

Inflation Report

November 1998

The *Inflation Report* is produced quarterly by Bank staff under the guidance of the members of the Monetary Policy Committee. It serves a dual purpose. First, its preparation provides a comprehensive and forward-looking framework for discussion among MPC members as an aid to our decision making. Second, its publication allows us to share our thinking and explain the reasons for our decisions to those whom they affect.

Although not every member will agree with every assumption on which our projections are based, the fan charts represent the MPC's best collective judgment about the most likely path for inflation and output, and the uncertainties surrounding those central projections.

This *Report* has been prepared and published by the Bank of England in accordance with section 18 of the Bank of England Act 1998.

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The Overview of this *Inflation Report* is available on the Bank's web site: www.bankofengland.co.uk/infrep.htm. The entire *Report* is available in PDF format on www.bankofengland.co.uk/ir.htm.

Overview

The Monetary Policy Committee sets interest rates to maintain a path for inflation looking ahead that is consistent with the 2.5% target for inflation on the RPIX measure. This requires the Committee to act in response to prospective deviations—downwards or upwards—from the inflation target in a symmetrical fashion.

Since the August *Inflation Report*, there have been two major developments affecting the prospects for inflation. First, following the debt restructuring in Russia and the imposition of capital controls in Malaysia, there was widespread financial market turbulence affecting both emerging and industrialised economies. This, together with news of further weakness in Japan, has led to a substantial deterioration in the prospects for world growth. Second, although official output data show UK growth continuing in the third quarter at close to trend rates, survey evidence and reports from the Bank's regional Agents indicate a sharp and widespread decline in business and consumer confidence.

The international financial market turbulence has been associated with a flight from risk. Few, if any, emerging market economies were untouched by the financial market contagion triggered by the Russian debt restructuring, and spreads on emerging market debt rose steeply. Spreads on corporate debt in industrial countries have also increased, though government bond yields have generally fallen. There were sharp falls in equity prices in industrialised countries, but these have been partly reversed. Uncertainty about, and unwinding of, the exposures of financial institutions, especially after the near-failure of the Long-Term Capital Management hedge fund in September, led to reduced liquidity and increased volatility in financial markets. In countries such as the United States, where the capital market is the major source of corporate finance, concerns have been expressed about an incipient 'credit crunch'. But in the United Kingdom, where the banking system is the main external source of business finance, there has so far been no sharp deterioration of credit conditions.

Where equity prices are lower and credit conditions are tighter, consumer demand will tend to weaken as households adjust to lower net wealth, and firms will scale back investment plans in response to the higher cost and reduced availability of capital. Although official interest rates have been reduced in a number of industrialised countries since September, the prospect is now for slower world growth than expected three months ago.

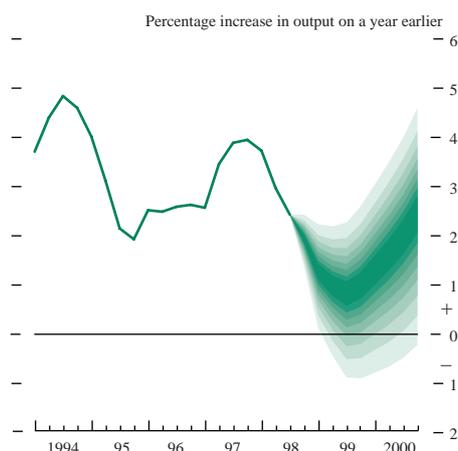
The weaker international outlook affects the prospects for the UK economy via two main channels. The first is lower demand for UK exports and increased import competition. In particular, unless capital flows to emerging market economies resume, those economies must have smaller current account deficits, or larger trade surpluses, than before. So the net trade position of industrialised countries, including the United Kingdom, will be weaker than otherwise. This, combined with the lagged effects of sterling's appreciation, means that net trade is likely to continue to make a significant negative contribution to UK growth. Second, the implications of weaker world demand for commodity and other traded goods prices, together with the depreciation of the currencies of emerging market economies, are likely to lower import prices and hence subdue inflation in industrialised countries. Even though the sterling effective exchange rate index has recently depreciated, external influences are likely to restrain UK inflation by more and for longer than previously expected.

Turning to the prospects for private domestic demand in the United Kingdom, there is a marked contrast between official data and survey evidence. The preliminary estimate for GDP growth in the third quarter was 0.5%, which was somewhat higher than in the central projection in the *August Report*. But since the summer, business surveys and reports from the Bank's regional Agents indicate that business sentiment has deteriorated sharply—in services as well as manufacturing. Survey evidence also indicates a substantial weakening of consumer confidence.

The outlook for inflation continues to depend upon developments in the labour market. Measures of employment, unemployment and vacancies suggest that the labour market remains tight, although some recent data suggest that it is no longer continuing to tighten. Unemployment on the LFS measure rose in the three months to August, but the claimant unemployment rate has continued to decline, reaching its lowest level since 1980.

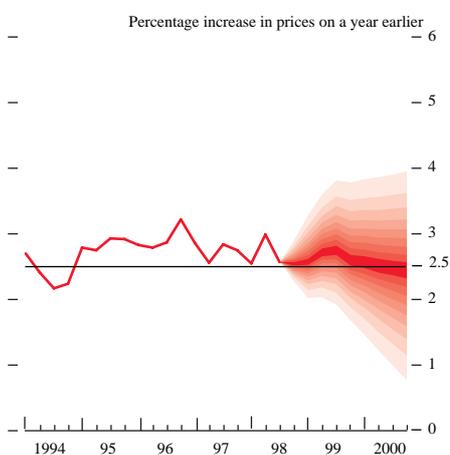
The underlying rate of earnings growth, a key indicator of domestic inflationary pressure, has become particularly difficult to assess. Since the beginning of October, the Average Earnings Index has been successively revised, rebased, and suspended pending an independent review announced by the Chancellor. The rebased series, which uses the same pay data as before, implies a profile for earnings growth that is both more volatile than the previous series, and hard to reconcile with other measures of pay and with the labour market tightening that has evidently taken place. The MPC has continued to pay attention to tightness in the labour

Chart 1
Current GDP projection based on constant nominal interest rates



The fan chart depicting the probability distribution for output growth is rather like a contour map. At any given point during the forecast period, the depth of shading represents the height of the probability density function over a range of outcomes for output. The darkest band includes the central (single most likely) projection and covers 10% of the probability. Each successive pair of bands is drawn to cover a further 10% of the probability, until 90% of the probability distribution is covered. The bands widen as the time horizon is extended, indicating increasing uncertainty about outcomes.

Chart 2
Current RPIX inflation projection based on constant nominal interest rates



The fan chart depicting the probability distribution for inflation is rather like a contour map. At any given point during the forecast period, the depth of shading represents the height of the probability density function over a range of outcomes for inflation. The darkest band includes the central (single most likely) projection and covers 10% of the probability. Each successive pair of bands is drawn to cover a further 10% of the probability, until 90% of the probability distribution is covered. The bands widen as the time horizon is extended, indicating increasing uncertainty about outcomes.

market, but recognises that there is more uncertainty than usual about the future path of earnings growth, and indeed about its path over the recent past.

Given the weaker prospects for both external and domestic demand, and hence for inflationary pressure internationally and at home, the MPC reduced interest rates by 0.25% in October and by a further 0.50% in November. The current projection for the growth rate of GDP—based on the assumption that the Bank’s repo rate remains constant at 6.75%—is shown in Chart 1. The projection is somewhat lower than in August, despite the interest rate reductions since then, because both external and domestic demand are weaker. The central projection is for four-quarter GDP growth to slow over the next year before increasing to around trend in the second half of 2000 as domestic demand, especially by the public sector, picks up. The balance of risks to growth is on the downside, primarily reflecting concerns about exports and consumer demand.

The corresponding projection for RPIX inflation is in Chart 2. The most likely path is for inflation to rise slightly above target, before returning to around 2.5% at the two-year forecast horizon. The small rise in projected inflation in 1999 is accounted for by earnings growth, including the effects of the National Minimum Wage to be introduced next April. But there is considerable uncertainty about the future path of inflation, especially in view of uncertainties about the profile for output, about earnings growth, and about the timing and extent of further pass-through to domestic prices from the past appreciation of sterling. Downside risks to inflation from weaker growth than in the central projection are largely balanced by upside risks, which include the possibilities of a more rapid fall in the exchange rate and of past money growth creating upward pressure on prices.

The inflation target is symmetric. The MPC will act just as determinedly in response to prospective deviations of inflation below target as to those above. Inflation has recently been at the 2.5% target. The deterioration in the international economic outlook since August means that external factors are likely to exert a stronger downward pressure on inflation than previously expected. Though recorded output growth has so far remained resilient, recent evidence, especially from surveys and the Bank’s regional Agents, suggests that growth is now somewhat weaker than expected in August. In view of the likely consequences for future inflation of these developments, the MPC reduced interest rates with the aim of keeping inflation on track to meet the target.

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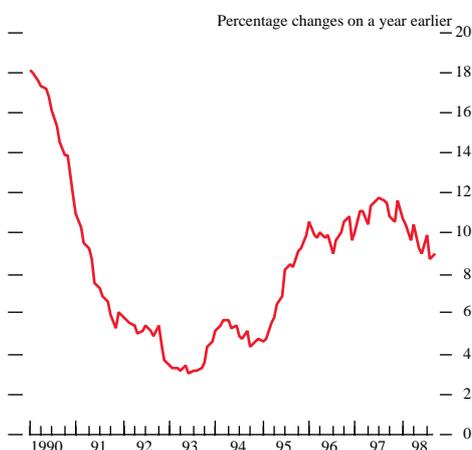
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Prices in world financial markets have moved sharply over the past three months. Equity prices fell to well below their July peaks, before recovering somewhat. Bond prices rose strongly in August and September, though prices of government bonds rose by more than those of corporate debt, reflecting a widening spread between their respective yields. There have been concerns in some countries about the possibility of a contraction in the supply of credit. There has also been substantial volatility in foreign exchange markets. Events in Russia triggered these developments, but the turbulence also reflected wider concerns about the financial position of emerging market economies, and the consequences for financial institutions, ranging from banks to hedge funds.

In the United Kingdom, equity prices fell sharply by around 25% between their July peak and early October. But they have since recovered strongly. While equity prices fell, gilt prices rose: the ten-year redemption yield on gilts fell to 4.5% on 5 October, before rebounding to 5.2% on 12 October. It subsequently fell slightly, and was 5.0% on 4 November. Yield spreads on corporate sector debt over gilts rose sharply from August. After peaking in early October, they now appear to be falling, though on 4 November they were still higher than when concerns about the effects of the Asian crisis were at their height last year. Nevertheless, data for September suggested that credit, notably to the UK corporate sector, continued to grow robustly.

The MPC decided to cut the Bank of England's official repo rate by 0.25% at its October meeting. And at its November meeting, the MPC voted to reduce the Bank's repo rate by 0.50% to 6.75%.

Chart 1.1
Growth of M4



Source: Bank of England.

1.1

Money

Year-on-year broad money growth has continued to moderate (see Chart 1.1). Nevertheless, it still grew by 9.0% in September on a year earlier, compared with the annual growth in nominal demand of 5.4% in Q2. Broad money has been growing considerably faster than nominal expenditure for much of the period since 1980, suggesting that portfolio motives have played an

Chart 1.2
Contributions to annual growth in OFCs' M4 deposits

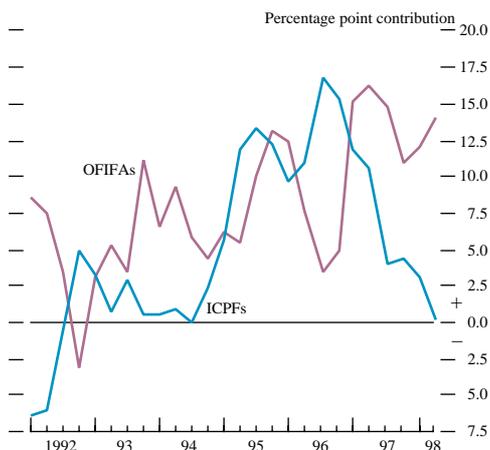
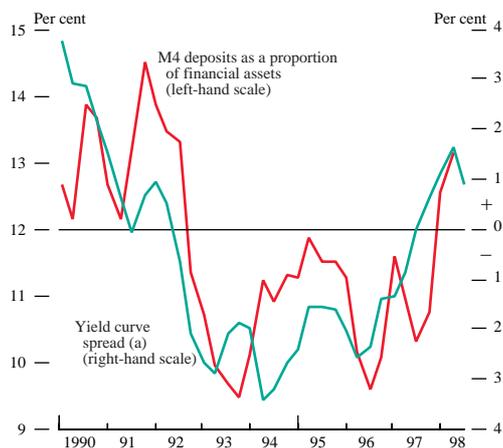


Chart 1.3
OFIFAs' M4 deposits as a proportion of their financial assets, and the yield curve spread



Sources: ONS and Bank of England.

(a) The yield curve spread is defined as the UK Treasury bill rate minus the nominal zero coupon ten-year yield on UK government debt. A positive value indicates a negatively sloping yield curve.

Chart 1.4
ICPFs' M4 deposits as a proportion of their financial assets



important role in the demand for money during that time. Over the past two years, the fall in broad money velocity has been predominantly accounted for by the increased money holdings of 'other financial corporations' (OFCs).⁽¹⁾

Other financial corporations

Within the non-bank financial sector, the Office for National Statistics (ONS) provides data for two main groupings: insurance corporations and pension funds (ICPFs); and other financial intermediaries and financial auxiliaries (OFIFAs). Examples of the latter include securities dealers and financial leasing corporations. According to these data, the main contribution to other financial corporations' M4 growth in the second half of 1997 and early 1998 came from deposits of other financial intermediaries and financial auxiliaries (see Chart 1.2). The share of M4 deposits in the financial asset holdings of this group appears to be correlated with the spread between the Treasury bill rate and the ten-year yield on UK government debt (see Chart 1.3).

Growth in the money holdings of insurance corporations and pension funds was negligible in the four quarters to 1998 Q2 (see Chart 1.2). Chart 1.4 suggests that the strength of insurance corporations and pension funds' money holdings over the past two years could be more than accounted for by the desire to hold money as part of a balanced portfolio when the rest of the portfolio was increasing strongly in value.

It is possible that other financial corporations may try to economise on money balances once the current financial uncertainty diminishes. If these balances were used to purchase financial assets rather than run down loans, there would be greater expansionary pressure.

Household sector

The year-on-year growth in the household sector's M4 has declined so far this year. The ratio of nominal household expenditure to that sector's M4 deposits has been reasonably stable for the past seven years. It is possible that the annual growth in nominal household

(1) The titles of the economic sectors in the monetary statistics have changed, to bring them into line with those used in the National Accounts statistics, which have been revised to conform to the new European System of Accounts 1995 (ESA95). The coverage in the Bank's monetary statistics, however, remains unchanged. Other financial institutions (OFIs) are now known as 'other financial corporations' (OFCs), industrial and commercial companies (ICCs) are now known as 'private non-financial corporations' (PNFCs) and the personal sector is now known as the 'household sector'.

Table 1.A
Large British banks:^(a) profits and capital

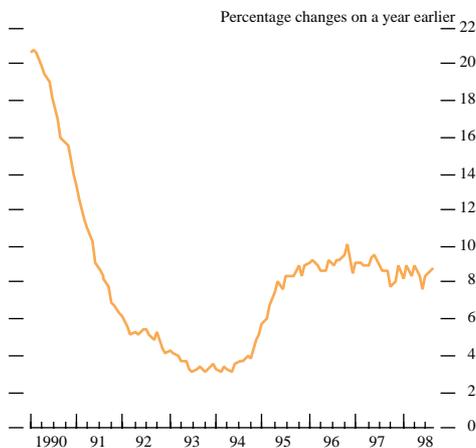
£ billions;^(b) percentages in italics

	1994	1995	1996	1997	1998 HI
Operating profit before bad debts	9.8	11.4	13.0	14.2	8.1
Charge for bad and doubtful debts	2.1	2.2	1.8	2.0	1.2
Operating profits after bad debts	7.8	9.2	11.2	12.2	6.9
Total net capital	46.3	51.5	54.5	59.5	62.4
Total risk-weighted assets	408.2	475.9	498.2	534.0	546.4
Capital adequacy ratio (c)	<i>11.3</i>	<i>10.8</i>	<i>10.9</i>	<i>11.1</i>	<i>11.4</i>

Source: Based on published company accounts.

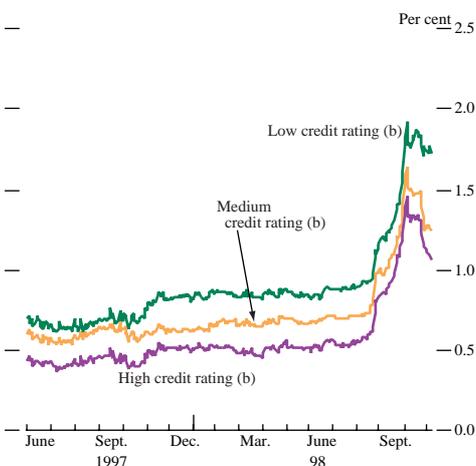
- (a) Abbey National, Bank of Scotland, Barclays, Lloyds (Lloyds-TSB from 1995), Midland, National Westminster, Royal Bank of Scotland and Standard Chartered.
- (b) Figures subject to rounding.
- (c) Total net capital divided by total risk-weighted assets. The internationally agreed minimum requirement is 8%.

Chart 1.5
Growth of M4 lending



Source: Bank of England.

Chart 1.6
Sterling corporate bond spreads^(a)



Sources: Bloomberg and Bank of England.

- (a) Spreads are an average of the individual spreads for the bonds contained within the above categories. Each individual spread is calculated as the difference between the corporate yield and the yield on a synthetic gilt with a matched coupon and maturity.
- (b) These labels are categorisations of credit ratings based on a combination of Standard and Poor's and Moodys' credit ratings.

expenditure may continue to follow the slowdown of M4 growth in the second half of 1998.

Private non-financial corporations (PNFCs)

The annual growth in private non-financial corporations' M4 deposits picked up in 1998 Q3, after it had slowed through 1997 and the first half of 1998. The ratio of investment expenditure to PNFCs' M4 deposits has been reasonably stable in the past three years. But a number of indicators suggest that investment growth is more likely to slow than rise in the rest of 1998 (see Section 2). So it is probable that PNFCs were building up deposits for reasons other than to finance investment expenditure.

1.2

Credit

Following the problems in emerging market economies and the near-failure of the Long-Term Capital Management hedge fund, there has been speculation that suppliers of finance might restrict the available quantity of credit or increase its price. A sharp reduction in the supply of credit is sometimes called 'a credit crunch'. The box on page 6 describes more fully what is meant by the term, and the text below assesses the evidence on whether credit conditions are tightening in the United Kingdom.

The latest data suggest that before the crisis large UK banks had a substantial cushion of capital to insulate them from adverse shocks (see Table 1.A). Deposit growth has remained strong at both retail and wholesale levels. As well as being able to attract deposits, banks' lending has continued to grow strongly. M4 lending growth in September was 8.8% on a year earlier (see Chart 1.5).

Private non-financial corporations

The world financial turmoil has affected UK capital markets. Corporate bond spreads over gilt yields widened considerably following the problems in Russia (see Chart 1.6). The CBI Industrial Trends survey for October showed a marked increase in external finance constraints on investment plans. But the potential impact of these developments on the UK real economy may not be significant. Though spreads rose in August and September, they have since declined somewhat. Furthermore, it is the real yield on debt that is important for corporate investment decisions. Real corporate

What is a credit crunch?

The amount of credit in the economy depends on the supply and demand for loans. A 'credit crunch' is often defined as a significant reduction in the supply of credit given the general level of real interest rates and the credit standing of borrowers.

A credit crunch may arise because a deterioration in the financial position of lenders constrains their ability to supply credit, for example because the lender finds deposits more difficult or costly to attract. In addition, banks' lending may be constrained by a fall in their surplus capital, perhaps as a result of losses. Banks are required by international agreement to maintain a minimum ratio of capital to risk-weighted assets of 8%, and UK regulators can set higher ratios which, if breached, trigger supervisory intervention. So if losses were to cause a capital surplus to decline, banks might decide to reduce the size of their total asset base (essentially their loans), or to seek out assets carrying a lower regulatory risk-weighting.

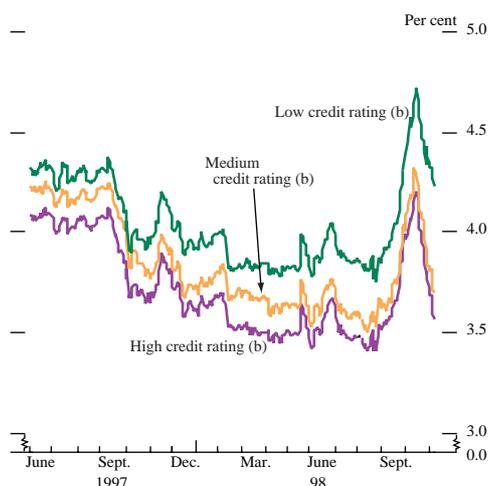
Credit supply may also change, possibly materially, for other reasons. In particular,

throughout the economic cycle credit supply tends to change as lenders' perceptions of risk alter, for example because of a change in borrowers' financial conditions. A deterioration in the cash flows and balance sheets of some borrowers, and so a tightening in the terms of credit supply to them, are typical features of an economic downturn.

Curtailed credit supply need not only take the form of higher interest rates. If borrowers willing to pay higher rates tend to be higher risks, then lenders might ration loan supply directly, rather than reduce the demand via higher interest rates. The terms of credit supply can also be tightened in other ways; for example by reducing the maturity of loans, increasing collateral requirements, or through imposing more demanding covenants (eg regarding events that trigger a technical default).

Credit is used by both the household and corporate sectors to finance consumption and investment. So a sharp reduction in the supply of credit would lead to slower growth.

Chart 1.7
Average real yields^(a) for sterling corporate bonds



Sources: Bloomberg and Bank of England.

- (a) Real yields are calculated as the nominal corporate yield minus a measure of inflation expectations for the appropriate maturity derived from the gilt market.
(b) These labels are categorisations of credit ratings based on a combination of Standard and Poor's and Moody's credit ratings.

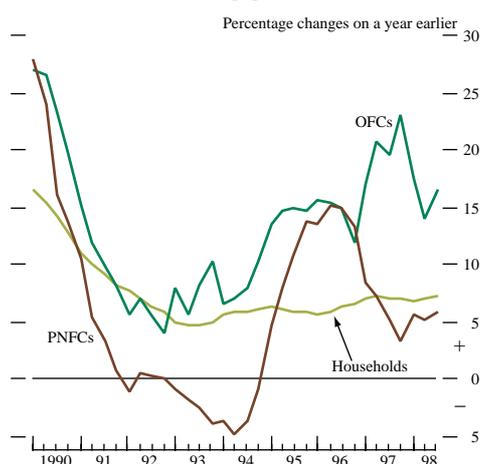
yields are not straightforward to measure, but a Bank estimate suggests that, except for the lower credit-rated companies, real yields are close to the levels at the end of 1997 (see Chart 1.7). In any event, unlike in the United States, corporate credit in the United Kingdom comes largely from banks rather than the bond market. The flow of M4 lending to companies in September was £1.6 billion, well above the average of the previous eight months.

Household sector

Households' credit growth tends to be positively associated with consumer spending growth.⁽¹⁾ As individuals have limited access to credit from outside the bank and building society sector, M4 lending to households is the key indicator of their borrowing activity. Unlike growth in households' deposits, the growth rate of M4 lending to the household sector on a

(1) See, for example, Astley, M and Haldane, A (1997), 'The information in money', *Quarterly Bulletin*, May, pages 174–80.

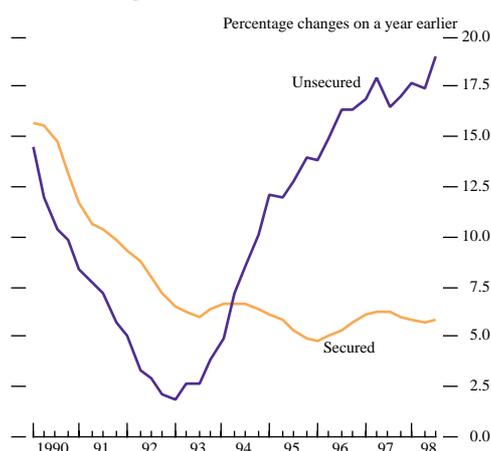
Chart 1.8
Sectoral M4 lending growth^(a)



Source: Bank of England.

(a) Excluding the effects of securitisations.

Chart 1.9
M4 lending to individuals^(a)



Source: Bank of England.

(a) Excluding the effects of securitisations.

Table 1.B
Official interest rates in euro-area countries—
4 November

Per cent

	Official interest rates (a)	Change since 5 August
Austria	3.20	0.00
Belgium/Luxembourg	3.30	0.00
Finland	3.40	0.00
France	3.30	0.00
Germany	3.30	0.00
Ireland	4.94	-1.25
Italy	4.00	-1.00
Netherlands	3.30	0.00
Portugal	3.75	-0.75
Spain	3.50	-0.75

Source: Bloomberg.

(a) All rates are tender rates, apart from Italy, which is a discount rate.

year earlier rose in September and in Q3 as a whole, which could point to continued resilience in consumer spending (see Chart 1.8). It is unlikely to represent a rise in distress borrowing, as unemployment remains low by recent historical standards (see Section 3) and consumers' finances are relatively healthy. Within M4 lending to individuals, year-on-year growth in unsecured lending has increased markedly during the past three years (see Chart 1.9). Annual growth in lending secured on dwellings did pick up in 1998 Q3, but has been reasonably stable for the past five years.

Other financial corporations

The year-on-year growth in bank and building society credit extended to OFCs increased in 1998 Q3, though it was below the growth rates seen in 1997. As with other sectors' credit, there were no signs in the statistics of a sharp reduction in credit availability in September.

1.3 Interest rates and asset prices

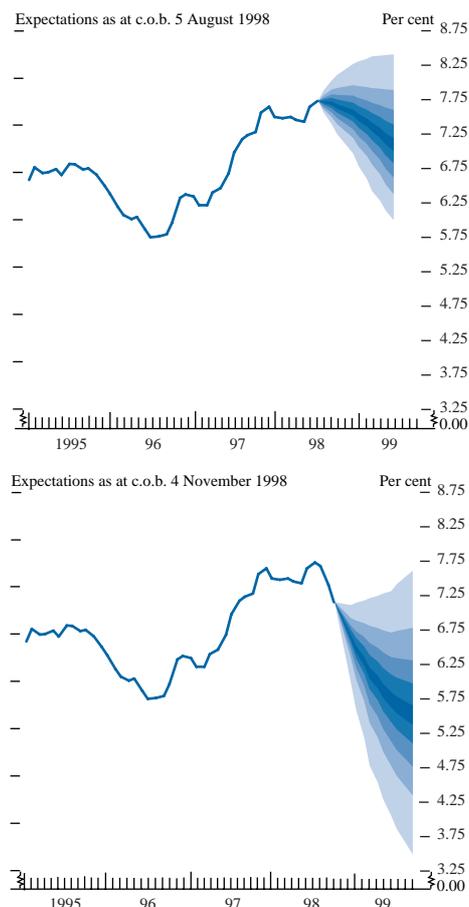
Short-term interest rates

The official repo rate was left unchanged when the Monetary Policy Committee met on 9–10 September. At its meeting on 7–8 October, the MPC voted to cut the Bank's repo rate by 0.25%. On 4–5 November, the MPC voted to reduce the Bank's repo rate by 0.50% to 6.75%.

Risk-neutral probability distributions derived from option prices of expected three-month market rates are shown in Chart 1.10. These suggest that markets had revised down substantially their expectation of the most likely outcome for interest rates during the past three months, shown by the darkest blue band in each chart. But their uncertainty about the future path of interest rates, shown by the width of the blue fan, had increased markedly.

The US Federal Reserve cut its official rate by 0.25% in September and again in October, reflecting concerns about the potential impact of the world's economic problems and of tightening US credit conditions. In the prospective euro area, while German and French official rates have remained unchanged at 3.30%, interest rates in other economies have fallen towards this rate. But further convergence is necessary before the euro comes into being on 1 January 1999 (see Table 1.B). If the higher rates were to fall to the levels currently prevailing in Germany and France, this would constitute a slight monetary loosening within the prospective euro area

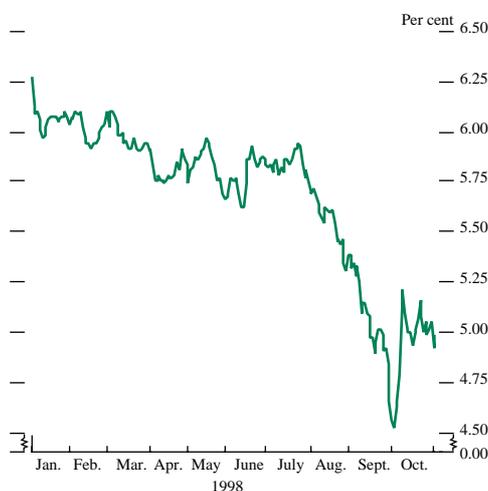
Chart 1.10
Implied distributions for sterling
three-month interest rates



Sources: LIFFE and Bank of England.

The chart depicts the probability distribution for short-term interest rates and is rather like a contour map. So at any given point, the depth of shading represents the height of the probability density function implied by the markets over a range of outcomes for short-term interest rates. The markets judge that there is a 10% chance of interest rates being within the darkest, central band at any date. Each successive pair of bands covers a further 20% of the probability distribution until 90% of the distribution is covered. The bands widen as the time horizon is extended, indicating increased uncertainty about interest rate outcomes.

Chart 1.11
Ten-year redemption yield on nominal
UK government stock



Source: Bank of England.

relative to a situation in which rates converge on the average of current rates.⁽¹⁾

Long-term interest rates

The yields on longer-dated UK government bonds have fallen since 1996. This downward trend accelerated in August: the redemption yield on ten-year gilts fell by 111 basis points between 13 August and 5 October (see Chart 1.11). The financial problems that affected emerging markets, and reduced appetite for risk, made less risky assets such as developed economies’ government bonds relatively more attractive. In the United Kingdom, nominal yields on conventional gilts fell by more than real yields on index-linked gilts over this period. In part, this probably reflected lower inflation expectations, as market forecasts for UK and world growth were reduced as a result of the world financial turmoil. But in addition, investors may have preferred the nominal gilt market to the less liquid index-linked market at a time of high uncertainty. Market contacts suggested that the fall in nominal yields was also driven by speculation about hedge fund positions that implied strong short-term future demand for conventional gilts.

There was a sharp reversal in UK government bond yields in the week beginning 5 October (see Chart 1.11). This was influenced by developments in the US bond markets. Additionally, in the United Kingdom, market speculation about hedge funds’ need to buy large amounts of nominal gilts was not realised, which contributed to the fall in gilt prices.

Government bond yields have followed similar paths across the G7. Overall, nominal yields remain below the levels in August (see Table 1.C).

Equity prices

The FT-SE All-Share index fell by around 25% between its peak on 20 July and 5 October, when it reached a low for 1998. But it subsequently rose so that the 15-day average up to 4 November (used as the starting-point for equity prices in the inflation projection) was 2,442—approximately the level of the index at the beginning of 1998. Chart 1.12 shows the correlation between the FT-SE All-Share and other countries’ share indices. This confirms that the proximate cause of recent movements

(1) For a detailed discussion of international economic and financial developments, see ‘The international environment’ article in the *Quarterly Bulletin*, November 1998, pages 314–23.

Table 1.C
G7 ten-year bond yields

Per cent	Rate on 5 August	Rate on 4 November	Change (a)
United Kingdom	5.71	5.03	-0.68
Canada	5.43	5.22	-0.20
France	4.70	4.24	-0.46
Germany	4.59	4.15	-0.44
Italy	4.90	4.51	-0.39
Japan	1.54	0.90	-0.63
United States	5.42	4.88	-0.54
G7 average excluding United Kingdom (b)	4.47	3.96	-0.51

Source: Datastream

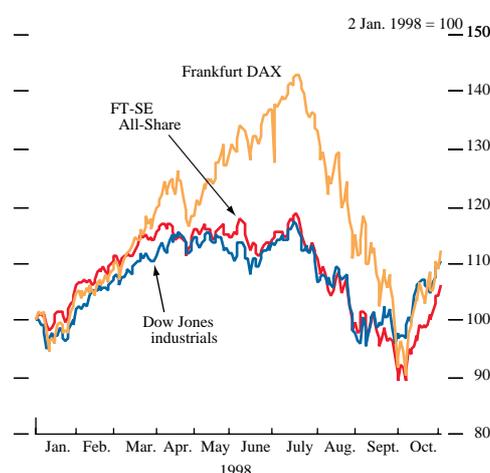
(a) Columns may not sum because of rounding.
(b) GDP-weighted.

in UK equity prices has been international developments. Equity prices are positively related to expectations about future profits, but are negatively related to risk. The financial problems that originated in emerging markets probably reduced profit expectations and raised the perceived risk of holding equities. But it is likely that monetary policy loosening and anticipation of further easing in some parts of the industrialised world helped to ease these concerns, so that equity prices rose again in October and early November. The MPC assumes that there is a greater risk of a fall in equity prices than of a further rise, relative to the central case.

