Semi-Annual Statement on Monetary Policy

Introduction

The economy moved through a period of slower growth in 1996 during which inflationary pressures eased significantly. The March quarter CPI result confirms that underlying inflation has returned to an annual rate of close to 2 per cent, and the prospects of inflation remaining low in the near future appear to be good. With some surplus capacity existing there is scope for the economy to grow more quickly in 1997 without generating significant inflationary pressures, provided growth in labour costs is not excessive.

So far in 1997 there have already been some indications that the pace of growth is picking up, particularly in areas of construction investment, housing and consumer spending. Growth is being supported by several factors including the effect of the three policy easings in the second half of 1996, which brought cash rates down by 1\(\frac{1}{2}\) percentage points. The impact of those cash rate reductions on home mortgage borrowers has been reinforced by a significant compression of intermediaries' interest margins in that area. The lower interest rates now in place should be supportive of interest-sensitive areas of activity, particularly housing and non-residential construction, as well as helping household and business cash flows.

Other factors favourable to growth at present include the strong US economy, moderately rising commodity prices, and an historically good level of business profitability in many industries.

Conditions in the manufacturing sector have been an exception to this generally firmer picture, with profitability under pressure and investment intentions declining. The pressure on profitability reflects a combination of rising wage costs and flat selling prices, which continue to be constrained in many parts of the manufacturing sector by strong international competition. With the exchange rate having risen in trade-weighted terms, pressures on competitiveness have intensified during the past year. Looking ahead, however, a number of areas of domestic manufacturing are likely to benefit from the expansion in housing and non-residential construction now under way.

Employment growth has lagged behind the overall pace of economic activity. Total employment has been growing at a rate of around 1 per cent in the past year, concentrated in part-time jobs. Nonetheless, the number of job vacancies has increased and employment can be expected to strengthen as the general pace of activity picks up over the course of the year.

The favourable near-term outlook for inflation is being underpinned by continued help from the exchange rate in holding down...
import prices. Also helpful to the outlook is the result of the recent Safety-N et Re view by the Australian Industrial Relations Commission, which delivered only moderate increases in award wages. However, other developments in labour costs are of more concern for the longer-term inflation outlook. Wage increases under enterprise bargaining continue to be in the 4 to 5 per cent range, figures which appear high in a climate of 2 per cent inflation and 8\textfrac{1}{2}\ per cent unemployment. Aggregate wages data, which encompass workers on award wages, enterprise agreements and other bargaining arrangements, suggest that the overall pace of wages growth has picked up recently. These figures will need to be closely watched to assess the extent to which they represent a significant change in trend but, taken at face value, they suggest that wages growth is becoming uncomfortably high.

The capacity of the economy to grow faster while maintaining low inflation will depend importantly on the future behaviour of wages. A significant acceleration of aggregate wages in response to stronger economic growth would directly curtail job creation. It would also threaten faster inflation - to which monetary policy would have to respond - and thereby put at risk the potential for faster non-inflationary growth. Lessening of wages growth would, on the other hand, enable faster growth without risk of acceleration in inflation.

While potential wages developments are a source of longer-term uncertainty for the inflation outlook, the immediate prospects are that inflation will remain low. The Bank’s assessment is that the current level of cash rates is accommodating the pick-up in activity without prejudicing continued low inflation.

**The Australian Economy**

The economy is now in its sixth year of expansion since the recovery from recession began in 1991. After a period of slower growth during 1996, there are a number of indications that the pace of growth is picking up. Non-residential construction activity is increasing, and forward indicators of activity in that sector point to the prospect of further growth ahead. The housing cycle is also moving into an upward phase, while the latest indicators of consumer spending point to some rebound from the weakness experienced in the second half of 1996. At the same time, there remain a number of weak spots. Employment growth during the past year has been only moderate, and remains less than trend labour-force growth. Full-time employment has been flat. There are also areas of weakness in the outlook for business equipment investment, particularly in the manufacturing sector. The prospects, however, are that the labour market and conditions in manufacturing will strengthen in the year ahead as the general pace of activity picks up.

**Domestic activity**

Growth of non-farm GDP in 1996 was somewhat below trend, coming in at 2.8 per cent for the year to the December quarter (Graph 1); growth of total GDP over the year was 3.1 per cent. Although the quarterly pattern has been quite uneven, and often difficult to interpret, the estimates suggest that growth was slower in the second half of the year, at an annual rate of around 2 per cent. Slower growth in 1996 largely reflected a slowing in consumer spending which, in turn,
was probably related to weaker employment growth during the year. The effect of this weakness in the consumer sector on overall activity was, to some extent, offset by robust growth in business investment.

Viewed from a longer-term perspective, a mild slowing of growth within the course of a longer period of expansion is not unusual. Each of the periods of economic expansion in the past couple of decades included a noticeable episode of mid-term slowing. In 1985/86, for example, non-farm GDP did not grow at all for a period of about a year before growth resumed and falls in unemployment recommenced. The current recovery to date has been of intermediate pace between the recoveries of the past two decades, and it has some way to run before exceeding the duration of those earlier recoveries (Box 1).

The business sector

Strong growth in business investment has occurred in most sectors of the economy during the past year. At an aggregate level, business investment grew by 21 per cent in real terms over the year to the December quarter, with growth strong in both the equipment and construction components. The ongoing recovery in investment has lifted investment spending as a share of nominal GDP well above the 1991 trough, to levels that are close to the averages of the past decade; it remains well below the peaks reached in the late 1980s (Graph 2), so that there is room for further expansion.

In the construction sector, the expansion currently under way is much more broadly based than was the case in the late 1980s investment boom, which was heavily concentrated in city office development. Much of the current strength in construction activity is coming from engineering construction - infrastructure, mines and so on - while non-residential building activity is quite broadly based across office, hotel, retailing and other developments. The prospects are good, therefore, for the expansion to continue without developing the sorts of imbalances that emerged in the late 1980s. A rapid rise in the backlog of work yet to be done on projects commenced suggests a continuing strong outlook for engineering construction activity in the year ahead (Graph 3). The same is true, to a lesser extent, for non-residential building projects, and is confirmed by the recent high levels of building approvals.
Like virtually all industrialised countries, Australia has experienced three recessions and three expansions in the past quarter of a century. This box sets out the facts on the length of the economic expansions following the recessions of the mid 1970s, early 1980s and early 1990s.

Recessions and expansions cannot be dated by simply looking at figures for GDP. Any single variable is likely to contain too many random movements for it to be used as the sole arbiter of the timing of business cycles (some anomalous instances are illustrated below). Instead, a range of national accounts aggregates, labour market measures and indicators from the manufacturing sector are used to develop a more general picture of cyclical developments.

**Dating recessions**

These cyclical indicators are summarised in Graphs 1, 2 and 3. In each case, the shaded areas show the recession, broadly defined as a period in which there is some fall in the level of the indicator of economic activity (or rise in the case of the unemployment rate). The exact position of the shaded area varies slightly according to which cyclical indicator is used, but the similarity of the pattern far outweighs the differences.

Graph 1 shows four measures of economic activity derived from the national accounts. Interestingly, it is these that give the least satisfactory dating of the business cycle. Although they point to the usual pattern of three recessions and three expansions, there are two anomalies.

The first is that GDP and non-farm GDP both show only a short and modest fall in economic activity in the 1974 recession, unlike those shown by other national accounts measures and data on the labour market and the manufacturing sector.
starting point of another cycle; the 1980s expansion was also characterised by a mid-cycle slowing.

Graph 2 shows that labour market measures clearly identify three recessions. Each is quite pronounced, and the only unusual aspect is that the 1970s recession shows up as being quite prolonged when measured by the rise in the unemployment rate, which rose almost continuously from June 1974 to March 1978. The large rise in real wages at this time explains why the unemployment rate indicates a deeper and longer recession than the other indicators of the cycle.

Graph 3 shows three measures from the manufacturing sector. Two measures of manufacturing output have been used because neither completely covers the estimation period. Again, each recession and expansion is very pronounced. This is not surprising, given that the manufacturing sector usually shows much greater cyclical movements than the economy as a whole.


2. The index of production is the ANZ Bank Index of Factory Production, which was also maintained at one stage by the Westpac-Melbourne Institute for Business Cycle Analysis. It was discontinued in June 1994. Manufacturing output is the official series produced by the ABS in the national accounts. This is a superior series, but only starts in September 1974.
Length of expansions

Having dated the recessions, the expansions can then be identified as the period between each recession. Table 1 shows the length and strength of each expansion, based on eight of the ten indicators. (Two cyclical indicators - unemployment and ACCI/Westpac Survey - have not been used because it is not possible to calculate growth rates from them.)

