0.8	0.5	0.1	-0.7	-0.6	1.6	-0.1	3.9	0.5	8.7
Q3	1.2	0.7	1.0	-0.3	-0.2	0.7	0.5	-1.9	1.0	1.8	0.3	3.5	0.5	8.8
Q4	1.4	0.8	1.0	-0.5	-0.2	1.1	0.7	0.4	1.0	2.2	0.3	3.4	0.4	8.9
2003 Q1	..	..	..	..	..	..	..	..	-0.7	2.4	0.7	..	..	..
2002 Apr	..	..	..	..	..	..	..	-0.3	-0.6	1.9	-0.1	..	..	8.7
May	..	..	..	..	..	..	..	-0.9	2.0	1.5	-0.1	..	..	8.7
Jun	..	..	..	..	..	..	..	-1.0	-3.1	1.5	-0.1	..	..	8.7
Jul	..	..	..	..	..	..	..	-2.4	1.7	1.7	0.3	..	..	8.7
Aug	..	..	..	..	..	..	..	-2.0	2.7	1.8	0.4	..	..	8.8
Sep	..	..	..	..	..	..	..	-1.4	1.8	1.8	0.4	..	..	8.8
Oct	..	..	..	..	..	..	..	—	3.0	1.9	0.4	..	..	8.8
Nov	..	..	..	..	..	..	..	1.5	2.1	2.2	0.3	..	..	8.9
Dec	..	..	..	..	..	..	..	-0.1	-1.8	2.3	0.4	..	..	8.9
2003 Jan	..	..	..	..	..	..	..	1.1	3.0	2.0	0.5	..	..	9.0
Feb	..	..	..	..	..	..	..	2.0	-0.7	2.6	0.7	..	..	9.1
Mar	..	..	..	..	..	..	..	..	-4.5	2.6	0.9	..	..	..
<b>Percentage change on previous quarter</b>														
	ILGJ	HUBQ	HUBR	HUBS	HUBT	HUBU	HUBV	ILHD	ILHX				ILIR	
1999 Q4	1.3	0.5	0.2	0.4	0.6	0.6	1.0	2.1	1.0				0.7	
2000 Q1	1.2	0.5	0.2	0.6	0.1	1.0	1.1	-0.3	-0.2				0.8	
Q2	0.7	0.2	0.2	0.4	-0.1	1.1	1.0	0.5	-0.7				0.7	
Q3	0.5	0.2	0.1	0.1	0.4	0.7	1.0	1.4	—				0.6	
Q4	1.3	0.3	0.2	0.5	0.1	1.0	0.9	1.1	-0.4				0.6	
2001 Q1	0.6	0.7	0.1	0.1	-0.7	-0.2	-0.5	-0.3	2.3				0.4	
Q2	-0.1	0.2	0.1	-0.2	0.1	-0.8	-0.4	-0.4	-2.2				0.3	
Q3	0.5	0.5	0.3	—	-0.6	0.1	-0.3	1.1	-0.3				0.2	
Q4	-0.3	0.1	0.1	-0.1	-0.2	-0.5	-0.4	-2.4	-0.5				0.3	
2002 Q1	0.7	0.1	0.3	—	0.3	0.4	0.5	0.1	1.4				—	
Q2	0.5	0.2	0.3	-0.1	-0.2	0.6	0.3	0.6	-1.2				0.1	
Q3	0.3	0.3	0.2	-0.1	—	0.2	0.2	-0.2	1.3				0.1	
Q4	-0.1	0.2	0.2	-0.3	-0.2	-0.1	-0.2	-0.1	-0.5				0.2	
2003 Q1	..	..	..	..	..	..	..	..	-0.3				..	
<b>Percentage change on previous month</b>														
								ILKD	ILKN					
2002 Apr								0.4	-2.0					
May								-0.4	1.4					
Jun								—	-2.4					
Jul								-0.2	3.1					
Aug								0.3	1.0					
Sep								-0.3	-3.8					
Oct								—	2.8					
Nov								0.9	—					
Dec								-1.7	-2.7					
2003 Jan								1.6	4.1					
Feb								0.6	-1.9					
Mar								..	-3.8					

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Empl = Total Employment not seasonally adjusted  
Unempl = Standardised Unemployment rates: percentage of total workforce  
IoP = Index of Production

1 Producer prices in manufactured goods  
2 Excludes members of armed forces

Source: OECD - SNA93

## Contribution to change in GDP

	GDP	PFC	GFC	GFCF	ChgStk	Exports	Imports	loP	Sales	CPI	PPI	Earnings	Empl	Unempl
Percentage change on a year earlier														
	ILGA	HUCI	HUCJ	HUCK	HUCL	HUCM	HUCN	ILGU	ILHO	HYAA	ILAH	ILAQ	ILII	GABE
1998	1.8	1.9	—	0.7	0.3	1.0	2.1	1.3	1.0	2.0	0.1	3.0	1.1	11.7
1999	1.7	1.6	0.2	1.0	0.3	—	1.4	-0.2	0.8	1.7	-0.2	1.8	1.2	11.3
2000	3.1	1.7	0.3	1.4	-1.1	3.3	2.4	4.1	-0.8	2.5	6.0	2.0	1.9	10.4
2001	1.8	0.7	0.6	0.6	—	0.3	0.3	-1.0	-0.1	2.7	1.9	1.9	2.0	9.5
2002	0.4	0.2	0.3	0.1	0.4	-0.3	0.4	-1.3	-0.6	2.5	0.2	2.6	1.4	9.0
1999 Q4	3.1	1.4	0.2	1.5	-0.1	2.1	2.1	3.0	2.2	2.1	2.2	1.5	1.4	11.0
2000 Q1	3.4	1.5	0.2	1.6	-1.3	4.0	2.6	3.6	-1.9	2.4	4.7	1.6	1.0	10.9
Q2	3.3	1.9	0.2	1.6	-0.9	3.0	2.6	5.7	—	2.6	6.2	2.6	1.6	10.5
Q3	3.0	1.7	0.3	1.6	-1.4	3.6	2.6	3.6	1.3	2.6	6.7	1.9	2.1	10.3
Q4	2.9	1.6	0.4	0.9	-0.8	2.6	1.8	3.8	-2.5	2.6	6.5	1.8	2.8	9.9
2001 Q1	2.6	1.2	0.5	0.8	-0.5	1.8	1.2	3.0	1.6	2.9	4.7	2.2	3.2	9.7
Q2	2.3	0.9	0.6	0.6	-0.2	1.5	1.1	-0.4	-0.3	3.0	3.2	1.3	2.0	9.5
Q3	1.7	0.4	0.6	0.4	0.8	-0.8	-0.4	-1.9	-1.0	2.8	1.1	2.0	1.8	9.4
Q4	0.7	—	0.6	0.4	-0.2	-1.0	-0.8	-5.0	-0.6	2.5	-1.1	2.1	1.2	9.2
2002 Q1	—	-0.2	0.5	-0.3	1.5	-3.0	-1.5	-3.8	-0.3	2.4	-1.0	2.2	1.7	9.0
Q2	0.1	-0.2	0.4	-0.3	0.6	-0.7	-0.4	-2.1	-1.0	2.2	-0.6	3.1	1.9	9.0
Q3	0.4	0.5	0.3	0.3	-0.4	1.2	1.4	-0.3	-1.3	2.4	0.5	2.3	1.3	9.0
Q4	1.0	1.0	—	0.8	—	1.3	2.2	0.8	—	2.7	1.7	2.8	0.9	8.9
2003 Q1	..	..	..	..	..	..	..	..	..	2.7	2.6	..	..	..
2002 Apr	..	..	..	..	..	..	..	-2.9	-1.0	2.3	-0.8	3.1	..	9.0
May	..	..	..	..	..	..	..	-1.6	-1.0	2.3	-0.4	3.1	..	9.0
Jun	..	..	..	..	..	..	..	-1.7	-1.0	2.2	-0.4	3.2	..	9.0
Jul	..	..	..	..	..	..	..	-0.2	-1.0	2.2	0.4	2.2	..	9.0
Aug	..	..	..	..	..	..	..	-0.8	-1.0	2.4	0.5	2.2	..	9.0
Sep	..	..	..	..	..	..	..	0.2	-1.9	2.6	0.8	2.4	..	9.0
Oct	..	..	..	..	..	..	..	—	—	2.7	1.6	2.8	..	8.9
Nov	..	..	..	..	..	..	..	2.0	—	2.8	1.5	2.8	..	8.9
Dec	..	..	..	..	..	..	..	0.5	—	2.8	2.0	2.7	..	8.9
2003 Jan	..	..	..	..	..	..	..	0.4	-1.0	2.8	2.4	..	..	9.0
Feb	..	..	..	..	..	..	..	-0.9	—	2.6	2.8	..	..	..
Mar	..	..	..	..	..	..	..	..	..	2.7	2.8	..	..	..
Percentage change on previous quarter														
	ILGK	HUCO	HUCP	HUCQ	HUCR	HUCS	HUCT	ILHE	ILHY				ILIS	
1999 Q4	1.1	0.4	—	0.6	0.1	1.1	1.1	1.4	2.6				-0.1	
2000 Q1	1.0	0.6	0.1	0.4	-0.6	1.6	1.1	0.3	-4.1				-1.2	
Q2	0.4	0.4	—	0.4	0.2	-0.5	—	1.7	2.3				1.6	
Q3	0.6	0.3	0.1	0.2	-1.0	1.3	0.3	0.2	0.6				1.9	
Q4	0.9	0.4	0.2	-0.1	0.7	0.1	0.3	1.6	-1.3				0.6	
2001 Q1	0.7	0.1	0.2	0.4	-0.4	0.9	0.5	-0.6	—				-0.8	
Q2	—	0.1	0.1	0.2	0.5	-0.8	—	-1.6	0.3				0.4	
Q3	—	-0.2	0.1	—	—	-1.0	-1.2	-1.3	—				1.7	
Q4	-0.1	—	0.2	-0.1	-0.3	-0.1	-0.2	-1.6	-1.0				—	
2002 Q1	—	-0.2	0.1	-0.3	1.4	-1.1	-0.2	0.7	0.3				-0.4	
Q2	0.2	0.1	—	0.1	-0.5	1.5	1.0	0.2	-0.3				0.6	
Q3	0.3	0.5	—	0.6	-1.0	1.0	0.7	0.5	-0.3				1.1	
Q4	0.4	0.6	-0.1	0.4	0.1	—	0.6	-0.6	0.3				-0.4	
2003 Q1	..	..	..	..	..	..	..	..	..				..	
Percentage change on previous month														
								ILKE	ILKO					
2002 Apr								-1.1	—					
May								1.7	—					
Jun								-0.5	—					
Jul								1.0	—					
Aug								-1.2	—					
Sep								0.5	-1.0					
Oct								-0.7	1.0					
Nov								0.6	—					
Dec								-0.6	—					
2003 Jan								-0.1	-1.0					
Feb								-0.3	2.0					
Mar								..	..					