Property prices

According to the Investment Property Databank, annual growth in capital and rental values of commercial property slowed in September. Property company share prices began falling in May, well before the aggregate share index started to decline (see Chart 1.13). During the August-September period when the FT-SE All-Share Index saw its biggest falls, property shares stabilised, probably reflecting the lack of international exposure of property companies and hence the possible attractiveness of their shares as a domestic ‘safe haven’. But as the UK equity market as a whole began to recover, property share prices fell further relative to the FT-SE All-Share index (see Chart 1.13).

Chart 1.12
UK, US and German equity prices^(a)

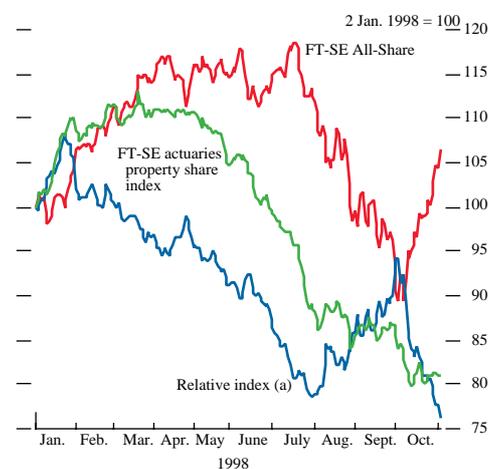


Source: The *Financial Times*.

(a) Own-currency terms.

The Nationwide and Halifax measures of annual house price inflation have continued to converge over recent months. The Nationwide measure of annual house price inflation has fallen quite sharply from 13.1% in January 1998 to 7.5% in October. The Halifax measure rose from 5.4% in September to 6.7% in October. Before that, it had remained relatively stable in a band between 5%–6% since January 1998. The less timely measure estimated by the Bank based on Land Registry data also shows house price inflation falling, but at a less rapid rate than the Nationwide measure. A range of indicators for housing turnover suggest that the trend in activity may be flat to falling.

Chart 1.13
Property share prices



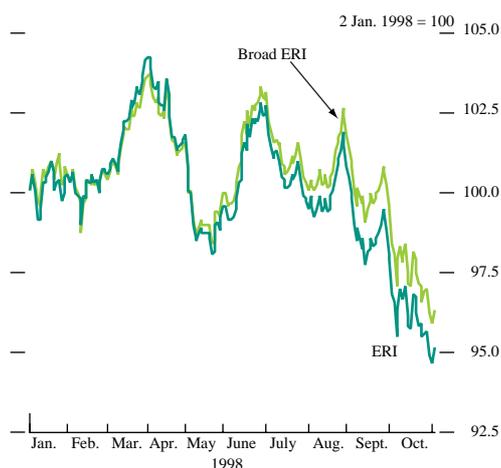
Source: The *Financial Times*.

(a) Property share prices relative to FT-SE All-Share.

1.4 Exchange rates

Sterling has depreciated since the *August Report* (see Chart 1.14). The sterling effective exchange rate index (ERI) averaged 100.0 in the 15 working days up to and including 4 November, which is the starting-point used for the value of the ERI in the current projection. This compares with an average of 103.8 for November in the

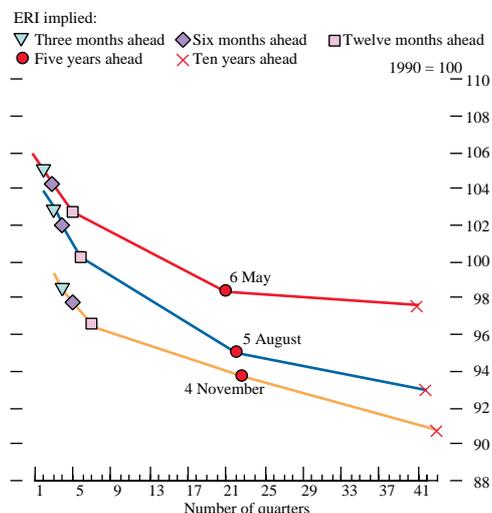
Chart 1.14
Sterling effective exchange rates^(a)



Source: Bank of England.

(a) The ERI is a trade-weighted index of 20 countries' exchange rates against sterling. The broad ERI is constructed using 49 countries' exchange rates.

Chart 1.15
UK effective exchange rate profiles^(a)



Sources: Bank for International Settlements, Datastream and Bank of England.

(a) Assuming uncovered interest rate parity.

August projection. Many factors could have accounted for the depreciation. A small part of the fall can be explained by the positive interest rate differential that existed between UK interest rates and overseas interest rates: other things being equal, currencies should move in order to equalise the risk-adjusted rate of return on assets across countries. The path implied by market interest rates at the time of the August Report is shown in Chart 1.15. In addition, interest rate differentials have narrowed at the short end of the yield curve, as financial markets are now expecting UK monetary policy to be less tight relative to overseas than they were in August. This would have caused the exchange rate to jump down, other things being equal. But at longer maturities, UK forward nominal interest rates have risen relative to overseas rates, suggesting that UK implied forward inflation rates have risen relative to the rest of the world. This would tend to imply a slightly steeper path for the depreciation of sterling expected by the market over the longer term (see Chart 1.15).

The problems in emerging market economies have led to net capital outflows from, or lower net capital inflows to, those countries. Unless the flows resume, these economies will have to run larger current account surpluses or smaller deficits than before. This is part of the explanation for their currencies depreciating against those of the major industrialised countries. And the counterpart to these surpluses or smaller deficits has to be larger deficits or smaller surpluses elsewhere in the world. Relatively weak demand relative to capacity and strong net exports in continental Europe and Japan could enable them to bear the largest part of the adjustment on their current accounts. Consequently, this may help to explain why the Japanese and continental European currencies appreciated by more against the emerging market currencies than the dollar and sterling.

In constructing its forecast, the MPC makes assumptions about a probability distribution of the future path for sterling, conditional upon unchanged interest rates. In judging the most likely path for sterling (the mode of the distribution), the MPC takes into account interest rate differentials. In this modal case, the sterling ERI declines to 97.7 at the end of the two-year forecast horizon. This implies bilateral exchange rates, two years hence, of about 1.68 and 2.69 against the US dollar and Deutsche Mark respectively. In the MPC's view, the risks to sterling relative to the central projection lie on the downside. So the mean of its forecast distribution for the exchange rate lies below the mode, at 94.9 two years from now.

1.5

Summary

Since August, financial market prices have moved sharply. In bond markets, yields on government debt fell, but credit spreads for corporates increased markedly. There have been worries that credit conditions could tighten considerably, which would depress the outlook for world growth further. But so far there have been few signs in the United Kingdom of a credit crunch. The MPC's central projection assumes that there will not be a credit crunch in the United Kingdom. But it has incorporated a small downside risk to activity and inflation from this source.

The exchange rate has depreciated more quickly than was implied by international interest rate differentials at the time of the *August Report*.

Annual broad money growth remains above the growth rate of nominal expenditure. The MPC assumes that some risk remains that past rapid money growth could feed through into higher inflation.

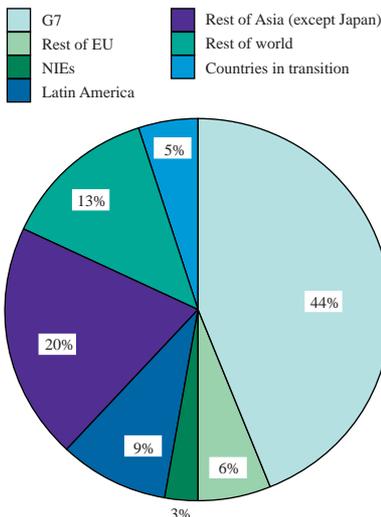
Table 2.A
IMF projections for GDP and trade growth^(a)

	1998		1999	
<i>GDP:</i>				
World	2.0	-1.1	2.5	-1.2
G7	2.1	-0.2	1.9	-0.3
<i>of which, Japan</i>	-2.5	-2.5	0.5	-0.8
NIEs (b)	-2.9	-4.7	0.7	-3.8
Developing economies	2.3	-1.8	3.6	-1.7
Countries in transition	-0.2	-3.1	-0.2	-3.6
<i>of which, Russia</i>	-6.0	-7.0	-6.0	-7.9
World trade	3.7	-2.7	4.6	-1.5

Source: IMF *World Economic Outlook (WEO)*, October 1998.

- (a) Differences from May WEO in italics.
(b) Korea, Singapore, Taiwan and Hong Kong SAR.

Chart 2.1
Share of world GDP^(a) 1997



Note: NIEs: Korea, Singapore, Taiwan and Hong Kong SAR.
Countries in transition: Central and eastern Europe, Russia, Transcaucasus and Central Asia.
Latin America includes Caribbean Islands.

Source: IMF *World Economic Outlook*, October 1998.

- (a) Purchasing power parity valuation.

Prospects for the external environment have worsened considerably since the August *Inflation Report*, increasing the downside risks for UK trade and output. Extensive revisions between 1991–97 to the UK National Accounts have raised the estimated cumulative growth of real GDP by nearly 2%, but did not change estimates of quarterly growth in 1998. Domestic demand growth in 1998 H1 is now lower than previously measured, but the contribution from net trade is less negative. The box on pages 14–15 considers the source and impact of the main revisions. The first estimate of GDP growth in 1998 Q3 was 0.5%, the same rate of growth as in Q2.

2.1 External demand⁽¹⁾

The prospects for world demand and output have deteriorated significantly since the August *Inflation Report*. Between May and October, the International Monetary Fund (IMF) revised down its forecast for world GDP growth in 1998 by 1.1 percentage points, to 2.0% (see Table 2.A). That compares with a forecast of 4.4% made in October 1997. Independent outside forecasters have also become more pessimistic about world growth prospects. The reduction of GDP growth forecasts largely reflects worsening prospects in Japan, Russia, the newly industrialised economies (NIEs) in Asia, and Latin America. In 1997, these economies accounted for around 40% of world GDP in purchasing power parity terms⁽²⁾ (see Chart 2.1). The prospects for growth in the major industrialised economies, with the exception of Japan, have so far been less affected, though business and consumer confidence surveys have weakened.

There are a number of channels through which the emerging market economies' crisis could affect demand and output in the major industrialised economies. Following the reversal of capital flows from the advanced economies to emerging markets, there is likely to be a direct trade effect, via lower demand for

(1) For a detailed discussion of international economic developments, see 'The international environment' article in the *Quarterly Bulletin*, November 1998, pages 314–23.

(2) Purchasing power parity adjusts exchange rates for the cost of a basket of goods and services in a common currency.

Table 2.B
Intra and inter-regional exports as a percentage
of total world exports of goods in 1995

Origin	Destination							
	North America	Latin America	Western Europe	CEECs (a)	Africa	Middle East	Asia	World
North America	5.7	2.0	3.0	0.1	0.2	0.4	4.3	15.9
Latin America	2.2	1.0	0.8	0.0	0.1	0.0	0.5	4.6
Western Europe	3.3	1.1	30.9	2.0	1.2	1.2	4.3	44.8
CEECs	0.2	0.1	1.8	0.6	0.0	0.1	0.4	3.1
Africa	0.3	0.0	1.1	0.0	0.2	0.0	0.3	2.1
Middle East	0.3	0.1	0.7	0.0	0.1	0.2	1.4	2.9
Asia	6.3	0.6	4.4	0.3	0.4	0.6	13.5	26.6
World (b)	18.4	4.8	42.7	3.1	2.3	2.6	24.7	100

Source: *Economic Trends*, November 1997.

(a) Central and eastern European countries.

(b) Figures may not sum to 100 because of rounding.

advanced economies' exports, and cheaper imports from the emerging market economies. In addition, market turbulence could affect financial wealth and confidence. Risk premia for emerging market debt have risen sharply, which could have repercussions for the industrialised economies. An important factor will be the extent to which the emerging markets crisis is concentrated in intra-regional trade. Table 2.B shows that Asian exports of goods accounted for 27% of total world trade in goods in 1995 (up from 20% in 1991), though more than half of this was accounted for by intra-Asian trade. And although Asia, Latin America and central and eastern Europe were the destinations for nearly one third of total world exports of goods in 1995, the majority of these originated within those regions.

Growth in the major industrialised economies slowed in 1998 Q2, partly reflecting a number of special factors. But excluding Japan, growth remained close to trend. US GDP growth moderated in 1998 Q2, reflecting the effects of the General Motors strike, and a large negative contribution from net trade. But the first estimate of US GDP growth in 1998 Q3 showed a small acceleration from Q2: lower consumption growth was offset by an increase in inventories and a smaller negative contribution from net trade. Recovery in the prospective euro area continued, albeit at a slightly slower rate than in 1998 Q1. By contrast, Japanese GDP fell for the third consecutive quarter in 1998 Q2, the weakest outturn since 1955, when the data were first collected. And following the declaration of a moratorium on domestic currency debt by the Russian authorities in August, financial market turbulence resulted in lower global equity prices and a widening of credit spreads on emerging market and other debt (see Section 1).

UK trade

Revisions to the UK National Accounts have improved the underlying net trade position in 1998 H1. The estimated fall in net exports in 1998 H1 was reduced by the equivalent of 0.5 percentage points of GDP, and the current account deficit in 1998 Q1 was revised down from £3.2 billion to £0.5 billion. Net exports of goods and services made a small positive contribution to UK GDP growth in 1998 Q2, after subtracting 1.2 percentage points from growth in the two previous quarters. And the current account registered a small surplus in 1998 Q2.

The UK balance of trade in goods with the European Union appears to have remained surprisingly resilient,

Revisions to the National Accounts

The National Accounts data released on 24 September contained a number of significant methodological changes, as well as the normal round of annual revisions.

There were four main sources of revision:

- These data were the first to be compiled in accordance with the European System of Accounts (ESA95),⁽¹⁾ which will be mandatory for all EU countries by 2003.
- The base year for constant-price comparisons was changed from 1990 to 1995.
- Existing business registers from which the ONS draws its survey samples were replaced by a common register—the Inter-Departmental Business Register (IDBR).
- The normal input-output balancing exercise which takes on new benchmark data was carried out for 1996.

The extent of these revisions makes comparisons with the previous data set problematic. Both the level and recent growth profile of GDP have changed. The table below summarises the main changes since 1994 to growth rates and their source.

Revisions to UK GDP^(a) since 1991

	1991–93 (b)	1994	1995	1996	1997
Previous annual percentage growth	-0.4	4.3	2.7	2.2	3.4
New annual percentage growth	0.9	4.4	2.8	2.6	3.5
<i>Contribution to change in growth rate, percentage points</i>					
ESA	-0.2	-0.1	0.1	-0.1	0.1
Rebasing	0.0	0.0	-0.1	-0.2	-0.4
Non-ESA	1.5	0.2	0.1	0.6	0.4
Total change	1.3	0.1	0.1	0.4	0.1

Source: ONS Blue Book 1998.

(a) Constant market prices.
(b) Figures are cumulative.

The level of GDP at current market prices in 1997 is now £15.4 billion higher than under the previous set of accounts. The introduction of ESA95, which resulted in revisions as far back as 1948, accounted for £2.4 billion, but had only a negligible impact on recent growth rates.

In real terms, cumulative GDP growth (at market prices) between 1991 Q1 and 1998 Q2 is now

estimated to be nearly 2% higher than previously thought. Rebasing is estimated to have reduced real GDP growth by 0.7 percentage points since 1995, implying that other changes to the data would have left GDP growth 2.6% higher since 1991 Q1.

Average annual growth in real GDP in the last decade is now 2.2%, compared with 2.0% in the previous accounts (see Chart 1). The revisions to GDP occur principally in two time periods. Around two thirds of the upward revision occurs between 1991–93, which reduced the measured depth of the recession. And growth is higher since 1994, particularly since 1996.

The upward revision to GDP, particularly since 1996, mainly reflects higher fixed investment (see Chart 2), which affects both the demand and supply sides of the economy. The peak in GDP growth now occurs in 1997 Q4, one quarter later than previously thought. But the slowdown in domestic demand, and particularly in household expenditure, since 1997 Q4 is more marked. Growth in household expenditure in the year to 1998 Q2 is now estimated to have been 2.8%, compared with 3.8% in the previous accounts. By contrast, the contribution to growth from net trade is now less negative (see Chart 3). This is primarily owing to higher exports of services. Investment income has also been revised up, significantly reducing the current account deficit in 1997 and 1998 Q1 (see Chart 4).

On the output side, the relative sizes of the broad industrial groups have changed. Chart 5 shows how sectoral shares of the economy have changed between 1990 and 1995. The weight of manufacturing in the economy has fallen, but the service sector's weight has risen to almost two thirds of the economy. Over the recovery as a whole, cumulative service sector growth has been revised up by 1.5 percentage points (see Chart 6). That largely reflects a methodological improvement to the measure of government output. Manufacturing output growth since 1992 Q2 is unchanged, but was 0.7 percentage points higher between 1997 Q3 and 1998 Q2. Nonetheless, the divergence between ONS and survey data since 1995, which has been highlighted in the past, still remains a puzzle.

(1) See also the article in the November 1998 Bank of England *Quarterly Bulletin* on pages 361–67, and the box on page 16 in the August 1998 *Inflation Report*.

Chart 1
GDP growth

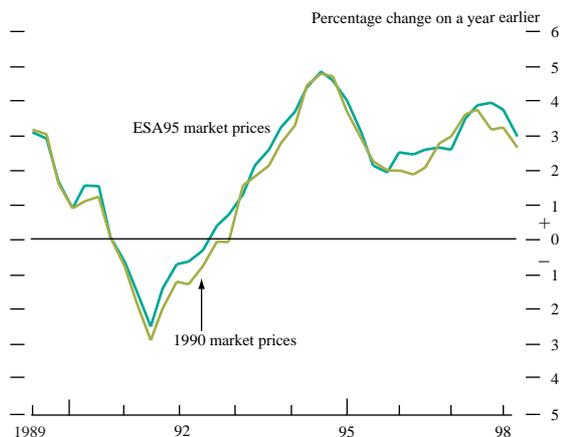


Chart 3
Contributions to GDP growth

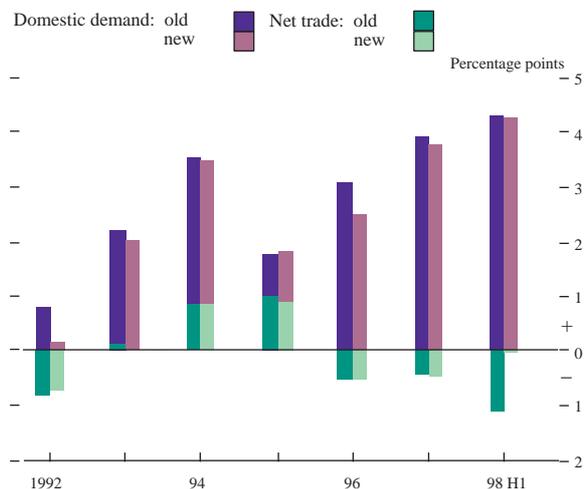
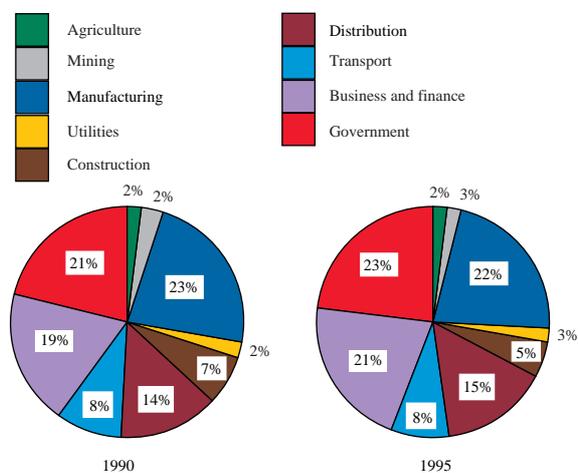
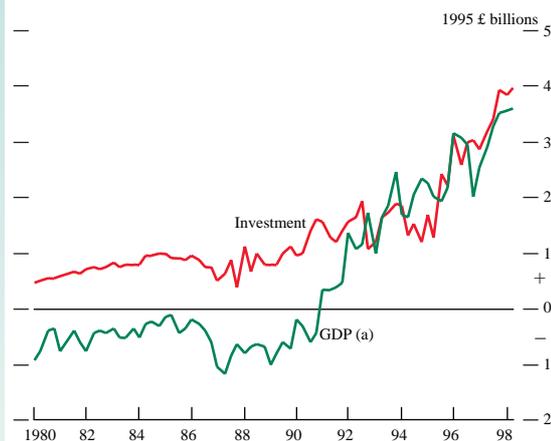


Chart 5
Shares in GDP^(a)



(a) Figures do not sum to 100 because of rounding.

Chart 2
Revisions to GDP and investment



(a) At market prices.

Chart 4
Revisions to the current account

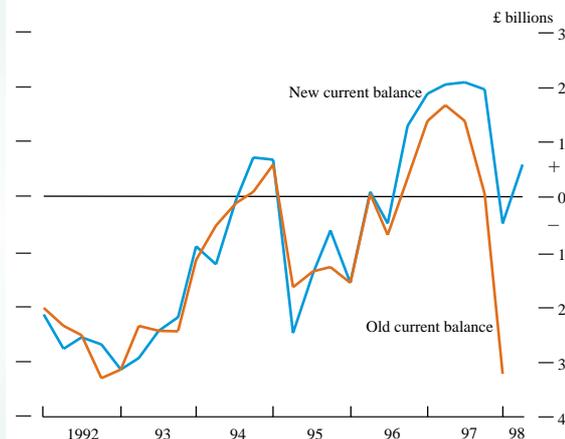
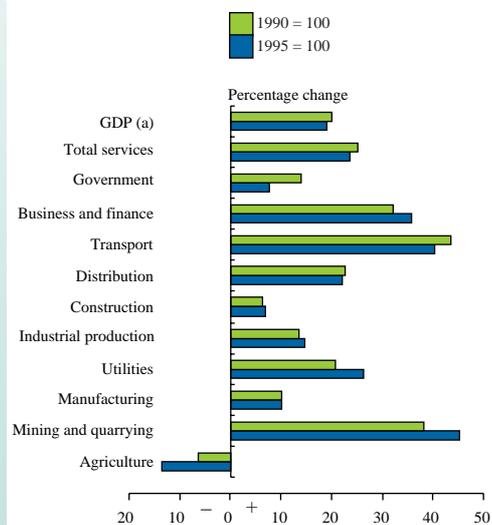
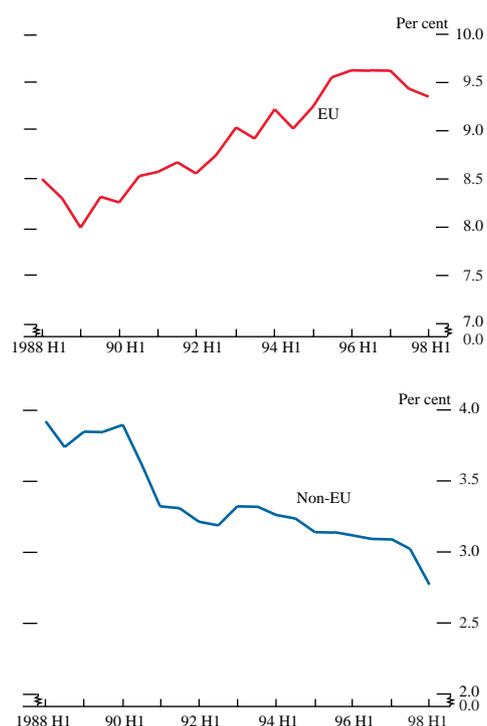


Chart 6
Cumulative growth 1992 Q2–98 Q2



(a) 1990 at factor cost, 1995 at basic market prices.

Chart 2.2
UK share of goods export markets^(a)



Source: OECD.

(a) Weights based on UK shares of overseas markets in 1994.

Table 2.C
Quarterly growth rate of GDP^(a)

Percentage change

	1997	1998	
	Q4	Q1	Q2
Consumption:			
Households	1.5	0.5	0.4
Non profit making institutions serving households	0.1	0.0	0.3
Government	0.4	0.9	0.9
Investment	2.7	3.1	-1.4
Final domestic demand	1.4	1.1	0.1
Change in inventories (b)	0.1	0.0	0.3
Domestic demand	1.5	1.1	0.3
Net trade (b)	-0.8	-0.4	0.1
GDP at market prices	0.7	0.8	0.5

(a) Constant 1995 prices.

(b) Contribution to quarterly growth.

Table 2.D
Households' expenditure at constant 1995 prices

Per cent

	Share of total	Changes on previous period		
		1997	1998	
		Q4	Q1	Q2
Durable goods	10	4.0	0.8	-0.4
of which, vehicles	5	6.2	1.4	-2.0
Non-durable goods	44	1.2	-0.5	1.1
Services	46	1.2	1.4	-0.2
of which, financial	4	3.1	1.0	-1.0
Total	100	1.5	0.5	0.4

despite the appreciation of sterling against most EU currencies since 1996. UK export volume growth to the European Union has remained robust, as EU domestic demand has strengthened, helping to offset some of the adverse impact of sterling's appreciation on the cost competitiveness of UK exports. However, the UK share of the EU market,⁽¹⁾ which had been increasing since 1988, has fallen back since 1997 H1 (see Chart 2.2). The UK share of the non-EU market, which has been on a downward trend over the past decade, also fell sharply in 1998 H1.

More timely monthly data show that the UK deficit in trade in goods and services is likely to have widened in 1998 Q3, mainly reflecting a rising deficit with non-EU countries, and in particular with Asia (excluding Japan). In its assessment of the outlook for UK net exports, the MPC has considered conditions outside, as well as within, industrialised countries. The UK trade deficit is likely to continue to widen in the rest of 1998. UK export markets, including non-OECD countries, grew by more than 9% on average between 1994–97, but the MPC expects growth to slow to around 7½% in 1998 and to just over 6% in 1999. This has been factored into its central projection.

2.2 Domestic demand

After growing by an average of 1.1% per quarter since 1997 Q1, domestic demand grew by 0.3% in 1998 Q2. This slowdown reflected slower consumption growth and falling investment (see Table 2.C). Excluding inventories, final domestic demand rose by 0.1% in 1998 Q2, its smallest quarterly rise since 1995 Q1.

Consumption

Household final expenditure grew by 0.4% in 1998 Q2, compared with 0.5% in 1998 Q1. Over the first half of 1998, household final expenditure rose by an annualised 2.9%, compared with 4.0% in 1997 H2. The principal component of the slowdown in consumption in 1998 Q2 was lower spending on services, particularly financial services. Spending on durable goods also fell in 1998 Q2, by 0.4%, reflecting a 2.0% fall in spending on vehicles (see Table 2.D).

Consumption is influenced by short-term changes to income, but in the long run it also depends on

(1) Defined as the United Kingdom's share of other EU countries' imports, weighted by UK exports to those countries in 1994.

Chart 2.3
Total net wealth and equity wealth

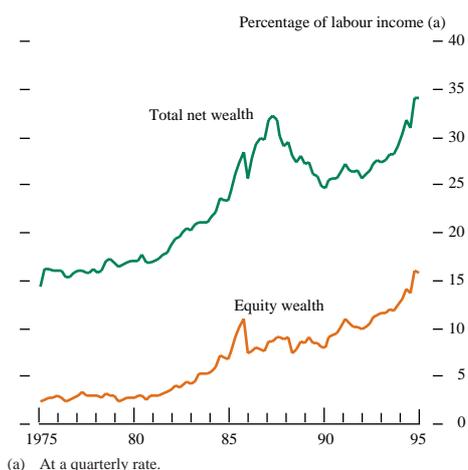


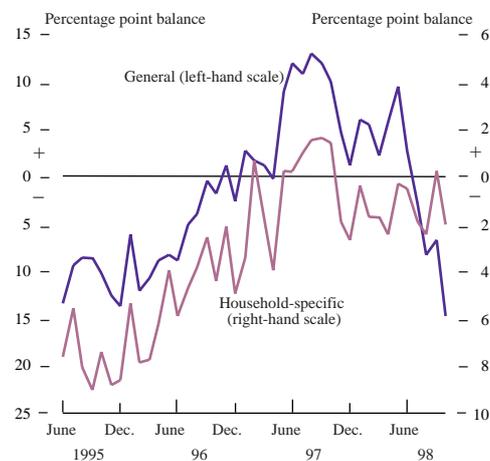
Table 2.E
Share of equities in personal sector's financial assets, 1996

Per cent	EU3 average (a)	Japan (b)	United States	United Kingdom
Equities held directly	24	6	26	20
Equities held indirectly via insurance and pension funds	6	5	14	34
Total equities (percentage of household assets)	30	11	40	54
Financial assets as a percentage of private consumption (1996)	285	404	437	433

Sources: OECD *Financial Statistics* and ONS *Financial Statistics*.

- (a) France, Germany and Italy.
(b) Based on insurance company balance sheets.

Chart 2.4
GfK survey balances on general and own economic situation



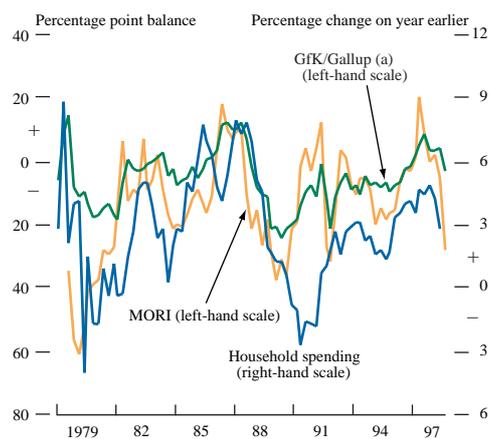
Source: GfK.

expectations about lifetime, or permanent income, from both labour and capital. Recent consumption growth has been supported by a strong rise in income earned from employment. The National Accounts measure of real income from employment increased at an annual rate of around 5% in each of the past four quarters. The nominal value of household net financial wealth had risen to a record level by 1998 Q2. Two thirds of the rise since 1995 has been accounted for by the rise in equity wealth (see Chart 2.3). Equities have become an important part of household net financial wealth. By value, they accounted for 46% of total net financial and housing assets in 1997. That compares with a share of 16% in 1980. Section 1 discusses recent movements in equity markets.

The proportion of the household sector's financial assets held in the form of equities is relatively high in the United Kingdom, though most are held indirectly, through pension and insurance funds (see Table 2.E). To the extent that the rise in financial wealth has supported consumption growth in the present recovery, the fall in equity prices since July could depress future consumption growth. But such changes typically take several quarters to have their full effect, so that past increases in net financial wealth should continue to underpin consumption growth in the near term.

Consumption growth is likely to have been relatively robust in 1998 Q3, despite a fall in private car registrations. Retail sales volumes were 0.7% higher in 1998 Q3. That contrasts with information from both the Confederation of British Industry (CBI) Distributive Trades and the British Retail Consortium surveys, which had pointed to a significant slowdown in retail spending growth. And survey measures of consumer confidence became negative in the summer and have continued to deteriorate. The aggregate GfK consumer confidence index fell in October to its lowest level since March 1996, reflecting concerns about the general economic situation. The proportion of respondents to the GfK survey who think that now is a good time to make a major purchase also fell, to its lowest level since June 1996. But respondents were more optimistic about their own financial situation. Aggregating the responses to the questions relating to households' own rather than general economic conditions indicates less of a downturn (see Chart 2.4). The less timely MORI measure of consumer confidence in the general economic situation fell further in September to -37%, its lowest level since October 1992. Chart 2.5 shows that changes in

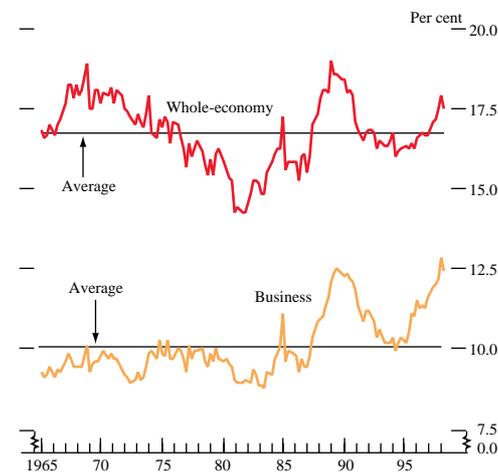
Chart 2.5
Consumer confidence and household spending



Sources: GfK, MORI, ONS and Gallup.

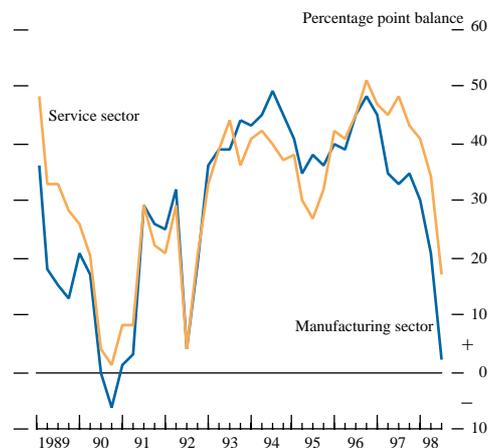
(a) Gallup prior to July 1995.

Chart 2.6
Investment as a share of GDP^(a)



(a) At constant 1995 prices.

Chart 2.7
Confidence in profitability



Source: British Chambers of Commerce.

consumer confidence have in the past been correlated with changes in household spending. Consumer confidence indicators may also have some forward-looking properties.⁽¹⁾

Investment demand

Whole-economy investment expenditure fell by 1.4% in 1998 Q2 on a quarter earlier. Business investment fell by 2.7% over the same period, reflecting falls across all industrial sectors. But government investment (general government plus NHS Trusts) rose by 0.3%. Business investment growth has been rapid in recent years. And following extensive upward revisions, particularly since 1991, to the investment series in the National Accounts, the business investment-output ratio is now estimated to be above its peak in the previous cycle (see Chart 2.6).