On the basis of the above measures, both of the previous expansions lasted 6–7 years. Some data on the current expansion to date are included for indicative purposes, but its length cannot be determined until it finishes. The average growth rate of each variable for each expansion is shown in parentheses. On the basis of each of the eight variables, the 1980s expansion has been the strongest, the current expansion is the next strongest and the 1970s expansion is the weakest. Part of the strength of the 1980s is due to faster population growth at that time. The differences in growth rates for non-farm GDP per head across the three expansions are smaller than for most of the other variables.

Table 1: Length of Expansion and Average Rate of Growth of Selected Variables

<table>
<thead>
<tr>
<th></th>
<th>From 1970s recession</th>
<th>From 1980s recession</th>
<th>From 1990s recession to date</th>
</tr>
</thead>
<tbody>
<tr>
<td>GDP</td>
<td>7 1/4 years (3.3%)</td>
<td>7 years (4.6%)</td>
<td>5 1/2 years (3.6%)</td>
</tr>
<tr>
<td>Non-farm GDP</td>
<td>7 1/4 years (3.3%)</td>
<td>7 years (4.5%)</td>
<td>5 1/2 years (3.6%)</td>
</tr>
<tr>
<td>Private final demand</td>
<td>7 years (4.1%)</td>
<td>6 years (4.9%)</td>
<td>5 1/2 years (4.3%)</td>
</tr>
<tr>
<td>Non-farm GDP/head</td>
<td>6 1/2 years (2.2%)</td>
<td>6 1/4 years (3.2%)</td>
<td>5 1/2 years (2.5%)</td>
</tr>
<tr>
<td>Employed persons</td>
<td>6 1/4 years (1.6%)</td>
<td>7 years (3.3%)</td>
<td>4 1/4 years (2.4%)</td>
</tr>
<tr>
<td>Hours worked</td>
<td>4 years (2.3%)</td>
<td>6 1/2 years (4.1%)</td>
<td>4 1/4 years (2.7%)</td>
</tr>
<tr>
<td>Index of production</td>
<td>6 years (3.0%)</td>
<td>6 1/2 years (4.2%)</td>
<td>-</td>
</tr>
<tr>
<td>Manufacturing output</td>
<td>6 1/4 years (3.1%)</td>
<td>6 1/4 years (4.5%)</td>
<td>4 1/4 years (2.2%)</td>
</tr>
<tr>
<td>Average of above</td>
<td>6.4 years</td>
<td>6.6 years</td>
<td>-</td>
</tr>
</tbody>
</table>

be kept in mind that these initial intentions can be subject to substantial revision. Aggregate investment intentions for 1997/98 are 6 per cent above the corresponding estimate a year earlier, but with some sharp contrasts between the major components (Table 1). Growth of investment in buildings and structures is expected to accelerate further, while expected investment in plant and equipment is lower than a year ago. Much of that weakness is concentrated in manufacturing, with most other industries expecting solid growth. Investment intentions in the mining, finance and property and business services sectors are particularly strong.

Other recent information confirms this general picture. The Access Investment
Monitor for the December quarter identifies projects under consideration worth $67 billion, an increase of 32 per cent on a year earlier, with strength concentrated in mining and in resource-related manufacturing projects. Investment in other parts of the manufacturing sector looks quite sluggish. The National Australia Bank’s business survey also points to a continuation of relatively strong investment intentions at an aggregate level over the year ahead. This outlook appears to be supported by expectations of reasonably firm levels of output and profitability, although these are not as buoyant as they were a couple of years ago. Consistent with other indicators, the survey suggests a relatively weak investment outlook in manufacturing, with a strong outlook in mining, finance and recreation (Graph 4).

This general picture for business investment is broadly in line with developments in profitability. Overall profitability of the corporate sector seems to be more than adequate, even if a little below the peak reached in 1993/94. The broadest measure of profits, corporate gross operating surplus (GOS) as a share of GDP, is only slightly below the most recent peak and close to the average of the past ten years (Graph 5). In the December quarter, GOS rose by 1.6 per cent. Profits in the unincorporated sector are also estimated to have risen in the December quarter, after declining in the previous two quarters. Profits after interest have tended to decline over the past couple of years, reflecting the impact of the 1994 interest rate increases and a tendency for corporate leverage to increase, but they remain at high levels compared with historical averages; they can be expected to receive a further modest boost as interest-rate

<table>
<thead>
<tr>
<th>Table 1: Capital Expenditure Intentions – First Estimate</th>
<th>1994/95</th>
<th>1995/96</th>
<th>1996/97</th>
<th>1997/98</th>
</tr>
</thead>
<tbody>
<tr>
<td>Buildings &amp; structures</td>
<td>4.7</td>
<td>2.4</td>
<td>17.3</td>
<td>30.0</td>
</tr>
<tr>
<td>Plant and equipment</td>
<td>18.7</td>
<td>-2.4</td>
<td>30.1</td>
<td>-4.5</td>
</tr>
<tr>
<td>Total</td>
<td>14.0</td>
<td>-0.9</td>
<td>26.0</td>
<td>5.7</td>
</tr>
<tr>
<td>- Mining</td>
<td>-15.3</td>
<td>-1.6</td>
<td>41.3</td>
<td>11.9</td>
</tr>
<tr>
<td>- Manufacturing</td>
<td>15.3</td>
<td>10.3</td>
<td>16.7</td>
<td>-18.9</td>
</tr>
<tr>
<td>- Other</td>
<td>33.2</td>
<td>-6.9</td>
<td>25.2</td>
<td>17.8</td>
</tr>
</tbody>
</table>

(a) Percentage change on previous year’s first estimate.
reductions in the second half of last year begin to feed through into profit results.

Business-sector balance sheets are currently in a healthy position. Debt servicing ratios of both the corporate and unincorporated sectors have been lower for the past couple of years than at any time in the preceding decade (Graph 6). The business sector now appears sufficiently confident to begin taking on more debt to finance growth in business investment. This is reflected in the business sector’s demand for credit. After being sluggish for several years, credit to the business sector has picked up during the past couple of years and, while weaker than in 1995/96, is still growing at an annual rate of around 9 per cent.

Graph 6

There is considerable variation in profitability across industries, which appears to be an important contributor to differences in investment intentions. Profits have grown strongly over the past couple of years in the mining industry, driven by strong growth in sales volumes. In contrast, profits in the manufacturing sector have declined over the past two years and are now 6 per cent below their peak in March 1995. Profits have also been sluggish in the wholesale and retailing industries, constrained by the weakness in retail sales during the second half of 1996.

A number of factors have contributed to the pressure on profits in manufacturing. Sales growth slackened as a result of weakness in retailing and in the housing industry which, for much of the past two years, was still experiencing declining activity. There also appears to have been a squeeze on margins in manufacturing, although the various data sources do not present a clear-cut picture in this area. Manufacturing output prices have been broadly flat for some time, constrained by strong international competition in many areas. Although imported input prices have been declining during the past year, as a result of the strengthening exchange rate, this appears to have been insufficient to offset the impact on profits of faster wage growth. Enterprise agreements in the manufacturing sector have been running at around 5 per cent. With labour costs representing about 60 per cent of value added in manufacturing, the net result has been a decline in overall profitability.

The outlook for manufacturers will depend on several factors, including their ability to contain costs and, for internationally oriented businesses, the level of the exchange rate. In the next year or two, another important influence will be the emerging housing recovery, since significant parts of manufacturing are engaged in the production of building materials or consumer goods stimulated by new housing development. Historical experience suggests that cycles in construction activity (defined as housing together with non-residential construction) exert a strong influence on the manufacturing sector (Graph 7).
Consistent with this link and with the firmer outlook for housing, some business surveys in manufacturing are showing signs of improved confidence. For example, the ACCI-Westpac Survey of the manufacturing industry conducted in the March quarter suggested somewhat stronger expectations of rises in profits and selling prices, although the assessment of current conditions was still weak.

The household sector

Dwelling investment

Forward indicators of housing activity are continuing to point to an upswing in that sector. In terms of work done and commencements, housing activity has been at a trough for around the past year, but building approvals have clearly turned up (Graph 8). The level of private building approvals in the March quarter was 12 per cent above the average level in 1995/96, with growth concentrated in building approvals for medium-density dwellings rather than houses. This strength has spread more recently to finance for new construction by owner-occupiers, suggesting that commencements of private houses will soon increase. Finance for investor housing projects has also grown solidly in recent months and is now well above the trough reached in the middle of 1996. The gathering strength in finance and building approvals should flow through into stronger commencements in the course of this year.

Further increases in building approvals are suggested by data on lending for housing, which have also been trending upwards, although the monthly figures have been quite volatile (Graph 9). The value of loan approvals in January and February was 23 per cent higher than a year ago. Although the upturn in lending for housing was initially confined to established and newly erected dwellings, this strength has spread more recently to new construction by owner-occupiers, suggesting that commencements of private houses will soon increase. Finance for investor housing projects has also grown solidly in recent months and is now well above the trough reached in the middle of 1996. The gathering strength in finance and building approvals should flow through into stronger commencements in the course of this year.