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Source: OECD - SNA93



## Contribution to change in GDP

	GDP	PFC	GFC	GFCF	ChgStk	Exports	Imports	less IoP	Sales	CPI	PPI	Earnings	Empl <sup>1</sup>	Unempl
<b>Percentage change on a year earlier</b>														
	ILGC	HUDG	HUDH	HUDI	HUDJ	HUDK	HUDL	ILGW	ILHQ	ILAA	ILAJ	ILAS	ILIK	GADO
1998	4.3	3.2	0.2	2.0	0.2	0.3	1.6	5.6	7.1	1.6	-1.1	2.5	1.5	4.5
1999	4.1	3.3	0.4	1.6	-0.2	0.4	1.6	4.2	8.8	2.1	1.8	2.9	1.5	4.2
2000	3.8	2.9	0.4	1.2	-	1.1	2.0	4.7	5.5	3.4	4.1	3.5	2.5	4.0
2001	0.3	1.7	0.5	-0.6	-1.4	-0.7	-0.5	-3.5	4.8	2.8	0.7	3.2	-	4.8
2002	2.4	2.2	0.6	-0.4	0.7	-0.2	0.6	-0.8	5.3	1.5	-0.6	3.2	-0.3	5.8
1999 Q4	4.3	3.3	0.5	1.3	0.1	0.6	1.7	5.0	8.2	2.6	3.2	3.6	1.5	4.1
2000 Q1	4.2	3.4	0.4	1.6	-0.4	1.0	2.0	5.2	7.8	3.2	4.6	4.2	2.8	4.0
Q2	4.9	3.0	0.6	1.4	0.7	1.3	2.2	6.0	5.8	3.3	4.4	3.3	2.8	4.0
Q3	3.7	2.9	0.4	1.0	0.2	1.4	2.2	4.8	5.2	3.5	3.9	2.9	2.3	4.1
Q4	2.3	2.4	0.3	0.7	-0.4	0.9	1.7	2.7	3.5	3.4	3.3	3.5	2.3	3.9
2001 Q1	1.5	1.9	0.5	0.1	-0.8	0.4	0.8	-0.2	2.9	3.4	2.1	2.6	0.8	4.2
Q2	-0.1	1.6	0.4	-0.5	-1.6	-0.4	-0.2	-3.4	4.5	3.4	2.1	3.5	0.1	4.5
Q3	-0.4	1.2	0.5	-0.9	-1.4	-1.3	-1.2	-4.6	3.8	2.7	0.6	3.4	-	4.8
Q4	0.1	1.9	0.7	-1.0	-1.7	-1.4	-1.4	-5.7	7.9	1.8	-1.5	3.4	-0.8	5.6
2002 Q1	1.4	2.0	0.7	-0.9	-	-1.1	-0.7	-3.8	5.9	1.2	-1.8	4.0	-1.2	5.6
Q2	2.2	2.1	0.7	-0.6	0.7	-0.4	0.4	-1.3	5.5	1.3	-1.7	3.4	-0.5	5.8
Q3	3.3	2.6	0.6	-0.2	0.9	0.3	1.1	0.8	7.0	1.5	-0.6	2.8	0.1	5.8
Q4	2.9	1.9	0.6	0.2	1.3	0.4	1.6	1.5	3.0	2.2	1.6	2.7	0.3	5.9
2003 Q1	2.1	1.6	0.5	0.1	0.4	0.2	0.9	1.1	4.2	2.9	4.0	2.7	1.0	5.8
2002 Apr	-	-	-	-	-	-	-	-2.1	5.8	1.6	-1.4	3.4	-0.8	5.9
May	-	-	-	-	-	-	-	-1.3	4.4	1.2	-2.2	3.4	-0.5	5.8
Jun	-	-	-	-	-	-	-	-0.3	6.2	1.1	-1.6	3.3	-0.5	5.8
Jul	-	-	-	-	-	-	-	0.6	6.9	1.5	-0.6	2.5	-0.5	5.8
Aug	-	-	-	-	-	-	-	0.6	6.5	1.8	-0.7	3.3	0.4	5.8
Sep	-	-	-	-	-	-	-	1.2	7.6	1.5	-0.5	2.5	0.4	5.7
Oct	-	-	-	-	-	-	-	1.0	0.3	2.1	1.5	3.3	0.5	5.8
Nov	-	-	-	-	-	-	-	1.8	3.5	2.2	1.5	2.5	0.2	5.9
Dec	-	-	-	-	-	-	-	1.5	5.3	2.3	1.9	2.4	0.3	6.0
2003 Jan	-	-	-	-	-	-	-	1.7	5.4	2.6	3.2	3.3	1.3	5.7
Feb	-	-	-	-	-	-	-	1.4	2.5	3.0	4.3	2.4	0.7	5.8
Mar	-	-	-	-	-	-	-	0.4	4.8	3.1	4.6	2.4	0.9	5.8
<b>Percentage change on previous quarter</b>														
	ILGM	HUDM	HUDN	HUDO	HUDP	HUDQ	HUDR	ILHG	ILIA				ILIU	
1999 Q4	1.7	0.8	0.2	0.2	0.5	0.4	0.4	1.6	2.0				0.3	
2000 Q1	0.6	0.9	-0.1	0.6	-0.5	0.2	0.5	1.3	2.2				0.7	
Q2	1.2	0.5	0.3	0.2	0.5	0.4	0.7	1.7	-0.4				1.2	
Q3	0.1	0.6	-	-	-0.3	0.3	0.5	0.1	1.3				0.1	
Q4	0.3	0.3	0.1	-0.1	-	-0.1	-0.1	-0.4	0.4				0.3	
2001 Q1	-0.2	0.4	0.2	-	-0.9	-0.2	-0.3	-1.6	1.6				-0.7	
Q2	-0.4	0.2	0.1	-0.4	-0.3	-0.4	-0.3	-1.5	1.2				0.5	
Q3	-0.1	0.2	0.1	-0.4	-	-0.6	-0.5	-1.2	0.5				-	
Q4	0.7	1.0	0.3	-0.2	-0.4	-0.3	-0.2	-1.5	4.3				-0.5	
2002 Q1	1.2	0.5	0.1	0.1	0.8	0.1	0.3	0.4	-0.2				-1.1	
Q2	0.3	0.3	0.1	-0.1	0.4	0.4	0.8	1.1	0.8				1.1	
Q3	1.0	0.7	0.1	-	0.1	0.1	0.1	0.9	2.0				0.6	
Q4	0.3	0.3	0.2	0.2	0.1	-0.2	0.3	-0.9	0.4				-0.4	
2003 Q1	0.4	0.2	-	-	-0.1	-0.1	-0.3	0.1	0.9				-0.4	
<b>Percentage change on previous month</b>														
								ILKG	ILKQ				ILLA	
2002 Apr								0.4	0.8				0.3	
May								0.3	-0.7				0.5	
Jun								0.3	1.6				0.5	
Jul								0.7	1.4				0.3	
Aug								-0.2	0.4				-0.2	
Sep								-0.1	-1.5				0.1	
Oct								-0.6	0.2				0.1	
Nov								0.2	0.8				-0.6	
Dec								-0.8	1.8				-	
2003 Jan								0.8	0.3				-0.5	
Feb								-0.1	-2.1				0.4	
Mar								-0.6	1.8				0.3	

GDP = Gross Domestic Product at constant market prices  
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GFC = Government Final Consumption at constant market prices  
GFCF = Gross Fixed Capital Formation at constant market prices  
ChgStk = Change in Stocks at constant market prices  
Exports = Exports of goods and services  
Imports = Imports of goods and services  
IoP = Industrial Production

Sales = Retail Sales volume  
CPI = Consumer Prices, measurement not uniform among countries  
PPI = Producer Prices (manufacturing)  
Earnings = Average Earnings (manufacturing), definitions of coverage and treatment vary among countries  
Empl = Total Employment not seasonally adjusted  
Unempl = Standardised Unemployment rates: percentage of total workforce  
Source: OECD - SNA93

<sup>1</sup> Excludes members of armed forces

## Contribution to change in GDP

	GDP	PFC	GFC	GFCF	ChgStk	Exports	less Imports	loP <sup>1</sup>	Sales	CPI	PPI	Earnings <sup>2</sup>	Empl	Unempl
<b>Percentage change on a year earlier</b>														
	ILGD	HUCU	HUCV	HUCW	HUCX	HUCY	HUCZ	ILGX	ILHR	ILAB	ILAK	ILAT	ILIL	GADP
1998	-1.2	—	0.3	-1.1	-0.6	-0.2	-0.6	-5.9	-6.0	0.7	-1.5	-0.9	-0.6	4.1
1999	0.2	0.1	0.7	-0.2	-0.3	0.1	0.2	0.6	-2.6	-0.3	-1.5	-0.7	-0.8	4.7
2000	2.7	0.5	0.7	0.7	0.3	1.3	0.7	5.1	-1.1	-0.7	0.1	1.7	-0.3	4.7
2001	0.4	1.0	0.4	-0.3	—	-0.7	—	-6.2	-1.2	-0.7	-2.3	—	-0.5	5.0
2002	0.3	0.8	0.4	-1.1	-0.4	0.8	0.2	-1.3	-3.1	-1.0	-2.0	-1.0	-1.3	5.4
1999 Q4	-0.5	-0.9	0.7	0.2	-0.2	0.7	0.8	4.4	-1.1	-1.0	-0.6	-0.3	-0.2	4.6
2000 Q1	1.3	0.3	0.6	—	-0.1	1.2	0.7	3.5	-2.2	-0.6	0.6	1.9	-0.5	4.8
Q2	1.9	0.2	0.9	0.2	0.1	1.4	0.8	6.3	-1.5	-0.7	0.4	2.1	-0.4	4.7
Q3	2.8	—	0.8	0.9	0.5	1.3	0.8	5.4	-0.4	-0.6	—	1.7	-0.4	4.7
Q4	5.1	1.4	0.8	1.9	0.6	1.2	0.8	5.1	-0.4	-0.8	-0.7	1.1	0.2	4.7
2001 Q1	3.5	1.1	0.7	1.2	1.0	0.2	0.7	1.5	2.3	-0.5	-1.9	0.3	0.5	4.7
Q2	1.1	1.1	0.4	0.3	0.1	-0.6	0.2	-4.4	-1.1	-0.7	-2.0	0.5	-0.4	4.9
Q3	-0.6	0.8	0.2	-0.4	-0.4	-1.0	-0.2	-9.1	-2.6	-0.8	-2.5	-0.2	-0.8	5.1
Q4	-2.4	0.7	0.4	-2.3	-0.6	-1.2	-0.6	-12.3	-3.4	-1.0	-2.8	-0.6	-1.3	5.4
2002 Q1	-2.8	0.4	0.4	-2.2	-1.6	-0.3	-0.5	-9.2	-4.4	-1.4	-2.6	-1.5	-1.5	5.3
Q2	-0.2	0.5	0.4	-1.4	-0.5	0.8	—	-3.6	-2.6	-0.9	-2.2	-0.8	-1.6	5.4
Q3	1.7	1.3	0.5	-1.0	0.2	1.1	0.5	2.7	-2.7	-0.8	-2.2	-2.2	-1.0	5.4
Q4	2.8	1.0	0.2	0.3	0.3	1.8	0.8	5.9	-2.7	-0.5	-1.2	0.1	-1.1	5.4
2003 Q1	..	..	..	..	..	..	..	..	-1.2	-0.2	-0.9	..	-0.8	5.4
2002 Apr	..	..	..	..	..	..	..	-7.2	-2.3	-1.1	-2.3	0.1	-1.4	5.3
May	..	..	..	..	..	..	..	-1.6	-2.3	-0.9	-2.2	-0.4	-1.9	5.4
Jun	..	..	..	..	..	..	..	-1.7	-3.4	-0.7	-2.1	-1.8	-1.4	5.4
Jul	..	..	..	..	..	..	..	0.7	-4.5	-0.8	-2.3	-4.9	-1.2	5.4
Aug	..	..	..	..	..	..	..	2.3	-1.1	-0.9	-2.3	-2.8	-1.1	5.5
Sep	..	..	..	..	..	..	..	5.1	-2.3	-0.7	-2.1	1.3	-0.7	5.4
Oct	..	..	..	..	..	..	..	5.2	-2.3	-0.9	-1.4	1.0	-0.8	5.5
Nov	..	..	..	..	..	..	..	6.8	-2.3	-0.4	-1.2	0.5	-1.3	5.3
Dec	..	..	..	..	..	..	..	5.4	-3.5	-0.3	-1.2	-1.3	-1.1	5.5
2003 Jan	..	..	..	..	..	..	..	8.0	-2.3	-0.4	-1.0	1.2	-1.0	5.5
Feb	..	..	..	..	..	..	..	4.9	—	-0.2	-0.9	1.7	-0.9	5.2
Mar	..	..	..	..	..	..	..	..	-1.2	-0.1	-0.8	..	-0.5	5.4
<b>Percentage change on previous quarter</b>														
	ILGN	HUDA	HUDB	HUDC	HUDD	HUDE	HUDF	ILHH	ILIB				ILIV	
1999 Q4	-1.0	-0.9	0.1	—	—	0.2	0.3	1.4	-0.7				-0.6	
2000 Q1	2.1	0.9	0.2	0.4	—	0.6	—	0.6	-0.7				-2.1	
Q2	1.0	0.2	0.4	0.1	0.3	0.4	0.3	2.6	0.4				2.3	
Q3	0.7	-0.1	0.2	0.4	0.2	0.1	0.2	0.7	0.8				—	
Q4	1.3	0.4	0.1	0.9	—	—	0.3	1.1	-0.7				—	
2001 Q1	0.5	0.6	—	-0.2	0.5	-0.4	-0.1	-2.9	1.9				-1.8	
Q2	-1.3	0.1	0.1	-0.7	-0.6	-0.4	-0.2	-3.3	-2.9				1.4	
Q3	-1.1	-0.3	—	-0.4	-0.3	-0.3	-0.2	-4.3	-0.8				-0.4	
Q4	-0.6	0.3	0.2	-1.0	-0.2	-0.2	-0.2	-2.5	-1.5				-0.5	
2002 Q1	0.1	0.2	0.1	-0.2	-0.5	0.5	0.1	0.5	0.8				-2.0	
Q2	1.4	0.2	—	0.1	0.5	0.7	0.3	2.8	-1.2				1.3	
Q3	0.8	0.4	0.1	0.1	0.4	—	0.2	2.0	-0.8				0.2	
Q4	0.5	—	—	0.3	-0.1	0.5	0.1	0.5	-1.6				-0.6	
2003 Q1	..	..	..	..	..	..	..	..	2.4				-1.7	
<b>Percentage change on previous month</b>														
								ILKH	ILKR				ILLB	
2002 Apr								-0.2	—				0.6	
May								3.9	—				0.3	
Jun								-1.1	-1.2				0.3	
Jul								1.0	-1.2				—	
Aug								0.3	2.4				—	
Sep								0.6	-1.2				-0.3	
Oct								0.1	-1.2				—	
Nov								-0.1	1.2				-0.1	
Dec								-0.2	-3.5				-0.9	
2003 Jan								1.7	3.7				-1.3	
Feb								-1.7	2.4				-0.2	
Mar								..	-2.3				1.1	

GDP = Gross Domestic Product at constant market prices  
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ChgStk = Change in Stocks at constant market prices  
Exports = Exports of goods and services  
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Sales = Retail Sales volume  
CPI = Consumer Prices, measurement not uniform among countries  
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Earnings = Average Earnings (manufacturing), definitions of coverage and treatment vary among countries  
Empl = Total Employment not seasonally adjusted  
Unempl = Standardised Unemployment rates: percentage of total workforce  
loP=Index of Production