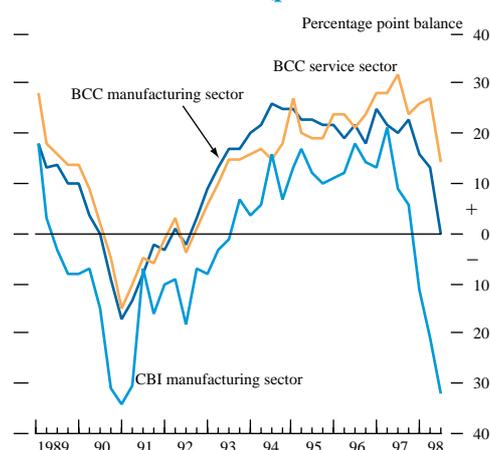
Firms' desired capital stock, and hence their investment decisions, are influenced by their expectations about future trends in output and profits. According to the British Chambers of Commerce (BCC) survey, confidence in profitability declined sharply in both the manufacturing and the service sectors in 1998 Q3 (see Chart 2.7). And the CBI October survey showed that optimism about business conditions among manufacturers fell to its lowest level since 1980. Other factors that may restrain investment include the rise in the real cost of capital and the cost of borrowing for many firms, following the fall in equity prices. However, after a sharp increase in real yields on corporate bonds in September, they have since fallen back, and are below their level in the immediate aftermath of the Asian crisis (see Section 1).

Surveys show that investment intentions have weakened, particularly among manufacturing firms (see Chart 2.8). As many manufacturing firms expected to reduce investment in plant and machinery in 1998 Q3 as intended to increase it, according to the BCC survey. And the balance of CBI manufacturing firms intending to decrease investment was at its highest in October since 1991. Service sector investment intentions have also weakened since the beginning of the year, according to the BCC survey.

The autumn pre-Budget report detailed an increase in net public investment over the next five years, which should

(1) Daron Acemoglu and Andrew Scott, 'Consumer confidence and rational expectations: are agents' beliefs consistent with the theory?', *Economic Journal*, January 1994.

Chart 2.8
Investment intentions (plant and machinery)



Sources: British Chambers of Commerce and CBI.

Chart 2.9
UK and US inventory-output ratios



Sources: UK National Accounts and US National Accounts (Bureau of Economic Analysis).

Table 2.F
Ratio of changes to inventory investment and GDP

Peak to trough in recession	Change in inventories/change in GDP	First eight quarters following trough	Change in inventories/change in GDP
1962 Q3–63 Q1	2.5	1963 Q1–65 Q1	0.1
1973 Q3–75 Q3	0.9	1975 Q3–77 Q3	0.2
1979 Q2–81 Q1 (a)	0.3	1981 Q1–83 Q1	0.3
1990 Q2–92 Q1	0.1	1992 Q1–94 Q1	0.1

(a) Excludes alignment adjustment.

boost the overall level of investment. Millennium-related construction spending will probably also raise the level of total capital spending and may bring some spending forward, though it may also lead to some substitution between private and public investment spending. The box on page 20 considers the likely impact of such spending, together with other Millennium-related effects.

Inventory investment

Inventory investment (including the alignment adjustment) has risen by more than £1 billion in each of the previous three quarters, and rose by £1.6 billion in 1998 Q2, contributing 0.3 percentage points to GDP growth. The rise in inventories in the first half of 1998 was more than accounted for by higher inventories of finished manufactured and retail goods. The total inventory-output ratio has risen in each of the past two quarters.

The inventory-output ratio has been on a declining trend since the early 1980s, partly owing to the introduction of integrated production processes and stock management techniques such as ‘just-in-time’. Chart 2.9 shows that the level of the inventory-output ratio in the United Kingdom is now similar to that in the United States. Inventory investment may have become less important to the economic cycle, perhaps because of the decline in the inventory-output ratio.⁽¹⁾ Table 2.F shows that the turning-points in the most recent cycle owed less to changes in inventories than in previous cycles. That is less clear in the United States, perhaps because the US inventory-output ratio has been broadly flat since the late 1980s. The UK inventory-output ratio has also flattened since 1994.

The Bank’s regional Agencies conducted an informal survey of contacts in September on the behaviour of inventories. They found that weaker-than-expected sales and orders had led to a rise in stocks of finished goods among 40% of contacts. The percentage was highest in the manufacturing sector; the picture was less clear among retailers and distributors. However, more than 70% of contacts expected to see stock levels fall relative to sales in the medium term.

The recent increase in inventories could be a normal cyclical response—firms typically take time to adjust

(1) See also the box on page 24 of the August 1995 Report.

The Millennium

With the turn of the century little more than twelve months away, there has been increasing discussion of the possible economic implications. This box considers two specific issues: first, Millennium-related construction and other aspects of the planned celebrations and, second, the so-called 'Millennium bug'.

Construction and celebrations

The Millennium has prompted a range of construction projects, including the Millennium Dome in London and a programme to build and renovate town halls around the country. The Millennium Commission has so far awarded some £1.7 billion in Lottery-financed grants for various capital projects, with payments spread out over several years between 1995 and 2001/02. A similar amount of private sector finance has been committed to these projects. And there may be other Millennium-related private-sector construction activity that has not received Lottery money.

Taken together, these projects will probably continue to raise investment over the next two years. But the effects are likely to be relatively small. The sums involved are dwarfed by total economy-wide gross construction output. And not all of the money reflects net extra spending. Some of it may have displaced other investment activity, either directly through reduced private sector spending on non-Millennium projects, or indirectly by raising the cost of resources in the construction sector. And some of it might have occurred anyway.

The Millennium celebrations are likely to affect the profile of demand and output around the turn of the century. But the implications for inflation in the medium term are limited. The timing of the Millennium is known with certainty, so consumers are likely to adjust their consumption and savings patterns to smooth some of the impact of the celebrations. And companies will adjust their stocks in anticipation of the temporary increase in demand.

The 'Millennium bug'

The so-called 'Millennium bug' or 'Year 2000 problem' affects how dates are handled by computers and other electronic equipment. Many older systems are unable to distinguish between the

years 1900 and 2000, because they use only two digits to record the year. And some do not recognise that 2000 is a leap year.

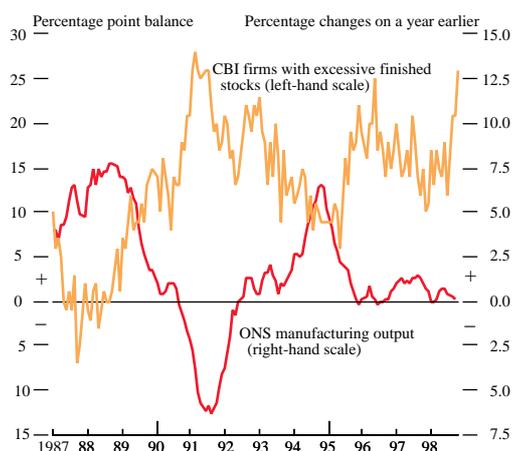
Efforts to fix these problems may continue to exert some positive inflationary pressure over the next year or two. Published estimates suggest that required spending in the United Kingdom lies between £15 billion and £50 billion. Not all of this reflects net additional spending: so far, many organisations appear to have met Millennium costs out of existing IT budgets, by postponing or cancelling other projects. And the total will be spread over several years, with some already spent, and some not spent until after 2000. But Millennium work has probably played some part in raising the earnings growth of IT staff.

Where repairs are not carried out, or not completed in time, there is a risk that system failures could depress output around the beginning of 2000. But there is very little hard information with which to quantify this risk. Some evidence suggests that the impact could be material. For example, the latest report from Action 2000 suggests that 12% of larger UK companies have still to progress beyond the initial stage of planning how to tackle the problem, and 40% of medium-sized companies have not even begun such planning. And progress in some other countries—with which UK firms have trading and financial connections—has been rather slower. But other considerations suggest a more limited impact. Not all firms are reliant on critical date-sensitive equipment. And where problems are known, or suspected, output may be at least partly maintained through the use of manual back-ups, precautionary stocks and diversified trading links.

Uncertainties about the scale of post-2000 effects may begin to have an impact before 2000. Precautionary stockbuilding by firms and households may raise GDP growth. And there may be some increase in insurance and financial risk premia, together with an increase in desired liquidity.

Given the significant uncertainties involved, the MPC has decided not to incorporate 'Millennium bug' effects in its central projection for inflation. But it does consider there to be a small upside risk to output in 1999, together with a small downside risk to output in 2000 and a small upside risk to inflation.

Chart 2.10
Manufacturing output and CBI stocks
of finished goods



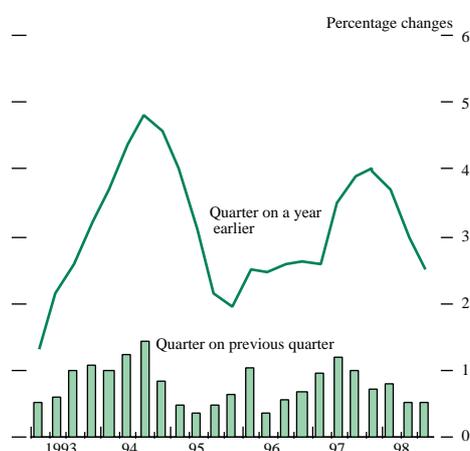
their production schedules as demand slows. To the extent that the build-up of inventories has been involuntary, it represents a downside risk to future output growth. There is some survey evidence that this may be the case. The percentage of manufacturers in the CBI survey citing excess stocks of finished goods has risen sharply in recent months, and was at its highest in October since July 1991. That has in the past been associated with lower manufacturing output growth (see Chart 2.10). The percentage balance of retailers saying that stocks are too high relative to expected demand has also picked up in the past three months, and has exceeded expectations since June. The MPC expect any significant rise in inventories to be unwound in line with the medium-run trend in the inventory-output ratio.

Public sector demand

Public sector net borrowing (PSNB) was -£0.1 billion in September (ie a net repayment). The cumulative PSNB for 1998 Q3 was -£2.1 billion, and £5.1 billion from April to September 1998, around £10 billion lower than for the same period in 1997.

In its assessment of the outlook for the public finances, the MPC has taken as its central case the nominal government expenditure plans and effective tax rates from the autumn pre-Budget fiscal statement published on 3 November. The overall fiscal stance is broadly the same as at the time of the *August Report*, after allowing for the effects of the adoption of ESA95 in the National Accounts, and projections of weaker activity.

Chart 2.11
GDP growth rate



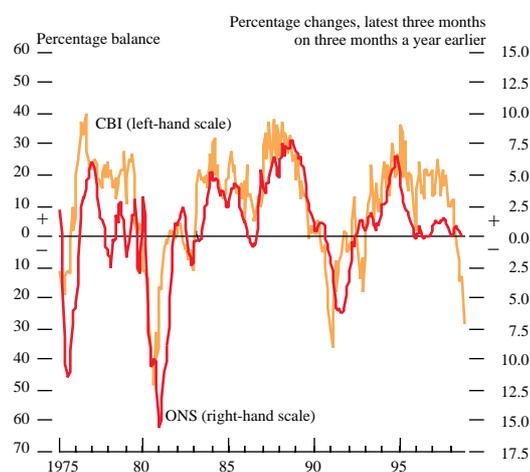
2.3 Output

The extensive revisions to the National Accounts raised the estimated cumulative growth in real GDP (at market prices) by nearly 2% between 1991–97, but estimates of quarterly growth in 1998 were unchanged.⁽¹⁾ According to the first estimate, GDP (at market prices) rose by 0.5% in 1998 Q3, the same as in 1998 Q2 and around its long-run average quarterly growth rate. The annual rate of increase fell back to 2.5% from 3.0% (see Chart 2.11).

Service sector output rose by 0.6% in 1998 Q3, the same rate of increase as in 1998 Q2, but lower than the average increase of 1.2% in the preceding four quarters. Survey data suggest that service sector growth is likely to slow further. The balance of service sector firms in

(1) Growth in GDP at factor cost was revised up by 0.3 percentage points between 1997 Q4 and 1998 Q2.

Chart 2.12
CBI and ONS manufacturing output



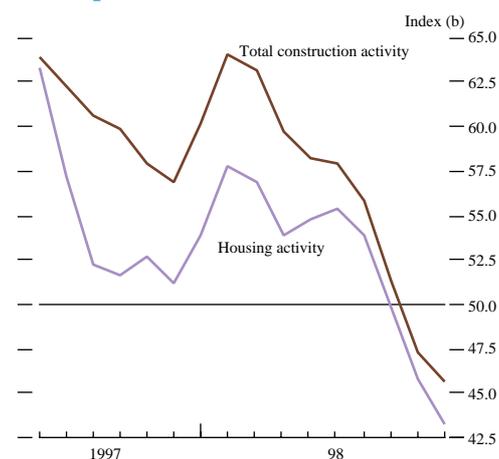
the BCC survey reporting a rise in domestic orders fell to 11% in 1998 Q3, compared with an average balance of 31% in 1997. And the balance reporting an increase in export orders was negative for the first time since 1991 Q2. According to the CBI Financial Services survey, business optimism within the financial sector in 1998 Q3 was at its lowest level for eight years. And the Chartered Institute of Purchasing and Supply (CIPS) report on services recorded an easing in growth for the fourth consecutive month in October. The level of incoming new business declined for the first time since the survey began in mid 1996.

Manufacturing output fell by 0.6% in August and by 0.4% in September, leaving the level 0.1% lower in 1998 Q3 than in Q2. Survey evidence points to a significant deterioration in business sentiment and output prospects in the manufacturing sector. The October BCC survey showed a further decline in both home and export deliveries, with the former becoming negative for the first time since 1992 and the latter reaching their lowest level since the survey began in 1989. The October quarterly CBI Industrial Trends survey reported that the balance of firms expecting output to increase over the next four months was the most negative since January 1991 (see Chart 2.12). Both domestic and export orders remained very weak. But the total orders balance has declined by considerably more than the export orders balance since April, suggesting that weakening domestic demand is playing a more significant role. And the CIPS Purchasing Managers' Index (PMI) fell for the seventh consecutive month in October, to its lowest level since January 1992, when the survey began.

Output in the energy extraction and supply industries rose by around 5% in 1998 Q2 compared with the previous quarter, contributing nearly 1 percentage point to total industrial production growth of 1.2%. However, the output of these sectors is very volatile from quarter to quarter. In 1998 Q3, energy extraction output rose by 0.2%, and energy supply output increased by 1.1%. Total industrial production rose by 0.1% in 1998 Q3.

Construction output fell by 2.9% in 1998 Q2, from the previous quarter, following a rise of 2.0% in 1998 Q1. But over the first six months of 1998, construction output was 1.4% higher than in 1997 H2. And construction output may have risen in 1998 Q3. After declining earlier in the year, construction new orders were 9.2% higher in the three months to September than

Chart 2.13
CIPS report on construction^(a)



Source: The Chartered Institute of Purchasing and Supply.

- (a) Seasonally adjusted.
 (b) A reading below 50 indicates a contraction.

in the previous three months, and more than 9% higher than a year ago. Private commercial orders showed the strongest rise, but housing-related activity declined further. By contrast, the CIPS Construction Activity Index was below 50 in both September and October, indicating an overall decline in activity for the first time since the survey began 18 months ago (see Chart 2.13). However, optimism about activity in the next twelve months remained robust.

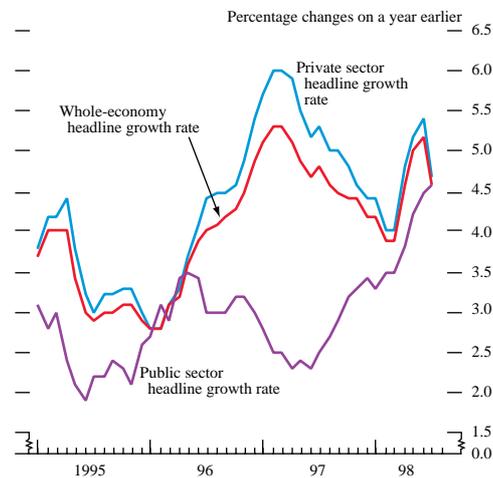
2.4

Summary

Global economic conditions have worsened markedly since the August *Inflation Report*, reducing the central projection and posing further downside risks for UK output growth. UK output could be affected in a number of ways: directly through net trade; and indirectly via the financial markets, which could have an impact on credit conditions, confidence and wealth, and hence on consumption and investment.

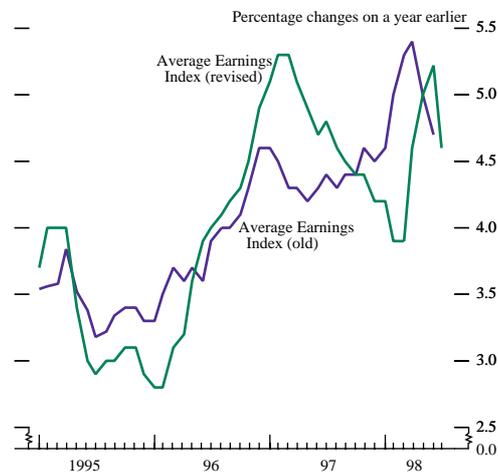
Data for the most recent quarters should be viewed within the context of the extensive back-revisions to the National Accounts, which raised the cumulative growth in GDP by nearly 2% between 1991–97. As the main source of these revisions was higher investment spending, particularly since 1996, this will have implications for both the demand and the supply side of the economy. The central projection in August was for a slowdown to below-trend growth in both domestic demand and GDP. Though domestic demand growth has slowed, GDP growth remains slightly higher than envisaged then. However, forward-looking indicators from surveys and from the Bank's regional Agencies suggest that a further slowing is likely. The MPC's forecast assumes that annual GDP growth will slow over the next year, before increasing to trend in the second half of 2000. But the risks remain on the downside.

Chart 3.1
Headline average earnings growth^(a)



(a) Seasonally adjusted.

Chart 3.2
Revisions to headline average earnings growth^(a)



(a) Seasonally adjusted, whole-economy figures.

Table 3.A
The variability of official earnings data^(a)

	Whole-economy	Manufacturing	Services	Private	Public
New AEI	0.8	0.6	1.1	1.0	0.8
Old AEI	0.6	0.5	0.9	0.7	0.5

Sources: ONS and Bank of England.

(a) Figures refer to the standard deviation of the twelve-month growth in earnings between 1994–98.

According to recently revised and rebased data, headline earnings grew by 4.6% in the year to July, more slowly than envisaged at the time of the *August Inflation Report*. The revisions have changed the profile and behaviour of reported earnings growth. It is no longer easy to reconcile the official earnings data with other information on the state of the labour market, particularly the continuing upward drift in wage settlements. On 2 November, the ONS announced that it was suspending publication of the Average Earnings Index, pending the outcome of an independent review of the series announced by the Chancellor. The labour market remains tight, although some recent data suggest that it is no longer continuing to tighten.

3.1

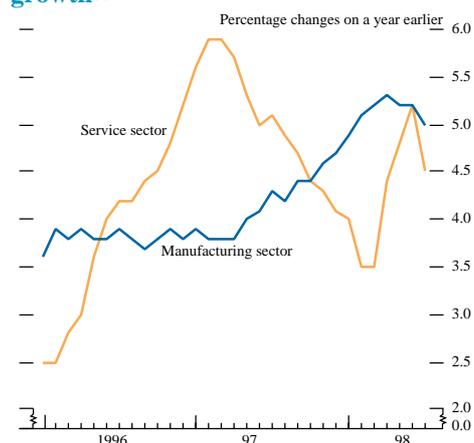
Earnings

Recent average earnings growth has been lower than expected at the time of the *August Report*. Headline whole-economy average earnings grew by 4.6% in the year to July, compared with 5.2% for June and 5.0% in May.⁽¹⁾ Chart 3.1 shows that, on the new series, the headline rate of annual earnings growth fell during 1995, then rose from about 3% to more than 5% in early 1997. It fell to below 4% in early 1998, then peaked above 5% before declining more recently.

Revisions and rebasing of the Average Earnings Index (AEI) significantly changed the reported profile of nominal earnings growth in 1997 and 1998 (see Chart 3.2). The new methodology attaches greater weight to small firms in the sample, and has changed the split between private and public sector pay. But it is difficult to draw inferences from the revised series, for three reasons. First, the changes in methodology have added to the volatility of measured earnings growth. Table 3.A shows that the standard deviation of earnings growth in the whole economy and in different sectors between 1994–98 is higher on the new AEI than on the older methodology. Second, the revised series does not sit well with other evidence on earnings behaviour, including available evidence on settlements, the New Earnings Survey (NES) and the National Accounts data. And third, the marked slowdown in earnings growth

(1) Based on a centred three-month moving average of earnings growth.

Chart 3.3
Manufacturing and service sector earnings growth^(a)



Source: ONS.

(a) Headline rate, seasonally adjusted.

Chart 3.4
Regular pay growth and the contribution of bonuses to overall earnings growth

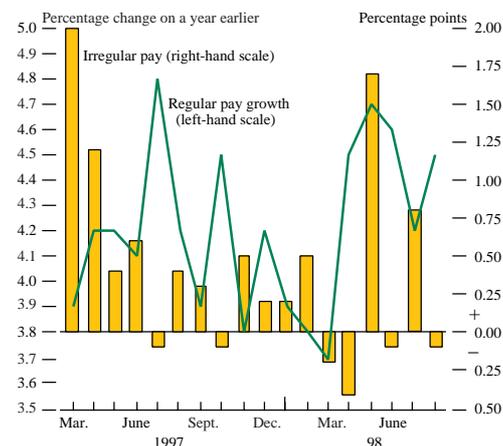
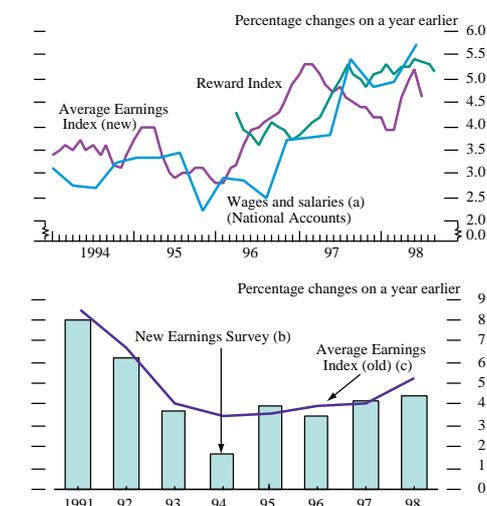


Chart 3.5
Alternative measures of nominal earnings growth



Sources: ONS, Bank of England and the Reward Group.

- (a) Calculated by dividing wages and salaries by total employees in employment.
- (b) Average gross weekly earnings of all employees, based on annual survey data undertaken in April of each year.
- (c) Seasonally adjusted twelve-month rate.

during 1997 is difficult to reconcile with the observed fall in unemployment, and the increases in employment that took place during that year. The ONS has decided to suspend the AEI pending the findings of the Chancellor's independent review.

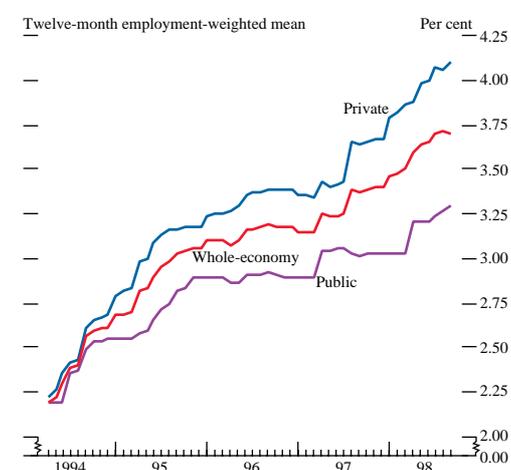
Before the rebasing, reported public sector earnings growth had been broadly flat at about 2.5% during the second half of 1997 and early 1998, before rising from 1998 Q2. And private sector earnings growth had risen steadily, from 5.1% in 1997 Q4 to 5.7% in 1998 Q2. But according to the new AEI, public sector pay growth has been revised up and is increasing, whereas private sector earnings growth fell markedly during 1997 to about 4% early this year, and then rose to a peak of 5.4% in June (see Chart 3.1). The large gap between public and private sector earnings growth on the old series, which suggested an upside risk to earnings because of the possible reversal of negative public sector wage drift, has largely disappeared according to the new series.

Chart 3.3 compares earnings growth in the manufacturing and services sectors, based on the revised series. It suggests that after remaining flat during 1996, earnings growth in the manufacturing sector has risen steadily. This is similar to previous estimates. By contrast, service sector earnings growth on the new series rose sharply in 1996, before falling in 1997 and early 1998; previous estimates had suggested a steady rise in service sector earnings growth since mid 1995.

Average earnings can be decomposed into estimates of regular and irregular pay. Chart 3.4 shows the behaviour of estimated regular pay growth and the contribution made by irregular components, including bonuses, in the past 18 months. According to the new earnings figures, regular pay growth fell sharply during 1997, but rose in early 1998. Bonus contributions have been volatile. With the notable exception of May, when reported bonus payments were around 90% higher than a year before, bonus growth has been sporadic and often slower than regular pay growth.

Chart 3.5 contrasts the revised numbers with other measures of earnings growth. Data based on the National Accounts suggest that wages and salaries per employee grew by more than 5% in 1998 Q2, and that earnings growth increased steadily during 1996–98. But wage and salary data are derived mainly from annual Inland Revenue PAYE figures, with the quarterly profile interpolated from the Workforce survey and the AEI. Wages and salaries could, therefore, be subject to

Chart 3.6
Wage settlements by sector



Source: Bank of England.

Table 3.B
Barclays Basix Survey of inflation expectations^(a)

Percentage increases in prices

Twelve-month RPI inflation two years ahead

	1998		
	Q1	Q2	Q3
Academic economists	3.1	3.1	3.0
Business economists	2.9	2.9	2.4
Finance directors	3.3	3.2	2.9
Investment analysts	3.3	3.3	3.1
Trade unions	3.9	3.8	3.6
General public	5.1	5.1	5.1

Source: Barclays Bank.

(a) Figures refer to RPI inflation, except for General public, for which the measure of inflation is not specified.

revision if more data on PAYE receipts become available during the financial year, and when revised Workforce jobs data are released in December. And since the quarterly profile of the National Accounts partly reflects movements in the AEI, it is possible that the two series could come to look more similar. But earnings based on the Reward Index,⁽¹⁾ a survey of 778 companies covering some 860,000 employees, accord with the profile currently implied by the National Accounts data. A third indicator—the New Earnings Survey (NES)—suggests that gross weekly earnings for all workers rose to 4.4% in April 1998, compared with 3.9% in April 1995. The NES measure bears a closer resemblance to the previous profile of average earnings growth. So it is difficult to reconcile the revised AEI profile with other estimates of nominal wage growth.

The Bank's estimate of the twelve-month employment-weighted mean of wage settlements was 3.7% in September, compared with 3.4% in November 1997. Private and public wage settlements have changed little in recent months, and were 4.1% and 3.3% respectively in September. But settlements have increased markedly over the past 18 months, as Chart 3.6 shows. As noted above, regular pay growth slowed during this period, according to the new AEI series. The growth of average earnings, however, should be linked to settlements, as well as to other factors such as regular overtime payments. So for earnings to have slowed, the contribution from overtime and the residual elements of wage drift must also have fallen. This would seem implausible during a period when the labour market was tightening.

Wage settlements between employers and employees are negotiated in nominal terms. But in bargaining over wages, employees and employers focus on real wages, and so form expectations about future inflation. Lower inflation expectations will tend to result in lower rates of increase in nominal wages. But inflation expectations are difficult to measure directly, and so it is hard to draw conclusions about the path of expected real earnings growth. Survey-based measures of inflation one and two years ahead have fallen slightly during the course of the year (see Table 3.B). In judging the path of expected real earnings, the MPC has assumed that in forming

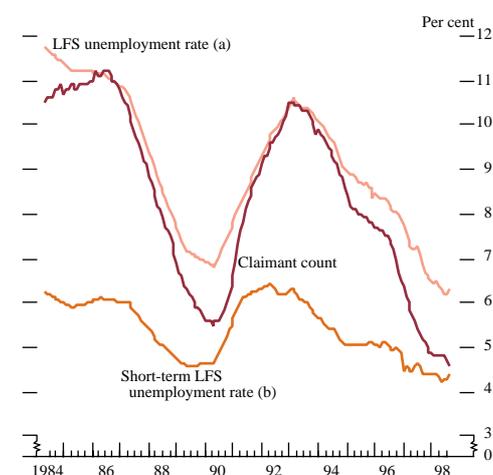
(1) The Reward Index is based on regional surveys of small and medium-sized firms, and attempts to represent standard industrial classifications. The results are compiled on a three-month moving-average basis. The index is divided into three employee groups: management and supervisors, clerical staff, and operative workers; and the measure of total pay includes irregular components such as bonuses and shift allowances. No adjustments are made to make the sample more representative of the overall population.

expectations, households and firms take into account past outturns of inflation, as well as the trend in actual inflation.

3.2 Unemployment and employment

Inflationary pressure in the labour market depends on the degree of labour market tightness, as well as its rate of change. Various measures of unemployment showed that the jobs market remained tight during the third quarter. But it may no longer be continuing to tighten—LFS unemployment rose by 9,000 in the three months to August. However, the resulting unemployment rate fell to 6.3%, from 6.4% in the three months to February. Unemployment based on the claimant count fell by 11,900 in September, after falling by 16,500 in August, reducing the claimant unemployment rate to 4.6%, its lowest level since 1980. And the short-term LFS unemployment rate remains low—though it increased slightly to 4.4% in August from 4.3% in July. The short-term rate may be a more relevant measure of the degree of labour market tightness, because it emphasises the role of workers who have been unemployed for less than a year. Such workers are often more likely to possess the up-to-date skills and experience that employers are seeking and are therefore better placed to take up vacancies. As Chart 3.7 shows, all three measures of unemployment have been falling steadily since the start of 1993.

Chart 3.7
Unemployment rates



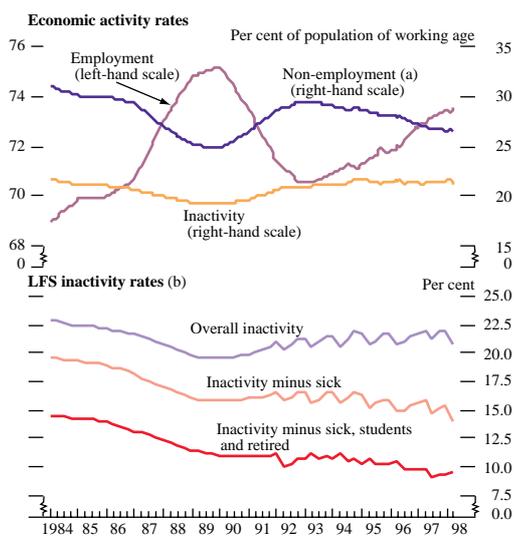
Sources: ONS and Bank of England.

- (a) LFS unemployment measures started in 1984.
 (b) Short-term unemployment refers to those employed for less than a year (seasonally adjusted estimate).

Evidence of continued labour market tightness based on recent employment data is ambiguous. Employment, as measured by the LFS, rose by 122,000 in the three months to August—a rise of 0.5%. By contrast, the Workforce jobs survey suggested that the number of jobs fell by 124,000 between March and June. Both measures showed falls in the number of self-employed jobs and employment in government-supported training programmes. The difference between the two measures is accounted for by different estimates of the number of employee jobs. The Workforce jobs measure is based on a survey of firms taken on a specific date, and measures the number of employee jobs.⁽¹⁾ The LFS measure, by contrast, is gathered on a continuous basis and measures directly the number of people in work. The Workforce measure is subject to much greater sampling variance than its LFS counterpart, and has shown stronger increases than LFS-based measures in recent quarters.

(1) The Workforce jobs estimates will be revised later this year to reflect revisions to the Annual Employment Survey (AES) data. AES data have been revised for 1995 and 1996; this is expected to add more than 300,000 jobs to the Workforce jobs series.

Chart 3.8
The extent of non-employment



Sources: ONS and Bank of England.

(a) Non-employment is the sum of inactivity and LFS unemployment.
(b) Based on non seasonally adjusted annual data before 1992 and quarterly data thereafter.

A further gauge of the degree of labour market tightness is the extent of non-employment. This includes people of working age, such as discouraged workers, who are neither employed nor actively seeking employment, but who could enter the labour market if prospects of finding work were thought to be high. Chart 3.8 shows that non-employment, based on LFS definitions, is above the levels reached during the previous trough in 1991. But if adjustments are made for the long-term sick and retired, who may be less likely to rejoin the labour market, inactivity rates and non-employment appear much lower, consistent with continuing labour market tightness.

The number of hours worked is a good, albeit volatile, measure of labour usage in the economy and offers a sense of firms' demand for labour. Total hours worked per week in the economy rose by 0.6% in the three months to August, and were 1.1% higher than a year earlier.

Survey evidence suggests that employment intentions remain positive overall, though they have begun to point to a slower rate of employment growth. In particular, information from recruitment agencies suggests that the demand for temporary and permanent labour has slowed since the first half of 1998, most notably in the IT, clerical and executive/professional sectors. This is corroborated by evidence from the CIPS report on services, which suggests that although employment growth remains robust, labour demand in IT and other service sectors has risen less rapidly. The CIPS weighted employment index, which aggregates manufacturing, services and construction, fell below 50.0 in October—its lowest level since June 1996. The sectoral pattern of employment growth continues to highlight the discrepancy between manufacturing and services. According to the BCC Survey, the balance of employers planning to recruit staff in manufacturing fell markedly in 1998 Q3, and a broadly similar picture emerges from other surveys (see Table 3.C).