The housing recovery is being supported by an historically high level of affordability of houses which, in turn, reflects the low level of nominal interest rates. Cuts in official interest rates in the second half of 1996 have been reinforced by a compression of intermediaries’ interest margins on home mortgages, the result of intensified competitive pressures in this area of lending. Standard mortgage interest rates, at around 7.5 per cent, are at their lowest level since the early 1970s, and indexes of housing affordability show affordability at close to record levels for the post-deregulation period.

Although the housing sector is picking up in aggregate, the picture is uneven geographically. Housing demand is strongest in NSW, not quite so strong in Victoria, Queensland and Western Australia, and flat in the other States and Territories. The unevenness is also apparent in house prices, which have been rising in Sydney and...
Melbourne – particularly in the inner suburbs – but are still flat or falling elsewhere. The apparent excess supply of housing stock in a number of areas, particularly outside the major capital cities, could act as a restraining influence on the overall pace of recovery. To date, the rate of growth in building approvals looks more like the moderately paced upturn in housing in the early 1990s, than the extremely rapid increases of the late 1980s cycle.

Consumption

After being quite weak during the second half of 1996, consumer spending picked up in the early months of 1997 (Graph 10). Retail sales rose by 2.7 per cent in January and, although this may have partly reflected a change in the timing of consumer spending around year end, the stronger January level was broadly maintained in February and March. In the March quarter, sales were 2.2 per cent higher in real terms than in the December quarter. The pick-up was particularly marked in hospitality and services, household goods and other retailing; spending on clothing and recreational goods remained weak. Demand for motor vehicles has also strengthened markedly in the early months of 1997; in March, passenger vehicle registrations were 10 per cent higher than their level in December. A good part of the additional demand seems to have been taken up by imports.

The weakness in consumer spending in 1996 partly reflected a slowing in growth of disposable income which, in turn, was related to slower employment growth during the year. There also appears to have been some (welcome) rebuilding of household saving during the year after a period when spending had been running ahead of income growth. In the December quarter, households are estimated to have saved nearly 5 per cent of disposable income. While still low by historical and international standards, this is up from 3½ per cent a year earlier. Caution on the part of consumers may have been related to concerns about job security. Survey evidence suggests that consumers became more concerned about employment prospects during the course of the year; the net balance of respondents to the Westpac-Melbourne Institute survey expecting lower unemployment fell sharply over this time. Prospects for consumer spending will depend importantly on the extent of strengthening in the labour market over the coming year – both because of the impact on confidence and through the effect of employment growth on disposable income.

Household debt

Notwithstanding the modest increase in saving rates recently, households’ aggregate borrowing has continued to increase faster than income. Over the year to February, credit to the household sector grew by 11 per cent, compared with growth in households’ nominal income which has been running at around 5 per cent; much of the growth in debt has occurred in home mortgages. The value of household assets has also been growing solidly, particularly in superannuation funds and other investment products. The growth of gross household debt has seen the household sector’s debt to income ratio on a gradually rising trend for much of the past decade. By international standards, however, the increases started from a low base and household debt ratios in Australia are currently not far from the average of other industrial countries (Table 2).
Longer-term growth in household borrowing has been encouraged by several factors. Financial deregulation has given many households greater access to credit, as well as expanding the range of financial services available. Combined with growth in household incomes, the attractiveness of many new financial products has encouraged the expansion of household balance sheets. The return to a low-inflation and low interest-rate environment may also have allowed households to take on more debt by making loans more affordable.

At this stage, the level of debt does not seem likely to be acting as a major constraint on household spending. Nonetheless, the higher debt levels suggest that households may have become more vulnerable to unforeseen falls in house prices or changes in household cash flow. In the past, if excessive debt levels were incurred by households, there was always the prospect that they could be eroded quite rapidly by inflation. A low-inflation environment, however, is much less forgiving of excessive debt.

The labour market

Total employment has been growing at an average annual rate of around 1 per cent for much of the past two years. There was a pick-up in the pace of employment growth in the September and December quarters of 1996 but this appears to have weakened in the March quarter (Graph 11). Employment growth in the recent period has been concentrated in part-time jobs; full-time employment has been, at best, flat in recent months, even allowing for the prospect of some reversal of the large monthly fall recorded in March, and there has been little net gain in full-time jobs since October 1995 (Graph 12). Unemployment has edged up over the recent period, reaching a rate of

Table 2: Household Gross Liabilities
(As a proportion of household after-tax income)

<table>
<thead>
<tr>
<th>Country</th>
<th>1980</th>
<th>1996(b)</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>108</td>
<td>128</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>56</td>
<td>106</td>
</tr>
<tr>
<td>Canada</td>
<td>86</td>
<td>105</td>
</tr>
<tr>
<td>Japan</td>
<td>67</td>
<td>102</td>
</tr>
<tr>
<td>Australia</td>
<td>62</td>
<td>91</td>
</tr>
<tr>
<td>Sweden</td>
<td>83</td>
<td>77</td>
</tr>
<tr>
<td>Germany</td>
<td>71</td>
<td>89</td>
</tr>
<tr>
<td>France</td>
<td>58</td>
<td>66</td>
</tr>
</tbody>
</table>

(a) Includes unincorporated enterprises.
(b) Or most recent year available.
8.7 per cent in March, and labour force participation has come off the peaks recorded two years ago.

Interpretation of the monthly figures in recent months has been complicated by the effects of changes in interviewing procedures for the Labour Force Survey. The ABS reported in the December Survey that the introduction of telephone-based interviewing was leading to under-reporting of employment growth, suggesting that the pick-up in employment growth occurring around that time was greater than recorded in the official figures. It was later reported that, by February, this bias was no longer affecting the figures, leading to downward reassessments as to the underlying strength of employment. Shifting biases had apparently affected the pattern of monthly employment changes between July and February, but were no longer affecting the level. Given the uncertainties of interpretation, it seems unwise to put too much emphasis on changes in employment over short periods; viewed over the past year, employment has been sluggish, and does not appear to have accelerated further since the initial pick-up in the September quarter 1996.

The strength of demand for labour has varied quite considerably between industries. In the year to February, total employment fell in a number of industry categories mainly associated with the public sector. There were also employment falls in some cyclically sensitive areas of private-sector activity, including the building and retailing industries. These were offset by solid employment growth in other industries, including accommodation, finance and property.

With employment growth normally lagging behind developments in the economy as a whole, the relatively modest average employment growth appears broadly consistent with the pace in GDP growth (Graph 13). A pick-up in employment growth in the course of the current year would seem consistent with the range of indicators pointing to faster growth in overall activity. Forward indicators in the labour market also point to some firming in labour demand. Private-sector job vacancies are at a high level and appear to be on a modest upward trend (Graph 14). A strong increase in the December quarter was only partly reversed in the March quarter, and vacancies remain at a level which in the past has been consistent with solid employment growth. A cyclical strengthening in the demand for labour will help to reduce unemployment. On its own, however, faster economic growth will not do enough to reduce unemployment significantly, unless it is accompanied by moderation in growth of labour costs.

Productivity has continued to grow at a relatively fast rate in the course of the current recovery. Growth in non-farm GDP per hour worked – a broad measure of labour productivity – has averaged 1.8 per cent per annum since the start of the recovery, a higher
rate than in the corresponding phase of the previous cycle, but slightly lower than in the 1970s cycle. However, total factor productivity, which allows for changes in both labour and capital inputs into the production process, and is therefore a better measure of efficiency, is growing faster in the current recovery than in the corresponding phases of either of the two previous cycles (Box 2).

The external sector

Both exports and imports picked up strongly in value terms in the first two months of 1997 before falling substantially in March (Graph 15). In volume terms, export growth may have picked up a little from the slow pace in 1996, but it remains below its longer-term average. The slowing of export growth during 1996 was broadly based with the exception of rural exports, which continued to benefit from the breaking of the drought. A major factor behind the slowing seems to have been the weakening of growth in the east Asian economies, the effect of which has shown up most clearly in resource and manufactured exports to those countries. In contrast, exports to non-Asian trading partners, including the US, South Africa and a number of middle eastern countries, were growing quite strongly. The more recent pick-up in export growth reflects continuing strength of rural exports and stronger exports of resources. Exports of manufactured goods weakened in 1996 after a run of strong years; in the March quarter of 1997 they were below their level a year earlier.

Modest growth in export quantities and prices, together with flat imports (on a quarterly basis), pushed the March quarter balance on goods and services back into a surplus of around half of one per cent of GDP, reversing the deterioration late last year. The net services balance contributed around two-thirds of this total and has now been in surplus for almost two years. The data point to a positive contribution to growth in GDP from net exports in the March quarter.

Public finance

Fiscal consolidation continued in 1996. The underlying Commonwealth Budget deficit has fallen from a peak of over 4 per cent of GDP in 1992/93 to an estimated 1.7 per cent of
The rate of productivity growth in the economy is the rate of growth of output that can be produced from a given amount of input of labour, capital, etc. Labour productivity growth – the rate of growth of output per hour worked – is also a useful concept since labour productivity growth ultimately determines the sustainable rate of growth of real wages in the economy.