1 Not adjusted for unequal number of working days in a month  
2 Figures monthly and seasonally adjusted

Source: OECD - SNA93

# 7 World trade in goods<sup>1</sup>

	Export of manufactures			Import of manufactures			Export of goods			Import of goods			Total trade	
	Total	OECD	Other	Total	OECD	Other	Total	OECD	Other	Total	OECD	Other	manufactures	goods
<b>Percentage change on a year earlier</b>														
	ILIZ	ILJA	ILJB	ILJC	ILJD	ILJE	ILJF	ILJG	ILJH	ILJI	ILJJ	ILJK	ILJL	ILJM
1992	4.3	3.3	9.5	5.3	4.2	8.7	4.5	3.6	6.3	5.6	4.2	9.7	5.0	4.8
1993	3.7	2.2	12.2	3.4	0.7	11.1	4.1	2.2	8.1	3.8	0.7	12.8	4.0	3.6
1994	10.3	9.9	17.3	10.9	12.3	10.7	11.5	9.3	13.0	12.0	11.0	11.3	11.7	10.6
1995	9.3	9.9	11.2	9.9	10.1	12.4	10.3	9.3	9.1	10.6	9.0	12.0	10.4	9.6
1996	6.8	6.5	6.9	7.1	8.0	6.6	6.6	6.5	7.6	8.0	7.2	7.9	7.3	6.9
1997	11.2	11.9	12.9	10.3	11.3	11.9	12.1	11.0	11.7	11.7	9.7	12.7	11.9	10.8
1998	4.7	6.3	1.2	5.5	9.5	-1.2	5.3	5.6	2.2	6.1	8.1	-2.5	5.6	5.1
1999	5.6	6.1	7.2	6.5	10.8	-0.5	6.4	5.7	5.4	7.9	9.0	-0.3	7.2	6.1
2000	12.6	12.6	20.4	12.6	13.9	14.0	14.4	12.1	13.9	14.8	12.2	17.3	14.5	12.6
2001	-0.4	-1.2	-2.3	0.4	-1.2	3.6	-1.3	-0.5	-0.2	-0.2	-0.6	2.6	-0.8	-
2002	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1996 Q3	7.1	6.7	7.3	6.8	8.8	4.6	6.9	6.6	8.3	8.1	7.7	6.3	7.5	6.9
Q4	9.2	8.2	9.7	8.3	8.9	7.8	8.6	8.9	9.9	9.0	8.5	9.4	8.8	8.7
1997 Q1	8.8	8.0	12.3	8.3	8.2	10.8	9.0	7.7	11.7	9.3	7.3	12.2	9.2	8.5
Q2	12.6	13.0	14.5	11.3	12.2	13.3	13.4	12.4	13.0	12.8	10.5	14.3	13.1	11.9
Q3	12.6	14.0	13.6	11.3	12.5	13.3	13.9	12.9	11.9	12.9	10.5	14.0	13.4	11.9
Q4	10.8	12.3	11.4	10.4	12.3	10.3	12.1	11.1	10.2	11.8	10.4	10.6	11.9	10.6
1998 Q1	9.5	11.2	6.4	9.0	12.6	4.1	10.1	10.8	6.0	10.0	11.0	3.6	10.0	9.2
Q2	5.2	6.9	1.7	6.0	9.7	0.1	5.8	6.2	2.4	6.7	8.2	-1.1	6.2	5.6
Q3	2.5	4.2	-1.3	4.0	8.0	-3.5	2.9	3.3	0.4	4.2	6.9	-5.2	3.6	3.2
Q4	2.0	3.4	-1.8	3.3	8.0	-5.2	2.2	2.7	0.2	3.7	6.6	-7.0	3.0	2.6
1999 Q1	1.7	2.8	-1.2	3.3	7.7	-4.2	1.9	1.8	1.3	3.9	6.2	-6.3	2.9	2.5
Q2	3.7	4.0	3.3	5.1	9.6	-2.5	3.8	3.7	3.7	6.1	7.9	-3.3	5.0	4.4
Q3	7.2	7.2	11.0	7.3	11.6	0.4	8.1	7.2	7.3	9.1	9.7	1.9	8.6	7.2
Q4	9.8	10.4	15.8	10.2	14.3	4.6	11.6	10.0	9.4	12.4	12.1	7.0	12.0	10.0
2000 Q1	13.5	13.5	22.5	12.5	15.0	10.2	15.4	13.4	13.7	14.7	13.3	13.7	15.1	13.0
Q2	13.8	13.9	24.2	13.4	15.1	14.0	16.1	13.1	15.7	15.7	13.2	17.8	15.9	13.6
Q3	12.7	12.6	20.3	13.9	14.7	16.9	14.4	12.0	14.6	16.1	12.9	20.3	15.2	13.3
Q4	10.5	10.5	15.3	10.8	11.1	14.7	11.5	10.1	11.6	12.6	9.5	17.4	12.1	10.6
2001 Q1	6.2	6.5	6.6	6.7	6.2	9.5	6.5	6.3	5.9	7.3	5.8	10.8	6.9	6.4
Q2	0.6	0.1	-1.0	1.4	-0.1	4.9	-0.1	0.7	0.5	1.0	0.2	4.2	0.4	1.0
Q3	-3.0	-4.4	-6.3	-2.5	-4.5	1.0	-4.8	-3.1	-2.9	-3.7	-3.6	-1.2	-4.3	-2.7
Q4	-4.9	-6.5	-7.8	-3.4	-5.8	-0.4	-6.8	-5.3	-4.0	-5.0	-4.5	-2.3	-5.9	-4.2
2002 Q1	-2.7	-4.6	-1.3	-1.8	-3.7	1.9	-3.9	-3.8	0.4	-2.5	-3.1	1.0	-3.2	-2.3
Q2	3.4	2.8	6.1	2.6	2.2	4.6	3.6	2.6	5.7	2.9	1.9	5.0	3.2	3.0
Q3	6.6	6.4	11.7	..	5.9	..	7.7	5.5	9.6	..	5.1	..	..	..
Q4	..	..	..	..	..	..	..	..	..	..	..	..	..	..
2003 Q1	..	..	..	..	..	..	..	..	..	..	..	..	..	..
<b>Percentage change on previous quarter</b>														
	ILJN	ILJO	ILJP	ILJQ	ILJR	ILJS	ILJT	ILJU	ILJV	ILJW	ILJX	ILJY	ILJZ	ILKA
1996 Q3	2.6	2.3	3.4	2.3	2.8	2.1	2.5	2.3	3.4	2.6	2.5	2.3	2.6	2.5
Q4	3.0	2.8	3.2	2.5	2.2	3.7	2.9	3.0	2.9	2.7	2.0	3.9	2.8	2.7
1997 Q1	1.7	2.0	3.8	2.0	2.0	4.2	2.4	1.1	3.2	2.7	1.2	4.6	2.6	1.9
Q2	4.8	5.3	3.5	4.0	4.7	2.7	4.9	5.5	3.0	4.1	4.5	2.7	4.5	4.4
Q3	2.7	3.1	2.5	2.3	3.0	2.1	3.0	2.8	2.3	2.8	2.5	2.1	2.9	2.5
Q4	1.3	1.3	1.2	1.7	2.0	0.9	1.3	1.3	1.3	1.7	2.0	0.8	1.5	1.5
1998 Q1	0.4	1.0	-0.9	0.8	2.3	-1.6	0.6	0.9	-0.7	1.1	1.7	-2.0	0.8	0.6
Q2	0.7	1.3	-1.1	1.1	2.1	-1.2	0.8	1.1	-0.5	1.0	1.9	-1.8	0.9	0.9
Q3	0.1	0.5	-0.5	0.4	1.4	-1.6	0.3	..	0.3	0.4	1.2	-2.2	0.3	0.2
Q4	0.8	0.6	0.6	1.0	2.0	-0.9	0.6	0.7	1.1	1.2	1.7	-1.2	0.9	0.9
1999 Q1	0.1	0.5	-0.2	0.8	2.0	-0.6	0.3	..	0.4	1.2	1.3	-1.2	0.8	0.5
Q2	2.7	2.4	3.4	2.8	3.8	0.5	2.6	3.0	1.8	3.2	3.6	1.3	2.9	2.7
Q3	3.4	3.6	7.0	2.5	3.2	1.3	4.4	3.3	3.8	3.2	2.9	3.0	3.8	3.0
Q4	3.3	3.5	4.9	3.8	4.5	3.3	3.8	3.3	3.1	4.3	3.9	3.8	4.1	3.5
2000 Q1	3.5	3.3	5.6	2.9	2.7	4.7	3.8	3.2	4.3	3.2	2.3	5.0	3.5	3.2
Q2	3.0	2.8	4.8	3.6	3.9	4.0	3.2	2.7	3.7	4.2	3.5	4.9	3.7	3.3
Q3	2.4	2.5	3.7	2.9	2.9	3.9	2.8	2.3	2.7	3.5	2.6	5.2	3.1	2.7
Q4	1.3	1.5	0.5	0.9	1.2	1.4	1.3	1.6	0.5	1.2	0.8	1.3	1.2	1.1
2001 Q1	-0.6	-0.4	-2.4	-0.9	-1.9	..	-0.8	-0.4	-1.0	-1.6	-1.2	-0.9	-1.2	-0.8
Q2	-2.4	-3.4	-2.7	-1.5	-2.2	-0.4	-3.2	-2.7	-1.6	-2.0	-1.9	-1.3	-2.6	-2.0
Q3	-1.3	-2.2	-1.8	-1.0	-1.6	..	-2.1	-1.5	-0.8	-1.3	-1.3	-0.3	-1.7	-1.1
Q4	-0.7	-0.7	-1.1	-0.1	-0.2	..	-0.8	-0.8	-0.6	-0.1	-0.1	0.2	-0.5	-0.4
2002 Q1	1.8	1.6	4.5	0.7	0.3	2.3	2.3	1.2	3.4	0.9	0.2	2.5	1.6	1.2
Q2	3.8	4.1	4.6	3.0	3.7	2.3	4.2	3.8	3.7	3.4	3.2	2.5	3.8	3.4
Q3	1.7	1.3	3.4	..	1.9	..	1.8	1.3	2.9	..	1.7	..	..	..
Q4	..	..	..	..	..	..	..	..	..	..	..	..	..	..
2003 Q1	..	..	..	..	..	..	..	..	..	..	..	..	..	..

<sup>1</sup> Data used in the World and OECD aggregates refer to Germany after unification

Source: OECD - SNA93

## CORPORATE SERVICES PRICE INDEX (EXPERIMENTAL) – 1st QTR 2003

### What is the CSPI ?

This summary contains the latest quarter's results for the experimental Corporate Services Price Index (CSPI) and the industry-level indices it encompasses. "Corporate services" are those services purchased by businesses and government from other businesses to support them in their usual line of activity. Broadly, the CSPI is the services sector equivalent of the manufacturing Producer Price Index (PPI).

The top-level CSPI is constructed by weighting together the currently available industry-level indices. Overall coverage is currently 50 per cent of the targeted corporate services sector.

The main uses of the CSPI are as:

- a key indicator of inflation in the services sector;
- a deflator of service sector output for use in calculating GDP and the Index of Services; and
- an information tool for business itself.

N.B. Measurement of service sector prices is inherently difficult and challenging. When viewing the results **it should be borne in mind that the indices shown are regarded as experimental**, particularly those that have been added to the series most recently. Therefore some of the results will be subject to revision before the completion of the CSPI development project. The top-level index should also be viewed as **experimental**.

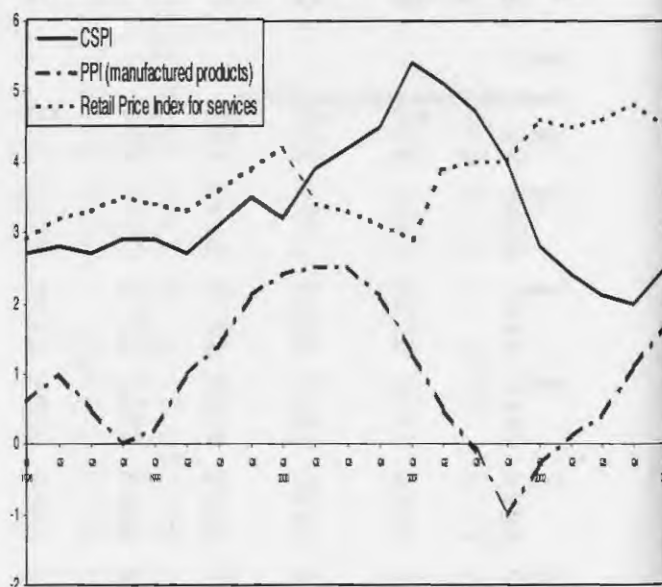
### Results for Quarter 1, 2003

The graph opposite shows that the annual rate of increase for the CSPI has risen to 2.5 per cent in Q1 2003, compared to 2.0 per cent for the previous quarter. This is the first increase in the annual rate for 7 quarters following its peak of 5.4 per cent in Q1 2001.

The graph also shows how the trend for the CSPI contrasts with the retail price index for services but is now following a similar trend to the producer price index for manufactured products.

The top-level quarterly results are shown in the table on the next page. Results are also shown with *property rental payments* excluded, due to its relatively high weighting within the top-level index (just under a third).

Experimental top-level CSPI compared with the Retail Price Index (RPI) for services and the PPI for manufactured products: percentage change on same quarter a year ago



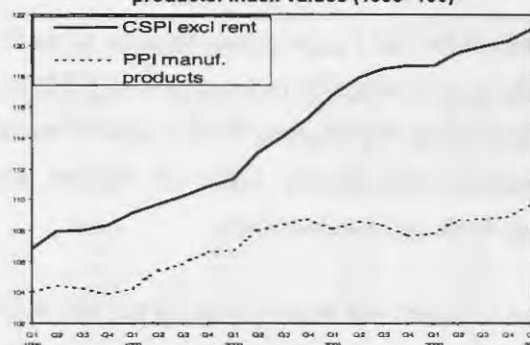


In Q1 2003, the CSPI (including property rental payments) rose by 0.7 per cent. The key contributions to this were price increases for Property Rentals, Freight Transport by Road and Freight Forwarding.