Surveys also suggest that skill shortages and recruitment difficulties remain considerable, though there has been some moderation since the August Report. According to the BCC Quarterly Economic Survey in 1998 Q3, the balance of firms experiencing recruitment difficulties remained high in both manufacturing and services. But there are signs that recruitment activity may have peaked. For example, hiring difficulties in the services sector have lessened for the first time in a year, and

Table 3.C
Surveys of employment intentions

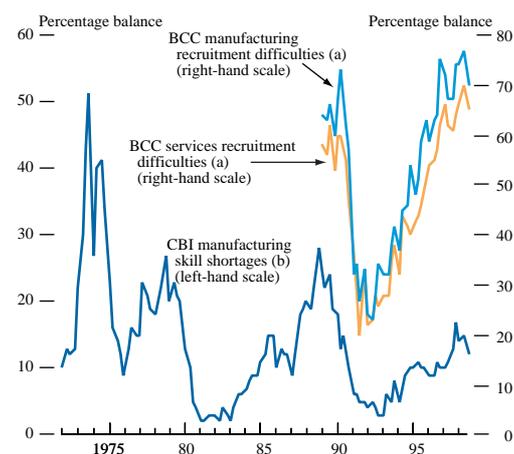
Percentage balance of employers planning to recruit staff

	Series average (a)	1998			
		Q1	Q2	Q3	Q4
BCC (b)					
Services	12	25	23	15	n.a
Manufacturing	3	9	13	-1	n.a
CBI (c)					
Manufacturing	-21	0	-15	-16	-32
Manpower (b)(d)					
Services	12	19	18	18	n.a
Manufacturing	14	20	18	14	n.a

Sources: British Chambers of Commerce, CBI and Manpower.

(a) CBI manufacturing average since 1979; BCC average since 1989; Manpower average since 1988.
(b) Next three months.
(c) Next four months.
(d) Seasonally adjusted by the Bank.

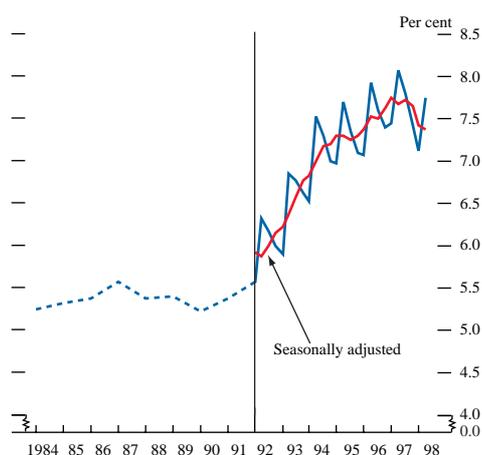
Chart 3.9
Skill shortages and recruitment difficulties



Sources: British Chambers of Commerce and CBI.

- (a) Past three months. Based on a survey question that asked if employers experienced any difficulties finding suitable staff in the following categories: skilled manual, technical/professional, managerial/clerical and un/semi-skilled.
- (b) Data refer to skilled labour. Questions refer to difference between those respondents answering 'yes' and those answering 'no' when questioned on factors likely to limit output during next four months.

Chart 3.10
Proportion of temporary employees^(a)



(a) Annual data before 1992, based on spring observations.

firms' expectations of expanding their workforces are diminishing. This is in line with CBI measures, which suggest that the balance of firms reporting skills shortages has been moderating in recent months (see Chart 3.9). The Bank's regional Agencies have also reported that while skill shortages continue in some regions and in a number of sectors, there have been some signs of moderation.

Chart 3.10 shows that, after remaining relatively stable through the mid 1980s, temporary employment as a share of total employees has risen during the 1990s, though recent data suggest some reversal of this trend. The increase in temporary employment has largely been accounted for by a rise in fixed-contract employees, and reflects both demand and supply factors. In particular, the change could reflect the outcome of firms' deliberations over hiring and firing costs. Investing in permanent employees can be costly and difficult to reverse—there may be larger search and training costs, and firing costs when the employment relationship is terminated. The longer firms expect the match to last, the more likely they are to hire an employee on a permanent basis. But if demand is uncertain, or if firms are risk-averse, they are less likely to invest in permanent staff, preferring temporary employees to cover peaks in demand. Supply-side factors, such as the changing composition of the labour market (for instance, desire to work part-time by working mothers or retired people), may also have played some role in the growth of temporary employment.

3.3 Unemployment and inflation

Labour market equilibrium depends, among other things, on institutional features of the labour market. These include factors such as the bargaining strength of unions, the benefits system, and labour market regulations such as a minimum wage and rules on maximum working time. Measures such as the New Deal and the Working Families Tax Credit (WFTC) are designed to increase the supply of labour, and could lower the natural rate of unemployment. By contrast, the Working Time Directive, which came into effect on 1 October, could potentially decrease labour supply or increase labour market rigidity, by constraining the choice of hours worked. But the implications of these policies for output, employment and wages are difficult to ascertain. They will depend, in part, on how far employers are able to offset the resulting higher costs through lower wages and productivity improvements.

The Working Time Directive (WTD)

The Working Time Directive came into effect in the United Kingdom on 1 October. The main provisions of the Directive and the extent of their potential are summarised in the table below.

The Directive contains a number of exemptions and derogations. For instance, self-employed workers and trainee doctors are exempt. And there are derogations in certain industries, which make allowances where there is a need for continuity of production (eg security). The provisions only cover relationships between individual employers and workers. So a worker can, in principle, exceed the maximum hours by

working for more than one employer.

According to preliminary estimates from the Department of Trade and Industry,⁽¹⁾ the main costs to businesses arising from the provisions relate to weekly and daily rest periods and to the annual leave entitlement.

The costs arising from the provisions on limiting working time to 48 hours are likely to be small, as it affects a small proportion of the labour force and many individuals can voluntarily waive this limit. But there is uncertainty around estimates of direct cost, because some employers may have already anticipated the Directive and the precise extent of derogation is unclear.

Provision	Affected workers ⁽¹⁾
No worker is to work more than a 48-hour week on average.	11.7% of employees (2.7 million employees) 'usually' work more than 48 hours per week.
Every worker must have at least one day's leave per week (two days for 16–18 year olds).	3.3% of total employees work seven days a week.
Every worker must have 11 consecutive hours break out of each 24 (12 hours for 16–18 year olds).	5.2% of total employees (1.2 million) work for more than 13 hours on at least one day per week, and so do not get 11 hours' daily rest.
Adult workers must have a 20-minute break if their working day is longer than 6 hours (30-minute minimum for 16–18 year olds working more than a 4.5-hour day).	Some 107,000 adult workers typically work in excess of 78 hours per week.
Workers must have a minimum of 3 weeks' paid annual leave, rising to 4 weeks in 1999.	11% of total employees (2.5 million) have annual paid leave entitlement of fewer than 3 weeks.
Night workers must work only 8 hours, on average, out of each 24.	250,000 night workers regularly work more than 48 hours per week and could fall within the scope of this regulation.
Night workers have the right to a health assessment, paid by the employer.	Some 5 million workers are involved in working at night.

(1) Sources: LFS Spring 1997 Surveys and DTI (1998), *op cit*.

The box above describes the main features of the Working Time Directive (WTD). The DTI has suggested that the maximum direct effect of the policy would be to increase the annual whole-economy wage bill by some 0.5%.⁽¹⁾ The Bank's regional Agencies report that a number of their contacts in sectors such as

(1) 'Measures to Implement Provisions of the Working Time Directive and the Young Workers Directive', Employment Relations Directorate, Department of Trade and Industry, April 1998.

construction expect to face increased wage bills due to more generous holiday entitlements. The effects of the WTD should be considered alongside other Government measures affecting the labour market. The MPC judges that the risks to inflation from the WTD are on the upside, relative to the central case, and this is reflected in an upward skew to the inflation projection.

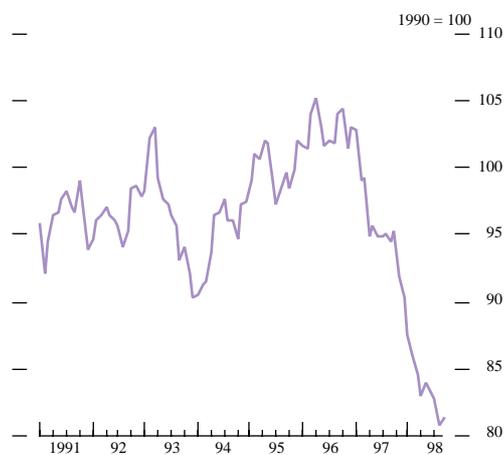
3.4

Summary

According to the latest AEI series, headline earnings growth slowed in July, largely reflecting a moderation in regular pay. Recent revisions and the rebasing of the Average Earnings Index have significantly altered the profile and behaviour of nominal earnings growth. They suggest that earnings growth slowed markedly during 1997, before picking up again in the spring of 1998. But the latest official earnings data are difficult to reconcile with other information on the state of the labour market, including the upward trend in wage settlements and other measures of nominal wage growth. On 2 November, the ONS announced that it was suspending publication of the Average Earnings Index, pending the outcome of an independent review of the series announced by the Chancellor. So there is more uncertainty than usual about the news on earnings growth since August, and the appropriate starting-point for use in the inflation projection.

The labour market remains tight. The LFS measure of unemployment was 6.3% in the three months to August. Claimant-count and short-term unemployment also remain very low by recent historical standards. Survey evidence suggests that employment intentions remain reasonably robust, but are now pointing to a moderation in labour demand. So labour market tightening may have come to an end. The expected slowdown in output growth is also likely to reduce the degree of labour market tightness. These factors should help to lessen inflationary pressures from the labour market over the next two years.

Chart 4.1
Bank's sterling commodity price index^(a)



Source: Bank of England.

(a) Monthly average of prices of primary commodities, weighted by their importance in UK demand.

Table 4.A
Changes in sub-components of the Bank's commodity price index between May 1996 and September 1998^(a)

	Weight (b)	Change (per cent)	Contribution to change in total index (percentage points)
Fuels (including oil)	51.6	-19.6	-10.3
Domestic foods	35.0	-23.2	-7.9
Metals	5.6	-33.1	-1.8
Non-food agriculture	5.5	-10.7	-0.6
Non-domestic foods	2.2	-16.6	-0.4
Total index	100.0	-21.0	-21.0

Source: Bank of England.

(a) Price data for September 1998 are provisional.

(b) Weights reflect estimates of the value of demand for each sub-component in 1990. Column does not sum because of rounding.

Annual retail price inflation measured by RPIX fell to its target rate of 2.5% in 1998 Q3. World commodity prices fell further, partly as the result of events in Russia and Asia, and UK import prices continued to decline. But unit labour costs have been rising, and sterling has depreciated since the previous *Report*. Manufacturing output prices are falling, reflecting strong import competition and slower demand growth. Output price inflation in the service sector—which makes up two thirds of GDP—has been rather higher, but survey evidence suggests that this may also now be moderating.

4.1 Raw material and commodity prices

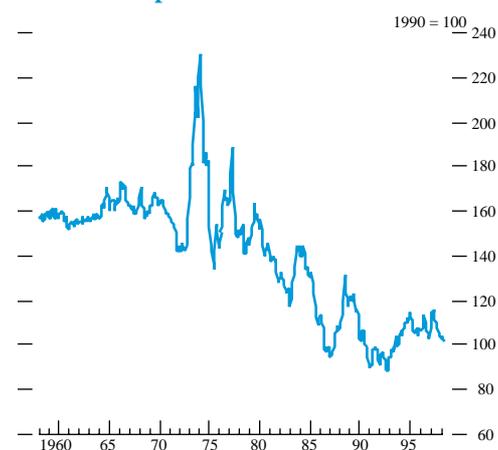
Prices of raw materials and commodities—which account for a little less than one tenth of economy-wide costs—have fallen sharply over the past two and a half years. The *Economist* dollar index of world commodity prices has declined by nearly 30% from its peak in May 1996. The Bank's oil-inclusive sterling index, which is weighted by UK demand, has also fallen markedly (see Chart 4.1). Prices of all the major groups within the index have fallen, but the largest contributions to the decline have come from lower prices for fuels and domestically produced food (see Table 4.A).

Wholesale food prices have been depressed by the strength of sterling against European currencies. The Bank's regional Agencies report increasing competition from imports, and support prices under the Common Agriculture Policy have fallen. The 'green' exchange rate, used to translate intervention prices from Ecu into sterling, was devalued by 3.0% in October, reflecting the fall in sterling's market value against European currencies; but it was still 19.4% higher than in August 1996.⁽¹⁾ Some intervention prices may fall further from 2000, if the European Commission's Agenda 2000 proposals are adopted.

Much of the decline in world non-agricultural commodity prices since mid 1997 probably reflects the

(1) The operation of the 'green' exchange rate system is described in the box on page 46 of the May 1995 *Report*. Under the rules of this system, devaluations in the 'green pound' occur more frequently and more rapidly when the market exchange rate is depreciating than revaluations occur when the market rate is appreciating. From 1 January 1999, intervention prices will be translated using the market exchange rate against the euro.

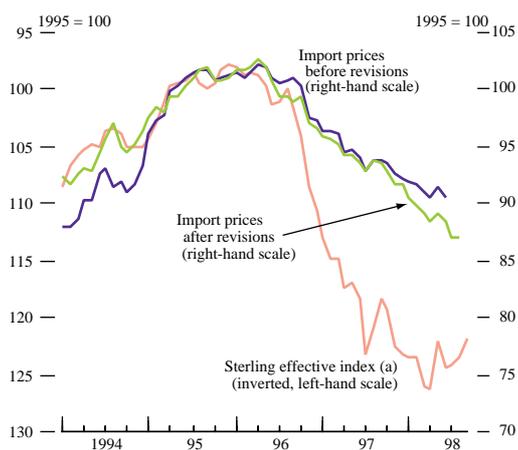
Chart 4.2
The relative price of commodities^(a)



Sources: United Nations and International Monetary Fund.

(a) United Nations commodity price index divided by industrialised countries' export prices (both in dollars).

Chart 4.3
Goods import prices and the exchange rate



Note: The ERI is measured against 20 other industrialised countries. The import price index covers imports from all countries.

(a) A fall in the line indicates an appreciation.

direct and indirect effects of weaker current and future expected growth in Asia. Prior to the downturn, the region accounted for a large share of the growth in commodity demand. For example, between 1992–96, around two thirds of the increase in world consumption of petroleum products, aluminium, zinc and lead came from Asian developing countries.⁽¹⁾ Lower commodity prices also played a part in precipitating the recent turbulence in Russia: well over half of Russian export revenues in 1995 came from sales of oil, gas and other basic materials. Dollar oil prices rose in September, amid market perceptions of a reduction in supply. But this partly unwound in October, and futures markets suggested that prices over the next six months were expected to remain considerably below their 1997 levels.

In the longer term, improvements in commodity extraction and production technologies, together with attempts by industries in advanced economies to economise on commodity use, have led to a trend decline in commodity prices relative to those of other goods (see Chart 4.2). Despite their recent sharp falls, commodity prices do not appear unusually low relative to this trend. The MPC's central projection assumes that world commodity prices will be broadly flat through the remainder of 1998 and in 1999, before rising in 2000.

4.2 Import prices and the exchange rate

Imports account for about one tenth of economy-wide costs and (directly or indirectly) for about one fifth of final demand. The prices of imported goods fell by 7.2% in the year to August, and were 12.3% lower than in August 1996, when sterling began to appreciate significantly. Following the revisions to trade and National Accounts data (summarised in Section 2), the falls in import prices at the end of 1997 and the first half of 1998 are now rather larger than previously recorded, and there is less sign of a slowdown in the rate of decline. But despite the recent depreciation of sterling, import prices have still fallen by considerably less than the rise in sterling since 1996 (see Chart 4.3).

Part of this gap can be explained by world export price inflation. But as Chart 4.4 shows, when expressed in a common currency, UK import prices have risen relative to the average export prices of many of the United Kingdom's major trading partners since 1996,

(1) See the International Monetary Fund's *World Economic Outlook*, May 1998, pages 125–30. Similar consumption growth for other commodities was observed over this period.

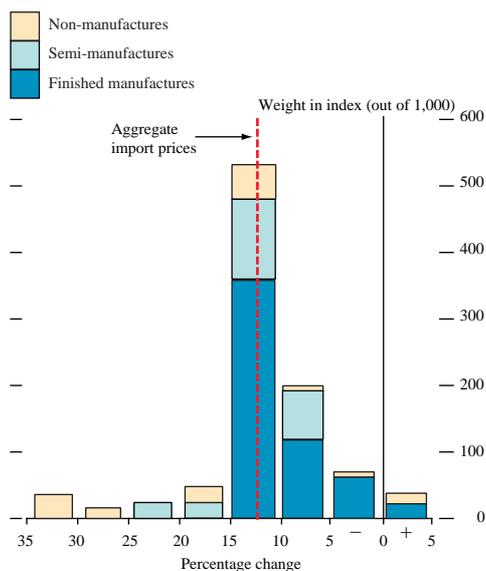
Chart 4.4
The ratio of UK import prices to major six overseas economies' export prices^(a)



Sources: ONS and Bank for International Settlements.

(a) Export prices are denominated in sterling and are UK trade-weighted. The major six economies are the G7 excluding the United Kingdom.

Chart 4.5
Distribution of changes in goods import prices between August 1996 and August 1998^(a)



(a) Based on maximum disaggregation allowed by the published trade data.

suggesting that foreign exporters may have used sterling's appreciation as an opportunity to widen their margins on sales to the United Kingdom.⁽¹⁾ Prices of imported finished manufactures—on which foreign exporters are likely to have more scope to widen margins—have, on average, fallen by less than prices of imported raw materials and semi-manufactures (see Chart 4.5).

The marked weakening in the prospects for global growth and inflation has, by itself, had a significant downward effect on the MPC's projected path for import prices, relative to that in the *August Report*. Further downward pressure is also expected from a continued unwinding of foreign exporters' margins. But these factors are expected to be offset by the impact of sterling's recent and projected future depreciation, with import price inflation assumed to become positive over the forecast period.

4.3 Costs and prices in the service sector

Survey data suggest that inflationary pressures in the service sector may be moderating. The Chartered Institute of Purchasing and Supply (CIPS) measure of growth in service sector costs fell from a peak of 58.9 in May to 55.0 in October, but this is still some way above its neutral level of 50, which indicates no rise on the previous month. Some of this continued strength may reflect positive contributions from labour costs, which account for a larger share of total costs in the service sector than in the manufacturing sector. Developments in the labour market are discussed in more detail in Section 3.

About 40% of gross service sector output is purchased by other firms or the public sector. The ONS is developing a new corporate services price index, analogous to the producer price series for manufacturing.⁽²⁾ Annual inflation in this measure—which is still experimental—has been well above that of manufacturing output prices since the second half of 1996, but moderated a little in the first half of this year. Services output price inflation may have slowed further since then: the CIPS indicator of increases in prices charged fell from an average of 51.9 in Q2 to

(1) An alternative explanation could be that UK import prices are reflecting higher sterling export prices from countries outside the G7. But a broader measure of export prices, covering nearly 80% of UK trade, gives no indication of such an effect. Sterling export prices from East Asia have fallen sharply.

(2) Further details on this index are given in 'Development of the Corporate Services Price Index: A review of progress', by Hugh Skipper, in *Economic Trends*, September 1998.

Table 4.B
Manufacturing sector: costs and prices

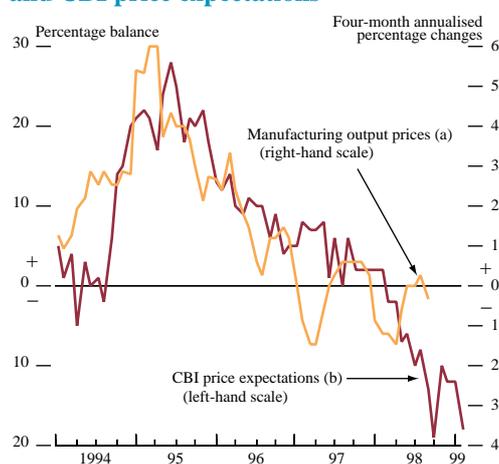
Percentage changes on a year earlier

	1998 Q2	Q3 (a)
Total weighted costs	0.3	-0.3
of which:		
Unit labour costs (b) (c)	2.3	2.1
Bought-in services (b)	0.4	0.3
Imported finished manufactures (b)	-0.3	-0.4
Materials, fuels and semi-manufactures (b)	-2.1	-2.3
Output prices		
Domestic prices (d)	-0.2	-0.4
Export prices	-4.2	-3.9

Sources: ONS and Bank of England.

- (a) Some Q3 data are provisional.
 (b) Contributions to change in total weighted costs.
 (c) Based on the Average Earnings Index. For a discussion of recent movements in this index, and comparisons with other measures of labour costs, see Section 3.
 (d) Excludes excise duties.

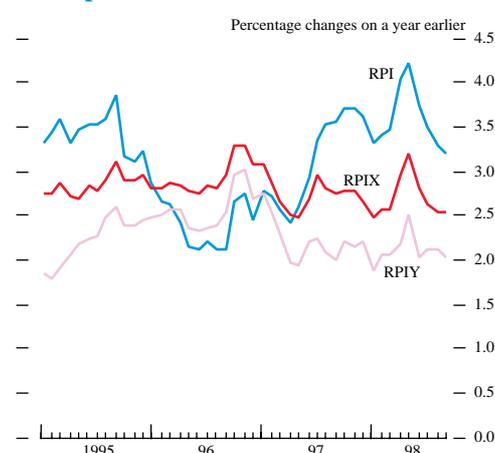
Chart 4.6
Domestic manufacturing output price inflation and CBI price expectations



Sources: CBI and ONS.

- (a) Excluding excise duties.
 (b) Balance of manufacturers expecting to increase prices over the following four months minus those expecting a reduction; seasonally adjusted and lagged by four months.

Chart 4.7
Retail price inflation^(a)



RPIX = Retail price index excluding mortgage interest payments.
 RPIY = RPIX excluding VAT, local authority taxes and excise duty.

- (a) Adjusted by the Bank of England for ONS error in under-recording aggregate price indices between February and May 1995. Other charts and tables in this Report that include measures of retail price inflation are similarly adjusted.

51.5 in Q3, and 48.5 in October. The BCC measure of output price rises in the service sector also fell in Q3.

4.4 Costs and prices in manufacturing

Inflationary pressures in the manufacturing sector are very subdued. Weighted costs are estimated to have fallen by 0.3% in the year to 1998 Q3 (see Table 4.B). Positive growth in labour and bought-in services costs has partly offset the effects of lower materials, fuels and imported finished manufactures prices.

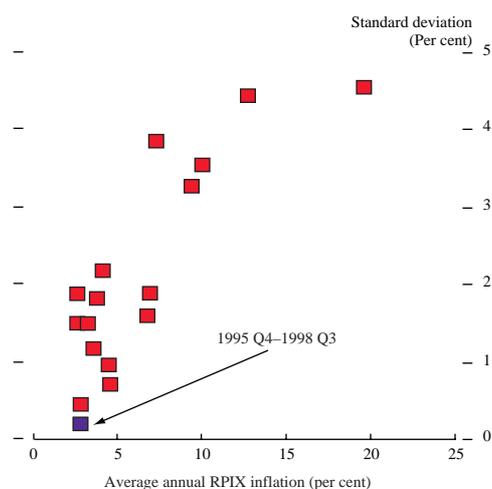
Domestic manufacturing output prices excluding excise duties fell by 0.4% in 1998 Q3, reflecting stronger import competition and slower growth in demand. The short-term outlook remains weak. The Confederation of British Industry's (CBI) measure of manufacturers' price expectations—which has tended to move closely with recorded output price inflation in recent years—suggests continued, and perhaps rather stronger, price falls over the next four months (see Chart 4.6).

4.5 Retail prices

Annual inflation in retail prices excluding mortgage interest repayments (RPIX) fell from 2.8% in June to the target rate of 2.5% in August and September (see Chart 4.7). Annual RPIX inflation in 1998 Q3 as a whole was 2.5%, in line with the August central projection. Within this, annual services price inflation, at 3.3%, remained substantially higher than that for goods, at 1.4%. Much of the fall in annual RPIX inflation between June and August was accounted for by the effects of last year's rise in petrol excise duties dropping out of the annual comparison. Movements in RPIX of this size are very small by post-war standards: the volatility of RPIX inflation over the past three years has been lower than at any time since 1947 (see Chart 4.8).

Recent movements in retail price inflation have been influenced by unusually large fluctuations in the prices of seasonal foods, caused mainly by bad weather during the summer (see Chart 4.9). Month on month, seasonal food prices rose by 8.3% in May—accounting for much of the rise in annual RPIX inflation to 3.2% in that month—and by 7.3% in August, the second-highest rise in that month since 1976. Overall, seasonal food prices rose by 2.6% between January and September, compared with an average fall of 0.6% for the same period in the previous five years. The current strength in seasonal and

Chart 4.8
Mean and standard deviation of annual RPIX inflation since 1947^(a)



(a) Non-overlapping twelve-quarter periods ending in 1998 Q3.

Chart 4.9
Seasonal food prices

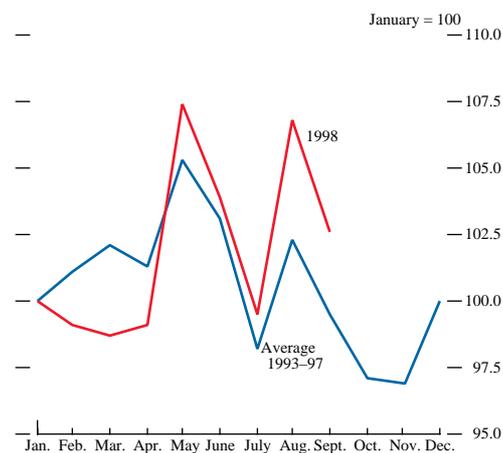
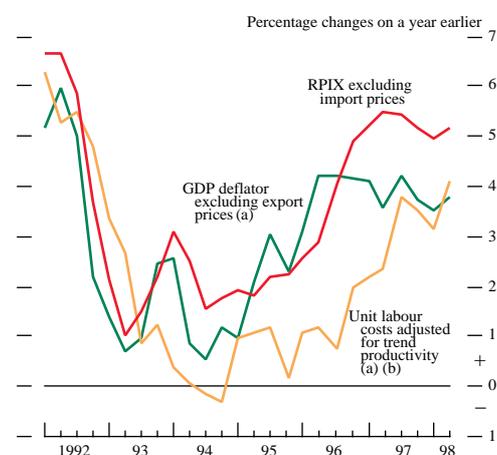


Chart 4.10
Measures of domestically generated inflation



(a) Using GDP measured at basic prices.
 (b) Using National Accounts measure of employee compensation.

non-seasonal food prices—which together make up 14% of the RPIX basket—is unlikely to persist in the medium term. Retail food prices rose by 0.6% between May 1996 and September 1998, compared with a 23.2% fall in domestic prices ‘at the farm gate’, and a 16.6% fall in imported food prices (see Table 4.A). Some of this gap is likely to reflect rises in labour and other costs incurred by food-processing companies, wholesalers and retailers. But to the extent that it reflects a rise in profit margins, it may narrow in the coming months as demand growth slows.

Retail price inflation can be thought of as a weighted average of domestically generated inflation (DGI) and imported inflation. When imported inflation is negative—as it has been over the past two years—DGI will exceed measured inflation in retail prices. One measure of DGI, obtained by stripping out the effects of lower import prices on RPIX,⁽¹⁾ rose above 5% in 1998 Q2. Other measures of DGI were also well above 2.5% (see Chart 4.10).

The gap between RPIX and headline RPI inflation should narrow over the remainder of 1998, as the reductions in official interest rates in October and November feed through into lower mortgage rates, and the effects of last year’s interest rate rises fall out of the annual comparison.

4.6 Other price indices

Other measures of retail price inflation were flat or fell slightly during 1998 Q3 (see Table 4.C). Annual inflation in the Harmonised Index of Consumer Prices (HICP) was 1.3% in August, the same as the average across all 15 Member States of the European Union. It rose slightly to 1.5% in September.

The National Accounts revisions had relatively little impact on the aggregate GDP deflators, which measure whole-economy inflation. Annual inflation in the headline GDP deflator at market prices was revised up slightly in 1998 Q1 from 1.9% to 2.2%, and was 2.4% in Q2.

4.7 Summary

RPIX inflation was on target at 2.5% in 1998 Q3. Falling prices of material inputs, together with stronger

(1) For a discussion of the construction of DGI measures, see the box on page 39 of the August 1998 Report.

Table 4.C
Other measures of retail price inflation

Percentage increase in prices on a year earlier

	<u>1996</u>	<u>1997</u>	<u>1998</u>			
	<u>Dec.</u>	<u>Dec.</u>	<u>June</u>	<u>July</u>	<u>Aug.</u>	<u>Sept.</u>
Trimmed mean (a)	2.8	2.3	2.2	2.2	2.0	1.9
Median (a)	2.3	2.2	1.8	1.8	1.7	1.6
HARP (b)	3.8	2.8	3.2	3.0	2.8	2.9
THARP (b)	3.6	2.6	2.5	2.6	2.4	2.3
HICP (c)	2.3	1.8	1.7	1.5	1.3	1.5

Sources: ONS and Bank calculations.

- (a) These measures provide a guide to underlying inflation in RPIX by stripping out the most extreme changes in prices at both ends of the distribution.
- (b) These measures, which contain a measure of owner-occupied costs, use the Halifax price index. HARP and THARP would show higher inflation rates using either the Nationwide house price index or the estimate of house prices based on Land Registry data.
- (c) Harmonised index for EU Member States. It differs from the RPI series in that it uses a geometric, rather than arithmetic, mean. It excludes owner-occupiers' housing costs and council tax, and includes new cars and airfares.

competition in domestic markets, have been reflected in subdued domestic manufacturing output and retail goods prices. Services price inflation has been higher. Business surveys suggest that services output price inflation may now be moderating. But inflation in retail services prices has so far showed less sign of slowing. Imported inflation has remained negative, reflecting continued falls in world commodity prices and the lagged impact of sterling's appreciation since 1996. The MPC's central projection assumes that imported inflation will become positive as sterling's recent and assumed future depreciation begins to have an effect. But the marked weakening in the prospects for global growth and inflation has had a significant downward effect on the projected path of import prices throughout the forecast period, relative to that in the *August Report*.

5

Monetary policy since the August *Report*

This section summarises the economic developments and the monetary policy decisions taken by the MPC since the August *Report*. The minutes of the August, September and October meetings are attached as an Annex to this *Report*. The Bank of England's official dealing rate—the repo rate—was reduced from 7.50% to 7.25% in October, and to 6.75% in November.

At the time of the August *Report*, the central projection was for RPIX inflation to rise slightly over the following twelve months, before falling back close to the target two years ahead. This inflation profile reflected a variety of factors, including a reassessment of labour market pressures following data showing a sharp increase in earnings growth. The balance of risks to inflation was on the upside, but the balance of risks to output was on the downside, reflecting concerns about the world economy and the speed of domestic demand moderation. With inflation projected to be close to the target in two years' time, the Committee voted to leave the repo rate unchanged.

At its meeting on 9–10 September, the Committee discussed the implications of the crisis in Russia. The unilateral debt restructuring there had led to sharply higher yields on emerging market sovereign debt, and a global widening of spreads on corporate debt. Monetary and fiscal policy had been tightened in a number of emerging market economies, and capital flows to these countries were thought to have come largely to a halt. Major world equity market indices had fallen by 5%–10%, and asset price volatility had increased markedly. Market interest rates had fallen in the industrialised countries. And world commodity prices were likely to remain weak, putting financial pressure on commodity-exporting countries.

The Committee agreed that the GDP data for the second quarter and industrial production data for July were broadly in line with the central projection for output growth in the August *Inflation Report*. But business surveys were more mixed on the prospects for the rest of the third quarter, with some pointing to negative manufacturing growth. On the demand side, surveys were consistent with slowing growth in retail sales,

Table 5.A
Revisions to average earnings growth^(a)

Percentage changes on a year earlier

Release date	MPC meeting	1998			
		May	June	July	Aug.
12 Aug.	9–10 Sept.	5.3	4.5		
16 Sept.		5.3	4.5	4.3	
6 Oct.	7–8 Oct.	5.5	4.7	4.8	
14 Oct.		6.3	4.5	4.9	4.5

(a) The ONS has subsequently suspended these data. See Section 3 for further details.

consumer confidence was weakening, and house prices were no longer accelerating.

The Committee noted that the slowdown in twelve-month earnings growth from 5.3% in May to 4.5% in June (see Table 5.A) had been surprising, given evidence of an otherwise tightening labour market. The Committee agreed that it should not place too much weight on one month's figures. But if the slowdown were confirmed by further data, it would be welcome news in terms of lower domestically generated inflationary pressure.

In its discussion of the immediate policy decision, the Committee agreed that the balance of risks to its projection for UK inflation had shifted towards the downside, largely reflecting international developments. The question was whether there was yet a sufficient case for rates to be cut. Projections for world growth and inflation had fallen, domestic surveys had weakened, earnings growth had fallen, and equity markets had declined and might fall further. But outturns for domestic data had been much as the Committee had expected, and sterling had fallen since the previous meeting and might fall further if there were an early cut in interest rates. Against this background, the Committee voted to leave the repo rate unchanged. In a statement accompanying the announcement of the decision, the Committee recognised that deterioration in the international economy could increase the risks of inflation falling below the target.