Labour productivity growth tends to follow the business cycle, rising as activity strengthens and falling as it weakens. This is because, as a rule, firms in the economy take some time to adjust their level of employment in response to a change in demand for their output. When comparing labour productivity performance between economic cycles, it is therefore important to measure labour productivity over common phases of the cycle.

For the past three business cycles, an appropriate comparison is between average labour productivity growth for the 5½ years after each trough in output (the current expansion has run for 5½ years since the trough in output in June 1991). On this basis, labour productivity growth in the current expansion has been significantly stronger than in the 1980s expansion, but somewhat weaker than in the 1970s expansion (Graph 1).

Part of the differences in labour productivity growth between business cycles reflects differences in the rate of capital accumulation and employment growth. Labour productivity can be boosted by a rise in capital input relative to labour input. Such a boost to labour productivity can occur even if labour and capital resources are used no more efficiently than before. It is possible, using quite simple techniques, to estimate how much of the difference in labour productivity growth between business cycles is due to changes in the capital intensity of the economy and how much is due to...

Table 1: Comparison of Three Business Cycles

<table>
<thead>
<tr>
<th>Period</th>
<th>Annual percentage growth in:</th>
<th>Total factor productivity</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Labour productivity</td>
<td>Capital stock</td>
</tr>
<tr>
<td>Mar 1975–Sep 1980</td>
<td>2.3</td>
<td>3.5</td>
</tr>
<tr>
<td>Mar 1983–Sep 1988</td>
<td>1.0</td>
<td>3.1</td>
</tr>
<tr>
<td>June 1991–Dec 1996</td>
<td>1.8</td>
<td>2.2</td>
</tr>
</tbody>
</table>

(a) Each period extends for 5½ years from a trough in non-farm output.
(b) Since real wages affect employment with a lag, real wage growth is an average for the 7½ years beginning two years before each period.
(c) Estimated from labour productivity growth assuming a standard production function with capital and labour inputs.
improved efficiency – so-called total factor productivity.

The 1970s business cycle was characterised by a combination of strong growth in the capital stock, but very weak growth in hours worked; this outcome occurred largely because real wages were rising faster than labour productivity (Table 1). The 1980s cycle was also characterised by strong growth in the capital stock; growth in hours worked was also strong, however, because of moderation in real wages in that cycle. In the 1990s cycle, the capital stock is estimated to have grown more slowly than in previous cycles; hours worked, by contrast, have grown faster than in the 1970s cycle but slower than in the 1980s one, again consistent with the behaviour of real wages.

The changing capital intensity of the economy explains some of the differences in labour productivity growth between business cycles. Labour productivity growth was boosted in the 1970s cycle by rising capital intensity, but held back somewhat in the 1980s cycle as growth in hours worked outstripped growth in the capital stock. Allowing for these changes in capital and labour inputs, total factor productivity grew at rates of 1.4 and 1.2 per cent in the first two expansions; in the 1990s expansion it is estimated to have grown at the stronger rate of 1.6 per cent.

It appears that the extensive changes in the economy over the past decade – including a structural fall in the inflation rate, productivity-enhancing changes in the labour market, corporatisation and privatisation of public-sector enterprises and substantial falls in the barriers to international trade – have led to an improvement in Australia’s underlying rate of productivity growth. This higher rate of underlying productivity growth, if sustained, should enable the economy to grow at a higher average rate than was possible in the past. Raising the growth rate of the economy by 0.3 per cent (the difference between the underlying productivity growth rate in the 1990s cycle and the average of the earlier cycles) makes little difference over a year or two; over a decade or two, however, the cumulated effect on living standards is substantial.

GDP in 1996/97 (estimated as at the Mid-Year Review published in January) (Table 3). The fall in the total public sector borrowing requirement over the same period has been somewhat larger, reflecting significant consolidation by State governments, partly offset by smaller surpluses of public trading enterprises. Further substantial reductions in the Commonwealth Budget deficit are in prospect in the years ahead.

<table>
<thead>
<tr>
<th>Table 3: Public Sector Borrowing Requirement (Per cent of GDP)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Commonwealth general government</td>
</tr>
<tr>
<td>memo item: Commonwealth Budget</td>
</tr>
<tr>
<td>State and local general government</td>
</tr>
<tr>
<td>PTEs</td>
</tr>
<tr>
<td>PSBR</td>
</tr>
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</table>

<table>
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<tr>
<td></td>
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<td>-0.1</td>
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<td>1.6</td>
</tr>
</tbody>
</table>

(a) On an underlying basis, excluding net advances.

Financial intermediation

Growth in financial intermediation is continuing at a steady pace. There are some signs that credit growth has picked up in recent months, after a weaker period in the second half of 1996, although it remains slower than that recorded in 1995/96 (Table 4). In recent months, total credit has been growing at annual rates around 10 per cent, with personal credit growth slightly stronger than the total.

Financial intermediaries have been funding this expansion in credit through both domestic and offshore raisings, and have issued short-term and longer-term debt securities to supplement deposits. Broad money, which comprises currency and deposits, has been growing at annual rates around 10 per cent for the past year. Currency growth, by contrast, has been considerably lower and has exhibited little cyclical since the early 1990s, in marked contrast to earlier cycles. If anything, currency growth appears to be on a steady downward trend, perhaps reflecting technical innovation in the payments system. For most of the past year, currency has been growing at year-ended rates around 3 per cent.

Table 4: Money and Credit Growth

<table>
<thead>
<tr>
<th></th>
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</thead>
<tbody>
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<td>Broad money</td>
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<tr>
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<td>- personal</td>
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</tbody>
</table>

Inflation Trends and Prospects

Recent developments in inflation

In underlying terms, consumer prices rose by 0.4 per cent in the March quarter 1997, and by 2.1 per cent over the year (Graph 17). Both the quarterly and annual rates were unchanged from the previous quarter, and the annual rate is now well below the recent peak of 3.3 per cent reached in the March quarter 1996.

Graph 17

The headline Consumer Price Index rose by 0.2 per cent in the quarter, bringing the year-ended rate to 1.3 per cent, down from 1.5 per cent in the December quarter and well down from its recent peak of 5.1 per cent in the December quarter 1995. Falls in mortgage...
interest rates detracted 0.5 of a percentage point from the quarterly headline rate and, on a year-ended basis, interest rate reductions that have already occurred will keep the headline inflation rate below the underlying rate for some time.

Other measures of inflation confirm the reduction that has taken place over the past year. Producer prices have been very subdued, with final output prices in manufacturing rising by only 0.3 per cent in the year to February. Similarly, construction materials prices have been little changed over the past year. The fixed-weight deflator for private consumption rose by 1.5 per cent over the year to the December quarter, while the broader fixed-weight deflators also showed increases of less than 2 per cent. All of these indicators show inflation running at substantially lower rates than a year ago.

A higher trade-weighted value of the Australian dollar over the past year has contributed importantly to the lower inflation outcomes. At the retail level, prices of imported consumer goods fell in the year to the March quarter, while the broader fixed-weight deflators also showed increases of less than 2 per cent. All of these indicators show inflation running at substantially lower rates than a year ago.

Trends in labour costs

Wage rates, as measured by average weekly ordinary-time earnings of adults working full time (AWOTE), increased by 1.3 per cent in the three months to February and by 4.6 per cent over the year (Graph 19). The annual figure represents a clear acceleration from a figure of 3.9 per cent over the year to November 1996, and follows a period when this measure of aggregate wages growth had been fairly steady at around 4 per cent.
The overall increase in AWOTE masks divergent behaviour between the estimated public and private-sector components during the past year, which complicates the interpretation of recent trends. A breakdown between the two components, available up to November, shows public-sector earnings growing by 7.6 per cent over the year. This is considerably faster than increases in public-sector enterprise agreements, and may be distorted by compositional change or other problems in the survey. To the extent that this is the case, it could be contributing to an overstatement of aggregate wages growth. According to the same survey, private-sector AWOTE decelerated considerably from an annual rate of over 6 per cent in mid 1995 to 2.8 per cent over the year to November 1996, although this seems likely to be an overstatement of the decline.

These considerations suggest, on balance, that the total AWOTE increase on a year-ended basis may have been slightly overstating wages growth on the last few readings. Nonetheless, the February data point to a significant acceleration in wages and, even allowing for some degree of overstatement, this would be a disturbing trend if it were sustained.

Wage increases in enterprise bargaining agreements have been running at quite a high rate, although they may have eased slightly towards the end of 1996 (Graph 20). Annualised increases in new agreements in the December quarter were 4.4 per cent, down from 4.8 per cent in the September quarter. In the private sector, the slowing was more pronounced, from 5.3 per cent in the September quarter to 4.4 per cent in the December quarter. These figures are influenced by the industry composition of agreements being negotiated, and the December quarter figures reflect some major agreements in industries that usually grant lower increases. Some important agreements in the manufacturing, finance, transport and construction industries are to be completed in coming months and these will need to be watched closely.