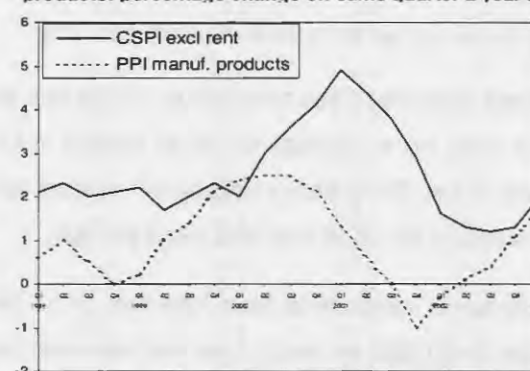
The top-level CSPI (excluding property rental payments) is compared to the net sector output PPI for manufactured products in the graphs on the right. Prices of corporate services covered by this inquiry have shown a relatively smooth upward path for the last 5 years but have been rising at a greater rate over this period than that of the PPI.

The annual rate for the CSPI (excluding property rental payments) was 2.0 per cent in Q1 2003 as compared to 1.3 per cent in the previous quarter. This compares to the peak in Q1 2001 when the annual rate was 4.9 per cent. The annual rate for the PPI has risen over the last year after being in decline for more than a year and is now at a level similar to that of the CSPI.

**Experimental top-level CSPI and PPI for manufactured products: index values (1995=100)**



**Experimental top-level CSPI and PPI for manufactured products: percentage change on same quarter a year ago**



		Quarterly CSPI index values (1995=100)		Percentage change on same quarter in previous year (%)	
		Including rent	Excluding rent	Including rent	Excluding rent
1997	Q1	104.5	104.6	3.8	4.2
	Q2	105.3	105.4	3.7	3.9
	Q3	105.9	105.9	3.9	4.1
	Q4	106.3	106.1	2.9	2.8
1998	Q1	107.3	106.8	2.7	2.1
	Q2	108.3	107.9	2.8	2.3
	Q3	108.8	108.0	2.7	2.0
	Q4	109.3	108.3	2.9	2.1
1999	Q1	110.4	109.1	2.9	2.2
	Q2	111.3	109.7	2.7	1.7
	Q3	112.2	110.2	3.1	2.0
	Q4	113.1	110.8	3.5	2.3
2000	Q1	113.9	111.3	3.2	2.0
	Q2	115.6	113.0	3.9	3.0
	Q3	116.9	114.1	4.2	3.6
	Q4	118.3	115.3	4.5	4.1
2001	Q1	120.0	116.8	5.4	4.9
	Q2	121.4	117.9	5.1	4.4
	Q3	122.3	118.5	4.7	3.8
	Q4	123.0	118.7	4.0	2.9
2002	Q1	123.4	118.7	2.8	1.6
	Q2	124.3	119.5	2.4	1.3
	Q3	124.8	119.9	2.1	1.2
	Q4	125.5	120.3	2.0	1.3
2003	Q1	126.4	121.1	2.5	2.0

## Industry-specific indices

The tables on the next 5 pages contain the series for the 31 industries for which indices of corporate services prices are currently available. The weighting for each index is shown separately for when property rentals are included and excluded. Some key points to note are:

- *bus and coach hire* prices rose by 2.0 per cent in Q1 2003 and were 6.7 per cent higher over the year. The increases are reportedly due to higher wages, increases in the price of fuel and a rise in insurance premiums;
- *freight forwarding* prices have risen by 1.3 per cent for Q1 2003, this is reportedly due to an increase in the price of fuel. This is the first increase for 7 quarters and the index is still 1.6 per cent lower than a year ago;
- *commercial vehicle ferries* prices have risen by 3.1 per cent for Q1 2003 and were 1.8 per cent higher over the year. This is reportedly due to increases in the price of oil as a result of the war in Iraq;
- *sea and coastal freight* prices rose by 1.9 per cent but are still down 1.4 per cent over the year. Again this is reportedly due to changes in the price of oil;
- *contract car hire* prices fell by 1.1 per cent over the quarter with a small increase of 0.3 per cent over the year, this is reportedly due to fluctuations in new car prices and anticipated future sell-on values;
- *property rental payments* rose by 0.8 per cent this quarter. Increases for retail and industrial properties have been largely offset by lower rental payments for office space, as reported by data suppliers IPD;
- prices for *real estate agency services* fell by 1.1 per cent mainly due to decreases in rental values of office property;
- *business rail fares* prices rose by 3.5 per cent for Q1 2003. This is due to an annual increase in ticket prices. The index shows a pattern of annual increases of 4 to 5 per cent in 1998-2000 and around 3 per cent in 2001 and 2002;

## Next results

The next set of CSPI results will be issued on 15th August 2003 via the National Statistics website [www.statistics.gov.uk](http://www.statistics.gov.uk) (search for "CSPI").

## Further information

- Inquiry Contact: Nick Palmer  
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Tel: (01633) 813493 email: [cspi@ons.gov.uk](mailto:cspi@ons.gov.uk)

**Note to the main table:** There are external sources for the indices denoted by an asterisk, as follows:

Index	Source
Property rental payments	Investment Property Databank (IPD)
Car contract hire and Maintenance and repair of motor vehicles	Yewtree.com Ltd
Construction plant hire	Construction Plant-hire Association (CPA)
Business telecommunications	Published sources: Tarifica Telecom Pricing Intelligence and What Cellphone magazine
Sewerage services	Ofwat (Office of the Water Regulator)
National post parcels	Parcelforce
Business rail fares	Strategic Rail Authority (SRA)

# Corporate Services Price Indices (EXPERIMENTAL) (1995=100)

SIC(92):	Freight transport by road							
	Maintenance and repair of motor vehicles*	Hotels	Canteens and catering	Business rail fares*	Rail freight	Bus and coach hire	Total	International component
	50.20	55.10	55.50	60.10/1	60.10/2	60.23/1	60.24	
1995 net sector weights (%):								
(including property rentals)	3.81	1.82	0.76	0.40	1.22	0.57	19.12	
(excluding property rentals)	5.43	2.60	1.08	0.57	1.74	0.81	27.23	
Annual								
1998	106.0	113.3	112.0	109.3	92.9	115.2	113.2	104.8
1999	108.0	114.7	114.8	114.7	94.0	119.7	115.8	102.0
2000	110.0	117.6	116.3	119.9	93.0	130.5	123.6	103.4
2001	112.6	121.5	120.9	123.6	93.6	135.6	132.9	104.9
2002	115.6	119.9	123.4	127.2	94.7	141.1	135.1	106.9
Percentage change, latest year on previous year								
1998	1.4	5.1	..	..	..	6.1	2.8	0.1
1999	1.9	1.3	2.5	4.9	1.3	3.9	2.4	-2.7
2000	1.9	2.5	1.3	4.5	-1.1	9.1	6.7	1.3
2001	2.4	3.3	3.9	3.1	0.7	3.9	7.5	1.5
2002	2.6	-1.3	2.1	2.9	1.1	4.1	1.6	1.8
Quarterly results (not seasonally adjusted)								
1998 Q1	105.4	112.1	110.8	109.3	93.0	111.9	112.0	104.8
Q2	106.4	113.0	111.9	109.3	93.3	115.5	113.3	105.3
Q3	106.3	113.8	112.4	109.3	92.6	116.2	113.5	105.4
Q4	106.1	114.3	112.8	109.3	92.6	117.1	113.9	103.8
1999 Q1	107.0	114.3	113.9	114.7	93.7	118.4	114.2	103.5
Q2	107.9	114.6	114.9	114.7	94.1	119.5	114.8	101.8
Q3	108.2	114.9	115.1	114.7	94.1	120.1	116.1	101.5
Q4	108.9	115.3	115.4	114.7	94.2	120.5	118.2	101.4
2000 Q1	109.2	115.1	115.5	119.9	94.7	126.6	118.6	102.3
Q2	109.5	117.8	116.5	119.9	92.5	130.8	121.9	102.3
Q3	110.1	118.9	116.7	119.9	92.4	131.9	125.4	102.9
Q4	111.2	118.4	116.7	119.9	92.4	133.0	128.6	106.0
2001 Q1	111.9	119.2	120.0	123.6	93.5	134.2	131.3	106.0
Q2	112.6	122.5	120.9	123.6	94.2	135.1	132.3	106.3
Q3	113.1	122.2	120.9	123.6	93.8	136.1	133.6	102.2
Q4	112.8	122.0	121.6	123.6	93.0	137.0	134.5	105.2
2002 Q1	114.4	122.7	121.6	127.2	94.0	137.4	133.7	105.2
Q2	114.9	119.5	123.6	127.2	94.7	139.4	134.9	105.1
Q3	116.0	118.1	124.2	127.2	95.0	141.9	135.7	107.5
Q4	116.9	119.3	124.2	127.2	95.1	143.7	136.0	109.6
2003 Q1	118.2	118.6	124.9	131.7	95.9	146.6	137.5	110.9
Percentage change, latest quarter on previous quarter								
1998 Q1	0.6	2.8	0.0	3.9	0.6	1.9	0.7	-1.0
Q2	0.9	0.9	1.0	0.0	0.2	3.2	1.2	0.5
Q3	-0.1	0.6	0.5	0.0	-0.8	0.6	0.3	0.0
Q4	-0.2	0.5	0.4	0.0	0.1	0.8	0.4	-1.5
1999 Q1	0.8	0.0	0.9	4.9	1.1	1.1	0.3	-0.3
Q2	0.8	0.2	0.9	0.0	0.5	1.0	0.5	-1.6
Q3	0.4	0.3	0.2	0.0	0.0	0.5	1.2	-0.3
Q4	0.6	0.3	0.3	0.0	0.1	0.3	1.9	-0.1
2000 Q1	0.2	-0.1	0.0	4.5	0.5	5.1	0.3	1.0
Q2	0.3	2.3	0.9	0.0	-2.3	3.3	2.7	0.0
Q3	0.5	0.9	0.1	0.0	-0.2	0.8	2.9	0.5
Q4	1.0	-0.4	0.1	0.0	0.0	0.8	2.5	3.1
2001 Q1	0.6	0.6	2.8	3.1	1.2	0.9	2.1	0.0
Q2	0.6	2.8	0.8	0.0	0.7	0.7	0.8	0.2
Q3	0.5	-0.2	0.0	0.0	-0.5	0.7	1.0	-3.8
Q4	-0.3	-0.2	0.6	0.0	-0.8	0.7	0.6	2.9
2002 Q1	1.4	0.6	0.0	2.9	1.1	0.3	-0.6	0.0
Q2	0.5	-2.7	1.6	0.0	0.8	1.4	0.9	-0.1
Q3	1.0	-1.1	0.5	0.0	0.3	1.8	0.6	2.3
Q4	0.8	1.0	0.0	0.0	0.1	1.3	0.2	1.9
2003 Q1	1.0	-0.5	0.6	3.5	0.8	2.0	1.1	1.2
Percentage change, latest quarter on corresponding quarter of previous year								
1998 Q1	1.1	6.7	..	3.9	-10.6	4.8	3.7	3.0
Q2	1.9	4.0	..	3.9	0.9	6.6	2.8	-0.4
Q3	1.4	4.7	1.3	3.9	0.1	6.4	2.4	-0.4
Q4	1.3	4.9	1.8	3.9	0.2	6.6	2.5	-1.9
1999 Q1	1.5	2.0	2.8	4.9	0.7	5.8	2.0	-1.3
Q2	1.4	1.3	2.7	4.9	0.9	3.5	1.3	-3.4
Q3	1.8	1.0	2.4	4.9	1.7	3.4	2.2	-3.7
Q4	2.7	0.8	2.3	4.9	1.7	2.9	3.8	-2.4
2000 Q1	2.0	0.7	1.4	4.5	1.1	6.9	3.8	-1.1
Q2	1.5	2.8	1.4	4.5	-1.7	9.3	6.2	0.5
Q3	1.7	3.5	1.3	4.5	-1.9	9.8	8.0	1.3
Q4	2.1	2.7	1.1	4.5	-1.9	10.4	8.8	4.6
2001 Q1	2.5	3.5	3.9	3.1	-1.3	6.0	10.7	3.6
Q2	2.8	4.0	3.8	3.1	1.8	3.3	8.6	3.8
Q3	2.8	2.8	3.7	3.1	1.5	3.2	6.5	-0.6
Q4	1.4	3.0	4.2	3.1	0.7	3.0	4.6	-0.8
2002 Q1	2.2	3.0	1.3	2.9	0.5	2.4	1.8	-0.8
Q2	2.1	-2.5	2.2	2.9	0.5	3.1	2.0	-1.1
Q3	2.6	-3.4	2.7	2.9	1.3	4.3	1.5	5.2
Q4	3.7	-2.3	2.1	2.9	2.2	4.9	1.1	4.2
2003 Q1	3.3	-3.4	2.7	3.5	2.0	6.7	2.8	5.4