At its meeting on 7–8 October, the Committee again discussed developments in the world economy. Prospects for world output and trade had deteriorated further. The latest IMF projection was for world output to grow by 2.0% in 1998 and 2.5% in 1999, much lower than the previous projection in May. The outlook for activity in Japan had worsened again, and the situation in some of the worst-affected emerging market economies remained difficult. Problems at Long-Term Capital Management had renewed concerns in the markets about financial fragility. In the United States, there were concerns that the deterioration in confidence might have begun to affect credit conditions faced by industrial and commercial firms. In the United Kingdom, spreads on corporate bonds had risen during the previous month. But anecdotal evidence suggested that bank-lending terms had not tightened across the board for small to medium-sized corporate customers or households.

Since the previous meeting, the FT-SE All-Share index had fallen by about 10% and gilt yields had fallen. The Committee noted that at least some of the fall in gilt yields probably reflected liquidity or ‘flight-to-quality’ effects, which were likely to prove temporary. Further falls in the sterling effective exchange rate and implied domestic short-term interest rate expectations suggested that markets anticipated a degree of monetary easing.

The Committee agreed that, on balance, the National Accounts revisions did not significantly alter its view of the prospects for demand, output and inflation. Headline GDP growth in the first half of 1998 was little changed and, although the level of GDP had been revised up, upward revisions to investment suggested that capacity was also higher than previously thought. There was a risk that inventories—which had recently risen—might subsequently fall, reducing GDP growth in the second half of 1998. A survey by the Bank’s regional Agents had shown some signs of unplanned inventory accumulation.

Looking ahead, the Committee agreed that the prospects for demand and output seemed weaker than at the time of the previous meeting. Evidence from domestic consumer and business surveys was now almost uniformly weak, and the Bank’s regional Agents were reporting a marked deterioration in business sentiment.

Data corrections published on 6 October suggested that growth of the Average Earnings Index had fallen rather less sharply in June and July than previously indicated (see Table 5.A). Given the corrections, and the fact that rebased estimates of the Average Earnings Index would be released on 14 October, the Committee felt more uncertain than usual about the interpretation of the earnings figures.

The Committee recognised that deteriorating domestic sentiment, lower equity prices and the weaker outlook for world activity meant that the slowdown in aggregate demand was likely to be greater, and more protracted, than thought at the time of the *August Report*. Although the extent of this deterioration was uncertain, the risk of inflation falling below the target two years or so ahead had increased. The Committee therefore voted to reduce the repo rate from 7.5% to 7.25%.

At its meeting on 4–5 November, the Committee voted to reduce the repo rate from 7.25% to 6.75%.

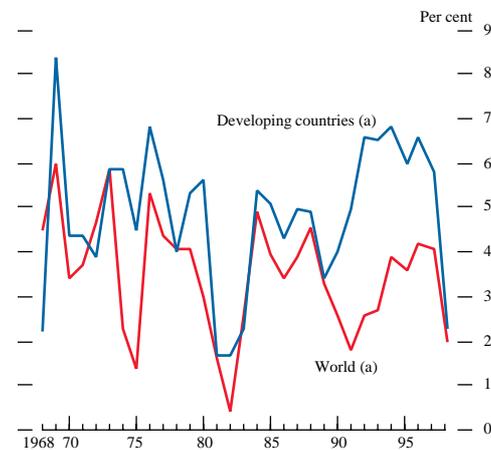
6.1 The inflation projection assumptions

This *Report*, which the MPC approved on 6 November, contains the Committee's assessment of developments in inflation in the economy since August, and prospects for the medium term. Charts 6.2 and 6.3 below show projections for GDP growth and RPIX inflation up to two years ahead, and the uncertainties surrounding them. The projections assume that official interest rates will remain unchanged at 6.75% during the next two years, and are conditioned on the assumptions described below.

There has been a marked downturn in the prospects for world trade since the *August Report*, following problems in some emerging market economies, disturbed conditions in financial markets, and further weakening in Japan. Demand for UK exports is now likely to be much weaker than thought at the time of the *August Report*. In making its projections, the Committee has taken into account the OECD and IMF's latest global projections, and has assumed that UK-weighted export markets will grow by around 7½% in 1998 and just over 6% in 1999 in its central projection. That is a marked fall from growth of just under 10% in 1997. However, the slowdown in the growth rate of UK-weighted export markets between 1997 and 1998–99 is likely to be less severe than the slowdown in total world trade, because of the compression of intra-Asian trade, which accounted for much of the increase in total world trade during the 1990s. But UK exports are likely to grow less quickly than weighted export markets, because of a worsening in competitiveness. There is a risk that growth in industrial countries will be even weaker than envisaged in the central projection, especially if wealth effects related to the falls in asset prices are large, or if credit conditions become tighter. So as well as a weaker central projection, the MPC considers that there is a substantial downside risk to UK demand from lower world growth.

The outlook is for lower world inflation—and hence for lower imported inflation—than at the time of the *August Report*. Commodity prices have continued to be weak, as international demand and the prospects for world growth have deteriorated. In particular, demand from Japan and emerging market economies is important for

Chart 6.1
Annual GDP growth



Source: International Monetary Fund (IMF).

(a) 1998 figures are projections from the IMF's October *World Economic Outlook*.

many commodities. The MPC assumes in its central projection that commodity prices, which are already weak, will be broadly flat through the remainder of 1998 and in 1999, before rising in 2000.

In assessing the outlook for UK net exports, it is important to consider demand and prices outside, as well as within, the industrialised countries. Compared with recent downturns in world growth, there is likely to be a different relationship now between activity in industrial and emerging market economies. Developing countries are likely to account for more of the slowdown in world GDP growth than in the early 1990s, when the downturn was primarily in the industrialised countries (Chart 6.1). In particular, if capital flows to emerging market economies decline, their current account deficits will fall (or surpluses rise), with the consequence that deficits will rise (or surpluses fall) in industrialised countries.

Adjustment in many of the emerging market economies—particularly in East Asia—has given rise to a marked fall in their real exchange rates against industrialised countries. The counterpart to this is a rise in the real exchange rates of industrialised countries as a group. The MPC has considered the consequences for UK growth and inflation of movements in a broad measure of the real effective exchange rate, which includes many emerging market currencies. The extent of the real exchange rate appreciation for the individual industrial countries' currencies has varied, with Japan recently experiencing an especially large appreciation.

The sterling exchange rate against other industrialised countries—as measured by the effective exchange rate index—averaged 100.0 in the 15 working days up to and including 4 November; this is the starting-point for the assumed exchange rate profile in the projection. It compares with an average of 104.7 at the time of the *August Report* (and an implied level of around 103.8 for November in the August projection). At the short end of the yield curve, the differential between the expected path of UK and overseas interest rates has narrowed since the *August Report*, and can account for some of the fall in the effective index since then. Looking further ahead, implied forward nominal interest rates expected in the United Kingdom have risen slightly relative to overseas. This is consistent with markets expecting a steeper depreciation of sterling than at the time of the *August Report*.

In judging the most likely path for sterling, conditional on unchanged UK nominal interest rates, the MPC has

taken into account both interest rate differentials and risk considerations. In the central projection, the sterling ERI declines to 97.7 by the end of the forecast period. This implies bilateral sterling exchange rates of about \$1.68 and DM 2.69 two years ahead. In the MPC's view, the risks of a fall relative to the central projection are slightly greater than the risks of a rise. On average, the sterling ERI is expected to decline more steeply than in the central projection, reaching a level of 94.9 in two years' time.

The MPC's central projection assumes that there will not be a credit crunch in the United Kingdom. Despite speculation about a tightening in credit conditions, money and credit growth have so far remained robust. In capital markets, spreads on corporate debt have risen following the recent turbulence in financial markets. But despite the rise in spreads, nominal yields on high-rated corporate bonds are significantly lower now than a year ago. Beyond this, there are few signs of tightening credit conditions. There is still, however, a small risk of a more marked reduction in the supply of credit, which would affect aggregate demand and inflation. The MPC has taken account of this as a downside risk to the central projection.

The autumn pre-Budget fiscal statement was made on 3 November, and these latest figures for nominal government expenditure have been factored into the MPC's projections. The overall fiscal stance is broadly the same as at the time of the *August Report*, after allowing for the effects of the ESA accounting changes and projections of weaker activity.

The EU Working Time Directive came into force in October. The MPC judges that although there is a risk that this might raise the wages and salaries bill, and so affect the level of retail prices, it is not sufficient to warrant changing the central projection for RPIX inflation two years ahead, but it is reflected in a small upside risk to inflation in the first year of the projection.

Millennium-related investment expenditure is continuing—for example, on Year 2000 compliant software. The MPC has included a small upside risk to inflation from this source. There has also been speculation about a disruption to output early in 2000 from the 'Millennium bug', but any effect is very difficult to quantify. The MPC's central projection assumes no material impact from any disruption.

6.2 The medium-term inflation projection

The September changes to the National Accounts were extensive. The revised figures showed that output growth in 1998 Q2 was as expected at the time of the August *Inflation Report*, although there had been a change in the balance between external and domestic demand. Overall, the National Accounts revisions do not significantly affect the immediate prospects for demand and output growth.

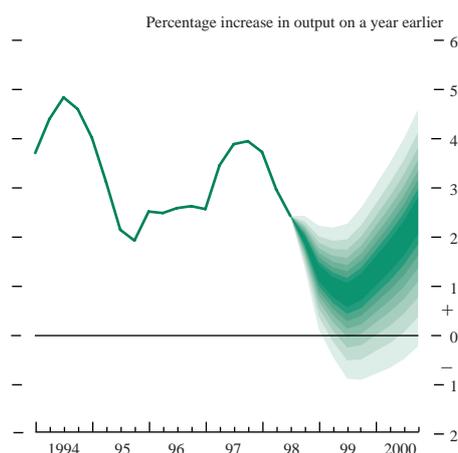
The preliminary estimate of GDP in Q3 was for growth of 0.5%, which was slightly higher than in the central projection of the August *Report*. Services output increased by 0.6%. The subsequent industrial production figures showed that output had risen by 0.1% in Q3. The strength of GDP growth in the third quarter contrasts with the business survey evidence. Reports from the Bank's regional Agencies also suggested that business sentiment had weakened sharply during the summer and autumn. The weakness in surveys has become more uniform since the August *Report*. In particular, there was a further marked deterioration in both the recent quarterly CBI and BCC surveys.

There are various possible explanations for the contrast between the survey evidence and the official output data. But essentially the output data are backward-looking, while the surveys are more forward-looking, and this is reflected in the MPC's forecast.

Turning to the expenditure components of GDP, the recent marked fall in the GfK measure of consumer confidence suggests a slowdown in consumption growth. But it is difficult to quantify the extent to which consumer confidence measures explain future consumption growth. Consumption growth is likely to be weaker because of the fall in equity wealth, which had been identified as a risk in previous *Reports*. Indeed, there remains a risk of a further fall in equity wealth.

The upward revision to investment in the National Accounts virtually eliminated the puzzle about the weakness of investment noted in *Inflation Reports* from 1995–97. Given the higher starting-level of investment and the deterioration in business sentiment during recent months, the central projection is for slightly weaker investment growth than in August. Indeed, it is possible that business investment could fall in 1999—though aggregate investment is likely to be boosted by Government investment plans.

Chart 6.2
Current GDP projection based on constant nominal interest rates



The fan chart depicting the probability distribution for output growth is rather like a contour map. At any given point during the forecast period, the depth of shading represents the height of the probability density function over a range of outcomes for output. The darkest band includes the central (single most likely) projection and covers 10% of the probability. Each successive pair of bands is drawn to cover a further 10% of the probability, until 90% of the probability distribution is covered. The bands widen as the time horizon is extended, indicating increasing uncertainty about outcomes.

The balance of payments figures have also been revised. The current account was in surplus by £0.6 billion in the second quarter of 1998. So although the prospects for world trade have deteriorated in recent months, the starting-point for the United Kingdom's net trade position was stronger than expected at the time of the *August Report*. Nonetheless, the MPC's central projection is for further negative contributions to UK output growth from net trade in the next two years, given the prospects for the world economy and the past appreciation of sterling. On balance, the MPC judges that the risks to net trade are on the downside.

Notwithstanding the stronger-than-expected Q3 GDP figures, the MPC judges that the immediate prospects are for significantly weaker activity in the period ahead than previously thought. There are two main reasons: first, the marked downturn in the prospects for world activity; second, the further decline in business and consumer sentiment since the *August Report*. These factors are related, as some of the deterioration in domestic consumer and business sentiment probably reflects developments in the world economy. The central projection is for the four-quarter growth rate of GDP at constant market prices to slow over the next year, before increasing to around trend in the second half of 2000 as domestic demand, especially by the public sector, picks up (see Chart 6.2).⁽¹⁾

At the time of the *August Report*, the main question was whether the slowdown in aggregate demand already under way would be sufficient to hold inflation at a level consistent with the inflation target, once the temporary restraining influence of the earlier appreciation of sterling wore off. Since August, inflation has turned out broadly as expected, and was on target in August and September. But the news on prospective output growth led to a significant moderation in the forecasts for inflation (at constant interest rates). Meanwhile, a central issue in assessing prospects for inflation has been recent developments in the labour market.

The Average Earnings Index was first revised and then rebased in October. This led to increased uncertainty about conditions in the labour market. First, the changes in methodology mean that the new series for earnings growth is more volatile than the old. This makes it more difficult to place weight on recent movements in earnings growth, which might prove temporary. Second, the revised data sit uncomfortably with the continuing

(1) Also shown as Chart 1 in the Overview.

gentle rise in twelve-month employment-weighted pay settlements, the profile for earnings implied by the National Accounts wages and salaries data,⁽¹⁾ and the recently published New Earnings Survey. And the latest profile of falling earnings growth through 1997 is difficult to reconcile with the tightening of the labour market shown by most of the quantity indicators for this period. The Average Earnings Index was suspended at the beginning of November, pending the outcome of the independent review announced by the Chancellor. So there is more uncertainty than usual about the news on earnings since August, and the appropriate starting-point for the inflation projections. The MPC has taken account of this greater uncertainty by increasing the variance around its projections for earnings growth.

Unemployment rose slightly in the three months to August according to the latest LFS data, but has continued to fall on the claimant-count measure. The labour market remains tight, although some recent data suggest that it is no longer continuing to tighten. As in the August *Report*, the central projection is that unemployment is likely to rise for a time, reflecting a period of output growth below trend.

There is uncertainty about recent trends in the employment data, with the LFS and Workforce jobs measures moving in different directions over the summer. Details of the Annual Employment Surveys for 1995 and 1996 have been published. These surveys form the annual benchmark for the quarterly Workforce jobs series, but will only be reflected in the published quarterly data when it is next updated in December. This could lower measures of productivity based on the Workforce jobs series. However, the Committee placed more weight on LFS household survey measures of employment and unemployment, which are not subject to these revisions.

Trade prices have also been revised. There has now been a slightly larger recorded fall in import prices following sterling's appreciation than reported three months ago, and so a smaller further fall is expected over the forecast period. By itself, this has tended to raise the profile for RPIX inflation slightly during the early part of the forecast.

(1) Which may also be subject to future revisions.

Chart 6.3
Current RPIX inflation projection based on constant nominal interest rates

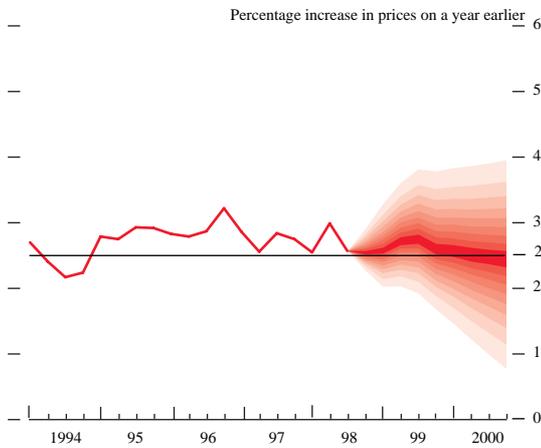
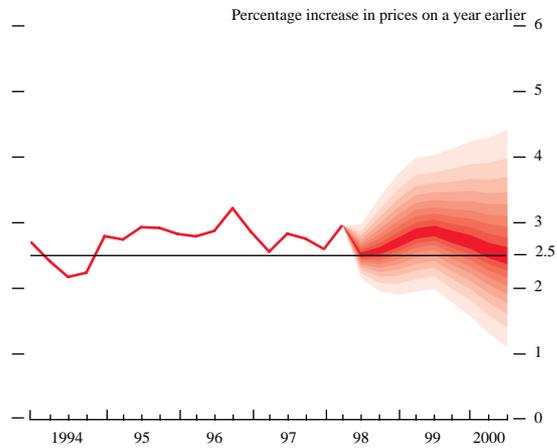


Chart 6.4
RPIX inflation projection in August based on constant nominal interest rates



The fan chart depicting the probability distribution for inflation is rather like a contour map. At any given point during the forecast period, the depth of shading represents the height of the probability density function over a range of outcomes for inflation. The darkest band includes the central (single most likely) projection and covers 10% of the probability. Each successive pair of bands is drawn to cover a further 10% of the probability, until 90% of the probability distribution is covered. The bands widen as the time horizon is extended, indicating increasing uncertainty about outcomes.

Chart 6.5
Current projection for the percentage increase in RPIX in the year to 2000 Q4

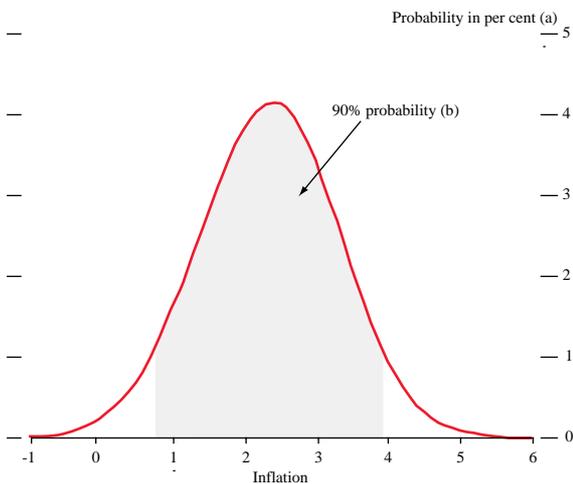
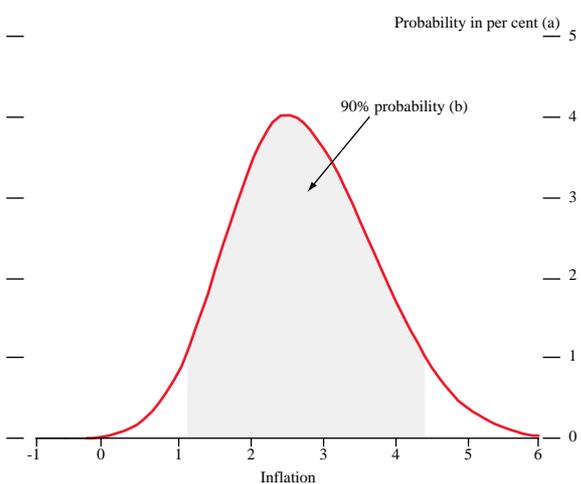


Chart 6.6
August projection for the percentage increase in RPIX in the year to 2000 Q3



Source: Bank of England.

- (a) Probability of inflation being within ± 0.05 percentage point of any given inflation rate, specified to one decimal place. For example, the probability of inflation being 2.5% (between 2.45% and 2.55%) in the current projection is around 4%.
- (b) The areas shaded light grey contain 90% of the probability, and are consistent with the widest bands shown in Charts 6.2 and 6.3. For further details see 'The *Inflation Report* projections: understanding the fan chart', February 1998 *Quarterly Bulletin*, pages 30–37.

The MPC's projection for the twelve-month RPIX inflation rate—assuming constant interest rates—is shown in Chart 6.3.⁽¹⁾ Alongside it is the August projection (see Chart 6.4). The most likely path is for RPIX inflation to rise slightly through the first half of 1999, before falling back to close to the target by the end of the forecast period. The small rise in inflation in 1999 is accounted for by earnings growth, including the effect of the National Minimum Wage to be introduced next April. But there is considerable uncertainty about the path of inflation, especially in view of uncertainties about the profile for output, about earnings growth, and about the timing and extent of further pass-through to domestic prices from the past appreciation of sterling.

The profile for inflation through 1999 is a little lower than in the August projection, but is broadly the same as in August by the end of the forecast period. That reflects a number of factors. The downturn in prospects for world activity implies a weaker outlook for UK exports and hence lower UK inflation, while the corresponding prospect of lower world inflation implies lower UK import and retail price inflation. The fall in equity wealth, together with more pessimistic consumer and business sentiment, will tend to weaken aggregate domestic demand and hence lower inflation. But some factors have raised the central projection since August. Interest rates were reduced by 25 basis points in October and by 50 basis points in November. In addition, the profile and starting-point for the sterling effective exchange rate is lower.

The balance of risks to output is on the downside throughout the forecast period. These risks, which reflect continuing concerns about the world economy and how fast domestic demand will slow, imply corresponding downside risks to inflation. Overall, the balance of risks to inflation is slightly on the downside at the end of the forecast period, but the downside risks from weaker activity are mostly offset by upside risks from a more rapid depreciation of the exchange rate and past money growth.

Charts 6.5 and 6.6 complement the fan charts, by showing the overall balance of risks to inflation at the end of the forecast period. Table 6.A shows the MPC's assessment of the probabilities of various outturns for inflation and output growth.

Table 6.A
The MPC's expectations for RPIX inflation and GDP growth based on constant nominal interest rates^(a)

RPIX inflation

Probability, per cent	Range:			
	less than 1.5%	1.5% to 2.5%	2.5% to 3.5%	more than 3.5%
1998 Q4	0	36	64	0
1999 Q4	2	36	50	12
2000 Q4	19	36	33	12

GDP growth

Probability, per cent	Range:					
	less than 0%	0% to 1%	1% to 2%	2% to 3%	3% to 4%	more than 4%
1998 Q4	0	0	61	39	0	0
1999 Q4	21	33	32	12	2	0
2000 Q4	7	13	23	27	20	10

(a) These figures are from the same distributions as the GDP and inflation fan charts, Charts 6.2 and 6.3.

(1) Also shown as Chart 2 in the Overview.

The market expectation of the likely path of interest rates has fallen substantially since the August *Inflation Report* projections were made. On 4 November, markets expected official interest rates to decline to around 5½% by the second half of 1999. The MPC's projections for inflation and output growth under the assumption that official interest rates follow market expectations differ from those in the central projection (see Charts 6.7 and 6.8). The path of interest rates diverges significantly below the constant interest rate assumption, implying faster growth and a central projection for inflation that is above the target throughout 1999 and 2000.

Chart 6.7
Current RPIX inflation projection based on market interest rate expectations

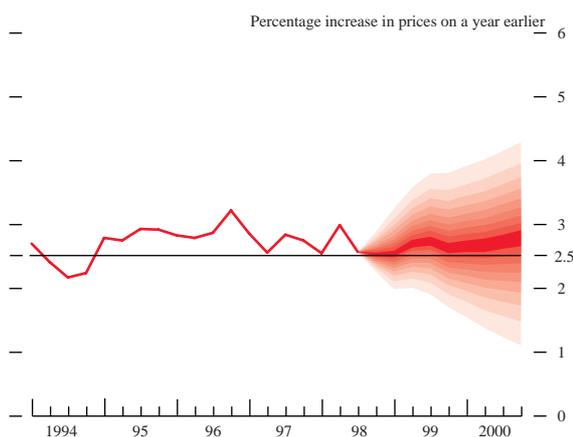


Chart 6.8
Current GDP projection based on market interest rate expectations

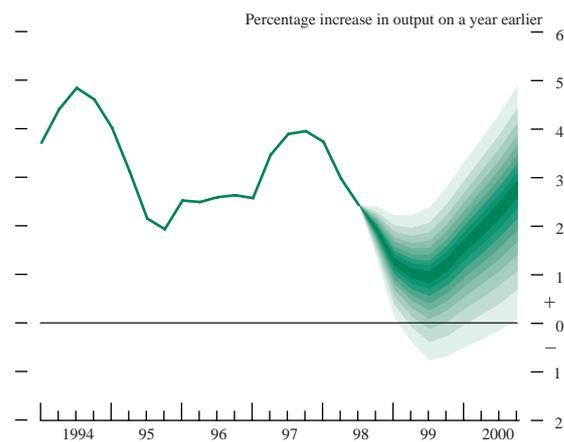
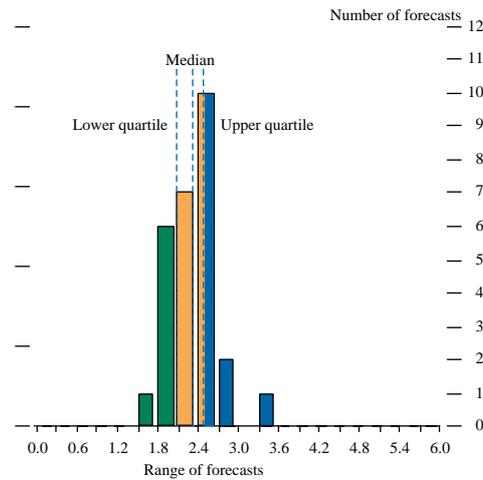


Chart 6.9
Distribution of RPIX inflation forecasts
for 2000 Q4



Source: Forecasts of 27 outside forecasters as of 30 October 1998.

Table 6.B
Other forecasters' expectations of RPIX inflation
and GDP growth^(a)

RPIX inflation

Probability, per cent	Range:			
	less than 1.5%	1.5% to 2.5%	2.5% to 3.5%	more than 3.5%
1998 Q4	3	57	39	1
1999 Q4	14	51	29	5
2000 Q4 (b)	15	46	30	10

GDP growth

Probability, per cent	Range:					
	less than 0%	0% to 1%	1% to 2%	2% to 3%	3% to 4%	more than 4%
1998 Q4	1	8	57	31	2	0
1999 Q4	21	41	27	9	2	0
2000 Q4 (b)	7	17	28	31	13	3

(a) 27 other forecasters provided the Bank with their assessment of the likelihood, at three time horizons, of expected twelve-month RPIX inflation and four-quarter output growth falling in the ranges shown above. This table represents the means of the responses for each range. For example, on average, forecasters assign a probability of 15% to inflation turning out to be less than 1.5% in 2000 Q4. Rows may not sum to 100 because of rounding.

(b) 26 forecasters.

6.3

Other forecasts

Chart 6.9 shows the distribution of central forecasts for the twelve-month rate of RPIX inflation in 2000 Q4, based on information gathered from 27 forecasters surveyed by the Bank. The median forecast was 2.3% in October, lower than the projections for 2000 Q3 made at the time of the July survey. This is the first time since the *Inflation Report* was first published in 1993 that the median has fallen below 2.5% looking two years ahead.

The forecasters surveyed by the Bank also provided their assessments of the probabilities that they attach to various outcomes for inflation and growth (see Table 6.B). Overall, they assign a 40% probability to inflation being above the target in the fourth quarter of 2000, and a 60% probability to it being below. These estimates have changed since August, when the probabilities were broadly balanced. The average projection for GDP growth in the year to 1999 Q4 is $\frac{3}{4}\%$ (with a range of central projections from -1% to +2%), rising to 2% in the year to 2000 Q4 (range 0% to $3\frac{1}{2}\%$). The estimate for 1999 is 1 percentage point lower than at the time of the *August Report*. Overall, the forecasters assign a 21% probability to output growth falling below zero in the year to 1999 Q4, compared with 9% in the July survey.

The implications of the latest projections for the stance of monetary policy are discussed in the Overview at the beginning of the *Report*.

**Annex:
Minutes and Press Notices
of the monthly
Monetary Policy Committee
meetings**



Minutes of the Monetary Policy Committee meeting on 5–6 August 1998

1 In reviewing recent news in the course of finalising its August inflation forecast and taking its immediate policy decision, the Committee discussed the international environment and external price developments; the evidence from official data of a slowdown in domestic demand and output growth; indicators of the future path of output, including recent surveys; labour market conditions, and the implications of the National Minimum Wage; the Government's recent spending announcements; monetary conditions; and recent outside forecasts.

The international environment

2 The Committee discussed the international environment against the background of its *August Inflation Report*. It agreed that the outlook for Japan and the rest of Asia had not changed much since its July meeting; the Japanese economy was certainly no better, and if anything perhaps slightly worse. By contrast Europe was still thought likely to grow in line with the May forecast assumptions.

3 The US economy was key to global prospects, and members noted that while growth had so far broadly followed the path expected in May, the uncertainties about the outlook had increased. Output growth had slowed somewhat in Q2, reflecting weaker net trade and stockbuilding contributions. But domestic demand growth remained strong, and continued rises in employment and earnings were sustaining growth in real personal disposable incomes. The outlook was potentially vulnerable to sudden change. The rate of broad money growth was still rising and unemployment was at historically low levels, possibly below the natural rate. It was accordingly plausible that domestically generated inflationary pressures were increasing. Headline inflation had perhaps so far been held down by benign external conditions and a strong dollar, as well as the high credibility of the Fed, which faced a delicate task in balancing domestic and international considerations.

4 Two particular risks were identified. First, that the US economy would turn down sharply in the face of an actual or expected tightening of monetary policy. Second, even in the absence of tighter monetary conditions, the equity market might fall. Equity prices were regarded by some commentators as reflecting highly optimistic expectations of corporate earnings growth as well as a much reduced equity risk premium (the extent to which equities were required to yield a higher return than government bonds on account of more uncertain returns). Arguably the fall in the days leading up to the Committee's meeting had increased the risk of a substantial fall in equity prices. But just as the probability and the scale of any market fall were uncertain, so were the consequences if it occurred. The macroeconomic impact of the large fall in October 1987 had in the event been small, although it was difficult to judge to what extent this was in fact due to offsetting effects from the loosening of monetary policy. However, the pattern of equity ownership had changed materially since then, partly through the growth of mutual funds, which had increased the personal sector's near-direct holdings of equities. It was therefore possible that an equity market fall would now hit consumer confidence and consumption via reduced wealth more than had been the case in the past.

5 The Committee felt that the balance of risks relating to future activity in the US and Japan were on the downside of the August central projection. It had therefore incorporated in its forecast a downside risk to UK output growth, and hence to inflation, from weaker than expected world activity in 1998 and 1999.

6 Also in the context of the external environment, the Committee noted that input price pressures remained benign because of further falls in world commodity prices and the continuing adjustment of import prices to sterling's past appreciation.

Pace of the domestic slowdown so far

7 The Committee agreed that there was now clear evidence that the economy had been slowing over the past year. The annualised growth rate of GDP had fallen from 2.9% and 3.0% through the first and second halves of 1997 respectively to an ONS estimate of 2.1% in 1998 H1. Growth in final domestic demand (ie excluding stockbuilding) had fallen from 4.6% in 1997 H1 to 4.0% in 1997 H2, and probably further in 1998 H1 given the indicators of Q2 demand so far available (for example, retail sales and car registrations).

8 Within total output, services growth had fallen from 4.7% (annualised) in 1997 H2 to 2.5% in 1998 H1. Manufacturing output growth was now at best flat. Within total final domestic demand, there were signs that retail sales growth had slowed, although some members of the Committee thought this could be attributed at least in part to recent bad weather and other special factors (eg the World Cup). Data on housing market activity—and closely related items of consumer spending—suggested a slight easing in demand pressures.

9 The Committee had projected a slowdown in domestic demand in its previous inflation forecasts but at that point there had still been considerable uncertainty as to whether it was underway. That uncertainty was now convincingly resolved. The slowdown also seemed so far to be less unevenly distributed across the different sectors of the economy than had previously been expected.

10 There remained, however, considerable uncertainty about the level of activity relative to the economy's productive capacity. One of the puzzles in the latter part of 1997 had been the persistent strength of surveys compared with the official data. It was still possible that the ONS estimates of past activity and demand might have under-recorded the strength of the economy. The Committee noted that there would be many changes to the National Accounts in September, including rebasing, implementation of the new European System of Accounts, and a new Inter-Departmental Business Register: it would need carefully to examine all of these changes as well as the usual revisions as further information became available to the ONS.

Indicators of future growth

11 More recently, and especially just prior to the Committee's July meeting, a series of surveys had suggested that there had been a sharp fall in business, and somewhat less so in consumer, confidence. For example, the MORI index of consumer confidence had fallen from +1 in May to -19 in June, while the GFK measure had fallen from +1.2 in June to -1.6 in July. In surveys of manufacturing, the BCC, CIPS and CBI measures had deteriorated materially over the quarter, with all appearing consistent with falling activity. The services sector measures—for example the CIPS activity and new business indices—generally signalled continuing growth, but at a slower pace than in April. (The Committee noted that there were still far fewer surveys of the services sector than of the smaller manufacturing sector.)

12 Interpretation of the survey evidence was felt to be difficult. First, it was not clear what had triggered the apparent sharp change

in sentiment. One possibility was that the Committee's June tightening, which had surprised financial markets, had induced a changed perception of the likely path of monetary policy. There was some support for this in the reaction of markets to subsequent earnings data, as the Committee had highlighted the pick up in earnings growth as one of the main factors behind its June decision. Alternatively, the lagged effects of past monetary tightenings and sterling's appreciation might now be becoming more obviously apparent to consumers and businesses. Another possibility, which could not be dismissed out of hand, was that the confidence indicators—and the publicity surrounding them—were in some degree feeding on each other.