Growth of executive salaries continues to outpace both overall wage growth and enterprise agreements. According to the Cullen Egan Dell survey, executive salaries rose by 5.9 per cent over the year to March, broadly the same as the rate of increase over the previous year.

Award wages, in contrast, have for a number of years been growing more slowly than wages in other bargaining streams, at annual rates of around 1\(\frac{1}{2}\) per cent. The Safety-Net Review completed in April by the Australian Industrial Relations Commission considered a claim by the ACTU for a $20 a week safety-net adjustment and an increase in award wages of 8.75 per cent; this was part of a larger three-stage claim seeking eventual award increases of around 30 per cent. The review thus had the potential to add substantially to aggregate labour costs if anything approaching the ACTU claim were granted. In the event, the Commission awarded a much more moderate increase in award wages of $10 a week and established a new federal minimum wage of $359.40 a week for full-time adult employees. The Commission has deferred consideration of stages 2 and 3 of the claim.

The $10 a week increase is equivalent to around 1\(\frac{1}{4}\) per cent for workers on average award wages, and thus entails little acceleration from the current rate of growth in awards of around 1\(\frac{1}{2}\) per cent. Around a quarter of workers will be affected, assuming...
the same increase flows into State awards; given that the pick-up in awards growth is quite modest, flow-ons for other workers on grounds of relativities are likely to be small. The addition to aggregate wages growth will also be small.

Inflation expectations

Expectations of inflation have generally come down over the past year, broadly in line with falls in inflation itself. Surveys of consumers and financial market participants have shown the most pronounced falls. Among producers, surveys suggest that expectations of selling-price increases moved up a little in the most recent quarters, perhaps in anticipation of firmer demand conditions, but they remain well down from a year ago.

Consumer inflation expectations, as measured by the Melbourne Institute Survey in April, have shifted down significantly in the past six months (Graph 21). The median expectation of consumer price inflation over the year ahead now stands at 3.5 per cent, compared with levels of well over 4 per cent in the previous couple of years. Although expectations remain higher than actual rates of inflation, this measure of consumer inflation expectations is now around its lowest level since the survey began in 1973.

According to the latest NAB Survey, retailers expect to raise their average selling prices by 0.6 per cent in the June quarter. This represents an increase from the responses given in the previous two quarters, but is still lower than most of the readings from this survey over the past five years. Other surveys of producers also suggest a modest increase in price expectations, again coming from very subdued levels. The net balance of respondents to the ACM and ACCI-Westpac surveys expecting to increase selling prices has risen, but remains low relative to results of the past few years.

Near-term inflation expectations of financial market participants have continued to fall. A survey of financial market economists, conducted by the Bank in April, shows the median forecast of underlying inflation falling to 1.8 per cent for the year to June 1997 (Graph 22). These forecasts have been
consistently revised downwards in successive surveys over a period of more than a year. Headline inflation forecasts for the current year were revised down even more dramatically, mainly reflecting the impact of falls in mortgage interest rates. The median forecast for headline inflation in the year to June 1997 now stands at 0.8 per cent. For the following year, underlying inflation of 2.6 per cent is expected, with a similar figure for the headline rate as mortgage interest reductions drop out of the calculation.

Longer-run inflation expectations are lower than they were a year ago, but seem to have stabilised more recently, and they remain higher than the mid-point of the Bank's target. Expectations implied by indexed bond yields, i.e. calculated from the difference between yields on indexed and conventional 10-year bonds, are currently around 3 per cent. This measure has fluctuated around the 3 per cent mark for much of the past year, but is well below the levels of the previous two years. Medium-term expectations recorded in the NAB Survey show some substantial declines in expected inflation have occurred during the past year, but more than half the respondents still expect inflation to be in the 3 to 4 per cent range.

Inflation outlook

A number of factors are likely to contribute to maintaining the good recent performance on inflation in the near future, with wages developments representing the main risk to a favourable outlook further ahead. As noted, the effects of the higher trade-weighted exchange rate will continue to feed through into lower import prices for some time, and will therefore help to restrain aggregate inflation. The strength of import competition should also act as a restraining influence on prices of many domestically produced goods. Inflation expectations have dropped back during the past year, and the falls in headline inflation that are in prospect could help to reinforce those lower expectations. Although the pace of growth in activity is picking up, there is scope at present for the economy to grow faster without meeting serious capacity constraints. Against this background, the Bank expects underlying inflation during 1997 to remain low, probably declining slightly below 2 per cent for a while. Some pick-up in inflation is likely in 1998 as the favourable exchange rate effects pass but, provided growth in labour costs is not excessive, price inflation should remain within the 2 to 3 per cent range.

Headline inflation will fall further below the underlying rate in the next few quarters as recent interest rate reductions are reflected in the index. The headline rate could drop below half of one per cent by the second half of 1997, before moving back towards the underlying figure as the interest rate reductions pass out of the calculation.

The relatively modest outcome in the 'living wage' case removes one source of danger to this outlook. The increases granted will raise the rate of wages growth for workers on award wages, but the acceleration is quite mild and it will have only a small impact on aggregate wage costs.

Broader wage developments do, however, present some risk to the inflation outlook. The February AWOTE increase suggests a pick-up in aggregate wages growth which, even allowing for a degree of overstatement, brings annual wages growth to a rate of over 4 per cent. Enterprise bargaining agreements have been delivering annual increases of between 4 and 5 per cent and, in some agreements currently being negotiated, higher figures have been mooted. Risks to the inflation outlook would arise if these increases were to accelerate as the economy strengthens, or if they spread more widely to other bargaining streams, pushing aggregate wages growth to levels inconsistent with maintaining low inflation.

High rates of overall wages growth, if continued, will also make for slow progress in reducing unemployment. It is quite possible for nominal wages to grow at a pace which is consistent with meeting the inflation objective, but still fast enough to close off opportunities for strong employment growth. There is a danger of this occurring in Australia, if those in jobs try to extract the gains from growth, to the detriment of those presently without
In a flexible labour market, unemployment as high as it presently is would result in slowing wages growth. This appeared to be happening, to some extent, in Australia over the past year or so, but overall wages growth has remained high in comparison with inflation and may again be accelerating. Wages growth also seems high in international terms (Box 3). This phenomenon lessens the scope which might otherwise exist for macroeconomic policies to expand the economy more quickly to a point where it operates with significantly lower unemployment.

International Economic Conditions

The international environment is broadly supportive of continued growth in the Australian economy. For the advanced economies in aggregate, growth in 1996 has remained at an annual rate of around 21/2 per cent, but the IMF is forecasting a modest firming in 1997 and 1998, to just under 3 per cent (Table 5). In the past, these sorts of growth rates abroad have provided reasonable growth opportunities for Australian exports.

<table>
<thead>
<tr>
<th>Year</th>
<th>Advanced Economies</th>
<th>Developing Asia</th>
</tr>
</thead>
<tbody>
<tr>
<td>1992</td>
<td>1.9</td>
<td>9.4</td>
</tr>
<tr>
<td>1993</td>
<td>1.2</td>
<td>9.3</td>
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<tr>
<td>1994</td>
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<td>9.6</td>
</tr>
<tr>
<td>1995</td>
<td>2.5</td>
<td>8.9</td>
</tr>
<tr>
<td>1996(e)</td>
<td>2.5</td>
<td>8.2</td>
</tr>
<tr>
<td>1997(f)</td>
<td>2.9</td>
<td>8.3</td>
</tr>
<tr>
<td>1998(f)</td>
<td>2.9</td>
<td>7.7</td>
</tr>
</tbody>
</table>

Sources: IMF; figures for 1996, 1997 and 1998 are IMF estimates and forecasts.

These aggregate figures mask some significant differences across the major economies. In the United States - which, historically, has tended to have a disproportionate impact on Australian business conditions - growth has been accelerating quite markedly, and concerns about potential inflationary pressures prompted a rise in official interest rates in March. In Japan, growth picked up substantially in 1996, although it remains to be seen whether this stronger momentum will be carried forward during 1997. The major European economies, with the exception of the UK, have been relatively weak. Recently, however, there have been signs that growth is starting to pick up. In most of the east Asian region outside Japan, industrial production and international trade are starting to recover after having slowed sharply in 1995 and early 1996. The overall outlook expected by the IMF is for firmer growth in the world economy, but for the distribution of growth to change across countries, with the United States economy slowing back towards trend but greater strength in some of the other major economies. Significant growth is expected in the ‘transition’ economies for the first time since 1989.