# Corporate Services Price Indices (EXPERIMENTAL) (1995=100) – continued

SIC(92):	Commercial vehicle ferries 61.10/1	Sea and coastal water freight 61.10/2	Business air fares 62.10/1	Freight forwarding 63.40	National post parcels* 64.11	Courier services 64.12	Business telecomm- unications* 64.20	Property rental payments* 70.20
1995 net sector weights (%):								
(including property rentals)	0.50	0.57	1.90	5.58	4.14	0.93	7.15	29.78
(excluding property rentals)	0.71	0.81	2.71	7.95	5.89	1.33	10.18	0.00
<b>Annual</b>								
1998	96.4	88.6	123.5	99.2	119.8	105.6	83.4	110.0
1999	101.9	79.6	127.2	95.5	122.9	107.0	81.7	116.0
2000	101.3	82.1	135.3	96.1	128.6	109.9	77.7	122.6
2001	101.2	84.9	153.5	96.0	132.6	116.0	75.6	130.5
2002	100.3	77.1	162.7	92.2	137.9	119.3	75.8	136.1
<b>Percentage change, latest year on previous year</b>								
1998	-0.4	-7.2	7.3	-4.5	6.6	4.2	-3.2	4.3
1999	5.6	-10.2	3.0	-3.7	2.5	1.3	2.1	5.4
2000	-0.6	3.2	6.3	0.6	4.7	2.7	-4.9	5.7
2001	-0.1	3.4	13.5	-0.1	3.1	5.6	-2.6	6.5
2002	-0.9	-9.2	6.0	-4.0	4.0	2.8	0.2	4.3
<b>Quarterly results (not seasonally adjusted)</b>								
1998 Q1	97.0	93.7	119.8	102.2	113.8	102.7	83.5	108.4
Q2	96.3	88.4	124.2	99.7	121.9	105.8	83.1	109.3
Q3	95.9	88.1	124.9	98.1	121.9	106.8	83.5	110.5
Q4	96.6	84.0	125.1	96.7	121.9	107.3	83.5	111.7
1999 Q1	103.8	81.8	125.4	97.4	121.9	107.3	83.5	113.4
Q2	102.7	81.2	127.5	94.7	123.2	106.9	83.0	114.9
Q3	101.5	77.1	127.7	94.5	123.2	106.9	81.5	116.9
Q4	99.6	78.0	128.3	95.4	123.2	107.0	78.7	118.7
2000 Q1	102.1	79.6	129.5	95.2	123.2	108.3	79.1	120.1
Q2	101.5	81.9	132.4	95.7	130.4	108.2	78.7	121.7
Q3	101.4	83.1	135.9	96.3	130.4	109.9	77.0	123.3
Q4	100.3	83.8	143.3	97.1	130.4	113.3	75.9	125.2
2001 Q1	103.7	85.8	150.3	98.0	130.4	113.8	75.9	127.6
Q2	101.9	87.3	150.8	97.0	133.3	115.6	75.5	129.6
Q3	100.2	85.2	154.9	94.9	133.3	117.2	75.5	131.4
Q4	98.9	81.2	157.9	94.0	133.3	117.6	75.6	133.3
2002 Q1	100.8	79.5	161.4	93.7	133.3	118.7	75.5	134.4
Q2	100.4	75.5	162.0	92.8	139.4	119.0	76.0	135.8
Q3	100.4	76.5	163.2	91.4	139.4	119.6	75.9	136.4
Q4	99.5	77.0	164.3	91.0	139.4	119.8	75.7	137.9
2003 Q1	102.6	78.4	165.1	92.2	139.4	121.5	75.8	139.0
<b>Percentage change, latest quarter on previous quarter</b>								
1998 Q1	2.7	-1.9	2.2	-2.1	0.0	1.0	-1.1	1.6
Q2	-0.8	-5.7	3.7	-2.5	7.1	3.1	-0.4	0.9
Q3	-0.4	-0.3	0.6	-1.6	0.0	0.9	0.4	1.1
Q4	0.8	-4.6	0.1	-1.4	0.0	0.5	0.0	1.1
1999 Q1	7.4	-2.6	0.2	0.7	0.0	0.0	0.0	1.5
Q2	-1.1	-0.7	1.7	-2.8	1.1	-0.4	-0.5	1.3
Q3	-1.2	-5.1	0.2	-0.2	0.0	0.0	-1.8	1.8
Q4	-1.8	1.1	0.5	0.9	0.0	0.1	-3.5	1.5
2000 Q1	2.5	2.1	1.0	-0.2	0.0	1.2	0.5	1.2
Q2	-0.6	2.8	2.2	0.5	5.9	-0.1	-0.5	1.3
Q3	-0.1	1.5	2.6	0.6	0.0	1.5	-2.1	1.3
Q4	-1.1	0.9	5.5	0.8	0.0	3.1	-1.4	1.6
2001 Q1	3.4	2.4	4.9	1.0	0.0	0.5	0.0	1.9
Q2	-1.7	1.7	0.3	-1.0	2.2	1.5	-0.6	1.5
Q3	-1.7	-2.4	2.7	-2.1	0.0	1.4	0.0	1.4
Q4	-1.3	-4.6	2.0	-1.0	0.0	0.3	0.1	1.5
2002 Q1	1.9	-2.2	2.2	-0.3	0.0	0.9	-0.1	0.8
Q2	-0.4	-4.9	0.4	-1.0	4.5	0.2	0.7	1.0
Q3	0.1	1.3	0.7	-1.5	0.0	0.6	-0.2	0.5
Q4	-0.1	0.6	0.7	-0.4	0.0	0.2	-0.3	1.1
2003 Q1	3.1	1.9	0.5	1.3	0.0	1.4	0.2	0.8
<b>Percentage change, latest quarter on corresponding quarter of previous year</b>								
1998 Q1	-2.2	-1.5	6.2	-1.2	4.9	1.4	-5.5	4.0
Q2	-1.8	-7.3	9.3	-3.8	7.1	4.2	-3.5	4.1
Q3	0.1	-7.9	7.1	-5.7	7.1	5.5	-2.4	4.5
Q4	2.3	-12.0	6.7	-7.3	7.1	5.5	-1.1	4.8
1999 Q1	7.0	-12.7	4.7	-4.7	7.1	4.5	0.0	4.7
Q2	6.6	-8.1	2.6	-5.0	1.1	1.0	-0.1	5.1
Q3	5.8	-12.5	2.2	-3.6	1.1	0.1	-2.4	5.8
Q4	3.1	-7.2	2.6	-1.3	1.1	-0.3	-5.8	6.2
2000 Q1	-1.6	-2.7	3.3	-2.3	1.1	0.9	-5.3	5.9
Q2	-1.1	0.8	3.8	1.0	5.9	1.3	-5.3	5.9
Q3	-0.1	7.7	6.4	1.8	5.9	2.8	-5.5	5.4
Q4	0.6	7.4	11.7	1.7	5.9	5.9	-3.5	5.5
2001 Q1	1.5	7.8	16.0	3.0	5.9	5.1	-3.9	6.3
Q2	0.4	6.6	13.9	1.4	2.2	6.8	-4.1	6.5
Q3	-1.2	2.5	14.0	-1.4	2.2	6.8	-2.0	6.6
Q4	-1.3	-3.1	10.2	-3.2	2.2	3.8	-0.4	6.5
2002 Q1	-2.8	-7.4	7.4	-4.5	2.2	4.3	-0.6	5.3
Q2	-1.5	-13.5	7.4	-4.4	4.5	2.9	0.7	4.7
Q3	0.3	-10.2	5.4	-3.3	4.5	2.1	0.5	3.8
Q4	0.6	-5.3	4.0	-3.2	4.5	1.9	0.1	3.4
2003 Q1	1.8	-1.4	2.3	-1.6	4.5	2.3	0.4	3.4



# Corporate Services Price Indices (EXPERIMENTAL) (1995=100) – continued

	Real estate agency activities 70.30	Car contract hire* 71.10	Construction plant hire* 71.32	Market research 74.13	Technical testing 74.30	Employment agencies 74.50	Security services 74.60
SIC(92):							
1995 net sector weights (%):							
(including property rentals)	1.14	1.29	1.92	1.23	1.17	6.10	1.11
(excluding property rentals)	1.62	1.84	2.73	1.76	1.67	8.69	1.58
Annual							
1998	119.5	97.5	99.8	..	106.7	114.9	100.3
1999	125.5	99.2	103.9	112.2	109.1	121.1	103.0
2000	134.5	102.2	109.3	116.1	109.8	123.8	105.0
2001	139.0	97.0	113.9	120.9	111.0	130.8	108.3
2002	139.2	96.7	111.5	124.5	113.6	132.3	112.4
Percentage change, latest year on previous year							
1998	..	1.2	3.4	..	..	5.5	0.9
1999	5.0	1.7	4.1	..	2.2	5.3	2.7
2000	7.2	3.0	5.1	3.5	0.6	2.3	1.9
2001	3.3	-5.1	4.2	4.1	1.0	5.7	3.1
2002	0.1	-0.3	-2.1	3.0	2.4	1.1	3.8
Quarterly results (not seasonally adjusted)							
1998 Q1	117.0	97.6	101.3	..	106.1	112.9	100.3
Q2	119.0	98.4	99.8	..	106.7	114.1	99.8
Q3	120.9	96.9	99.1	106.8	106.7	115.3	100.4
Q4	121.3	97.3	99.1	108.6	107.4	117.5	100.8
1999 Q1	121.9	97.8	105.3	111.7	109.1	119.4	101.4
Q2	124.6	98.1	102.6	112.0	109.1	120.7	102.5
Q3	126.6	99.6	103.0	112.4	109.0	121.9	103.9
Q4	128.8	101.4	104.9	112.8	109.3	122.3	104.3
2000 Q1	131.8	102.3	105.6	115.2	109.5	122.7	104.3
Q2	133.9	102.7	110.1	115.7	109.7	123.5	104.4
Q3	135.2	102.2	111.1	116.5	110.1	124.1	105.6
Q4	137.2	101.6	110.2	117.1	110.1	124.9	105.7
2001 Q1	138.6	99.5	111.3	120.5	109.5	127.5	106.8
Q2	139.1	96.6	118.0	121.0	110.9	130.8	108.0
Q3	139.2	96.2	114.8	120.7	111.5	132.6	108.1
Q4	139.1	95.7	111.4	121.4	111.9	132.4	110.3
2002 Q1	139.0	96.2	109.7	124.3	113.4	131.4	111.0
Q2	139.1	96.4	110.8	124.1	114.0	131.1	112.1
Q3	139.7	96.6	112.5	124.1	113.7	133.0	112.8
Q4	139.1	97.6	113.1	125.4	113.5	133.5	113.7
2003 Q1	137.6	96.5	113.8	126.4	113.4	134.2	115.0
Percentage change, latest quarter on previous quarter							
1998 Q1	..	1.1	4.8	..	..	2.2	0.3
Q2	1.7	0.8	-1.4	..	0.5	1.1	-0.5
Q3	1.6	-1.5	-0.7	..	0.0	1.0	0.6
Q4	0.4	0.4	0.0	1.6	0.7	1.9	0.3
1999 Q1	0.5	0.5	6.3	2.9	1.6	1.6	0.6
Q2	2.2	0.3	-2.6	0.3	0.0	1.0	1.1
Q3	1.6	1.6	0.5	0.4	-0.2	1.0	1.4
Q4	1.7	1.9	1.8	0.3	0.3	0.3	0.4
2000 Q1	2.3	0.9	0.7	2.1	0.2	0.3	0.0
Q2	1.6	0.4	4.3	0.5	0.2	0.7	0.1
Q3	1.0	-0.5	0.8	0.7	0.3	0.5	1.1
Q4	1.4	-0.6	-0.7	0.6	0.0	0.6	0.2
2001 Q1	1.0	-2.1	1.0	2.9	-0.5	2.1	1.0
Q2	0.4	-2.9	6.1	0.4	1.2	2.6	1.1
Q3	0.0	-0.4	-2.7	-0.2	0.6	1.4	0.1
Q4	0.0	-0.5	-3.0	0.6	0.3	-0.2	2.0
2002 Q1	-0.1	0.5	-1.5	2.4	1.4	-0.7	0.7
Q2	0.1	0.2	1.0	-0.2	0.5	-0.2	1.0
Q3	0.4	0.2	1.5	0.0	-0.3	1.4	0.7
Q4	-0.4	1.0	0.6	1.1	-0.1	0.4	0.7
2003 Q1	-1.1	-1.1	0.6	0.7	-0.1	0.5	1.2
Percentage change, latest quarter on corresponding quarter of previous year							
1998 Q1	..	1.5	3.1	..	..	5.5	1.4
Q2	..	1.8	3.6	..	..	5.3	0.6
Q3	..	0.8	4.4	..	..	4.9	0.7
Q4	..	0.8	2.5	..	..	6.4	0.8
1999 Q1	4.2	0.2	4.0	..	2.8	5.8	1.1
Q2	4.8	-0.3	2.8	..	2.3	5.7	2.6
Q3	4.7	2.7	4.0	5.2	2.1	5.7	3.4
Q4	6.1	4.2	5.9	3.9	1.7	4.1	3.5
2000 Q1	8.1	4.7	0.3	3.1	0.3	2.7	2.9
Q2	7.4	4.8	7.4	3.3	0.5	2.3	1.9
Q3	6.8	2.6	7.8	3.6	1.0	1.9	1.6
Q4	6.5	0.2	5.1	3.9	0.7	2.1	1.4
2001 Q1	5.2	-2.8	5.4	4.6	0.0	4.0	2.4
Q2	3.9	-6.0	7.2	4.6	1.1	5.9	3.4
Q3	2.9	-5.9	3.4	3.6	1.3	6.8	2.4
Q4	1.4	-5.8	1.0	3.7	1.6	6.0	4.3
2002 Q1	0.3	-3.3	-1.4	3.2	3.5	3.1	3.9
Q2	0.0	-0.2	-6.1	2.6	2.8	0.2	3.8
Q3	0.4	0.4	-2.0	2.8	1.9	0.3	4.4
Q4	0.0	1.9	1.6	3.3	1.5	0.9	3.1
2003 Q1	-1.0	0.3	3.8	1.6	0.0	2.1	3.6