13 A second issue was whether, in addition to giving signals on the direction of the economy, the surveys provided information on the likely scale and speed of the slowdown. Few surveys had been in existence long enough for a robust view to be reached on this; many had not yet seen one complete business cycle. The CBI Business Optimism measure did, however, seem to have been a reasonable leading indicator in recent cycles. Taken on its own, it appeared to indicate a sharp downturn in activity.

14 Moving on to other evidence, the Committee noted that the messages about activity conveyed by the Bank's regional Agents had also become bleaker. Most striking was the sense that the downturn was not restricted to parts of the country with a proportionally large manufacturing presence and was extending to southern England. Some of the considerations bearing on the surveys applied here too, but the Agents' evidence nevertheless broadly corroborated a steeper and more broadly based slowdown than previously expected.

15 Finally, the rise in the number of profit warnings issued by quoted companies also suggested an accelerating slowdown. Some of the downside risks to equity prices incorporated in the May *Inflation Report* seemed to be materialising. The Committee agreed that the downside risks remained, particularly in the light of apparently greater fragility in the US equity market. Consumption would, however, tend to be supported by the effects of past equity price increases and projected robust labour income growth.

16 Overall, the economy had so far slowed broadly in line with the Committee's May forecast. The short-run outlook for activity was now slightly weaker than assumed in May and, given the recent surveys, the downside risks had probably increased.

Labour market conditions

17 While recent demand and activity data and survey indicators made it clear that the economy was slowing, the sustained above-trend growth of previous years was putting accumulating pressures on capacity. In particular, further increases in the demand for labour had become more of a concern in recent months. On the LFS measures, employment had risen in the three months to May compared with the previous three months, while the unemployment rate had fallen to 6.3% in May. Employment intentions, as measured by surveys, remained strong in the services sector, but were falling in manufacturing. According to the British Chambers of Commerce, recruitment difficulties were at a record high in both sectors in Q2. There were, however, some signs of easing in recent data: the claimant unemployment count had risen for the second month running to 4.8% in June, and the CBI had recorded fewer reports of skill shortages in manufacturing in its July survey.

18 More striking was the sharp rise in measures of earnings growth during the spring, as discussed at the Committee's June and July meetings. Headline whole-economy average earnings growth in the three months centred on April was 5.4% (private sector 6.2%, public sector 2.8%), having increased from 4.6% (revised up from 4.5%) in January. The amounts identified by respondents to the ONS survey as 'irregular pay', which seemed likely to represent

mainly bonuses, contributed 0.2 percentage points to the 1.1 percentage point increase in annual average earnings growth over the year to April 1998, suggesting that the acceleration of labour costs was only to a degree the result of increasing bonuses.

19 The Committee noted that the increasing importance of bonuses and profit/performance-related pay in remuneration complicated the assessment of labour market conditions. In particular, since most firms paid bonuses in a single month, the bonus contribution had to be smoothed over the year to obtain a measure of the underlying change in earnings growth. This required an assumption about the rate of growth in bonus payments over the coming twelve months. Assuming that bonuses continued to increase at the same rate as over the past year, underlying earnings growth in May was 5.2%, calculated on this basis. If, on the other hand, bonus growth fell to 10% by 1999, the smoothed earnings growth figure for May would be around 4.9%; and for zero bonus growth by January 1999, the figure was 4.7%. The assumption about future bonus growth was therefore an important element in judging current underlying earnings growth, although it was noted that since 1996 earnings growth had picked up steadily on any measure.

20 Views varied amongst Committee members about the best assumption. On one view, past bonus growth reflected rapid growth in corporate profits and revenue, which was unlikely to continue through 1998–99 given the activity slowdown underway. On another view, bonus growth was in part a symptom of a tight labour market, with firms having to pay up to recruit and keep labour.

21 The Committee discussed arguments advanced in the press that the official numbers materially overstated the rate of earnings growth because of the way bonuses were treated, and that there had been no real acceleration in earnings. But even on evidence as presented there had clearly been an increase in the rate of earnings growth.

22 The Committee discussed the twelve-month and three-month annualised measures of settlements growth. The twelve-month employment-weighted mean for the whole economy was 3.8% in Q2, up from 3.5% in Q1, while the three-month mean settlement had fallen from 3.9% to 3.7% over the same period. The twelve-month rate could potentially mislead as it reflected settlements agreed up to a year ago, and so possibly before the prospect of a slowdown had become widely apparent. However, the three-month measure was probably more misleading. Different firms settled in different months, so that the range of employers included in the three-month measure changed from month to month. In particular, the timing of public sector settlements distorted the three-month measure.

23 There was a range of views on the likely pace of future earnings growth, but members agreed that the labour market was tighter, and thus upward pressures on earnings were greater, than a quarter ago. One view was that the prospective slowdown in demand and output would dampen earnings growth, which was a lagging indicator of the economy. Another was that there would be continuing increases. In particular, there was a risk that public sector pay would start to catch up with the private sector, as discussed at previous meetings. The slowdown in domestic demand might, though, reduce the ability of firms to pass higher labour costs into prices, which the Committee agreed to reflect in its central projection.

24 The Committee also discussed recently published research suggesting that official estimates understated productivity, and so overstated unit labour cost growth, in manufacturing. Members noted that the research was specific to manufacturing and had no implications for the accuracy of official estimates of productivity and unit labour costs in the whole economy, which was the

Committee's focus. The authors of the research had said that any errors in the measures of manufacturing were likely to be offset by countervailing errors in the measures for other industry groups.

25 The Committee discussed the implications for inflation of the National Minimum Wage due to take effect from April 1999; a box on the MPC's analysis would appear in the August *Inflation Report*. The introduction of the National Minimum Wage (NMW) was akin to a price level shock. It would raise the price level, with a temporary impact on inflation. There was an upside risk that there would be more restoration of wage differentials than assumed in the central projection. Faster earnings growth in 1998 and 1999 than had been assumed in May, together with the NMW, would change the profile of the central projection of RPIX inflation, in the direction of making it humped rather than saucer-shaped.

Fiscal policy

26 The Committee discussed the implications for the inflation outlook of the latest Government spending announcements (in the Economic and Fiscal Strategy Report and the Comprehensive Spending Review). Fiscal policy had been progressively tightened in recent years. Following the latest announcements, the starting point in the EFSR was a somewhat lower fiscal deficit in 1997/98 than in the March Budget and May *Inflation Report*. There appeared to be an increase in current as well as in public investment spending from 1999/2000 onwards compared with the illustrative assumptions in the March Budget. The March Budget had, though, still effected reductions in forecast future deficits compared to 1997/98. It was observed that the budget balance was not by itself a complete measure of the macroeconomic impact of fiscal policy, which was also affected by changes in the level and composition of planned expenditure. These changes were reflected in the central projection.

Monetary conditions

27 The Committee noted that the rate of growth of most of the money and credit numbers had fallen over both the quarter and the latest month, and quite markedly since the peaks in 1997. Compared with May, there were clearer signs that monetary growth had eased. However, with the possible exception of narrow money, whose three-month annualised rate of growth was around 4% in July, further falls were needed in the absence of persuasive reasons to expect continuing strong negative velocity growth. On one view, additional risks were posed by a possible liquidity overhang from cumulative past rapid broad money growth.

28 Consumer credit had continued to rise very rapidly. It seemed that, notwithstanding the increases in official rates, intense competition had prevented interest rates from rising on unsecured credit products over the past year or so. It was unclear what if any implications this had for future consumption growth, particularly given that mortgage equity withdrawal had been negative in recent quarters.

29 As regards price indicators of monetary conditions, the Bank staff's estimates of short maturity real interest rates suggested a fall over the past month but a rise since May, mainly owing to the change since the June tightening in expected future official rates. However, sterling had fallen over both the past month and compared with the May *Inflation Report* assumption.

Other forecasts of inflation

30 The Committee reviewed information collected up to the meeting on other forecasts; as usual the completed survey would be summarised in the *Inflation Report*. So far, the averages for RPIX inflation in 1998 Q4, 1999 Q4 and 2000 Q3 were 2.6%, 2.5% and 2.5% respectively; and for GDP growth they were 1.4%, 1.7% and 2.2%. These forecasts did, of course, make a

variety of assumptions about the path of interest rates and the exchange rate.

The MPC's August forecast

31 On the Committee's own forecast, which is described fully in the *Inflation Report* published in the week following the meeting, the near-term outlook for output growth was weaker than in May. As in previous quarters there was a negative contribution from net trade through much of the forecast period, but this was smaller than in May due to sterling's slight fall over the quarter and a steeper future depreciation being assumed in the central projection, reflecting a widening in interest rate differentials. The official figures for investment in 1996 and 1997 having been revised up, the Committee decided to reduce its forecast of investment growth, and so domestic demand growth, over the forecast period. Overall, therefore, in the central projection output growth fell below trend before rising as the fall in net exports came to an end and as planned government spending picked up.

32 The inflation profile reflected the adverse news on earnings since May, which on its own implied a worse rate of inflation for a given rate of output growth (a worse short-run nominal/real trade-off). Not all members agreed with this interpretation of the earnings data. The alternative view was that the bonus elements of earnings was likely to slow as activity slowed. However, in the central projection, earnings now accelerated by more than assumed in May, and the effect of the National Minimum Wage on the price level added to nominal earnings growth in the shorter run. Inflationary pressures would, however, subside somewhat as the economy slowed and unemployment rose. The central projection was thus for RPIX inflation to rise into 1999 before falling back.

33 The net effect of these influences was that the central projection for RPIX was above the 2.5% target until the end of the forecast period; and that May's saucer-shaped forecast was succeeded by a forecast with a hump. The balance of risks to inflation were on the upside towards the end of the period through, amongst other things, the possibility of a greater sterling depreciation than assumed in the central projection.

The immediate policy decision

34 The Committee first discussed to what extent it should weigh in its policy decision not only the medium-term outlook for inflation but also the hump in inflation which it was forecasting in the first half of 1999.

35 On one argument, the Committee should be concerned with the profile for inflation over the entire horizon at which current policy was likely to have some impact on inflation, not solely on the two-year ahead prospect. The central projection for inflation in the August *Inflation Report* was above the target throughout the entire forecast period, except at the two year horizon, with the prospect of a subsequent rise in inflation as domestic demand growth picked up. Moreover the balance of risks to inflation was on the upside. To eliminate the anticipated hump in inflation completely might require too much volatility in output in the short run. Nevertheless, it would be appropriate to reduce that hump somewhat by a further immediate tightening of monetary policy. This would also help to bring down inflation at longer horizons. The inflation projection implied that over the two year horizon, in order to meet the inflation target, an increase in interest rates was more likely to be necessary than a cut. There were no pressing arguments for delaying an increase, and so an immediate increase was called for.

36 On another argument, the lags in monetary policy were such that raising rates to reduce the expected but uncertain hump in

inflation in 1999 would raise output volatility without directly improving the medium-term outlook for inflation. This argument pointed to not raising interest rates immediately.

37 Turning to the implications for policy of the overall outlook for inflation, the Committee identified arguments for raising rates, for leaving them at 7.50%, and for cutting rates.

38 The arguments for raising rates were as follows. The central projection for inflation was above the target throughout the forecast period, except at the 2 year horizon. The risks to inflation were, moreover, on the upside throughout—and especially towards the end of—the forecast period, so that the mean projection of inflation was above 2½% throughout the forecast period. On one view, it seemed likely, notwithstanding the considerable uncertainties, that inflation would be increasing beyond the two-year horizon, as the effects of sterling's appreciation on net trade wore off and as the impact of government spending on domestic demand came through. Thus, just as inflation outturns had persistently been above target in the past, it was more likely than not that inflation would be above target in the foreseeable future. This would be damaging to credibility, and called for an immediate 25 basis point rise.

39 The arguments for a cut in rates were as follows. Current monetary conditions were already tight. Real short-term interest rates were probably in the range 4½%–5% and the exchange rate was being held up partly by market expectations of official interest rates being set at the current level (or even higher) for some time. The downturn in the economy now becoming evident in the data was largely the effect of the monetary tightening put in place a year or so ago and the past appreciation of sterling. So far the downturn was moderate, but the more recent monetary tightenings were yet to have their maximum effect, and there were some ominous signs in the survey evidence and from the Bank's regional Agents that the decline in output growth might be about to steepen.

40 On this view these arguments pointed to an immediate, but small, reduction in interest rates, both to bring down their level directly and also to signal that official rates had probably peaked. Further support for this view came from a lower inflation forecast based on an alternative interpretation of bonus payments and earnings growth which assumed no change in the short-term nominal/real trade-off from that in the May projection. In that case it was unlikely that a 25 basis points reduction in rates would be enough to prevent inflation from being below target, especially if the downside risks of a deeper prolonged impact from the Asian crisis materialised. But there were arguments against a larger cut at this point. Domestically, there were some offsetting upward risks to inflation. Medium-term inflationary pressures had increased because of the introduction of the minimum wage and because of the expansionary effect of higher planned government expenditure. There was also a risk of further earnings acceleration, although on this view it would not be possible for producers to pass much of that through to prices in the current environment. It was therefore

desirable to reduce rates by 25 basis points now and then wait to see how earnings and prices developed before bringing rates down further.

41 The arguments for leaving rates at 7.50% were as follows. The slowdown in activity and demand so far was broadly in line with the Committee's earlier forecasts, resolving the earlier uncertainty about whether a turning point had been reached. The downturn also appeared so far to be somewhat more balanced than previously expected. On the other hand, the earnings data were clearly worse than expected in May, implying that the short-run nominal/real trade off had deteriorated. That would probably continue for a while, and was reflected in the Committee's forecast. While the risks to inflation were on balance on the upside, there were downside risks. In particular the forecast of consumption growth depended in part on private sector wealth and thus on the course of the equity market, which had recently become more rather than less uncertain. And the recent striking fall in consumer and business confidence, evidenced by surveys and the Bank's regional Agents, signalled downside risks to activity and inflation. These risks might be greater than reflected in the forecast. For example, the downturn might prove sharp enough to prevent the forecast rise in earnings growth being passed through into prices in the short run, although that would tend to increase latent price pressures beyond the two-year horizon, since margins would probably be rebuilt at some stage. In sum, given that inflation was forecast to be close to the target in two years' time and that the outlook beyond then was highly uncertain, the Committee could sensibly wait to gather more information before concluding that policy needed to be changed.

42 The Governor invited members of the Committee to vote on the proposition that the Bank's repo rate be left unchanged this month. Seven members of the Committee (the Governor, Mervyn King, David Clementi, Alan Budd, Charles Goodhart, Ian Plenderleith and John Vickers) voted for the proposition, and two (Willem Buiter and DeAnne Julius) voted against. Willem Buiter preferred an immediate rise in interest rates and DeAnne Julius an immediate cut.

43 The following members of the Committee were present:

Eddie George, Governor
 Mervyn King, Deputy Governor responsible for monetary policy
 David Clementi, Deputy Governor responsible for financial stability
 Alan Budd
 Willem Buiter
 Charles Goodhart
 DeAnne Julius
 Ian Plenderleith
 John Vickers

44 Andrew Turnbull was also present as the Treasury representative.

Annex: Summary of data presented by Bank staff

1 This Annex summarises the analysis presented by Bank staff to the Monetary Policy Committee on Friday 31 July, in advance of its meeting. At the meeting itself, members were made aware of information that had subsequently become available, and that information is included in the Annex.

I Monetary conditions

2 The twelve-month growth rate of notes and coins had risen to 5.6% in July from 5.5% in June, and the three-month and six-month annualised rates were 3.5% and 4.2% respectively, after adjusting for the effects of the introduction of the new 50p and £2 coins. Three-month annualised real narrow money growth had slowed to around 2%.

3 Retail M4 had grown by 0.1% in June, bringing the three-month, six-month and twelve-month growth rates down to 5.1%, 4.5% and 5.6% respectively, from 5.5%, 5.1% and 6.7% in May. The fall in the twelve-month growth rate had partly reflected strong inflows to retail deposits in June 1997 following the Halifax Building Society demutualisation.

4 The twelve-month growth rate of aggregate Divisia money had fallen to 7.9% in Q2, from 8.6% in Q1. Within the total, personal sector Divisia growth had remained unchanged at 6.9%, while ICCs' Divisia growth had fallen to 5.1% from 5.7% in Q1, and OFIs' Divisia growth to 16.6% from 23.1%. The twelve-month growth rate of aggregate real Divisia had fallen to around 5% in Q2. In the past 20 years the average annual fall in Divisia velocity had been around 1%; if that were the current rate, real Divisia growth of about 5% was consistent with real transactions demand growth of around 4% a year.

5 Personal sector M4 growth had weakened in June, but had been relatively strong in Q2. The three-month annualised growth rate for Q2 was 6.6%, above the twelve-month growth rate of 6.2%.

6 ICCs' M4 deposits had risen by 1.5% in Q2—only slightly stronger than the 1.4% rate in Q1—while the twelve-month growth rate had fallen to 5.3% from 5.8% in Q1. However, the rates of growth over shorter periods had been rising, the three-month rate picking up to 6.0% in Q2 from 5.5% in Q1, and the six-month rate to 5.8% from 4.4%.

7 The 3.5% rise in OFIs' M4 in Q2 was the weakest quarterly increase since 1994 Q4, bringing the three-month annualised growth rate in Q2 to 14.9%. The three- and six-month growth rates had remained below the twelve-month growth rate of 19.9%. Asset allocation surveys carried out by Merrill Lynch suggested that LAFPs' cash to portfolio value ratio had fallen in June to 4.9%, which was close to the average since 1975.

8 The twelve-month growth rate of aggregate M4 had fallen to 9.0% in June, despite relatively strong monthly growth of 0.7%. The three- and six-month growth rates had remained below 9%. Since 1997 Q2, when the twelve-month growth rate of M4 was 11.7%, persons' M4 growth had fallen from 7.7% to 6.2%, ICCs' M4 growth had fallen from 7.7% to 5.3%, and OFIs' from 27.8% to 19.9%.

9 Real M4 growth had fallen by around 2 percentage points during 1998—slightly above the 1.6 percentage point fall in nominal M4 growth. The twelve-month growth rate of real M4 lay somewhere between 6% and 7%, depending on which price series was used to deflate nominal money. The 20-year average growth rate of velocity had been around -2%; if that were the current rate, real M4 growth of 6%–7% suggested real demand growth of between 4% and 5%.

10 Turning to credit, aggregate M4 lending growth had been weak in June, growing by 0.3% on the previous month. The three- and six-month growth rates had both fallen and the twelve-month growth rate had fallen to 7.6% from 8.2% in May.

11 M4 lending to persons had remained steady: the twelve-month growth rate was 6.8% in Q2 and had varied very little in the previous twelve months. Net secured lending had also been steady. Gross secured lending had been strong again in June, possibly reflecting continuing high levels of remortgaging. Unsecured lending had remained strong—the twelve-month rate had remained above 16% in June—within which net credit card borrowing (accounting for about 25% of the stock of unsecured credit to the personal sector) had grown at 25.5%.

12 Lending to ICCs had fallen by 0.1% in June, bringing the twelve-month growth rate down to 5.2% from 5.5% the previous month. However, the three- and six-month rates were somewhat higher. Also, external finance from outside the M4 sector had remained strong in Q2, with total (sterling and foreign currency) external finance steady between Q1 and Q2.

13 OFIs' M4 lending had weakened in Q2, the twelve-month growth rate coming down to 13.2% from 17.5% in Q1. Monthly growth had averaged 0.6% during Q2.

14 Turning to financial prices, as expected banks had now largely passed on the most recent repo rate rise to both savings and variable rate mortgage rates, whereas mutual lenders had continued to delay. Unsecured personal credit rates had not risen. Average rates payable on fixed-rate mortgages had risen in July, with a range of banks and building society increasing rates significantly.

15 Inflation expectations for 1998—as measured by surveys of professional forecasters conducted by Consensus Economics (forecasts of average 1998 RPIX inflation) and HM Treasury (forecasts of 1998 Q4 RPIX inflation) and the Merrill Lynch survey of fund managers (forecasts of RPI inflation in the year to December 1998)—had edged up slightly in July; in each case most respondents had been surveyed before June's low RPI inflation outturn had been published.

16 Sterling interest rate expectations, as derived from the futures markets, had fallen slightly in July—the three-month rate implied for September 1998 stood at 7.76%—but remained higher than immediately prior to the June repo rate rise. The nominal forward curve had risen slightly at the long end (around 9 basis points at the 20-year horizon) to 5.53%. The real forward curve had hardly moved at the long end. The implication was that either long-run inflation expectations or the inflation risk premium (or both) had risen slightly in July compared with June. There were, however, few clear macroeconomic explanations for any such development, and the increase was not large in comparison with the historical volatility of the series.

17 The two-year forward rate (for 18–24 months), derived from index-linked gilts, had fallen by about 25 basis points over the month. There were no new survey-based estimates of short real rates available this month.

18 The broad and narrow measures of the sterling ERI had fallen by 1.4% and 1.6% to 120.4 and 104.0 respectively since the 8–9 July MPC meeting. The ERI had fallen by 1.8% from the (15 day average) starting-point in the *May Inflation Report*. Using the uncovered interest parity condition to project the exchange rate from end-July levels now implied a path for sterling out to 2000 Q2 approximately mid-way between the mean and modal paths for

sterling assumed in the *May Inflation Report*. Exchange rate forecasts taken from Consensus Economics implied a path reasonably close to the *May Inflation Report* mean.

19 The Consensus forecasts can be used to provide a measure of the sterling risk premium (the excess return required on sterling assets above interest rate differentials); this was based, amongst other things, on an assumption that survey respondents' and market participants' expectations were the same. Comparing the April and July Consensus forecasts, it was noticeable that, while the forecast value for sterling in early 2000 was broadly unchanged, the estimated risk premium on other currencies relative to sterling had fallen by around 1.5 percentage points, from around 4% to around 2.5%. Most of this fall had occurred between the April and May Consensus surveys, and might have been associated with the 'Euro weekend' at the start of May. The effect of this estimated fall in the risk premium on sterling had subsequently been offset by an increased differential in market interest rates—expectations of future UK interest rates had risen after June's increase in the repo rate.

II Demand and output

20 Recent data had suggested a further slowdown in underlying economic growth. The preliminary estimate of GDP growth for 1998 Q2 was 0.5%, the same as in Q1. But the Q2 figure had been boosted by strong energy output. Non-oil GDP grew by 0.4% compared with 0.6% in 1998 Q1. Annual GDP growth had moderated from 3.0% in Q1 to 2.6% in Q2.

21 There was as yet only a limited sectoral breakdown of the Q2 output data. Service sector output had grown by 0.6% in Q2 (0.7% in Q1). That compared with an average quarterly growth rate of 0.9% for the recovery period as a whole; and growth over the latest two quarters had been much less than in 1997, reflected in six-month annualised growth rates of 2.6% in 1998 H1 compared with a peak of 4.7% in 1997 H2. Within services, distribution output had risen by 0.1% in Q2, though the figure was typically revised. The relative weakness partly reflected the fall in car sales in Q2.

22 Manufacturing output was unchanged in June, having fallen by 0.4% in May. Consequently output was unchanged in the second quarter compared with the previous quarter. The trend in manufacturing output since mid-1997 appeared to have been, at best, flat.

23 The recent pattern of monthly retail sales data had been particularly volatile, in part reflecting the impact of the poor weather. Sales volumes had fallen by 1.1% in June after having risen by 1.8% in May. Clothing and footwear sales volumes had fallen by 6.7% in June. Quarterly growth in retail sales volumes had slowed in Q2 to 0.3% from 1.0% in Q1, the lowest rate since 1995 Q3. This indicated a continued slowdown in spending, though it was perhaps exaggerated in Q2 by the impact of the weather on sales. The slowdown had been particularly evident in household goods sales. Annual growth was 4.4% in 1998 Q2. The growth in household good sales volumes had fallen sharply in the late 1980s prior to the peak of the cycle.

24 Car registrations had fallen in June to stand 2% higher in Q2 than a year earlier. Private registrations had fallen by 0.7% in this period following strong growth in 1998 Q1. This was likely to depress growth in consumer spending in Q2. But the Bank's regional Agents had suggested that in most parts of the country car sales in July had improved, and orders were up for August.

25 Recent housing market data also supported a picture of slowing domestic demand growth. There was a close correlation between growth in consumption and housing wealth, though it was not clear whether the housing market was a leading or contemporaneous indicator of demand. Both were likely to be

related to income expectations. Housing transactions also tended to rise sharply when existing home-owners trade-up as incomes and prices rise. House price inflation did not appear to be rising. The Nationwide index had risen by 1.1% in July bringing the annual rate of increase down to 10.8%. The Halifax index had risen by 6.0% over the year to July 1998. The Bank index had increased by 8.7% in the year to 1998 Q1. Regional house price data had suggested some slowdown in the south-east of England in 1998 Q2 but little overall change in the regional pattern. The volume of transactions measured by particulars delivered were 5.9% lower in June 1998 than a year earlier. This apparent softening in the housing market was consistent with a slowdown in the growth of consumption, though it was not clear whether it would itself reduce consumption growth further.

26 Housing starts had fallen by 10.9% in Q2 over Q1. Construction had fallen by 4% in Q2. More generally, investment might fall in Q2 in the absence of the erratic factors evident in Q1.

27 The Public Sector Net Cash Requirement outturn in June was £6.1 billion, higher than June 1997, partly due to the timing of interest payments. Over the latest three months, the PSNCR was £2.8 billion lower than the same period in 1997.

28 Monthly goods and services trade data had suggested that net trade may make a smaller negative contribution to GDP growth in Q2 than in Q1 (-0.7 percentage points). Goods export volumes had risen by 0.3% in May (excluding oil and erratics) reflecting a 1.8% rise in exports to EU countries. And exports to non-EU countries had risen by 3.6% in June, having fallen by 2.1% in May. Overall, exports to non-EU countries had fallen in Q2. The trend in total exports appeared to have been flat during 1998. Imports had fallen in May by 1.2%, but imports from non-EU countries had risen in June by 1.4%. The trade deficit deteriorated in May to £1.2 billion from £0.7 billion in April mainly due to oil and erratic trade with non-EU countries. This had unwound in the June data for non-EU trade. Excluding oil and erratics, the trade deficit was broadly unchanged between April and May.

29 Survey data had shown a marked deterioration in sentiment over the latest month. Consumer confidence had fallen sharply in the June MORI survey: from +1 to -19. And it had fallen for the second consecutive month in the GFK survey in July, down 4.2 percentage points to -1.6%. This had been mainly due to worsening perceptions about unemployment. There had been no further fall in the balance of respondents believing that it was a good time to make a major purchase. The CBI Quarterly Industrial Trends survey recorded a large fall in the new orders balance: +2 in April to -17 in July, the lowest balance since October 1992 and the largest quarterly fall since July 1990. The balance of firms reporting order books above normal had fallen from -9 in April to -31 in July, the lowest balance since 1993 and the largest quarterly drop since 1980. The deterioration had been mainly in domestic orders: -15 from +9 in April. Alongside the fall in orders, manufacturers confidence fell from a balance of -22 in April to -44 in July, the lowest since January 1991. Output balances had also fallen though less markedly. The reported output balance (past four months) had fallen from +7 to -4, the lowest balance since April 1993; expected output (next four months) had fallen to -8, the lowest since July 1991.

30 The British Chambers of Commerce (BCC) Survey had also recorded falling balances for manufacturing orders and deliveries. Domestic orders fell from +12 in Q1 to +2 in Q2; export orders from -12 to -24. Domestic deliveries fell from +15 to +3; and export deliveries from -5 to -13. Investment, confidence and cashflow balance had all fallen to their lowest levels since late 1992. The July CIPS survey had showed a large fall in the manufacturing output index, from 48.7 to 43.2, the lowest level and largest fall recorded by the survey.

31 On the services side, the BCC survey had indicated some slowdown in domestic demand, the home orders balance falling from 30 to 23, approaching its average level over the course of this recovery (+21). Home deliveries had fallen from +36 to +31. The export deliveries balance had fallen from +10 to 0, though the export orders balance (+3) was little changed on Q1 (+4). The CIPS Report on Services had indicated continued but moderate growth in services activity. The Business Activity index was 55.9 in July but had fallen for the fifth consecutive month. The Volume of Outstanding Business index was 48.7, below 50 for the second month running, although the Incoming New Business index was still above 50 (53.7).

32 Investment intentions balances in the manufacturing sector had fallen in both the CBI and BCC surveys to their lowest levels since 1991 and 1992 respectively. But services investment intentions had remained relatively strong in the BCC surveys and well above the recent average.

33 On the international side. Japanese industrial production had fallen again in June, by 2%; and retail sales were 0.9% lower in May than a year earlier. There had been some recent signs of stabilisation in Asia, but weakness in Japan continued to risk global imbalances and potentially threaten the outlook for China. Furthermore, financial risks and fear of contagion had probably increased over the latest quarter, notably in Russia.

34 In the second quarter, US retail sales volumes had risen by as much as in Q1, and the inventory/sales ratio had remained historically low. US industrial production rose by 0.6% in Q2, but the annual rate of growth had slowed. The trade deficit had widened further in April, and the June National Association of Purchasing Managers survey had shown a fall in export orders. GDP growth had nevertheless slowed in Q2 (0.4% on Q1), reflecting negative contributions from stockbuilding and net trade as well as the effects of the strike at General Motors. Domestic demand had remained strong, but was expected to slow gradually in the second half of 1998.

35 Monthly data had suggested relatively strong GDP growth in Q2 in France and Italy, but a weaker picture in Germany.

III Labour market

36 LFS employment grew by 36,000 (0.1%) in the three months ending in May, compared with the previous three months. This was similar to the increase recorded in the three months ending in February. The increase in employment in March-May, compared with the same months a year earlier, was 282,000, a much faster average quarterly rate than the latest three months. The employment rise in the latest three months had been entirely accounted for by part-time workers. A wider measure of labour demand, total hours worked, had increased by 0.3% in the three months to May. Though the series was volatile, it seemed that the trend may have flattened.

37 Surveys of employment intentions had given a mixed picture of prospects. The CBI and CIPS surveys suggested falling employment in the manufacturing sector at an increasing rate. But the BCC survey suggested slowing, although still positive, growth in demand for labour in that sector. BCC service sector recruitment intentions showed a balance of 22% of firms expecting to recruit more staff, some 10 points above the ten-year average, but lower than in recent quarters, after adjusting for seasonal variation. Information from the Bank's regional Agents confirmed the sectoral picture.

38 LFS unemployment had been 54,000 lower in the three months to May than in the previous three months and the rate had fallen to 6.3% from 6.4%. The claimant-count measure of unemployment had risen 700 in June after a slightly larger increase in May. But the claimant rate had remained at 4.8%. The

difference in unemployment changes on these two measures could have reflected job seekers who are not eligible to claim benefit either finding work or giving up looking. The LFS survey suggested that unemployment falls during the past six months had been matched arithmetically by rises in numbers of people not actively seeking work, and the rises in employment matched the increase in the population of working age (though of course this did not imply that none of the previously unemployed people found work nor that all of the increase in population went into employment).

39 Regional data showed clear regional differences in the extent of tightness, and recent analysis by the Employment Policy Institute showed marked differences within regions. But there was little variation in the recent trends in claimant-count unemployment at the regional level.

40 The stock of vacancies had risen again in June and notifications had bounced back, but there had been a slowdown in the growth of press recruitment advertising in recent months. The latest CBI survey had shown a fall in the balance of manufacturing firms reporting skilled labour as a constraint on output to 12%, almost down to its long-run average. But the BCC survey for 1998 Q2 suggested recruitment difficulties in manufacturing and the service sector were at record levels.

41 Headline whole-economy earnings growth in the three months centred on April was 5.4% compared with a year earlier, up from a revised 5.3% in March. That rise reflected a 0.1 percentage point increase in both manufacturing and services earnings growth. The difference between private and public sector earnings growth remained wide—annual growth had risen to 6.2% in the private sector and risen to 2.8% in the public sector. The ONS estimate of the contribution of irregular bonuses and profit-related payments to earnings growth allowed calculation of growth in the 'regular pay' component. High irregular bonus payments had continued to push up earnings growth this year but the ONS estimates suggested that of the 1.1 percentage point increase in twelve-month earnings growth between May 1997 and May 1998, regular pay accounted for around 0.9 percentage points of the rise.

42 Twelve-month averages of wage settlements had continued to rise steadily during the second quarter as settlements in the current round were generally higher than in the previous one: the twelve-month employment weighted mean of settlements for the whole economy had been 3.8% in June. The increase in the second quarter was entirely due to higher private settlements (which included the second tranche of the construction sector settlement); public sector settlements had remained unchanged at 3.2% between April and June. Staff calculations of wage drift (the difference between earnings growth and settlements levels) showed drift had been rising since 1996. But it was still only around its long-run historical average despite recent high bonuses.

43 The latest ONS data showed unit wage costs in manufacturing rising at around 6% with productivity lower than a year earlier. Agents' contacts continued to suggest that productivity growth was stronger than the official data. The London Business School (LBS) had recently published a study suggesting that the sectoral composition of productivity growth had been mismeasured. Bank staff had previously drawn the Committee's attention to the contrast between official data for manufacturing output and survey evidence, and to the weak official data for productivity; the LBS suggested that there was also a statistical break in the relationship between manufacturing employment data and survey data. The LBS economists did not, however, question the whole-economy data for earnings, productivity and unit wage costs; in their view an underestimate of manufacturing productivity growth was compensated by an overestimate in the non-manufacturing sector.