United States

In the March quarter of 1997, real GDP grew by 1.4 per cent, following the strong rise in the December quarter (Graph 23). For much of the past year, the economy has been growing faster than trend capacity growth, and unemployment has been edging downwards. In April, the unemployment rate was 4.9 per cent, which is below levels that in the past have been associated with rising wage pressures. Monthly employment figures up to April, and other indicators such as industrial production, confirm the solid pace of growth in the early months of this year. The presumption of most observers is that, if the economy does not slow, inflationary pressures will become more intense.

To date, these pressures have not flowed through into general price inflation. The CPI, excluding food and energy, rose by 2.5 per cent in the year to March, a slight deceleration from previous months. Earnings growth, however, has picked up noticeably,
Low inflation is currently the norm for most countries. A comparison of the experience of the major industrialised (G7) countries, Australia and New Zealand, shows that seven of these nine countries have experienced average inflation in the range 1-3 per cent over the past two years (Table 1). Australia’s average inflation rate over this time, at 2.7 per cent, is typical of that of many other countries.

Consistent with this low inflation, rates of wage growth have also been low for most countries in the OECD. Four of the nine countries shown in the table experienced average wage growth of less than 3 per cent over the past two years; three had wage growth in the 3-4 per cent range. Australia and Italy were the outliers, with average wage growth of 4.4 per cent.

Faster average wage growth in Australia has been accompanied by trend growth in labour productivity which is faster than the average of the countries shown in the table.

From the point of view of controlling inflation in Australia, this combination of wages growth and productivity growth has been acceptable.

Inflation control, however, is not the only consideration in gauging the appropriate rate of average wage growth. It is possible to maintain low inflation, but still have wages growth which is too high to encourage job creation. This can happen for a variety of reasons. Wage bargaining generally may not be very responsive to unemployment; wage bargains in a particular leading sector may reflect conditions in that sector, but then be transmitted, through concerns about relativities, into other sectors which experience quite different conditions; wage negotiators may have unduly high expectations of future inflation in mind when striking their bargains. In any of these cases, a tendency for costs to rise limits the speed of short-term economic growth which is consistent with inflation control, and is

Table 1: Indicators for Major OECD Countries

<table>
<thead>
<tr>
<th>Country</th>
<th>Core inflation (a)</th>
<th>Wages growth (a)</th>
<th>Trend labour productivity (b)</th>
<th>Unit labour cost growth (c)</th>
<th>Unemployment rate (d)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Japan</td>
<td>0.2</td>
<td>1.3</td>
<td>0.8</td>
<td>0.5</td>
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<td>3.9</td>
<td>2.4</td>
<td>1.5</td>
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<td><strong>3.1</strong></td>
<td><strong>1.5</strong></td>
<td><strong>1.7</strong></td>
<td><strong>8.3</strong></td>
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<td>2.2</td>
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<td>1.0</td>
<td>1.1</td>
<td>9.6</td>
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<tr>
<td>Germany</td>
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<td>2.9</td>
<td>2.5</td>
<td>0.4</td>
<td>9.9</td>
</tr>
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<td>France</td>
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<td>2.4</td>
<td>1.4</td>
<td>1.0</td>
<td>12.0</td>
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<td>2.1</td>
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<td>12.0</td>
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</tbody>
</table>

(a) Annual average percentage change, end 1994 to end 1996.
(b) Measured as an average over the five years, 1991 to 1996.
(c) Wages growth minus trend labour productivity growth. Numbers may differ due to rounding.
(d) Average of 1995 and 1996.
(e) Using headline inflation.
therefore detrimental to unemployment performance.

Overall wages growth in Australia is, to a degree, sensitive to the state of the labour market: average wages growth slowed from about 5 per cent in 1995 to closer to 4 per cent in 1996, though the latest data suggest this slowing may have ended. The international comparisons shown here suggest, however, that growth in unit labour costs in Australia has still been on the high side over the past couple of years, given the rate of unemployment.

Graph 23

Reflecting the tight labour market conditions. Average hourly earnings rose by 3.6 per cent in the year to April, compared with 3 per cent a year earlier. A broader measure of labour costs, the Employment Cost Index, has also picked up, but more slowly, reflecting moderation in non-wage labour costs.

The combination of ongoing strength in activity and signs of inflationary pressure in the labour market prompted a tightening of monetary policy, by 25 basis points, in late March. This was the first move since the completion of a series of easings that had taken place between July 1995 and January 1996.

Asia-Pacific

The Japanese economy grew by 3.7 per cent in 1996, its second year of firmer growth after an extended period of weakness (Graph 24). The quarterly pattern of GDP growth in 1996 is difficult to interpret, but suggests some bounce-back after a relatively flat period in the middle of the year. Unemployment has dipped slightly during the past six months and is currently 3.2 per cent, down from a peak of 3½ per cent in the middle of 1996, but still reflecting the tight labour market conditions.
high by historical standards. There is still substantial surplus capacity in the economy and no evidence of inflationary pressures. In the year to March, the CPI rose by just 0.5 per cent, and this was affected by rising import prices as a result of a decline in the yen. Subsequent inflation data will reflect the rise in the VAT rate in April.

The tax increases and government spending cuts currently being implemented are expected to have some dampening effect on demand over the year ahead, although they may have brought forward some spending in the early months of 1997. On the other hand, domestic demand should continue to be supported by the low level of interest rates, while the recent depreciation of the yen is giving a significant boost to export growth.

Growth in other east Asian economies slowed during 1995 and 1996. Growth in industrial production in the region slowed to a rate of 7 per cent in late 1996, down from a peak of 14 per cent in 1994. The slowing of trade growth for countries in the region was dramatic, reflecting a combination of structural and cyclical factors. Among the latter were a contraction in international demand for electronics and a loss of competitiveness as currencies appreciated with the US dollar against the yen. There appears to have been some pick-up in activity in the past few months, particularly in China and Taiwan. Activity is also stronger in Hong Kong and remains robust in Indonesia and Malaysia.

By contrast, in South Korea – Australia’s second biggest Asian market – exports and industrial production have been disrupted by labour unrest, and corporate bankruptcies and political uncertainty have affected business confidence. Thailand is coping with a period of financial stress associated with falling asset prices and declining loan quality in the banking system. These conditions may hamper economic performance in the period immediately ahead.

Europe

The major economies of continental Europe have been recovering from recession since 1994, but the pace of recovery has been only moderate and, during 1996, proved insufficient to prevent unemployment rising from already high levels. The weak growth performance, in turn, has made it difficult for countries to meet the fiscal goals stipulated by the Maastricht treaty. Interest rates are at low levels, however, and should be supportive of recovery.

In the two largest economies – France and Germany – the most recent figures point to some lift in the pace of growth in recent months, but growth rates are still quite modest (Graph 25). Unemployment in both countries is at historically high levels – over 11 per cent in Germany and over 12 per cent in France.

Graph 25
Fiscal contractions required to meet the Maastricht goals could be a further dampening influence in the year ahead. Some positive impetus, however, is coming from the export sector, which is being boosted by depreciation of the European currencies against the US dollar. The Italian economy has been even weaker than France and Germany, showing little overall growth in the year to the December quarter.

In contrast, the UK and some smaller European economies have performed more strongly. The UK has had quite robust growth for several years and unemployment has fallen steadily, reaching a rate of 6.1 per cent early in 1997. There is evidence that inflationary pressures are developing and the Bank of England has been recommending a second interest-rate increase (following the first in October 1996) for several months.

Commodity prices

Most commodity prices have tended to firm in recent months. The Bank’s Commodity Price Index (in SDRs) rose by 5 per cent during the March quarter, to a level 21 per cent higher than the trough reached in September 1993 (Graph 26); it then eased back a little in April. Base metal prices have followed a similar pattern this year, rising by 15 per cent in the first three months of the year, supported by strengthening world industrial production. Some of these gains were reversed in April after the monetary policy tightening in the United States prompted some downward revisions to expected demand for commodities. Rural prices also rose strongly, showing an increase of 12 per cent during the quarter. The increase reflected higher prices for wool as well as firmer beef prices which were boosted by a temporary shortage in the United States.

In contrast to the strength of rural and base metals prices, other non-rural commodity prices have tended to fall in early 1997. The price of oil has fallen from around US$25 a barrel at the start of the year to around US$20 a barrel in April; this brings it roughly back to its level in the first half of 1996. The price of gold has also steadily declined during 1997, falling by 7 per cent between December and April. New contract prices for coal, which came into effect in April, were lower, but there was a small increase in iron ore prices.

Developments in Financial Markets

The stability that has characterised the Australian economy over the past year has resulted in a number of favourable developments in financial markets, the most noticeable of which is that interest rates have fallen to low levels – in the case of housing interest rates, to levels not seen for a quarter of a century. This has brought substantial benefits to borrowers – households, business and governments – and is underpinning an increased demand for credit. Equity prices have also shown a solid increase – 25 per cent over the past couple of years – which has increased access to, and reduced the cost of, equity capital.