# Corporate Services Price Indices (EXPERIMENTAL) (1995=100) – continued

SIC(92):	Industrial cleaning 74.70	Commercial film processing 74.81/9	Contract packaging 74.82	Direct marketing & secretarial services 74.83 (part)	Translation & interpretation services 74.83 (part)	Adult education 80.42
1995 net sector weights (%):						
(including property rentals)	2.20	0.08	0.47	0.18	0.14	0.56
(excluding property rentals)	3.13	0.12	0.67	0.26	0.20	0.80
<b>Annual</b>						
1998	101.3	105.5	..	108.0	106.9	111.1
1999	101.8	105.6	109.4	109.9	108.5	114.7
2000	102.0	106.3	112.7	109.5	108.6	118.8
2001	101.8	107.6	112.8	107.3	107.7	123.7
2002	103.6	108.5	113.4	106.6	107.1	127.9
<b>Percentage change, latest year on previous year</b>						
1998	2.5	0.8	..	..	..	2.4
1999	0.5	0.1	..	1.8	1.5	3.2
2000	0.1	0.7	3.0	-0.3	0.0	3.6
2001	-0.1	1.2	0.1	-2.0	-0.8	4.1
2002	1.7	0.9	0.6	-0.6	-0.6	3.4
<b>Quarterly results (not seasonally adjusted)</b>						
1998 Q1	100.8	105.5	..	106.4	106.9	111.1
Q2	101.3	105.5	..	108.1	106.7	110.9
Q3	101.5	105.5	..	109.1	106.9	110.7
Q4	101.7	105.5	..	108.2	107.1	111.9
1999 Q1	101.8	105.5	109.2	109.3	108.5	113.9
Q2	101.9	105.6	109.5	110.4	108.6	114.4
Q3	101.9	105.6	109.5	109.7	108.5	115.0
Q4	101.7	105.6	109.5	110.0	108.5	115.4
2000 Q1	102.0	105.9	112.0	110.2	109.1	117.6
Q2	102.1	105.9	112.2	109.8	109.1	117.6
Q3	102.0	106.5	113.5	110.2	108.2	119.7
Q4	101.7	107.0	113.0	107.8	107.9	120.4
2001 Q1	101.6	106.8	112.6	106.9	107.9	122.1
Q2	101.7	107.0	112.8	106.8	108.0	123.3
Q3	101.4	108.2	112.7	107.6	107.7	124.3
Q4	102.7	108.5	112.9	107.7	107.3	125.3
2002 Q1	103.6	108.5	112.9	106.9	107.1	126.9
Q2	103.5	108.5	113.1	106.5	107.3	127.4
Q3	103.4	108.5	113.6	106.4	107.1	128.4
Q4	103.7	108.5	114.0	106.7	107.1	128.8
2003 Q1	104.1	108.5	112.8	107.5	108.7	130.8
<b>Percentage change, latest quarter on previous quarter</b>						
1998 Q1	1.8	0.2	..	..	0.2	0.3
Q2	0.5	0.0	..	1.7	-0.1	-0.2
Q3	0.2	0.0	..	0.9	0.2	-0.2
Q4	0.1	0.0	..	-0.8	0.2	1.1
1999 Q1	0.1	0.0	..	1.0	1.3	1.8
Q2	0.1	0.1	0.3	1.0	0.0	0.4
Q3	0.0	0.0	0.0	-0.6	0.0	0.5
Q4	-0.2	0.0	0.0	0.3	0.0	0.4
2000 Q1	0.3	0.3	2.3	0.2	0.5	1.9
Q2	0.1	0.0	0.1	-0.4	0.0	0.0
Q3	-0.2	0.5	1.2	0.4	-0.8	1.8
Q4	-0.2	0.4	-0.5	-2.2	-0.2	0.6
2001 Q1	-0.1	-0.2	-0.3	-0.8	0.0	1.4
Q2	0.1	0.2	0.1	-0.1	0.0	0.9
Q3	-0.2	1.2	0.0	0.8	-0.2	0.9
Q4	1.2	0.3	0.2	0.1	-0.4	0.7
2002 Q1	0.8	0.0	-0.1	-0.8	-0.3	1.3
Q2	0.0	0.0	0.2	-0.4	0.2	0.4
Q3	-0.1	0.0	0.5	-0.1	-0.2	0.8
Q4	0.3	0.0	0.4	0.2	0.0	0.3
2003 Q1	0.3	0.0	-1.1	0.7	1.5	1.6
<b>Percentage change, latest quarter on corresponding quarter of previous year</b>						
1998 Q1	2.1	1.1	..	..	..	3.6
Q2	2.8	1.1	..	..	..	3.3
Q3	2.6	0.8	..	..	0.4	1.7
Q4	2.6	0.2	..	..	0.4	1.1
1999 Q1	0.9	0.0	..	2.8	1.6	2.5
Q2	0.6	0.1	..	2.1	1.7	3.2
Q3	0.4	0.1	..	0.6	1.5	3.8
Q4	0.1	0.1	..	1.7	1.4	3.1
2000 Q1	0.2	0.4	2.6	0.8	0.5	3.2
Q2	0.2	0.3	2.4	-0.6	0.5	2.8
Q3	0.0	0.8	3.7	0.5	-0.3	4.1
Q4	0.0	1.3	3.2	-2.0	-0.6	4.4
2001 Q1	-0.4	0.8	0.5	-3.0	-1.0	3.8
Q2	-0.5	1.0	0.5	-2.7	-1.0	4.8
Q3	-0.5	1.6	-0.7	-2.4	-0.4	3.9
Q4	1.0	1.4	0.0	-0.1	-0.6	4.0
2002 Q1	1.9	1.7	0.2	0.0	-0.8	4.0
Q2	1.9	1.5	0.3	-0.3	-0.6	3.4
Q3	2.0	0.3	0.8	-1.1	-0.6	3.3
Q4	1.0	0.0	1.0	-1.0	-2.0	2.8
2003 Q1	0.5	0.0	0.0	0.5	1.5	3.0

# Corporate Services Price Indices (EXPERIMENTAL) (1995=100) – continued

TOP-LEVEL CSPI					
SIC (92)	Sewerage services* 90.00/1	Waste disposal 90.00/2	Commercial washing and dry cleaning 93.01	Including property rentals	Excluding property rentals
1995 net sector weights (%):				100.00	..
(including property rentals)	1.28	2.31	0.56		
(excluding property rentals)	1.82	3.29	0.79	..	100.00
Annual					
1998	114.1	129.0	108.9	108.4	107.8
1999	118.1	138.1	112.1	111.7	110.0
2000	107.8	145.2	114.8	116.2	113.4
2001	105.6	149.6	116.3	121.7	118.0
2002	106.2	156.3	117.0	124.5	119.6
Percentage change, latest year on previous year					
1998	3.8	1.8	..	2.8	2.1
1999	3.4	7.0	2.9	3.1	2.0
2000	-8.7	5.2	2.4	4.0	3.2
2001	-2.0	3.1	1.3	4.8	4.0
2002	0.6	4.5	0.6	2.3	1.4
Quarterly results (not seasonally adjusted)					
1998 Q1	111.0	128.5	107.3	107.3	106.8
Q2	115.2	129.2	109.2	108.3	107.9
Q3	115.2	128.9	109.8	108.8	108.0
Q4	115.2	129.3	109.4	109.3	108.3
1999 Q1	115.2	130.9	110.5	110.4	109.1
Q2	119.0	139.6	112.5	111.3	109.7
Q3	119.0	140.8	112.4	112.2	110.2
Q4	119.0	140.9	112.9	113.1	110.8
2000 Q1	119.0	141.7	114.6	113.9	111.3
Q2	104.0	147.3	114.9	115.6	113.0
Q3	104.0	146.2	115.3	116.9	114.1
Q4	104.0	145.5	114.4	118.3	115.3
2001 Q1	104.0	145.5	115.6	120.0	116.8
Q2	106.1	148.3	116.2	121.4	117.9
Q3	106.1	152.0	116.1	122.3	118.5
Q4	106.1	152.7	117.1	123.0	118.7
2002 Q1	106.1	152.7	117.4	123.4	118.7
Q2	106.2	156.6	117.1	124.3	119.5
Q3	106.2	157.3	116.9	124.8	119.9
Q4	106.2	158.8	116.5	125.5	120.3
2003 Q1	106.2	159.2	117.6	126.4	121.1
Percentage change, latest quarter on previous quarter					
1998 Q1	0.0	0.4	-0.4	0.9	0.6
Q2	3.8	0.5	1.7	1.0	1.0
Q3	0.0	-0.2	0.6	0.4	0.1
Q4	0.0	0.3	-0.4	0.5	0.3
1999 Q1	0.0	1.2	1.0	1.0	0.8
Q2	3.3	6.7	1.8	0.8	0.5
Q3	0.0	0.8	-0.1	0.8	0.4
Q4	0.0	0.1	0.5	0.8	0.6
2000 Q1	0.0	0.6	1.5	0.7	0.5
Q2	-12.6	4.0	0.2	1.4	1.5
Q3	0.0	-0.8	0.4	1.1	1.0
Q4	0.0	-0.4	-0.7	1.2	1.0
2001 Q1	0.0	-0.1	1.0	1.5	1.3
Q2	2.0	2.0	0.5	1.1	1.0
Q3	0.0	2.5	-0.1	0.7	0.4
Q4	0.0	0.4	0.8	0.6	0.2
2002 Q1	0.0	0.0	0.3	0.3	0.0
Q2	0.1	2.6	-0.3	0.8	0.7
Q3	0.0	0.4	-0.2	0.4	0.4
Q4	0.0	1.0	-0.3	0.5	0.3
2003 Q1	0.0	0.2	0.9	0.7	0.7
Percentage change, latest quarter on corresponding quarter of previous year					
1998 Q1	3.9	1.6	..	2.7	2.1
Q2	3.8	2.6	..	2.8	2.3
Q3	3.8	1.7	3.1	2.7	2.0
Q4	3.8	1.1	1.5	2.9	2.1
1999 Q1	3.8	1.9	3.0	2.9	2.2
Q2	3.3	8.1	3.0	2.7	1.7
Q3	3.3	9.2	2.3	3.1	2.0
Q4	3.3	8.9	3.2	3.5	2.3
2000 Q1	3.3	8.2	3.7	3.2	2.0
Q2	-12.6	5.5	2.1	3.9	3.0
Q3	-12.6	3.8	2.6	4.2	3.6
Q4	-12.6	3.3	1.3	4.5	4.1
2001 Q1	-12.6	2.7	0.9	5.4	4.9
Q2	2.0	0.7	1.2	5.1	4.4
Q3	2.0	4.0	0.7	4.7	3.8
Q4	2.0	4.9	2.3	4.0	2.9
2002 Q1	2.0	5.0	1.5	2.8	1.6
Q2	0.1	5.6	0.8	2.4	1.3
Q3	0.1	3.4	0.7	2.1	1.2
Q4	0.1	4.0	-0.5	2.0	1.3
2003 Q1	0.1	4.2	0.1	2.5	2.0

# Retail Sales Index Development

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## Summary

A number of aspects of the methods and systems used to produce the Retail Sales Index (RSI) are under review. This development and investigatory work covers a number of areas:

- to rebase the RSI from 1995=100 to 2000=100;
- review of the survey methods used for the Retail Sales Inquiry (the survey that underlies the RSI);
- development of a new index construction system;
- seasonal and calendar adjustment methods.

This development work will move the RSI onto the standard methods and systems used for other economic statistics. This development work is being considered for implementation in October 2003 at the earliest. An update of the development work will be provided in a further article.

## Introduction

As explained in an article 'Interpreting Retail Sales Data' in April 2003 *Economic Trends* (Davies and Hopwood 2003), the Retail Sales Index (RSI) is currently being rebased onto 2000=100. The Retail Sales Inquiry is also subject to a triennial review. This article gives a brief overview of the RSI and describes the development and investigatory work currently underway for the RSI. Each of the topics under investigation is explained in turn. The final section sets out next steps for the development work. The article is in seven parts:

Part 1 – Overview of the RSI

Part 2 – Developments

Part 3 – Rebasing

Part 4 – Review of survey methods

Part 5 – Index construction

Part 6 – Seasonal and calendar adjustment

Part 7 – Next steps

## Part 1 – Overview of the RSI

The RSI and the Retail Sales Inquiry are explained in an article 'Interpreting Retail Sales Data' published in April 2003 *Economic Trends*.

The Retail Sales Index (RSI) is a base-weighted (Laspeyres) index measuring monthly movements in the average weekly retail turnover of retailers in Great Britain. Headline data are presented in constant prices (volume) seasonally adjusted. The seasonally adjusted series are also adjusted for calendar effects introduced because the RSI is based on a pattern of four, four, five week standard periods within a quarter.

The RSI is compiled from data collected in the Retail Sales Inquiry; the inquiry goes out to a sample of almost 5,000 retailers of all sizes every month. All of the largest 900 retailers are included in the sample, together with a sample of smaller retailers.



The Retail Sales Inquiry collects total retail turnover from retailers for the standard periods of four, four, five weeks within each quarter. Around three-quarters of respondents provide data for these standard periods. Some retailers are unable to report on the standard four or five week basis. Where this is the case, the data is adjusted to bring it into line.