44 In July, the Agents conducted a special inquiry into the potential effects of the Minimum Wage on firms. The survey covered 136 firms, employing around one million staff. A third of all firms said they would be unaffected. Because these firms tended to be the largest firms they represented 70% of the staff covered by the survey. Of those affected around a third had already taken action. Nearly half of the firms which would be affected said they would reduce margins. Around a third said they would raise prices and a third said they would reduce employment (firms were allowed to indicate more than one reaction). The survey suggested that service sector firms were more likely to try to increase prices or reduce margins, and manufacturing firms were more likely to reduce employment and increase mechanisation. Around 40% of firms affected said that restoration of pay differentials was likely to take place.

IV Prices

45 Annual deflation in both commodity and manufacturers' input prices had persisted in June. The Bank's commodity price index had fallen (provisionally) by 1.6% in June, and by 11.3% over the year. The index excluding oil had fallen (provisionally) by 0.4% on the month and by 8.4% over the year. Metals and non-oil fuels prices had fallen since November 1997 as the turmoil in East Asia weakened demand; both had fallen by around 5% in the three months to June. Those falls had been counterbalanced by a provisional 5% rise in UK agriculture prices following recent bad weather and poor harvests. The sterling price of Brent crude oil (one-month future) had fallen by 8.1% in June and by a further 3.0% in July. The June oil price fall had contributed to a 0.7% fall in manufacturers' input prices, down by 3.7% on the year. The CIPS report on manufacturing had suggested a further fall in input prices in July.

46 Oil prices had fallen since March 1997. That price weakness showed no sign of abating despite two OPEC agreements to cut supply in 1998. As a result, Saudi Arabia was proposing an alternative cartel of oil exporting countries to intervene in oil markets in order to stabilise prices. In July, the six-month future price of oil (£8.74) remained above the one-month future price (£7.88) reflecting high inventory levels and the consequent high price of storage.

47 In June, manufacturing output prices (excluding excise duties) had recorded annual deflation for the third consecutive month; excluding excise duties, output prices had risen by 0.1% in June giving annual growth of -0.5%. The Quarterly CBI Industrial Trends Survey had reported a further fall in output price expectations in 1998 Q2 (the seasonally adjusted balance fell from -6% in Q1 to -10% in Q2). Though more volatile, the CBI expectations balance was correlated with annual producer output price inflation. The CBI balance of manufacturers' unit costs had remained negative, at -1.0%, in Q2; the balance had been close to its all-time low throughout the past year. Low cost inflation could help to explain low output price inflation: but it was not consistent with the Bank's estimate of manufacturers' weighted costs which had continued to rise in Q2, by 0.8% year-on-year, due to rising bought-in services and unit labour costs.

48 The tax wedge component in output prices had increased over the past year; annual output price inflation in June was 1.0%, compared to -0.5% for PPIY (output prices excluding excise duties). The increased tax wedge had been caused by rising petrol and tobacco duties and the weakness of petrol prices (which had a larger effect on PPIY than on total output prices).

49 Total import prices had risen by 0.9% in May but had fallen by 3.5% on the year; total export prices had risen by 1.2% in May but had fallen by 2.7% on the year. Annual deflation had persisted in non-EU export and import prices in June (export prices down by 0.4% on the year, import prices down by 3.1%). Nonetheless, the correlation between falling trade prices and sterling's appreciation

had not been as strong as expected, given past experience of exchange rate movements.

50 The Bank's estimate of manufacturers' margins had been updated to include the food, drink, tobacco and petroleum industries. Following that change the estimates had continued to show a decline in margins on both domestic and export sales, as unit labour and bought-in services costs had risen, more than offsetting falls in other costs, alongside falling export and domestic prices.

51 All of the main retail price inflation measures had fallen sharply in June following their surprising rise in May. The fall in annual RPIX inflation, to 2.8%, in June had been entirely due to goods prices, which had accounted for the rise in May. Annual RPIX goods price inflation had fallen from 2.6% in May to 2.0% in June; RPIX services inflation was unchanged at 3.1%. Within goods prices, the largest falls (relative to June 1997) came from seasonal foods, motor vehicles and petrol. Annual RPI inflation of 3.7% had remained above RPIX inflation because mortgage interest payments had risen 25% in the year to June. That gap between RPIX and RPI inflation was expected to narrow sharply in the coming months as last year's MIPS rises fall out of the annual inflation rate.

52 RPIY inflation was 2.0% in June; the gap between RPIY and RPIX inflation was expected to narrow by 0.2 percentage points in July when the timing effects of recent increases in petrol excise duties fall out of the calculation. HICP inflation had fallen by 0.3 percentage points to 1.7% in June, in line with the fall in RPI inflation. UK HICP inflation remained above the average rate in the European Union of 1.6% in the year to May.

V Bank's regional Agencies: summary of business conditions

53 A fairly widespread deceleration in manufacturing output had been reported, as difficult export markets and increasing import competition were accompanied by weakening domestic demand growth. Less regional divergence had been reported than previously, a slowdown in manufacturing being reported across the south of England as well as elsewhere in the United Kingdom. Housing market activity had also shown signs of slowing. Retail sales growth had weakened in all regions; softer consumer demand being attributed in part to concerns about mortgage payments. But in the rest of the service sector evidence of a slowdown had been more mixed, with some sectors (notably IT) reporting strong growth.

54 No change had been reported in the scale of wage settlements or earnings growth; service sector contacts had continued to report higher settlements than those in manufacturing. Material input costs had continued to fall, reflecting the decline in world commodity prices. There had been some signs of a further weakening in manufacturing output prices and heavier retail discounting in response to subdued demand and a build-up of stocks.

55 Reports of declining employment in manufacturing had increased. In contrast, reports of skills shortages had remained widespread in the service sector, although a few signs of softening had emerged; vacancies reports had not been quite as strong in recent weeks. The number of contacts reporting deferral of investment plans had risen, but much investment still remained in the pipeline—usually targeted at productivity improvements.

VI Financial markets

Foreign exchange

56 July had been a quiet month for the G3 currencies on the whole. Sterling had softened against the Deutsche Mark, but had barely moved over the month against the dollar.

57 The yen had weakened, to 107.4 on its effective index, with the main influence being the uncertain prospects for reform of the banking system and for permanent tax cuts. The yen's fall against the Deutsche Mark in the month had been steady; its path against the dollar had been more erratic.

58 The Deutsche Mark had strengthened against both the yen and the dollar, to around Yen 81½ and DM 1.77 respectively. With little change in European interest rates, the main factor behind the Deutsche Mark's strength appeared to have been the more stable position in Russia, reducing concerns about the impact on the German banking system. When the IMF package was initially announced on 13 July, the dollar fell by almost 2 pfennigs against the mark. Since then the dollar had trended lower and was close to the bottom of its recent trading range.

59 The sterling ERI had fallen by 1.6% to 104.0 over the month. It fell by around 1% in the first half of the month, then recovered, before falling further after the CBI Quarterly Trends survey released on 28 July. Sterling had fallen by about 2½% against the Deutsche Mark to DM 2.90, but remained almost unchanged against the dollar (trading just under \$1.64). Some of the factors which had caused the Deutsche Mark to appreciate against the dollar—namely the unwinding of safe haven flows related to Russia—had affected the pound as well. Three pieces of domestic news had also affected the pound: the RPIX data (sterling fell); the average earnings data (sterling rose); and the CBI survey (sterling fell).

60 Overall, the foreign exchange market was now more convinced than a month ago that the UK economy was slowing; the market was also probably a little less pessimistic about events in Asia and Russia. Both of these factors had proved negative for sterling.

Bond and money markets

61 Overall, July had been a quieter month for domestic markets after the unusually sharp movements during June.

62 The short sterling futures market seemed to have experienced four surprises since the July MPC meeting: the MPC's decision not to raise rates, the RPI data, the average earnings data, and the CBI survey. Larger than normal turnover of short sterling contracts on those days corroborated the view that those days were characterised by significant market repositioning, though it was difficult to draw firm forward-looking conclusions from the flow data.

63 Looking at the market's short-term views ahead of the August MPC, very few contacts thought that rates would change. Anecdote suggested that the market was clearly still nervous, though implied volatility, derived from the LIFFE option on short sterling futures contracts, had fallen after publication of the CBI survey. The two-week forward general collateral repo

curve indicated that little change in the Bank's repo rate was expected.

64 Over the month, gilt yields had moved down, by about 15 basis points at 10 years, and by rather more than US Treasuries and German Bunds. The government's spending announcements had had little initial impact on the gilt market, though subsequently some contacts had worried about the potential implications for gilt supply if the economy were to slow sharply.

Equity markets

65 Overall the FT-SE All-Share index had fallen by 6%, to 2,643, since the July MPC. Major markets fell sharply after Chairman Greenspan's Humphrey-Hawkins testimony on 21–22 July. There had been a small fall in long-term real yields during the month, so the change in equity prices probably reflected either a fall in profit expectations or a rise in the equity risk premium.

66 Looking at sectors of the UK equity market showed that the *general industrials* sector had fallen by 11.5% since the last MPC; within this, *chemicals* fell by 15.0%, linked to the ICI profit warnings. Taking a longer perspective, the *chemicals* sector had underperformed relative to the All-Share since the start of 1996. Looking at revisions to analysts' forecasts for profits over the past three months showed that the recent underperformance in the *chemicals* sector was associated with a downward shift in profit expectations for 1998 and 1999.

67 The *general retailers* index had increasingly underperformed the FT All-Share since the autumn of 1997. Analysts' earnings forecasts for this sector had been revised down for 1998 (but not for 1999) over the past three months.

68 Analysis of profit warnings showed more warnings in July 1998 compared with July 1997. These were predominantly in the *general industrials* and *general retailers* sectors. (A profit warning had to be issued where a quoted company's directors became aware of information about their company's performance which was likely to lead to a substantial movement in its share price. Profit warnings were therefore an indication of genuine news about a company's prospects, and possibly about the sectors in which the company operated.)

69 Separately, Bank staff had looked at the effect of news on the minimum wage on the share prices of listed (ie relatively large) firms. Five sub-sectors of the FT-SE All-Share index had been selected which corresponded to the industries identified by the Low Pay Commission as having a high proportion of low paid workers; *household goods and textiles, retailers (food), retailers (general), leisure and hotels, and breweries, pubs and restaurants*. The analysis showed that these sub-sectors had not responded significantly to news items about the minimum wage over the past three years. However, the analysis did not necessarily carry over to small firms.

Minutes of the Monetary Policy Committee meeting on 9–10 September 1998

1 The Committee began by discussing recent world developments, particularly the problems in emerging market economies and the increasing weakness in Japan. On the domestic economy, the Committee contrasted the official output data with the picture presented by business surveys, and discussed the possible news in the latest data for earnings and monetary growth. Taking the external and domestic news together, the Committee considered the implications for its own inflation and output projections before turning to the immediate policy decision.

The world economy

2 The main developments in the world economy since the previous meeting had been the financial and political crisis in Russia and the continued deterioration of the outlook for growth in Japan. The Committee considered the direct trade linkages with Russia, the implications of changes in capital flows, the reaction in world equity, bond and money markets, the likely impact of weak commodity prices—especially for oil—and the outlook for world growth.

3 Looking at the direct effects on trade it was clear that Russia on its own would have a relatively small impact via trade linkages, accounting for just 0.7% of UK exports compared with 1.2% going to Latin America and 7.8% to Asia (excluding Japan). Following the unilateral restructuring of Russian debt there had been a sharp reaction in world financial markets. In particular there had been a global widening of spreads on corporate debt over risk-free assets, including for industrialised world companies exposed to the emerging market economies, which had raised the cost of capital. There had also been a large increase in bond yields for emerging-market sovereign debt. This would make it more difficult for those countries to finance external deficits and to refinance maturing debt. To ward off the threat of contagion, the policy response in a number of these countries had been to tighten monetary and fiscal policy, with deflationary implications for the world economy.

4 Capital flows to the emerging market economies were thought to have largely come to a halt. In the short-run the Committee thought that this could put pressure on the exchange rate pegs of a number of countries, causing further financial instability. Assuming that the change in capital flows persisted, there would have to be a corresponding re-balancing of trade flows, with smaller deficits/larger surpluses in emerging market economies and bigger deficits/smaller surpluses in the industrialised world. This in turn would require a higher real exchange rate relative to the currencies of the emerging market economies.

5 The Committee noted that, unfortunately, the industrialised countries were not well placed to expand demand appropriately. Ideally the largest increases in demand would come in Japan and then continental Europe, with less change in the United States and the United Kingdom which were already experiencing strong domestic demand and increasing trade deficits. In Japan—which had cut interest rates on the first day of the meeting (9 September), guiding call money rates down by 25 basis points to just 0.25%—little progress had as yet been made in restructuring the financial system and achieving sustained growth in domestic demand. In continental Europe, attention was focused on the introduction of the single currency. National fiscal policy would be constrained by the Stability and Growth Pact, which might make any immediate expansionary policy response problematic.

6 In consequence, the Committee thought it was likely that the US and UK trade deficits would have to bear a large share of the burden, and that this could have exchange rate consequences. If the

US and UK trade deficits continued to get larger, then the dollar and sterling effective rates could come under pressure, despite appreciating against the currencies of emerging market economies. The dollar had already weakened significantly. The sterling effective exchange rate had appreciated sharply immediately following the Russian crisis, to reach a peak of 106.9, but had fallen back to 103.5 by the start of the Committee's meeting.

7 The financial market reaction had included a fall in the major world equity markets of 5%–10%, and the Ft-SE 100 index had fallen by around 10%. Committee members suggested that, in the aftermath of such events, it could be difficult for markets to establish new equilibrium prices, either for equities or for currencies. Consistent with this, there had been a marked increase in the volatility of asset prices. The Committee also considered that there might yet be further adjustment downwards in world equity markets, especially since price-to-earnings ratios remained high.

8 Market interest rates in the industrialised countries had fallen, consistent with a fall in expected future rates. This might indicate a degree of monetary easing. The expected starting level of official rates in the Euro-area, implied by future rates, had fallen from around 3³/₄% to 3.3% (the current level of official rates in France and Germany). In the United Kingdom, actual money market rates had fallen by one eighth of a percentage point for one-month London inter-bank rates, by one quarter of a percentage point on three-month rates and by half of one percentage point on twelve-month rates. Bond yields over one year had also fallen by up to half a percentage point.

9 One particular consequence of recent events was that world commodity prices were likely to remain weak, especially for oil. This in turn would put financial pressure on oil-producing countries at a time when OPEC was already struggling to agree reduced production levels. A reduction in oil and other commodity prices would constitute a change in the terms of trade, redistributing demand to the importers. It would also have favourable supply-side effects on employment and capital formation. In the medium-run this would be beneficial to world growth. However, based on what had happened when oil prices fell in 1986, the initial effect could be to weaken world growth if, as then, demand fell faster in the oil exporting countries than it rose in the importing countries.

10 The Committee considered the impact of all these developments on the outlook for world output and prices. Within the last month forecasts for Japanese output growth in 1998 and 1999 had been revised down substantially and forecasts for other G7 economies were also being revised down for 1999. The Committee agreed that weaker world demand growth would result in excess capacity. These conditions of excess supply should result in lower world inflation.

The policy implication of external developments

11 The Committee discussed its reaction to an internationally co-ordinated monetary policy response, should such a proposal emerge. The Committee would consider changing interest rates if that were consistent with pursuit of the domestic inflation target.

12 It was not clear, however, that a co-ordinated monetary easing was the appropriate policy response in current circumstances. On one possible view, the current crises in emerging market economies reflected problems originating within those economies and were not caused by excessively tight monetary policies in the industrialised economies. Although faster demand growth in, say, the OECD countries might help alleviate some of the symptoms, it would not solve the fundamental problems in Russia.

And any plausible changes in policy rates would be small relative to the rise in spreads engendered by the crisis. Another possible view held that the magnitude of the spreads might not be independent of the level of interest rates in the main industrial countries. A monetary relaxation could then be rather more effective.

13 The Committee noted that the different cyclical and structural situations in Japan, continental Europe, the United States and the United Kingdom would make a differentiated response more appropriate. For some countries an appropriate monetary easing might be to increase rates by less than previously thought likely, whereas for others it might be more appropriate to cut.

Domestic output and business surveys

14 The official GDP data for the second quarter and industrial production data for July were broadly in line with the central projection for output growth in the August *Inflation Report*. But the Committee noted that business surveys, particularly of manufacturing, had been weak for the second month running. Staff analysis of the surveys—matching the balances to actual growth rates—gave a mixed picture. Some survey data—such as expectations reported in the British Chambers of Commerce survey carried out in Q2—had been broadly consistent with continuing flat manufacturing output growth in Q3 and with services growth declining from strong rates, but still positive. In contrast some survey data—notably the CBI industrial trends survey and the CIPS (Chartered Institute of Purchasing and Supply) survey of manufacturing—clearly indicated negative manufacturing growth in the third quarter. In this context the July figures for manufacturing output—showing growth of 0.1% on the month—supported a somewhat firmer picture.

15 The Committee felt that the evidence was consistent with its central expectation of a further modest slowdown in output growth in the third quarter, with growth overall likely to remain positive. However, the Committee noted the weaker CBI evidence and also recalled the experience of 1990 when the official data released up to the Autumn gave little indication of the imminent sharp fall in output. The balance of risks to the short-run outlook for output remained on the downside.

16 The weaker surveys and the official data could be reconciled if it were the case that there was an unplanned build-up in stocks, delaying the reduction in actual output. The Committee noted that stockbuilding had made a third successive positive contribution to growth in the second quarter. The Committee decided to ask the Agents to investigate further what was happening to stock levels.

17 The Committee considered the growing evidence that the projected slowdown in demand growth was also materialising. The Q2 data suggested that domestic demand was slightly stronger than projected in the August *Inflation Report*, but this was entirely accounted for by stockbuilding. For Q3 the main indicators of demand were for retail sales, cars, consumer confidence and the housing market.

18 The British Retail Consortium data for August had indicated a continuing slowdown in annual retail sales growth, although quarterly changes in retail sales might be erratically strong after a weak second quarter. The CBI Distributive Trades survey for August was consistent with a slowing growth rate in retail sales. Some members of the Committee thought that the survey was not quite as weak as it might have been, given the weak expectations for August recorded in the July survey. Car registrations had been erratically weak in Q2 and the staff had indicated that there was likely to be some rebound in growth in Q3, but the CBI Distributive Trades survey indicated a weak August for the motor trades.

19 Consumer confidence had been weakening. The Committee noted that the deterioration was in large part due to sentiment about

the general economic situation rather than respondents' own financial positions. The housing market was also giving mixed signals but house prices were no longer accelerating and had fallen in August according to both the Nationwide and Halifax indices. Surprisingly, the net mortgage lending data had risen strongly in July but no firm conclusions could be drawn from one month's numbers.

20 Taking all the demand indicators together, the Committee concluded that there was evidence of continuing underlying slowdown in the third quarter.

Earnings growth

21 The labour market data for June had been somewhat surprising for both quantities and prices. Despite the slowdown in output growth, unemployment was continuing to fall on both the Labour Force Survey (LFS) and claimant count measures and the decline in LFS unemployment had been greater in the second quarter than the first. According to the LFS, employment was rising less quickly than unemployment was falling. The difference was explained by an increasing number of people becoming inactive. The latest Federation of Recruitment and Employment Services survey indicated that the labour market was continuing to tighten, albeit at a slower pace than earlier in the year. This picture was supported by the reports of the Bank's regional Agents.

22 In the context of an otherwise tightening labour market, a significant slowing in the annual growth rate of earnings had been surprising. The twelve-month rate had fallen to 4.5% in June from 5.3% in May. Within the total the growth of the 'irregular' pay component had been expected to fall back, and had done so, but the regular pay component had also fallen from 4.7% in May to 4.4% in June. Furthermore, the fall had occurred equally in both manufacturing and services. On the other hand, public sector pay growth had risen to 3.8%, sharply reducing the difference between private and public sector growth rates. And data on settlements continued to show an upwards trend.

23 There was no evidence that the earnings figures were being distorted by special factors but the Committee could not place too much weight on one month's figures. If further data confirmed a slowdown in earnings growth, that would be good news in terms of lower domestically generated inflationary pressure.

Monetary growth

24 The growth of broad money had been slowing during 1998, giving some support to the projection of a slowdown in nominal demand growth. But aggregate M4 growth had risen to 10.3% in the twelve-months to July from 9.3% in June. It was possible that these two months had been affected by seasonal distortions, but even taken together, the picture of a slowdown was weakened.

25 Narrow money growth had also picked up, with M0 growth rising from 5.8% in the twelve months to July to 6.2% in August. Although Notes and Coin growth rose by just 0.1 to 6.0%, both figures gave less support for an underlying slowdown in nominal demand growth.

26 As with the earnings data, the Committee could not place much weight on one month's figures. In this case, if further data confirmed strong rates of money growth, that would be bad news in terms of inflationary pressures (in the absence of a decline in velocity).

Retail prices

27 The Committee briefly reviewed the evidence on retail prices. Having peaked at 3.2% in May, affected by tax effects and other erratic factors, it was comforting that RPIX inflation had fallen back to 2.6% by July, only just above the target of 2.5%.

Staff estimates of the short-run influences on RPIX components suggested that inflation might be slightly lower over the next few months than projected in the August *Inflation Report*.

Consequences for the Committee's inflation and output projections

28 The Committee concluded that there had been relatively little in the data on the domestic economy that would change its projections. Demand and output growth seemed to be slowing in line with the August central projection although the risk of a faster slowdown had increased. The data on earnings would be good news for inflation prospects if sustained in the coming months, while continuing strong money supply data would be adverse.

29 In its evaluation of external developments it was clear to the Committee that there had been an increase in the downside risks to world activity, principally arising from the recent and possible future contagion of financial market crises in emerging market economies. Taking external and domestic factors together the balance of risks to inflation, which had been on the upside at the time of the August *Inflation Report*, had shifted towards the downside.

30 The Committee also concluded that the degree of uncertainty surrounding future world prospects had risen and this had been seen in increased market volatility.

31 The Committee further agreed that its expectations for world growth and inflation were now lower than at the time of the August *Inflation Report*. However, there was a range of views over whether developments so far should lead to any substantial change as yet in the central projection for UK inflation.

32 On one view, world events so far should cause only a small change to the central projection for UK inflation. Although it was possible to imagine any number of downside scenarios for the world economy, the Committee should not assume that the most extreme outcome was the central case. The most important economies for world activity and for UK exports remained the United States, continental Europe and Japan. Growth remained robust in the United States and domestic demand had been strengthening in the major EU economies, although the pace of expansion had been variable. Japan had weakened further. The Russian crisis and the widespread fall in equity prices were evidence that some of the downside risks identified earlier were now coming to pass but most of the concern over emerging market economies was in relation to possible future events rather than actual outcomes. And sterling had weakened since the August MPC meeting. Hence the central projection had shifted by less than the balance of risks.

33 On another view there had been a significant increase in excess world supply, which would lead to a prolonged deflationary effect on the world economy. The major world equity markets still had high price-to-earnings ratios and more price adjustment was likely. It was also possible that domestic activity was weakening faster than projected in August, under the influence of high interest rates and a strong exchange rate. On this view, recent external developments reinforced earlier concerns that inflation might undershoot the target and the central projection should be revised down by more.

The immediate policy decision

34 The Committee agreed that there had been a marked shift in its position since the August meeting. The balance of risks for its projection of UK inflation had been on the upside in the August *Inflation Report* and that balance had since shifted towards the downside, largely reflecting international developments. One consequence of these developments had been some correction in equity prices, but these still seemed high and a more significant adjustment might yet occur.

35 The out-turns for domestic data had been much as the Committee had expected, although there was common concern over the weaker signals from business surveys and a welcoming of the weaker data on earnings growth. There was broad agreement that the risks had at least shifted sufficiently to remove the balance on the upside of the August central projection of inflation. The discussion concentrated on whether there was a sufficient case yet for rates to be cut immediately, taking into account all the relevant external and domestic considerations.

36 On one view, the factors determining the central projection had not yet shifted sufficiently to justify a change in rates. If the forecast were to be revised, the balance of risks would clearly have shifted towards the downside and the 'hump' shape in the inflation projection for 1999 might be less marked, but any change in the central projection for inflation in the medium-term would be small. And the balance of risks might alter if rates were cut at the wrong moment. In particular, an early cut, which the markets might well take as indicating a change in the direction of rates, could lead to a sharp fall in sterling, which might more than offset the increased downside pressures on inflation from weaker world output and inflation. All Committee members nevertheless acknowledged the increased downside risks to the world economy and the possibility that domestic growth could be slowing more quickly than projected and indicated a willingness to move quickly should either possibility prove to be the case.

37 On a second view, although the outturns for official data on domestic activity were broadly as expected, business surveys were very weak for the second consecutive month, the equity market had come off the top and the correction might still have a long way to go. The change in the world outlook was also significant news. Taking these factors together there was sufficient evidence already to shift the central projection for UK inflation from above the target to below. On this basis, rates should now be cut by 25 basis points.

38 On a third view, there had already been a danger of undershooting the inflation target and the previous case for a cut in rates was reinforced. The full extent and timing of the reduction would be a matter of tactics but it should start immediately. Even after interest rates started to fall, sterling would be subject to upwards as well as downwards pressure, given the relative strength of the UK economy and investors seeking a safe haven from world events.

39 The Governor invited members of the Committee to vote on the proposition that the Bank's repo rate be maintained at 7.50% this month. Seven members of the Committee (the Governor, Mervyn King, David Clementi, Alan Budd, Charles Goodhart, Ian Plenderleith and John Vickers) voted for the proposition, and two (Willem Buiter and DeAnne Julius) voted against, preferring an immediate cut in interest rates.

40 After reaching its decision, the Committee decided to make a statement to reflect the shared view that, despite no change in interest rates, the balance of risks had nevertheless shifted since the August meeting.

41 The following members of the Committee were present:
Eddie George, Governor
Mervyn King, Deputy Governor responsible for monetary policy
David Clementi, Deputy Governor responsible for financial stability
Alan Budd
Willem Buiter
Charles Goodhart
DeAnne Julius
Ian Plenderleith
John Vickers

42 Gus O'Donnell was also present as the Treasury representative.

Annex: Summary of data presented by Bank staff

1 This Annex summarises the analysis presented by the Bank staff to the Monetary Policy Committee on 4 September 1998, in advance of its meeting. At the start of the Committee meeting itself, members were made aware of information that had subsequently become available, and that information is included in the Annex.

I International financial crisis

(i) World financial markets

2 The spread of US\$ denominated Brady bonds over US treasuries had risen from some 6 percentage points in July to around 15 percentage points by the end of August—similar to the level during the ‘Mexican crisis’ in 1995. Russian equity prices had fallen by two-thirds in dollar terms since the middle of July when its IMF loan was approved. That fall was much larger than in other emerging market economies, though Latin American equity prices had also experienced substantial falls during the month (30%–40%), and eastern Europe (20%–30%). Hong Kong equity prices were virtually unchanged since July. Emerging market exchange rate movements against the US dollar were generally small, except for the Russian rouble, which had depreciated by more than 50% since end-July.

3 One explanation for this turmoil was the weakness in commodity prices. Many of the affected countries relied on primary commodities as their main exports (for example, three-quarters of all Venezuela’s exports were oil, and half of Russia’s exports were primary commodities). Another possible explanation was a rise in the risk premia associated with emerging market debt default: spreads on foreign currency-denominated debt had risen significantly since Russia announced a package of economic measures on 17 August including a devaluation of the rouble, a freezing of its domestic debt market, and a 90-day moratorium on foreign commercial debts. Emerging market asset prices moved more closely together than usual during times of financial stress, which reduced the possibility of diversification. These problems may have been exacerbated by institutional and/or liquidity effects, with capital flowing out of emerging market economies to allow banks or investment houses to meet margin calls. There was evidence of this happening at the time of the Asia crisis in 1997.

4 The German banking system had a large direct exposure to Russia, though a good deal of this was backed by German government guarantees. The US banking system had a large exposure to Latin America. In the United Kingdom, banks’ largest exposures in emerging market economies were to Asia (\$55 billion out of around \$100 billion to emerging market economies in total at end-1997), most of which was with Hong Kong.

5 The yen had touched an eight-year low against the US dollar on 11 August of ¥147.6, but then started to appreciate as the likelihood of intervention was perceived to increase. More recently the yen had strengthened to around ¥135 at the beginning of September. Japanese firms appeared to be buying back yen to offset losses caused by weakness in Japanese asset markets ahead of the half-year-end reporting. And hedge funds, which had gone short of yen earlier in the year, were also said to have liquidated profitable positions to offset losses on emerging market economies. Despite Japan being a major commodity importer, the yen and commodity prices had fallen together during 1998; both seemed to reflect weakness in Asian demand.

6 The exchange rates of commodity exporters had continued to fall. For example, the Canadian dollar and Norwegian krone both

fell sharply in August despite rises in official short term interest rates in both countries. Some European currencies also experienced weakness. But the pressure did not move the prospective euro members’ forward exchange rates for 1 January 1999 much from their central parities.

7 The Deutsche Mark had appeared to soften initially following the Russian turmoil, perhaps reflecting concerns about the impact on the German banking system. But as these fears abated the US dollar had depreciated quickly against both the DM and other currencies as US equity prices fell sharply. This may have reflected views that the US economy was more sensitive to changes in equity wealth than other countries, as well as its greater vulnerability to events in Latin America.

8 Sterling initially rose following the Russian turmoil—with the UK effective exchange rate index increasing around 2½% to 106.7—as the United Kingdom was perceived to be relatively insulated from the emerging market problems. But as the market realised that concerns over the DM had been overdone sterling fell back, reaching DM 2.87 on 9 September, slightly below the rate at the time of the previous MPC meeting. But sterling was around 2 cents higher against the dollar at \$1.66.

9 Turning to domestic financial markets, these too had been influenced by the international turmoil as government bond markets in industrialised countries received a flight of capital from emerging market economies. This had dominated the effect of domestic data releases in the United Kingdom, though the earnings data were lower than the market had expected. Looking at the expected path for UK short-term interest rates, the main movement followed the fall in equities at the end of August and increased Russian turmoil. The market now seemed to expect an earlier and steeper fall in UK rates than previously. At the same time, expectations of rising rates in the US and Germany had receded.

10 Ten-year spot yields on government bonds had fallen in all of the G7 except for Canada (which had raised short-term interest rates); the fall in UK yields was in line with most others’ experience. In recent months the German and US yield curve had flattened and the UK curve had become more steeply downward sloping.

11 The recent falls in equity prices globally had been, in general, larger than the falls experienced during October last year when the Asian turmoil arose. The steep falls in US and UK equity prices at the end of August coincided with announcement of details of the Russian debt rescheduling on 26 August. Small UK firms’ share prices had fallen earlier and more sharply than those on the FT-SE 100 index.

12 Using a simple dividend discount model, it was possible to illustrate possible combinations of dividend yield, risk premia and implied real dividend growth which share price movements during the past month might imply. This suggested that the recent rise in dividend yield was consistent with only a relatively small rise in the risk premium and a small fall in implied real dividend growth. Direct survey evidence showed analysts expectations of corporate earnings growth had fallen slightly in August for 1998/99 but not for 1999/2000.

13 Implied volatility of the equity market had risen significantly since the August MPC. The implied risk neutral distribution for equity returns had become wider and the probability attached to very large negative returns had increased.

14 A selection of corporate credit spreads over government bonds in both sterling and US dollars had widened during the past month, and in some cases more so than they had following the start of Asian turmoil last year. Swap spreads (which partly reflect bank credit risk relative to government risk) had also increased considerably towards the end of August.

(ii) *The international real economy*

15 The US economy remained relatively robust. In the United States, consumption growth was slowing but remained strong, with nominal retail sales having grown 4.4% on a year earlier in July. The recent fall in consumer confidence, which was largely due to a deterioration in expectations of future economic conditions, suggested a further slowing in US consumption in the near future. There was some evidence of a split between manufacturing and services activity. Service sector activity and employment was growing more strongly than manufacturing, even after adjusting for the effects of the GM strike. This pattern had also been apparent in labour cost data and the National Association of Purchasing Managers' surveys.

16 Although French GDP rose by 0.7% during 1998 Q2, growth in the prospective euro-currency area as a whole was likely to have been a little weaker. That largely reflected weak German growth as the increase in consumption in Q1, caused by the impending VAT increase, unwound. Industrial production in the euro-area was also slowing. But industrial confidence remained strong with declines in Italy and Germany offset by improvements elsewhere. Retail sales continued to grow strongly and this was mirrored in continued improvements in consumer confidence.

17 The Japanese economy continued to weaken. Industrial production fell 9.3% in July on a year earlier, and with inventory levels still high, further cuts in production were likely. The Economic Planning Agency had indicated that GDP could fall in both the second and third quarters of 1998. Private consumption remained depressed. Real household spending fell 3.4% in July on a year earlier. There was little sign that the earlier economic packages were having much effect on activity. The ability of local governments to shoulder their burden of public works spending had been hampered by their fiscal deficits. Construction and housing starts continued to fall. However, Japanese exporters had managed to offset some of the fall in demand from Asia by switching to US and European markets.

18 The Russian economy had very limited trade links to Europe, accounting for 0.7% of UK exports and 1.1% of EU exports. The main risk for G7 economies from Russian instability therefore probably lay in financial market contagion. A world financial crisis would affect UK GDP and RPIX in three main ways. UK net trade could be adversely affected by lower external demand and a possible safe-haven effect on sterling. Domestic demand could be affected by changes in wealth and confidence. Last, import prices could fall due to weaker commodity prices.