The exchange rate of the Australian dollar has moved to a flatter trend after the increase over late 1995/early 1996. Our exchange rate against the US dollar and the currencies of most of our trading partners has shown little net change over the past year, and the rise in the trade-weighted index in recent months has been due mainly to the weakness being experienced by the Japanese yen. By and large, this is a reflection of the very accommodative
The real interest rate is a concept which takes account of the fact that inflation in prices reduces the effective cost of borrowing and the return to lending. Measures of real interest rates typically deduct an inflation component from some ‘nominal’ interest rate.

There is no unique way of calculating a real interest rate because different borrowers pay different real costs of borrowing, depending on the term and degree of risk of the loan. In addition, borrowing and lending are forward-looking decisions: borrowers are making judgments about their future capacity to service debt, while lenders are making decisions about future returns. Computations of real interest rates should really be made by deducting an expectation of future, rather than past, inflation from the relevant nominal interest rate.

Because these expectations are hard to measure, past inflation is often used in practice as a proxy for expected inflation, but it is important to remember that this may not be accurate. For example, with a cash rate of 6 per cent at end April, and underlying inflation at 2.1 per cent, the real cash rate estimated this way is 3.9 per cent. Surveys, however, show that businesses and consumers expect a higher rate of inflation – typically in the range of 3 to 4 per cent – which would imply a correspondingly lower estimate of the real cash rate – about 2 to 3 per cent. These differences point to the difficulty of making fine judgments about the level of real interest rates at a given point in time.

Proxies for real interest rates can be more useful over long periods, particularly where there are pronounced differences in the prevailing inflation rate and large movements in nominal interest rates and inflation expectations. Graph 1 illustrates the nominal cash rate and two measures of the ‘real’ cash rate over a decade – one using the past year’s underlying inflation to proxy expected

**Box 4: Real Interest Rates**

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**Graph 1**

**Graph 2**
inflation and the other using consumers’ expectations as recorded in the Melbourne Institute survey. The much lower nominal interest rate structure prevailing in Australia in the 1990s reflects, in part, the large decline in inflation since the late 1980s. But real cash rates are also considerably lower now than in the 1980s. On either measure of real cash rates shown here, they are well below the average of the second half of the 1980s; they have declined since their most recent peak in 1995, but remain above the low point reached in 1993/94.

Although the real cash rate can be a useful summary measure of monetary policy, rates on offer from banks and other intermediaries are more relevant for borrowing decisions of businesses and individuals. Graph 2 shows nominal and real measures of banks’ business lending and mortgage rates. The compression of bank margins in recent years means that, unlike the cash rate, real bank rates on business loans are close to their cyclical troughs in 1993 while real mortgage rates are below their previous troughs.

Comparisons are often made of real interest rates across countries. Such comparisons, which typically use actual past inflation as a proxy for expected inflation, currently show Australia as having relatively high real interest rates. Table 1 illustrates.

Australian real short rates are higher than in most of the major economies. There are, however, two things to keep in mind when drawing this comparison.

The first is that the differences in real interest rates reflect differences in current macroeconomic conditions. In continental Europe, Canada and Japan, economies have been characterised by very low rates of both economic growth and inflation (driven importantly by very low rates of wages growth). Their monetary policy is set in a more expansionary way to reflect this situation, and their real interest rates, accordingly, are lower than those in Australia.

The second difficulty is that while using recent actual inflation, rather than inflationary expectations, to construct an approximation of real interest rates might be reasonably accurate for countries with a long history of low inflation, it is less accurate for Australia and may therefore lead to an overstatement of real interest rates in Australia.

The longer-term inflation track record is important in the bond market, where the central bank has no direct impact on the level of interest rates. Using actual inflation over the past five years as a proxy for longer-term inflation expectations, Australian real rates are relatively high in international terms. Other English-speaking countries with a long-term history of high inflation – such as Canada, the UK and New Zealand – also have long-term real interest rates higher than the average. These ‘real’ interest rates probably still embody some inflation premium. Even though Australia’s average inflation performance over the past five years has been superior to those of the traditional low-inflation countries, international markets still require compensation for inflation uncertainty, because of Australia’s longer-term history. It takes a long time to build up low-inflation credibility.

Table 1: Real Interest Rates

<table>
<thead>
<tr>
<th>Country</th>
<th>Short-term based on past year’s underlying inflation</th>
<th>10-year bond based on average inflation rate over the past five years</th>
</tr>
</thead>
<tbody>
<tr>
<td>New Zealand</td>
<td>5.5</td>
<td>6.1</td>
</tr>
<tr>
<td>Australia</td>
<td>3.9</td>
<td>5.6</td>
</tr>
<tr>
<td>Italy</td>
<td>4.5</td>
<td>3.7</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>3.4</td>
<td>5.0</td>
</tr>
<tr>
<td>United States</td>
<td>3.1</td>
<td>4.1</td>
</tr>
<tr>
<td>Average</td>
<td><strong>2.8</strong></td>
<td><strong>4.3</strong></td>
</tr>
<tr>
<td>France</td>
<td>2.3</td>
<td>4.0</td>
</tr>
<tr>
<td>Germany</td>
<td>1.5</td>
<td>3.4</td>
</tr>
<tr>
<td>Canada</td>
<td>1.3</td>
<td>5.3</td>
</tr>
<tr>
<td>Japan</td>
<td>0.0</td>
<td>1.7</td>
</tr>
</tbody>
</table>

(a) April average
monetary stance being followed by the Japanese authorities and, given the different cyclical positions of Australia and Japan, some rise in the exchange rate between the countries is to be expected.

Australia has not been alone in being affected by these developments in Japan. With the Japanese economy and interest rates well out of synchronisation with most other countries, there have been significant realignments in exchange rates in international markets. At the same time, the outflows of funds from Japan have helped to support bond and equity markets in a range of other countries, including Australia.

**Interest rates**

Interest rates have fallen across the maturity spectrum over the past year. At the short end, rates are down from 7 1/2 per cent in mid 1996 to 6 per cent at present. This reflected the three easings in monetary policy over the second half of 1996 (Graph 27). The Bank began this easing process in July 1996 in anticipation of a fall in inflation over the second half of the year. This was ahead of general expectations at the time and, as a consequence, was greeted with some surprise in markets, a symptom of which was a temporary fall in the exchange rate. The Bank followed through with two further easings, in November and December, as inflation improved.

At its current level, the cash rate is roughly half way between the recent peak in 1995, when policy was exerting a restraining influence on demand, and the low point in 1993, when the policy setting was highly stimulatory. The same observation is broadly true for measures of the ‘real’ cash rate - that is, the nominal rate adjusted for measures of expected inflation (Box 4). After allowing for the compression of interest margins by financial intermediaries, however, the real rates of interest paid by borrowers are at levels similar to or, with the case of housing loans, below those in 1993 (Graph 28).

The monetary policy easings in the second half of 1996 have been fully passed on by banks to both businesses and home loan borrowers. The small business indicator rate has been reduced to 9.8 per cent, from 11.3 per cent, while the large business indicator rate has fallen to 9.3 per cent from 10.8 per cent. The fall in home lending rates has been considerably larger than the reduction in cash rates, reflecting the intensified competition in the provision of housing finance (Box 5). The predominant standard variable rate on housing loans has fallen by about 3 percentage points since early 1996, to 7.5 per cent.

While banks fully passed on the easings, there was a noticeable tendency to impose significantly longer lags in implementing these reductions than was the case when interest rates were increased in 1994. Existing home loan borrowers had to wait 6-7 weeks on average, small business borrowers 5-6 weeks.
and large business borrowers around 3–4 weeks. By contrast, when monetary policy was tightened in 1994, business and housing loans were generally raised around 2 weeks after the policy announcements.

Short-term security yields in the money market moved down generally in line with the cash rate as policy was eased. Thereafter, they continued to fall in late December and January as markets moved to price in a further easing, reaching a low of about 5.7 per cent. By February, however, the weight of evidence pointing to a pick-up in economic activity caused the market to abandon these expectations. Since then, short-term security yields have traded in a narrow margin around the cash rate, indicating that markets are not expecting policy changes in the near term.

At the long end of the yield curve, sentiment began to improve noticeably a year ago, reflecting the decline in the Budget deficit and the improvement in inflation. The benefit for the bond market in the fiscal improvement is clearly illustrated by the fact that, in the current fiscal year, the Government’s net call on the bond market for new funds has been only about $4 billion, compared with $14 billion two years earlier. This reduced call by the Government has opened up the market to private sector borrowers; issues of corporate bonds over the past year were the highest since 1991.

Capital markets are very sensitive to inflation because of its impact on real long-term returns, so it is not surprising that bond yields have fallen as inflation has come down. A year ago, yields on 10-year bonds in Australia were around 9 per cent; by late 1996 they had fallen to close to 7 per cent (Graph 29). The fall was to some extent reinforced by a fairly benign environment in international bond markets, but nonetheless Australian bonds outperformed key benchmarks such as the US bond market. The spread between Australian 10-year bond yields and comparable US yields narrowed from 250 basis points a year ago to about 100 basis points at present (Graph 30). This is close to historical lows.