## Part 2 – Developments

Between now and October 2003 we will be carrying out the routine rebasing of the RSI from 1995=100 to 2000=100. Rebasings is likely to lead to revisions from January 2000 onwards. We are also conducting a triennial review of the Retail Sales Inquiry, which will include a review of the survey estimation.

The computer system to produce the retail sales index works only with the matched-pairs methods so if we update our estimation method we will need a new index construction system. A new system would have minimal impact on the numbers.

We are also taking the opportunity of rebasing and the review of estimation to look at some other aspects of the Retail Sales Index, such as calendar and seasonal adjustment.

## Part 3 – Rebasings

We are planning to rebase the RSI from 1995=100 to 2000=100 and to publish the results in October 2003. This is a routine five-yearly process. For the RSI, the main stages in the rebasing exercise are:

- re-weight the deflators from the current base year (1995) to the new base year (2000);
- re-reference the index onto 2000=100.

The rebasing exercise is also an opportunity to introduce some other associated improvements. The EU have recently produced a European wide classification of commodities – COICOP (Classification of Individual Consumption by Purpose). The rebased RSI will use the COICOP classification for deflators from 2000 onwards. We are also considering whether to move from using an arithmetic mean to a harmonic mean for combining the detailed commodity deflators.

As in previous rebasings we will also:

- Reset RSI turnover estimates in the base year (2000) to equal Annual Business Inquiry estimates in 2000.
- Rework turnover estimates for each month from the base year

to date (to take account of the new turnover levels in the base year and latest data from retailers).

- Link the 2000=100 series to the existing 1995=100 indices. This will maintain the 1995 based growth rates prior to 2000, resulting in a loss of additivity in the historical estimates.

For this rebasing exercise, we are considering:

- Redefining our size strata for estimation based on employment size rather than turnover.
- This would mean we would re-define 'small' and 'large' retailers. At the moment large retailers are defined as those with a turnover of at least £5 million in the base year (1995), it is likely that we would define large retailers as those with employment greater than or equal to 100. The difference between these two definitions is likely to be small.
- Taking on changes in industrial classification and size of firms as they happen, rather than periodic updating at the time of rebasing.

Although we eventually aim to chain-link the RSI, we do not expect to be able to do this to the same timetable as for the National Accounts (the plan is to publish chain-linked National Accounts in the 2003 *Blue Book*). However, when National Accounts chain-linking is introduced, the National Accounts will be chain-linked up to 2000, and will be on a 2000=100 base for the period from 2000. The National Accounts and RSI will thus be on the same basis for the most recent periods.

## Part 4 – Review of survey methods

We are carrying out a triennial review of the Retail Sales Inquiry (the survey which underlies the Retail Sales Index) as required under the Prime Minister's instruction on the control of statistical surveys. These reviews of surveys are to assure us that surveys are still required, that they continue to meet their customer needs and impose the minimum burden on contributors subject to meeting user needs.

### Updating the sample allocation

The total sample size for the retail sales inquiry is 5,000; this sample is allocated to industry by sizeband strata or 'cells'. We have recently implemented the following changes:

- the allocation has been designed to minimise the standard error of the monthly change in retail sales;
- retailers with between 10 and 99 employment will remain in the survey for 27 months;

- small retailers with large turnover (annual turnover at least £40million) will always be included in the sample.

The changes were implemented in three stages between September 2002 and January 2003.

### Survey estimation

As part of the current triennial review we are taking forward a recommendation from the last triennial review. The last review recommended that 'the retail sales index should move ... to a system based on grossing to the register each month' – i.e. to use ratio estimation, the standard business survey method of estimation. The Retail Sales Inquiry currently uses a matched-pairs approach for the sampled part of the survey (about 30 per cent of the total retail turnover), rather than 'ratio estimation' that is more commonly used for business surveys. Table 1 compares the main features of matched-pairs and ratio estimation.

Table 1

Matched pairs	Ratio estimation
Designed to estimate month on month changes	Estimates a level for each period – growth rates derived from level estimates
Uses data from respondents who have returned for current and previous periods	Uses all returned data
Therefore, stable over two consecutive months	Consecutive levels estimates can be volatile
Measures changes only in the sample chosen	Takes account of changes in the total turnover of the retail industry

The review will consider the feasibility of introducing ratio estimation for the Retail Sales Inquiry, and the likely impact.

### Other survey processes under review

We are considering whether other survey processes need to be changed to work with ratio estimation. The areas being considered for change are:

- Imputation for non-response;
- Outlier detection and treatment.

### Imputation for non-response

We routinely response chase retailers who fail to respond to the survey. Even so, some large retailers (those with employment of at least 100) fail to respond in time to be included in provisional survey results. For these large non-responding retailers, figures are manually

imputed based on the individual histories of the retailer concerned. Smaller retailers who do not respond are assumed to move in the same way as small responding retailers. We are considering whether we can use the standard ONS business survey method for imputing for non-respondents for the retail sales inquiry. This standard method calculates, within each industry, the average monthly movements for those retailers who have returned. It then applies that average monthly movement to the previous (returned or imputed) value for non-responding retailers. This produces an imputed turnover figure for the retailer for the current month. The performance of this standard method will be tested for the RSI.

### Outliers (contributors with atypical returns)

Unusually high or low turnover returns from retailers can distort the turnover estimates produced. The current approach:

- Completely excludes a retailer's data if the ratio of the current month's sales to the previous month's sales is less than 0.2 or greater than 5; experience has shown that data outside these limits is usually incorrect. Retailers with data which is less extreme but atypical may be excluded from the calculation of the month on month movement but their data will be added back to produce the final totals. These less extreme, atypical retailers are currently identified manually.

We are considering whether a commonly used standard method ('winsorisation') should be introduced for identifying and treating outliers.

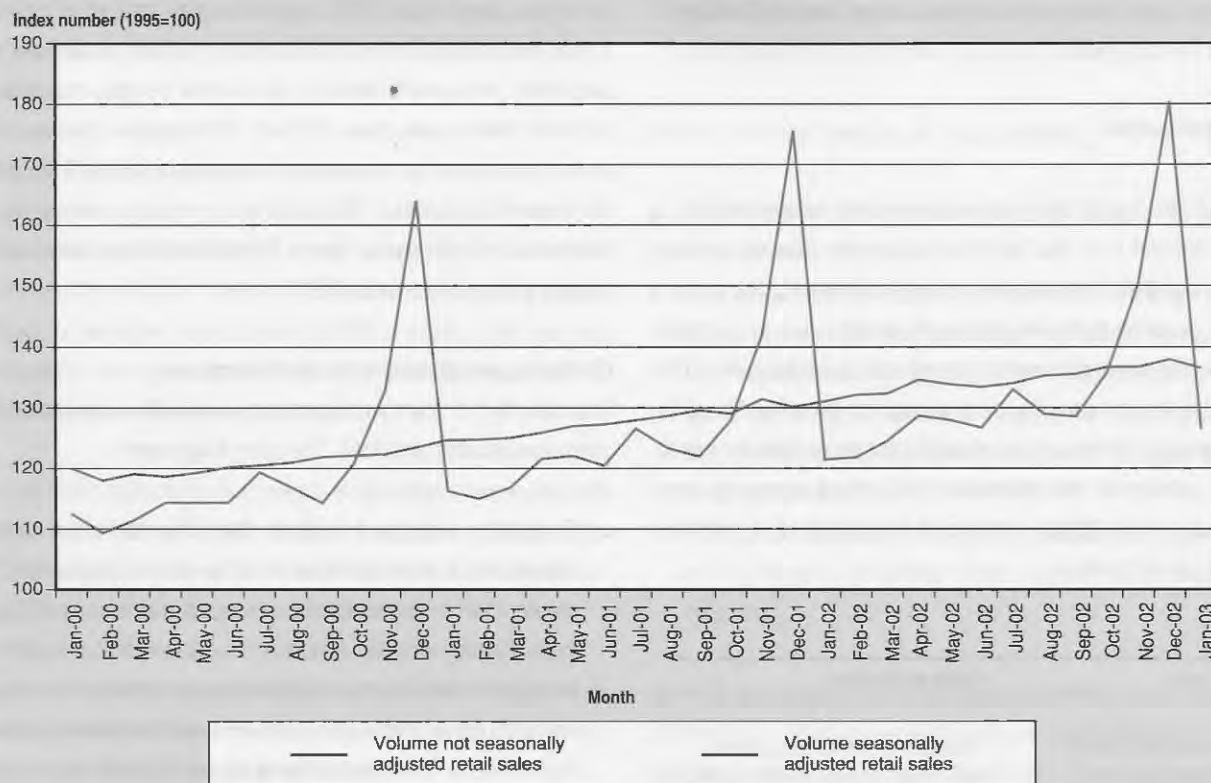
## Part 5 – Index construction

The current computer system to produce the Retail Sales Index works only with the matched-pairs methods so any move to ratio estimation would need a new index construction system. A new system would have minimal impact on the numbers, but would move the RSI onto a more modern system. We are considering a system based on that being developed for the Index of Production (Fletcher and Williams 2002). A new system would deliver the following benefits:

- Improved flexibility – to respond to future developments and improvements to methods.
- Improved consistency and coherence – the RSI would move to the ONS standard computing system and environment, as used for other economic statistics. As a result, the RSI would be able to take advantage of standard functionality. For example, we would be able to more easily chain link the RSI (although chain linking is unlikely to be implemented before October 2003).
- Opportunity for more analyses.

**Figure 1**

**RSI all retailing volume, Seasonally adjusted and not seasonally adjusted**



## Part 6 – Seasonal and calendar adjustment

Figure 1 illustrates the profound seasonality exhibited by retail sales each year. Sales build up heavily towards Christmas and then fall away very sharply in January. There is a modest build up in the summer and fallback in the autumn. Sometimes there is a more modest build up to Easter and fall back afterwards. However, while the broad sweep of these patterns are similar from year to year, many complications can occur that distort the seasonal patterns.

### Overview of RSI seasonal and calendar adjustment

- The RSI is seasonally adjusted using X11ARIMA, the standard program for seasonal adjustment in ONS.
- Special measures are in place to deal with the moving bank holidays and the phase-shift effect (see below) – this is known as calendar adjustment.
- Moving bank holidays: when working with calendar month based data, the only holiday that moves between months is Easter. However, when data is compiled on a four, four, five

week basis the late May Bank Holiday and the August Bank Holiday also become moving holidays, since they do not always occur in the same standard RSI period.

- The phase shift-effect: RSI data are presented for four, four, five week standard periods within a quarter and so are not subject to trading day variation (for example, in a calendar month there are sometimes four Saturdays and sometimes five). However, the standard periods do introduce a 'phase-shift' effect, associated with the fact that the standard periods do not match calendar months and move slightly each year relative to the calendar month. In a typical year, the standard periods total 52 weeks or 364 days compared to 365 (366 in a leap year) in a calendar year. As a result, the standard periods 'slip back' one (or two) days every year. The reporting year is brought back into line with the calendar year by adding an extra week, normally to January, every five or six years. Adjusting for the phase-shift moves the estimate based on the standard period onto an 'average' month.
- Calendar adjustment is applied within X11ARIMA (as permanent prior adjustment factors).



We are taking the opportunity of rebasing and the review of estimation to review seasonal and calendar adjustment.

The basic approach to calendar and seasonal adjustment will remain unchanged. The seasonal adjustment parameters need to be reviewed periodically; any changes to the parameters will take account of the recent data, including any revisions from January 2000 as a result of rebasing and the review of estimation.

### **Reviewing calendar adjustment**

The current approach to calendar adjustment is based on fitting a regression model to estimate the impact of moving bank holidays and the phase-shift effect. The current model was derived using data up to the mid 1990s. We are reviewing the regression model using data up to the end of 2002, which might lead to a revised regression model.

Any changes to seasonal or calendar adjustment will possibly lead to changes from January 2000 onwards. Any changes will be considered for implementation in October 2003 at the earliest.

### **Part 7 – Next Steps**

We will continue with our work to rebase the RSI onto 2000=100 and to publish a rebased dataset in October 2003. The rebasing exercise is likely to introduce revisions to published data from January 2000. These revisions will affect all published series. We will continue to evaluate the methods and systems being considered. An article explaining the likely impact on the RSI will accompany any changes. Implementation will be in October 2003 at the earliest and is unlikely to lead to revisions prior to January 2000.

For further information please contact Pam Davies, e-mail [pam.davies@ons.gov.uk](mailto:pam.davies@ons.gov.uk)

### **References**

- Davies P and Hopwood P (2003) Interpreting Retail Sales Data. *Economic Trends* No. 593 pp 48–54.
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# The impact of redeveloping the Index of Production

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## Summary

- The Index of Production computer system has been updated, with some changes made to the methodology and compilation method. This has affected growth back to 1994.
- Results from the new system will be published as part of the September 2003 *Blue Book* dataset and when the new system replaces the existing IoP system in October 2003.
- This article outlines the system changes and the methodological enhancements and discusses their impact on the IoP.
- The main methodological enhancements are chain-linking, splining of quarterly stock data, smoothing and producing current price stock adjusted indices for the first time.
- There is more growth in the new IoP than the existing IoP due to these changes but actual growth figures will be published in September 2003.

## Introduction

Following an article which explained the conceptual basis of the IoP and the reasons required for both system and methodological changes, (Fletcher and Williams, 2002), this article discusses the breakdown of the IoP methodology concentrating on the changes that have been made to the existing system and their impact on the data. The new system and therefore the methodological changes will replace the existing IoP system in October 2003 and the first new data will be published as part of the September 2003 *Blue Book*. There will be six methodological changes of note and one major system change. This article is split into nine sections;

1. Overview of the IoP;
2. The new system – benefits;
3. Seasonal adjustment – changes and impact;
4. Inventory adjustment – changes and impact;
5. Smoothing - changes and impact;
6. Annual Chain-linking – impact;
7. Current price series – changes;
8. Setting lagged industries order distributions to zero – changes and impact;
9. Timetable.