Graph 29

Graph 30

Ten-year Bond Yield Differential Between Australia and US

One of the features of bond markets over recent years is that spreads – or risk premia – of all types have come down. This is the case for spreads between countries, and between bonds of different credit quality within the same country. For example, leaving aside Japan, among the industrial countries the gap between the country with the highest bond yields and that with the lowest bond yields has fallen to less than 2 percentage points (Graph 31). To a large extent, this reflects a marked convergence of inflation rates, to low levels, among these countries. Other factors, however, have also played a role. Some of these are favourable, such as the global push for fiscal consolidation and the increasing international integration of capital markets. Others, such as the tendency for investors to become increasingly eager to chase high yields...
Box 5: Competition in Housing Financing

Competition in the provision of housing finance has increased over the past year, with banks announcing two rounds of cuts in housing interest rates (in June 1996 and February 1997) independent of any easings in monetary policy. The combination of these reductions and banks’ responses to the three easings of monetary policy in the second half of 1996 has seen interest rates on variable-rate mortgages fall by about 3 percentage points in the past year. The standard variable rate is now at 7.55 per cent, its lowest level since late 1973 (Graph 1).

While financial deregulation a decade ago opened up the way for greater competition in the provision of finance, the full impact was not felt until recent years, particularly for households. One reason for this was that inflation remained high in the 1980s. The resulting high level of interest rates in the wholesale money market, the main source of funds for lenders such as mortgage managers, made it difficult for potential new lenders to compete with banks, who had access to low-cost retail funding. This situation enabled banks to sustain wide margins on housing lending, largely uncontested by other institutions. The return to low inflation and the fall in money market interest rates opened up the way for new institutions to enter the market, since there was then sufficient margin between money market interest rates and the rates charged by banks on housing loans for these new lenders to undercut banks (Graph 2). The development of markets for securitised assets facilitated the funding activities of mortgage managers.

Mortgage managers were slow to start but by the end of the first half of the 1990s, they were gaining substantial market share from other lenders. By mid 1996, their share of new lending had risen to around 10 per cent (Graph 3). Correspondingly, banks’ market share fell by 10 percentage points from over 90 per cent of new loans in early 1994 to over 80 per cent in mid 1996.

Banks initially responded to the competition from mortgage managers by product innovation aimed at new borrowers, rather than cutting their main standard variable interest rates. This latter course would have been more costly to banks as it would have passed on lower rates to existing as well as new customers. New facilities included ‘honeymoon’ loans, a wider range of fixed-rate loans and the introduction of ‘basic’ loans at substantial discounts to the...
standard variable-rate home loan, with similar conditions to those offered by mortgage managers. Signs of more general competition on housing rates emerged in late 1994, when banks responded to the rise of 2\(\frac{1}{4}\) percentage points in cash rates by raising housing rates by only 1\(\frac{3}{4}\) percentage points. Banks accommodated this smaller rise mainly by limiting the rise in interest rates on deposits.

Competition spread more openly to the market for existing borrowers in mid 1996 when banks cut the interest rate on standard variable-rate loans independently of any effect on funding costs from a change in monetary policy. Several banks also introduced incentives to refinance existing loans – for example, waiving fees and loan establishment costs – with the aim of attracting borrowers from their competitors. A similar episode occurred in February of this year. In total, the standard variable rate was lowered by 1\(\frac{1}{2}\) percentage points over and above the falls that accompanied the three monetary policy easings.

The result of this competition, which originated from the entry of new non-bank lenders into the market, is that banks have reduced their standard mortgage rates to match those of the new entrants. Some banks are offering ‘no-frills’ or basic loans at rates lower than those offered by key mortgage managers. In the process, banks’ margins on housing loans, which had been high by international standards, have come down significantly in the past year (Graph 4). They are now more in line with those in comparable overseas countries.

as the general level of interest rates falls, suggest a need for caution. After a prolonged period of relatively tranquil conditions in markets, participants often see little danger in taking on more risk.

An important issue in bond markets at present is whether the recent tightening of 25 points by the US Federal Reserve marks the start of a more general uptrend in interest rates. In the past, there have been some similarities between the US interest rate cycle and that of other countries, particularly the English-speaking countries. This reflects correlations in economic cycles. The United Kingdom tightened policy in late 1996, and markets have begun to price in tightenings in a wider range of countries, most evidently in Canada, where interest rates are currently below those in the US and where the exchange rate has been weakening.

The possibility that there may be a global upswing in interest rates in the year ahead has
seen bond yields in most countries rise over the past couple of months. In Australia, bond yields have increased to about 7.7 per cent, a move broadly in keeping with global trends. In this respect, the Australian bond market has performed better than in 1994, the previous occasion when the US Federal Reserve began to raise interest rates. On that occasion Australian bond yields rose significantly more than those in the US, reflecting market concerns that Australia would not be able to maintain control over inflation in an environment of strong global expansion. The spread between US and Australian bonds, which had been under 100 basis points in early 1994 before the tightening, reached over 300 points by early 1995. In the current episode, the spread has remained in a fairly tight range around 100 points, helped no doubt by the continuing good news on inflation and the favourable outcome of the recent wage judgment. This more benign market reaction may be a sign that Australia is improving its standing in world markets as a low inflation country. This will have important benefits for government, business and household borrowers.

Share markets

The impact of the fall in interest rates over the past year has also been felt in the share market. It has made shares more attractive both on a relative yield basis and because it has improved the outlook for corporate profitability, particularly after interest payments.

In addition, the Australian market has benefited from the strong lead provided by the US share market, where prices have risen by almost 90 per cent since the start of 1995. Besides low interest rates, the factors underpinning this strength in the US market have been the high profits of US corporations, reflecting the strength and soundness of the US economy, and the strong inflows into equity mutual funds from US households.

By late 1996, the rapid pace of increase in US equity prices seemed to be an emerging source of concern to the US Federal Reserve, as it had the potential to cause imbalances which could ultimately undermine the continued expansion of the US economy. These concerns, which were publicly stated by Chairman Greenspan on a number of occasions, caused the market to pause. Subsequently, following the tightening of US monetary policy, the market fell sharply for a time, but had more than recovered by early May (Graph 32).

These recent US developments largely flowed through to the Australian share market, the result being that it has shown a small net rise so far in 1997. The current level of share prices nonetheless remains 25 per cent higher than two years earlier. While this is no match for the increase in the US share market over this period, it is a solid rate of increase in a low inflation environment.
Businesses continue to take advantage of favourable equity market conditions to raise new funds. These raisings amounted to $15 billion in 1996, up from $14 billion the previous year and roughly double the levels experienced during the period of share market weakness in the early 1990s.

Foreign exchange markets

A year ago, the forces acting on the Australian dollar exchange rate were all working in the direction of pushing it up. Notably, the outlook for the US economy, and therefore commodity prices, was improving, providing a favourable environment for commodity exports. Also, interest differentials substantially favoured Australian investments. This was particularly the case for Japanese investors, who faced extremely low interest rates at home. Very large inflows of funds from Japan came from late 1995, assisted by innovations such as bonds featuring repayments in a combination of both Australian dollars and Japanese yen, which thereby reduced some of the exchange rate risk for Japanese investors. Retail investors in Japan had a strong appetite for these securities.

It is not surprising, therefore, that after its sharp dip to US71 cents (TWI of 48.5) in mid 1995, the Australian dollar recovered strongly to reach US79 cents (TWI of 58) by early 1996. Since then, the exchange rate against the US dollar has shown little net change, if anything weakening a little (Graph 33). More generally, the exchange rate has been steady, or has fallen, against the currencies of countries accounting for two-thirds of Australia’s trade.

Despite the steady performance of the Australian dollar against the bulk of Australia’s trading partners, its trade-weighted value has risen by about 4–5 per cent over the past year. The bulk of this has been due to the exchange rate against the Japanese yen, as the yen has fallen sharply on world markets, including a fall of about 50 per cent against the US dollar from its peaks in mid 1995.

Investment flows out of Japan have been an important factor shaping world financial markets over the past couple of years, not only because of overseas investment by Japanese residents, but also because non-residents have taken advantage of cheap Japanese money to fund positions in other markets. A tightening in monetary policy by Japan would be an important signal that this period was coming to an end, and would therefore be likely to have a significant impact on market psychology.

Overall, factors affecting the foreign exchange market are more mixed than they were a year ago. Most notably, the extent to which interest differentials favour Australian investments has narrowed significantly following the easings of Australian monetary policy in the second half of 1996. The most visible impact of this has been in the drying up of inflows from Japan into dual-currency bonds in 1997, following the easings. The recent tightening of US monetary policy has further contributed to the narrowing of differentials.

6 May 1997