For more detail on the conceptual basis of the IoP and the reasons for change see (Fletcher and Williams, 2002).

## 1. Overview of the IoP

The UK Index of (industrial) Production has existed in more or less its present form since the late 1940s. Using 1995 weights, the IoP represents 26.8 per cent of total GDP(O), the output measure of GDP. The IoP covers manufacturing (21.8 per cent of GDP(O)); mining and quarrying (2.6 per cent of GDP(O)), and energy supply industries (2.4 per cent of GDP(O)), and is published separately on a monthly basis. The main data source for the IoP is the Monthly Production Inquiry, which provides turnover data for around 75 per cent of overall production. The remaining 25 per cent is accounted for by series based on volume indicators, such as oil and gas extraction and electricity and gas supply, which are provided mainly by the Department of Trade and Industry.

Turnover data are deflated using weighted combinations of home and export producer prices. Inventory adjustments, obtained from monthly and quarterly ONS surveys, are then applied to the series to produce an estimate of total output.

Most four-digit constant price industry indices are seasonally adjusted and then weighted together (currently using 1995 weights) to produce higher level aggregates and the total IoP. Series showing not seasonally adjusted data, and aggregations by market sector (rather than industry) are also produced, alongside the current and constant price series.

The IoP is published 26 working days after the reference month. The First Release gives details of seven industrial sectors within manufacturing, as well as showing the market sector breakdowns and oil and gas extraction.

The new IoP system has been developed as a number of distinct modules following the standard method of index construction. The modules are outlined below:

- **Pre-processing** – turnover data, inventory data, and price indices are quality assured in preparation for indexing. This also includes lagging deflators in industries where sales figures are made up of orders made at previous prices.
- **Indexing** – the initial turnover index is calculated to give a Current Price (CP) index.
- **Deflation** – the index is deflated using Producer Price Indices (PPI's) and Export Price Indices (EPI's) which are combined to give a harmonic deflator. This step produces a Constant Price (KP) index.
- **Seasonal Adjustment** – the deflated index is seasonally adjusted using standard seasonal adjustment X11 ARIMA models.
- **Ad hoc data quality adjustments** – the index is adjusted to remove anomalies only identified during the examination of the seasonally adjusted series.
- **Inventory adjustment** – the index is adjusted for changes in inventories to produce an output index rather than a turnover index.
- **Smoothing** – 13 of the inventory adjusted indices are smoothed to remove excess volatility caused by using monthly sales and quarterly stocks data.
- **Aggregation** – low level (4 digit SIC indices) are aggregated to 2 digit and higher levels. Currently the aggregation uses 1995 weights but will, after the 2003 *Blue Book*, use annually chain-linked weights. The benefits of this are discussed in (Tuke and Ruffles, 2002) and (Tuke and Beadle, 2003).
- **Constraining** – Constraining attaches the most recent data (for the 'open' revisions period), to the 'constrained' published series, which are not open for revision.
- **Balancing** – the aggregated indices can be balanced at this stage so that their growth matches the quarterly GDP(O) growth rates using balancing or coherence adjustments. The IoP will not be balanced, however, in the short term.

Current price (CP) processing after initially producing an index is another feature of the IoP system. Both KP indices and CP indices are produced by the IoP every month.

## 2. The new IoP computer system

The new IoP index construction methodology has been developed in the database software WinCSDB. WinCSDB is an ONS in-house designed database with a Windows front-end. It is the National Accounts Group (NAG) standard software for storing and calculating time series datasets. As a database it is more robust, has better security and data storage facilities than the existing IoP system which was developed in the spreadsheet software SMARTWARE. There are, however, some disadvantages with using a database, in particular the processing speed, transparency and ease of manual intervention. All of these disadvantages have been addressed during the development to ensure that WinCSDB can provide the functionality and performance required to produce the IoP under the existing time constraints. A full comparison of the two systems is presented in Figure 1.

Figure 1 A comparison of WinCSDB and SMARTWARE

	WinCSDB	SMARTWARE
Pros	<ul style="list-style-type: none"> <li>• NAG standard</li> <li>• Supported corporately</li> <li>• Database concept</li> <li>• Archiving facilities</li> <li>• Publication facilities</li> </ul>	<ul style="list-style-type: none"> <li>• Processing speed</li> <li>• Some transparency</li> <li>• Manual intervention easy</li> </ul>
Cons	<ul style="list-style-type: none"> <li>• Slower processing</li> <li>• Manual intervention slow</li> <li>• Poor analytical tools</li> <li>• analytical tools</li> </ul>	<ul style="list-style-type: none"> <li>• Non-standard</li> <li>• Unsupported</li> <li>• Spreadsheet concept</li> <li>• Poor archiving facilities</li> <li>• No publication facilities</li> <li>• Black-boxes</li> <li>• Poor analytical tools</li> </ul>

## 3. Seasonal adjustment and constraining – changes and impact

Seasonal adjustment in the IoP takes place at the four-digit level of the SIC. Currently, seasonal factors are revised only for periods which are open for revision according to the National Accounts Revisions Policy. Sometimes this can be as little as the month prior to the current month, as is the case when February results are produced. Other times, the whole year's factors can be revised, for example at December and January results. The new methodology allows all periods to be revised in the underlying series and then constrains out revisions for periods which are not allowed to be revised for publication. This gives the best unconstrained seasonally adjusted

four digit series possible at all times. The new methodology applies growth rates from the unconstrained four digit series to the latest periods not allowed to be revised (this is consistent with the method used to constrain GDPO and recommended in the Short Term Output Indicators Review (STOIR)). This means that growth rates into the latest part of the series should be more accurate than before and will ensure consistency between the four digit data and that for higher aggregates. Generally the overall IoP is rarely affected by more than 0.1 of an index point due to recalculating seasonal factors each month.

#### **4. Inventory adjustment – changes and impact**

Changes in quarterly inventories are now splined using a cubic spline to interpolate the monthly path rather than apportioned as an average across the quarter. This usually leads to small revisions to the indices of around 0.5 to 2 index points in most periods. Larger changes occur when splining causes a negative or positive adjustment to be assigned to a month where simple averaging would have led to an adjustment with the opposite sign being applied. This has the effect of exaggerating the difference as the adjustment to the IoP causes the index in the one month to be increased, say, while the next month is reduced.

The methodology will produce a more accurate monthly index, e.g. say the change in inventories in for a quarter was 6, averaging would give 2 in each month but splining may give –2 in month 1, 3 in month 2 and 5 in month 3 (overall 6 for the quarter). This can cause relatively significant revisions at the four digit level. Generally the overall IoP is rarely affected by more than 0.1 of an index point due to splining of inventories.

#### **5. Smoothing – changes and impact**

Thirteen as opposed to thirty-seven series in the existing system are smoothed to remove the volatility that is caused by collecting quarterly inventories and monthly sales. If destocking or stockbuilding takes place more in some months than in others of a quarter then sales figures collected on a monthly basis will reflect this. However, the figure for the inventory adjustment (calculated either by averaging change in quarterly inventories, as in the existing system, or by splining the change in quarterly inventories, as in the new system) will not reflect these movements. Analysis of each industry in the IoP indicates if this type of phenomenon is occurring for that particular industry.

The result of this discrepancy is volatility in the series which is then removed by smoothing using a Henderson smoothing method (or a Kalman filter in the existing system).

For example, using output rather than indices for simplification, say the sales for three months were 100, 150 and 100 respectively, while the quarterly inventory change was –60. This inventory change using the splining method of apportioning would be applied say as –15, –30 and –15 respectively (in the existing IoP this would be applied as a –20 change to each month), making the output 85, 110 and 85 respectively. However, in reality, destocking actually occurred more in month 2 than in months 1 and 3 to meet the strong demand in the middle month. The inventory change should be –5, –50, –5 giving, 90, 100 and 95 as the final output figures but splining will not produce this result. Hence, if this phenomenon is known to occur in an industry, applying a smoothing method will smooth the original output 85, 120, 85, to produce something closer to the correct figures of 95, 100 and 95.

In the existing system, after smoothing, the series are not benchmarked to the quarterly totals. Benchmarking has been incorporated into the new system, as the quarterly totals should be correct and the discrepancy between quarterly stocks and monthly sales should only cause volatility within the quarters and not between the quarters. However, this change in methodology does have a considerable impact on a handful of those series which are smoothed, although not on the overall IoP due to the relatively small number of series which are affected (impact on the overall IoP is never more than 0.2 of an index point).

#### **6. Chain-linking – changes and impact**

Annual chain-linking is a method for aggregating volume measures of economic growth which better reflects the changing structure of industry and patterns of expenditure. It is described as 'annual' because annual rebasing or updating of weights will replace 5-yearly rebasing and 'chain-linking' because each year of growth estimates on one price base will be chain-linked to the next year to create a continuous time series. The index for the year of the most recent weights will be given the value of 100 and this will be updated every year.

Using the existing fixed base methodology which annual chain-linking replaces, industries with fast-growing volumes and stable or falling prices tend to be over-weighted as we move away from the base year and industries with slow-growing volumes and rising prices tend to be under-weighted. Using more up-to-date weights will help to reduce this distortion where it occurs and investigation shows that introducing annual chain-linking is likely to have an overall modest downward impact on annual GDP growth. However, for components of GDP, the introduction of annual chain-linking will only have a downward impact if detailed inputs fit this association of rising

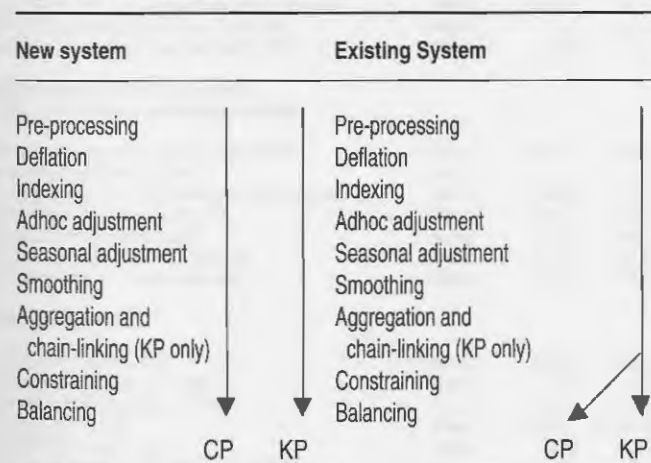


volumes with falling prices and vice versa. Where rising volumes are associated with rising prices or vice versa, annual chain-linking may have a positive impact on the growth of aggregates, and this seems to have occurred in manufacturing in all of the years from 1997 onwards except for 1998, when there is a small negative impact from chain-linking. A previous *Economic Trends* article outlined the industries which provide the extra growth (Tuke and Beadle 2003). Further analysis has revealed that electricity supply from within section E of the SIC is also providing significant extra growth for all years from 1998 onwards.

## 7. Current Price – changes

A CP IoP is derived from the KP series on the existing IoP system, but the new system allows the CP IoP to be calculated in parallel with the KP series. This will improve the consistency, accuracy and transparency of the CP index and allow an inventory adjusted CP index to be produced for the first time. However, only KP indices are chain-linked in the new system, the CP indices are calculated on a 5 yearly fixed base method similar to the method used to produce both KP and CP indices in the existing IoP system. Figure 2 gives a diagrammatic summary of index construction of the IoP.

Figure 2 IoP Index construction



## 8. Setting lagged industries with missing lagged distributions to non-lagged.

Fifty-three industries in the IoP require lagged deflators to account for sales in one period being composed of orders made in previous period prices. The deflators are derived using orders distribution and the non-lagged industry deflators. However, three of the industries in the existing system do not have any data in their orders distributions. Hence, the existing system instead uses deflators and a distribution

from a similar industry to produce lagged deflators for these industries. This seems plausible except the similar industries selected have in all three cases moved away from these industries in terms of their home and export deflators. This has caused deflators to be calculated which can be as much as 20 index points different from the average deflator for the industry over the previous 24 months and therefore the deflators calculated by the existing system would seem implausible. The deflators have been changed so they are no longer lagged but this produces a change in the IoP at the four-digit level of up to 15 index points. This impact is relatively significant at the published group level (the three industries are from the basic metals published group) but is necessary to correct assumptions on orders distributions that now appear to be implausible. In order to lag these industries the ONS would need to undertake a new Timing and Prices Survey.

## 9. Timetable

Figure 3 presents the timetable for the final delivery of the new IoP.

Figure 3 Timetable for delivery of the IoP

Time period	Task and deliverable
March 2003	Hand the developed system to the IoP production team-completed
July 2003	Deliver new datasets to <i>Blue Book</i> 2003
September 2003	<i>Blue Book</i> 2003 IoP data published
From October 2003	Produce the first IoP monthly outputs on the new system

The new datasets will be published on 30 September 2003.

## Conclusion

The main conclusions to draw from this article are:

- The IoP will be produced on a more robust and reliable computer system;
- The IoP will be produced using improved methodology most of which will only have a small impact on the overall IoP. Chain-linking will have a significant impact.
- The new IoP will be published on 30 September 2003 and the first monthly release on the new basis will be on 7 October 2003.

If you would like any further information regarding this project or the IoP in more detail please contact the authors of this article. You can obtain more detail on the methodology of the indicators in the Short Term Output Indicators section of the National Statistics website.



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