II **Monetary conditions**

19 Aggregate M4 growth had risen sharply in July. The one-month growth rate was 1.4% and the twelve-month rate had risen to 10.3%, from an upwardly revised 9.3% in June. This strong outturn was partly accounted for by increased repo-market activity. Wholesale deposits had risen by 2.2% in July, and the twelve-month growth rate had risen by 1.2 percentage points to 18.3%. Retail deposits were also strong at 1.1% in July, following a weak outturn in June. However, the unusual pattern of retail inflows in June and July during the previous two years may have distorted the seasonal adjustment factors applied to unadjusted data in July 1998. The average one-month growth rate over June and July 1998 was 0.6%.

20 Sectoral data indicated that persons' deposits had risen by 1.1% in July and 6.7% on a year earlier, in line with the behaviour

of retail deposits. Looking at the institutional split of persons M4, twelve-month growth in building society deposits at 12% had continued to exceed bank deposits growth at 6.7%.

21 ICCs' deposits had grown by 0.9% in July and the annual rate of growth in 1998 Q2 had been revised up by 0.5 percentage points to 5.8%. Robust growth in OFIs' deposits of 2.8% in July had in part been accounted for strong repo activity. It had also been consistent with a recent Merrill Lynch-Gallup survey of major UK pension fund managers' asset allocation intentions which suggested the share of cash in LAPFs' portfolios had risen.

22 M4 lending had risen sharply in July following a weak June outturn. The one-month growth rate had risen to 1.1% from 0.4% in June and the twelve-month growth rate had risen by 0.7 percentage points to 8.5%. The sectoral breakdown indicated strong lending to individuals. In particular, total net secured lending had risen by 0.6% in July, the highest monthly rate since the series began in April 1993. Figures from the Council of Mortgage Lenders and estimates by Bank staff suggested that remortgaging activity remained robust. There was also evidence of a rising share of new business and remortgaging being undertaken at fixed rates. Unsecured lending had continued to rise strongly, with the twelve-month rate at 16.3% in July; the twelve-month growth in credit card lending had remained high at 25.7%.

23 M4 lending to ICCs had been flat in July, following a fall of 0.2% in June. But despite weak sterling bank lending, ICCs' total external finance had remained robust due to strong sterling capital issues and foreign currency borrowing. OFIs' borrowing had risen sharply by 3.3% in July on a month earlier, largely accounted for by strong reverse repo activity. The twelve-month growth rate remained generally weaker than in 1997.

24 Turning to the price component of monetary developments, most banks and building societies had now passed through the most recent rise in official interest rates and there had been little change on the month in retail rates. But fixed rate mortgages had risen for a second successive month despite a fall in swap rates.

25 The short-term RPIX expectations of outside forecasters with respect to a fixed end-point, as surveyed by Consensus Economics, HM Treasury and Merrill Lynch-Gallup, had nudged down in August. This had offset similar rises in July and had been in line with recent movements in current RPIX inflation. Forecasters' expectations for RPIX inflation at the end of 1999 remained fairly close to the inflation target.

26 In wholesale markets, expected three-month inter-bank rates implied by sterling futures contracts had moved down across all maturities since the previous MPC meeting. A profile of falling rates remained priced into short sterling futures, with the December 1999 contract implying nominal rates of close to 6%. Expectations of inflation in ten years time and real forward rates, as derived from index-linked gilts, had changed little over the month. But three-year real forward rates and inflation expectations, derived from index-linked gilts had fallen by around 30 basis points and 20 basis points respectively. There was also evidence that corporate bond and swap spreads over gilt yields had widened quite substantially during the month. If this were the case, the cost of capital for persons and corporates might be little changed overall.

27 Sterling had been volatile over the month but by 9 September the nominal effective exchange rate was just 0.6% lower than at the previous MPC meeting; the broad ERI, incorporating 49 currencies, had fallen by 0.1%. The forward path of the ERI implied by nominal interest rate differentials suggested a similar depreciation path to that incorporated in the August *Inflation Report*. UK and overseas forward interest rates had moved broadly together during August suggesting little net monetary news during the month. Evidence from the Consensus Economics survey of exchange rates had suggested that the sterling

risk premium had been rising in recent months. But the most recent survey on August 10 indicated a fall, perhaps consistent with a change in foreign currency risk premia in favour of sterling given concerns about financial fragility overseas.

III Demand and output

28 GDP at factor cost had grown by 0.5% in 1998 Q2, unrevised from the preliminary estimate. The expenditure breakdown had revealed a sharp slowdown in domestic demand growth, from 1.3% in 1998 Q1 to 0.6% in 1998 Q2. Prior to that, the slowdown in GDP growth had been driven by a deterioration in net trade. Net trade had deteriorated further in 1998 Q2, reducing overall GDP growth by 0.1 percentage point compared with 0.7 percentage points in 1998 Q1.

29 Within domestic demand: quarterly consumption growth had slowed to 0.7% in Q2, compared with 0.9% in Q1—annual growth had fallen to 3.8% from 4.9% in Q1; government consumption had grown strongly in 1998 Q2, by 1.1%; and investment had fallen by 1.9% in Q2. Overall, final domestic demand (domestic demand excluding stockbuilding) had increased by 0.3% in 1998 Q2. Stockbuilding had increased by £1.3 billion, contributing 0.3 percentage points to GDP growth—the third consecutive positive contribution. Typically a temporary build-up of stocks followed a slowdown in final demand. But at this stage, Bank staff felt the data might include a large quarterly alignment adjustment, so it was not clear by how much actual stockbuilding had risen.

30 Investment had fallen in 1998 Q2, following the large contribution from erratic components in Q1 (an oil rig, tube trains). Business investment had fallen sharply, by 5.5%. Excluding the less cyclical sectors (public corporations, oil and utilities) annual growth in business investment had fallen from 11.3% in 1997 Q4 to 1.1% in 1998 Q2. Service sector investment had fallen for the second consecutive quarter, though annual growth in service sector investment remained positive at 2.2% in 1998 Q2 and British Chambers of Commerce (BCC) survey investment intentions balances had remained relatively strong. Manufacturing investment had risen by 6.7% in 1998 Q2, though it had fallen by 1.9% on an annual basis. But investment data were volatile and prone to revision so it was too early to determine the pace of the slowdown in investment.

31 Following June's 1.5% fall, retail sales had grown by 0.9% in July, largely due to a 6% rise in clothing and footwear sales. Despite the volatile monthly pattern, a slowdown in demand remained evident: annual growth in retail spending had fallen to 3.2% in July (latest three months) compared with 3.6% in June. British Retail Consortium data showed that total sales values growth had slowed to 4.3% in the year to August but remained unchanged from July on a like-for-like basis at 1.5%. The growth rate of the official ONS series normally lay between these two figures. The August CBI Distributive Trades survey showed a further fall in expected sales balances, to +10 from +27 in July, below its average level since 1992 (+25). Car registrations had totalled 505,312 in August, a fall of 3.8% on the previous year. Private registrations had fallen by 7.2% on their level a year earlier.

32 There had been a rise in housing turnover during the summer: particulars delivered had increased in June and July though they remained 2% lower over the latest three-month period compared with the previous three months; and 6.7% lower compared with the same three months a year ago. A large rise in net mortgage lending in July had also pointed to higher turnover over the coming few months. But the House Builders' Federation survey had reported falling balances for site visits and reservations in July. And housing starts had fallen by 10.7% in the second quarter. House prices had fallen in August according to both the Halifax and Nationwide indices. Annual rates of increase had

moderated to 9.2% and 5.3% respectively, with three-month annualised rates of 6.0% and 5.4%.

33 Monthly trade data had shown a narrower goods deficit in June reflecting trade with non-EU countries, as the deficit with EU countries had widened. Both exports and import goods volumes (excluding oil and erratics) had increased in 1998 Q2, by 0.2% and 1.0% respectively. But exports to non-EU countries had fallen in July, as had imports. The puzzle regarding the continued growth of exports to EU countries following sterling's appreciation could be explained, in part, by the growth in EU markets over the period. The UK share of EU markets had been falling since 1997 H1 after rising for much of the period since the late 1980s. There had been a longer term decline in the share of non-EU markets which had recently intensified following the Asian crisis.

34 There had been little change in the output data since the preliminary GDP release. Services output had risen by 0.6% in 1998 Q2. New data on the more disaggregated components of output suggested that growth in the transport & communications and finance & business services sectors had remained strong at 0.9% and 1.0% respectively. But this had been offset by growth of 0.1% in the distribution and hotels & catering sector. Construction output had fallen in 1998 Q2 by 2.6%, leaving output 0.6% higher than a year earlier. Manufacturing output had increased by 0.1%, following two quarterly falls. Total industrial production had grown by 1.1%, boosted by large increases in energy (oil & gas) and utilities output following falls in the first quarter. GDP excluding primary sectors had grown by 0.2% in 1998 Q2 compared to 0.5% for total GDP. Manufacturing output had increased by 0.1% in July though level of output was little changed on a year earlier. Total industrial production had risen by 0.4%, reflecting higher gas and electricity output due to cooler than normal weather in July.

35 The continued contrast between the manufacturing and service sectors had remained evident in the latest business surveys. The August CBI Industrial Trends survey had recorded a further fall in the expected output balance: to -15 compared with -8 in July and -3 in June; and the Chartered Institute of Purchasing and Supply (CIPS) manufacturing survey had recorded another fall in its output index. The CIPS services survey showed continued growth in service sector activity in August though at a slower pace. Work undertaken in the Bank using a regression technique to generate growth rates based on the past relationship between survey responses and ONS data had suggested that recent BCC service sector responses were consistent with continued strong growth in service sector output in 1998 Q3. For manufacturing, the BCC survey was consistent with flat output in Q3. But the CBI and CIPS surveys were more indicative of a fall in manufacturing output in 1998 Q3.

IV Labour market

36 LFS employment had grown by 21,000 in the three months to June compared with the previous three months. That was slower than the average rate of growth over the past year. The CIPS survey for August reported continued employment growth in services but at a slowing rate, and falling employment in manufacturing, a picture which had been broadly corroborated by the Bank's regional Agents. The total number of hours worked had flattened off according to the LFS, implying a fall in the number of hours worked per person. That was consistent with data showing that employment gains over the past three months had been in part-time employment at the expense of full-time jobs. Further evidence of increasing demand for employees was shown by the Federation of Recruitment and Employment Services survey for August, though the rate of growth of jobs showed further signs of slowing.

37 The stock of Jobcentre vacancies increased by 1,900 in July, although the number of new notifications fell. The National Press

Recruitment Advertising index also rose to a new record in July according to NTC.

38 Turning to unemployment, both of the main measures had reported falls in the latest month. LFS unemployment was 62,000 lower in the three months to June than in the previous three months. The rate fell to 6.2%. That fall was mainly accounted for by falls in short-term unemployment (under twelve months), in contrast to falls over the past year which had been mainly in long-term unemployment. Claimant unemployment fell by 26,000 in July following a revised fall of 5,800 in June. July's data were probably affected by inappropriate seasonal adjustment. Before the Job Seeker's Allowance (JSA) was introduced, there had tended to be a rise in the unadjusted claimant count every July as students signed on over the summer, followed by a fall as they signed off in October. Since the introduction of the JSA the size of these flows had fallen. But the ONS seasonal adjustment package was still trying to adjust the data based on pre-JSA behaviour. Taking this into account, it was likely that unemployment was falling at an underlying rate of around 5,000 per month.

39 According to the LFS, there had also been a sharp rise in inactivity in the three months to June, which was entirely accounted for by people who said they did not want a job.

40 One feature of the recovery in the 1990s had been a sharp rise in temporary employment from around 5.5% of employees in 1992 to 7.5% in 1997. There was a possibility that the higher numbers of temporary employees may lead to a faster response of employment to changes in output. In a downturn this would imply a faster rise in unemployment and a faster abatement of inflationary pressure.

41 Turning to earnings, there had been a sharp fall in headline earnings growth (a centred three month moving average) from 5.4% in April to 5.0% in May. The monthly earnings index was 4.5% higher in June than a year earlier. As expected the ONS's measured contribution of irregular bonuses and PRP had fallen to 0.3% in June, similar to June 1997. The surprise had been in the outturn for estimated regular earnings. But earnings data were volatile, and more than one month's data would be necessary to infer a change in the trend.

42 The Bank's estimate of bonus-smoothed earnings—using the technique described in the August 1998 *Inflation Report*—fell from 5.2% in May to 5.0% in June assuming a continuation of current bonus growth, and from 4.9% to 4.7% assuming bonus growth slows to 10%. Over the coming months, the size of the irregular bonus contributions was expected to be relatively small: few firms pay bonuses between August and October. Headline earnings estimates may thus fall below the smoothed estimates for a time, reversing the pattern during the bonus payment period.

43 There had been a fall in private sector headline earnings growth from 6.2% in April to 5.7% in May, while the public sector increased from 2.8% to 3.2%. Headline earnings growth had fallen in both the manufacturing and the services sectors to 5.1% and 5.3% respectively.

44 Twelve-month wage settlements continued to creep upwards in July, although the Bank's mean settlement remained at 3.8% to one decimal place. There had been small increases in both private and public settlements.

V Prices

45 Commodity prices had continued to fall. The Bank's UK-demand weighted index had fallen by 1.4% in July (1.0% excluding oil) and by 13.7% in the year to July (16.2% excluding oil). Input price deflation had also continued. Manufacturers' input prices fell 8.9% over the year to July, and the CIPS survey indicator remained close to 40 (well below the neutral 50 level), as

it had done for the past two years. Manufacturers' output prices had remained at around the same level since early 1996.

46 According to Bank estimates, goods retailers were able to widen their margins in the year to 1998 Q2, despite a rise in unit labour costs.

47 All three headline measures of retail price inflation in the year to July were broadly in line with the August *Inflation Report* central projection. Annual RPI and RPIX inflation had both fallen 0.2 percentage points, from 3.7% to 3.5% and 2.8% to 2.6% respectively, as last year's increase in petrol price duty dropped out of the annual comparison. RPIY inflation, which excludes the effects of indirect tax changes, had risen from 2.0% to 2.1%.

48 Some indicators of RPI inflation during August had suggested that inflation might be lower than previously expected during the autumn. In particular, there had been evidence of downward pressures on food price inflation and second-hand car prices, both of which could be sustained in the short-term.

VI Reports by the Bank's Agents

49 The Bank's Agents had undertaken a survey of their contacts to give some insights into the pace of the slowdown in activity during July and August and the outlook for output during the rest of the year. The industrial composition of their sample was similar to the whole of the private sector.

50 In the service sector, 44% of companies reported no change in output during July and August compared with 1998 Q2. The proportion of firms reporting positive growth was balanced by those reporting falling output. The outlook for the rest of the year was slightly more sanguine, with the distribution of responses marginally skewed towards those expecting positive growth. However, responses from different parts of the sector varied considerably.

51 Output was weaker in manufacturing: 43% of those surveyed reported that output had fallen in July and August, while 50% expected lower output during the rest of the year. Net trade was highlighted by a majority of respondents across all sectors as the most important factor restraining output.

52 The Agents also reported on the results of more general discussions with their contacts. Business confidence was still being affected by events in Asia, though comfort was being taken by the strength in the European economy. Recent events in Russia and their impact on world financial markets had yet to have a significant effect on sentiment. Contacts had argued that there was a danger of talking the economy into a recession. Though the value of sterling was being talked about less as a negative factor, there were increasing instances of transferring some production offshore. The Agents were also being told that markets lost on sterling's strength, would not be easily won back if sterling fell in value.

53 Retailers noted that sales growth was falling. The used car market was weak as new cars were becoming increasingly competitive, but even that market was slowing. There were many non-price special offers, such as zero per cent finance, on retail goods as well as price-related deals, such as multiple purchase discounts. Contacts were concerned that these were not being captured by the RPI index. The housing market was weakening. The construction sector's output was flattening but not going into reverse.

54 Skill shortages persisted in IT, electrical engineering and construction. There were also reports of shortages of able unskilled staff in the service sector. Even so, many service sector contacts expected recruitment to slow and some could see a downturn in employment ahead.

Text of Bank of England press notice of 10 September 1998

Bank of England maintains interest rates at 7.50%

The Bank of England's Monetary Policy Committee has today voted to maintain the Bank's repo rate at 7.50%.

The Committee discussed extensively the potential impact of recent international and domestic economic developments on the outlook for UK activity and inflation. Although the Committee judges that the current level of interest rates is necessary to meet the inflation target, it recognises that deterioration in the international economy could increase the risks of inflation falling below the target. The Committee will continue to monitor these risks.

The minutes of today's Monetary Policy Committee meeting will be published on Wednesday 14 October. The minutes of the meeting held in August will be published on Wednesday 16 September.

Minutes of the Monetary Policy Committee meeting on 7–8 October 1998

1 Before considering the implications of the latest data for its immediate policy decision, the Committee discussed recent developments in the prospects for world output and trade; the risk of a credit crunch; movements in financial markets; the revised National Accounts data; and the labour market, including the correction to the earnings figures since May.

The external environment

2 The Committee began by discussing recent developments in the world economy. These could be broadly grouped under three main headings. First, the prospects for world output and trade had deteriorated over the month and the prospects of lower world inflation and weaker commodity prices had improved; second, the Committee discussed the risks of a credit crunch; third, financial markets had been particularly volatile and there had been significant changes in equity prices, interest and exchange rates.

(I) Prospects for world output and trade

3 The latest International Monetary Fund *World Economic Outlook* (IMF *WEO*) projection was for world output growth of 2.0% in 1998 and 2.5% in 1999, while world trade volume was projected to grow by 3.7% and 4.6% respectively. These projections were much lower than published in May, and they implied a sharp slowdown from 1997. There were considerable downside risks that world trade, and hence demand for UK exports, might be even weaker than the IMF was currently projecting for the rest of this year and 1999.

4 The outlook for activity in Japan had, if anything, deteriorated further since the September meeting, though the prospect of progress on banking reform seemed brighter and had been reflected in the level of the Nikkei.

5 Turning to the emerging market economies, the situation in some of the worst affected countries remained difficult, but since the election on 4 October capital outflows from Brazil in particular appeared to have fallen. The implications of further adverse news in Latin America would be serious for the world economic outlook, both because of the size of these economies and their financial links with other emerging market and industrialised economies.

(II) The risk of a credit crunch

6 The Russian default had led to a sea change in perceptions concerning the pricing of risk and the desire for liquidity. Spreads on emerging market debt were much higher than in the autumn of 1997, and were close to the levels reached following the Mexican crisis in 1995. Nonetheless, spreads on emerging market debt had fallen slightly during the month. There had been tentative signs that the financial fragility seen in the immediate aftermath of the Russian default might have been easing, but the problems at Long-Term Capital Management (LTCM) had led to a further reassessment by financial markets. In the United States, concerns had emerged that the deterioration in confidence was spreading beyond the financial sector and impacting on credit conditions faced by the industrial and commercial sectors.

7 In the United Kingdom, although corporate bond yields had actually fallen over the past year and over the past month, there had been a rise in the spread between the yield on corporate bonds and gilts since the previous meeting. Spreads were well above the level of a year ago, reflecting either an increased aversion to risk or a perception of greater risks. Bond issuance by UK companies would need to be monitored.

8 The latest monetary data showed fairly strong growth in bank lending to the corporate sector in August, but it was too early for the most recent developments to be reflected in the published data. Looking back over a longer period, the growth of bank lending to the corporate sector had slowed and may have been related to a slowdown in demand rather than a reduction in supply. Anecdotal evidence suggested that there was no across-the-board tightening of terms for small- or medium-sized corporate customers or households, although over a longer period there had been adjustments for companies exposed to emerging market economies.

(III) Movements in financial markets

9 The level of interest rates implied by the December short sterling contract had fallen around 25 basis points since the previous meeting, and 100 basis points since the high in mid-June. The fall implied by 1999 contracts was greater still. Gilt yields had also fallen. The fall in UK nominal government bond yields looked particularly striking when compared to the much smaller change in the yield on index linked gilts. The Committee noted that this could reflect a genuine downward revision of implied forward expected inflation rates—which should be considered alongside a possible global revision of inflation expectations. But at least some of it probably reflected liquidity or ‘flight to quality’ effects as portfolios were adjusted, and this part was likely to prove temporary.

10 Against the backdrop of a weaker outlook for the demand for UK exports than thought at the time of the previous meeting, the Committee assessed the 3½% fall in the sterling effective exchange rate since the September meeting. (Sterling was around 5% below the assumption used in the August central projection.) It was difficult to gauge the implications for RPIX inflation without identifying the sources of the depreciation, although the fall in sterling against the Deutsche Mark seemed consistent with movements in market expectations of future domestic and foreign short-term interest rates. The implied fall in domestic short-term interest rate expectations and the depreciation of sterling suggested that markets anticipated some degree of monetary easing, which could be already affecting decisions by companies and households.

11 The dollar had weakened over the past month against the Deutsche Mark and yen. The fall in US equity prices, and the US economy’s exposure to the most heavily affected emerging market economies, might have led markets to anticipate a fall in US interest rates relative to other industrialised economies. This would be consistent with some depreciation of the dollar. The dollar fell markedly against the yen during the course of the meeting.

12 The FT-SE All-Share index had fallen by about 10% since the September meeting, and was well below the July peak. The fall was particularly marked in the banking sector. The fall in the FT-SE over the past month had been more than that in the Dow Jones—though the movements in the two indices over the past year had been similar. A fall in equity wealth could have implications for permanent income and hence consumption, as well as the cost of capital and investment. Both would work in the direction of weakening the outlook for output and inflation, as would the recent moderation of house price inflation.

Activity and the revisions to the National Accounts

13 The National Accounts had been revised since the previous meeting, following methodological changes, rebasing and incorporation of new data. Although the new headline measure of GDP growth at market prices was little changed in the first half of

1998 compared with the previous estimate, growth in gross value added (formerly GDP at factor cost) was faster. The level of GDP on the headline measure had been revised up by just under 2% compared with the earlier estimates, and the average growth rate of GDP had been around 0.2% higher since the start of the decade. The revision to investment suggested that capacity was also higher than previously thought. This made it difficult to judge whether the revised data suggested that output was higher relative to the economy's productive capacity than previously thought. That would need to be assessed in the preparation of the November *Inflation Report*. On balance, revisions to the National Accounts did not significantly alter the Committee's view of prospects for demand, output and inflation.

14 Revisions to consumption suggested that growth had recently slowed more quickly than previously thought. But investment growth had been revised up, so that final domestic demand growth was only slightly lower through the second half of 1997 and the first half of 1998 than previously estimated. Even after revisions, the recent rise in inventories (stockbuilding) remained difficult to interpret. The Bank's regional agents had undertaken an informal survey which showed some signs of an undesired accumulation of inventories—especially in finished manufactures—and a desire to unwind those positions. There was a risk of a fall in inventories reducing GDP growth in the second half of 1998, but it was difficult to quantify. The contribution from net trade to GDP growth had been revised up in the second quarter, though it had been erratic from quarter to quarter.

15 The latest activity indicators for the third quarter appeared consistent with the August *Inflation Report* central projection. But looking forward, the prospects for demand and output seemed weaker than at the time of the previous meeting on account of both external and domestic news. The evidence from domestic consumer and business surveys was almost uniformly weak. The picture from the surveys was confirmed by the reports from the Bank's regional Agents which had shown a marked deterioration in business sentiment over recent months.

The labour market

16 There was evidence of continuing tightness in the labour market, with unemployment continuing to fall on both the LFS and claimant-count measures. Employment was still rising on the LFS measure, although hours worked had been flat. The lags between output and employment, and output growth having remained close to trend in the first half of the year, could explain why unemployment had continued to fall. Reports of recent job losses were likely to relate to the period after that covered by the latest data.

17 The Committee then turned to the corrections to average earnings growth for May, June and July announced by the ONS on 6 October. At the time of the September meeting, the extent of the fall in annual earnings growth between May and June had been surprising, and the Committee had concluded that if subsequently confirmed by later data it would be good news about domestically generated inflationary pressure. However, the subsequent correction of these figures meant that the fall in earnings growth was less sharp. But there was considerable uncertainty about the reliability of official data on earnings growth. The correction related to the treatment of new firms included in the sample from April 1998 onwards, which had lower levels of average earnings than the firms already in the sample. The number of new firms surveyed in some sectors appeared to be material. Even on the corrected data there remained a puzzle concerning the fall in the contribution from regular pay.

18 Given the correction, and the fact that these figures were likely to change again on 14 October when the ONS released rebased estimates of the Average Earnings Index, the Committee felt more uncertain than usual about the interpretation of the

earnings figures. The Committee also noted that there were no signs of a fall in settlements, which had continued to edge up on the twelve-month employment-weighted measure most directly comparable to the annual earnings growth figures.

The consequences for the Committee's output and inflation projections

19 Overall, the global outlook appeared weaker than it had a month ago, and the links from developments in emerging market economies to the industrial economies were becoming stronger and more apparent. In particular, recent developments raised the question of a credit crunch in the United States. There had been a flight to industrial countries' government debt from corporate debt, as well as from emerging market economies, with a resulting rise in spreads. The order of magnitude of the financial risks in the United States currently seemed greater than in the United Kingdom. It was not clear that the signs of financial fragility in global financial markets would persist. But even if signs of fragility dissipated, there could be significant effects on world activity from the fall in equity prices and the shifts in business and consumer confidence that had already occurred.

20 While there had been significant news affecting the outlook for activity during the month, there was no clear message from data on prices and costs. Inflation had turned out broadly as expected at the time of the August *Inflation Report*, and had remained surprisingly stable over recent years despite large movements in the exchange rate and activity. There was uncertainty concerning the news in the corrected earnings data. Furthermore, the Committee had to take into account the causes and effect of the depreciation of sterling since the September meeting.

The immediate policy decision

21 The Committee noted that it could take account of the analysis and opinion of outside commentators, but had to reach its own assessment, in line with its remit.

22 The Committee recognised that recent financial turbulence introduced new downside risks to the outlook for output in the industrial countries as a whole. That effect would be taken into account in the Committee's assessment of the prospects of hitting the inflation target in the United Kingdom. Moreover, an early reduction in UK interest rates might, following the easing of policy in the United States, help to reduce current turbulence in financial markets.

23 Although there had been little news in the GDP revisions and latest monthly indicators, the domestic survey evidence, together with the weaker outlook for world activity, suggested that the prospects for UK activity had deteriorated. The Committee concluded that the slowdown in aggregate demand was likely to be greater, and more protracted, than thought at the time of the August *Inflation Report*. The extent of the deterioration was uncertain, and would need to be quantified in the context of the November forecast round. Some of the relevant factors—such as developments in credit markets—were particularly difficult to quantify. Looking forward, the expected sharper and more prolonged slowdown in aggregate demand, together with the latest price and cost data, had probably reduced or removed the 'hump' in the central projection for inflation made in August, and increased the risk of inflation falling below the target of 2.5% looking two years or so ahead.

24 There was a tension between the ONS data, which showed the economy to be broadly on the track expected at the time of the August *Inflation Report*, and the weak survey data. It was difficult to know how much weight to place on the surveys.

25 One argument was that more weight should be placed on the published data than the recent weakness in surveys—which might

not persist. If some of the deterioration in sentiment concerning prospects for the world economy also proved to be overdone, the profile for UK inflation might not change significantly compared with the August *Report* central projection. On this view, the degree of monetary easing required at the present time was small, especially given the fall of sterling. But it was necessary to take into account market expectations of a loosening: taking no action might further dent confidence, thus increasing the downside risks to activity and inflation. These considerations pointed to an interest rate cut of 25 basis points.

26 Another argument suggested that the case for an interest rate cut was clearer. The weakness in surveys during the past few months now seemed uniform, and the sharp deterioration in sentiment was confirmed by the Bank's regional Agencies. It was difficult to discount this evidence and together with the overseas news it could significantly change the outlook for inflation. At the same time there had also been some easing from the fall in the exchange rate and short-term real interest rate expectations. These arguments also suggested that a reduction in interest rates of 25 basis points was warranted. There were, as yet, no clear signs of a credit crunch in the UK, but if they emerged, a larger cut in rates might be required.

27 On a further argument, the current conjuncture might warrant a larger cut in interest rates than 25 basis points. However, there had been a great deal of volatility in financial markets, and some of the current signs of financial fragility might dissipate. Moreover, it was difficult to form a quantitative view of how the deterioration in the world economy, GDP revisions, fall in sterling, earnings revisions and domestic survey evidence would affect the projection of inflation two years or so ahead. There was a risk that a large reduction in interest rates might have to be partly reversed. The best course, because of the uncertainties, was to cut interest rates by 25 basis points, and review the outlook in the context of the quarterly forecast round in November.

28 On a fourth argument, the deterioration in prospects for UK output were such that a 25 basis point reduction in interest rates

would be insufficient to stop a more substantial fall in output and rise in unemployment. Together with the likely further weakening of external prices, this would lead to inflation undershooting the target. Even without a credit crunch, the latest IMF WEO projections might seriously underestimate the extent of the slowdown in world trade and world growth. Therefore, the deterioration in the external demand for UK goods and services could be large. More weight could also be attached to the possibility of an inventory adjustment, and to tentative reports that domestic credit conditions were tightening. On this view the chances of a UK recession next year had substantially increased. The current level of real short-term interest rates was too high both domestically and in comparison with other G7 countries, and a reduction in interest rates of at least 50 basis points was required.

29 The Governor invited members of the Committee to vote on the proposition that the Bank's repo rate be cut by 25 basis points to 7.25% this month. Seven members of the Committee (the Governor, Mervyn King, David Clementi, Alan Budd, Charles Goodhart, Ian Plenderleith and John Vickers) voted for the proposition, and two (Willem Buiter and DeAnne Julius) voted against, preferring a larger cut in interest rates.

30 The following members of the Committee were present:

Eddie George, Governor
 Mervyn King, Deputy Governor responsible for monetary policy
 David Clementi, Deputy Governor responsible for financial stability
 Alan Budd
 Willem Buiter
 Charles Goodhart
 DeAnne Julius
 Ian Plenderleith
 John Vickers

31 Gus O'Donnell was also present as the Treasury representative.

Annex: Summary of data presented by Bank staff

1 This Annex summarises the analysis presented by the Bank staff to the Monetary Policy Committee on 1 October 1998, in advance of its meeting. At the start of the Committee meeting itself, members were made aware of information that had subsequently become available, and that information is included in the Annex.

I Financial markets

Foreign exchange

2 September had been dominated by cuts in US and Japanese interest rates and by market concerns about deteriorating credit quality in many overseas markets. The Bank of Japan had cut interest rates on 9 September, guiding call money rates down by 25 basis points to just 0.25% and the Federal Reserve had cut its target fed funds rate on 29 September, also by 25 basis points, to 5¼%. The dollar had weakened against the Deutsche Mark during the month, but had changed by less against the yen until 7 October, when it fell very sharply. Until then, the dollar's weakness had probably reflected a number of factors: falling equity prices; politics and policy; and events in Latin America. Most prospective EMU countries' currencies had been stable. But several other currencies, such as those in Scandinavia, had at times come under pressure, with bond yields falling by less than in Germany.

3 In effective terms, sterling had fallen from 103.3 at the time of the previous MPC meeting to 99.8 (at cob 7 October). It had fallen from DM 2.8670 to DM 2.7370 against the Deutsche Mark. Domestic economic data releases had generally had little effect on the pound. Early in the month, the press notice following the September MPC meeting had been seen as an important signal by the market. The apparent change in sentiment about UK interest rates—that they would fall further and faster—had probably accounted for much of sterling's fall.

Government bond and money markets

4 International events had affected domestic bond and money markets. Overall, bond markets had rallied strongly, as markets retreated from risk, and money market rates eased.

5 Domestic economic data releases had had little influence on the market. Short-term interest rate expectations had been correlated with changes in the FT-SE 100 during the month, as markets speculated about the potential response of the MPC to sharp falls in equity prices. Implied interest rates from three-month sterling futures prices for most of 1999 and 2000 had fallen by about 40 basis points since the previous MPC meeting. There had been less of a fall at the longer end of the money-market curve, with implied rates falling by around 25 basis points.

6 Market anecdote suggested that credit conditions had tightened in the wholesale interbank market in London. Unsecured interbank rates had widened a little relative to repo at three months, though less than in the fourth quarter of 1997. Bid-offer spreads in the gilt market had also widened over the month, and the long end of the gilt yield curve had been heavily squeezed. Implied volatility on options on three-month sterling futures and on the long gilt had risen sharply (though volatility on the three-month contract had fallen back in the days before the October MPC meeting).

7 The flight from risk had been accompanied by a sharp fall in gilt yields, particularly at the long end. Thirty-year gross redemption gilt yields had fallen to 4.38% (at cob 7 October), compared with 5.02% at the time of the previous MPC meeting. Because of the extreme market movements, it was more difficult

than usual to interpret the large fall in implied market expectations of inflation derived by comparing conventional and index-linked gilt yields. Index-linked bonds had underperformed over the month, largely because they were seen as less liquid than conventionals, and perhaps also because of supply effects (the prospects of an IG auction).

Corporate debt and equity markets

8 Equity prices had fallen sharply since the previous MPC meeting. There had been larger falls in continental Europe than in the United Kingdom or the United States (the Eurostoxx index had fallen by 16.5% while the FT-SE 100 had fallen by 9.1%).

9 The *financials* sector of the FT-SE All-Share index had fallen by 13% since the previous MPC meeting and the *general industrials* and *consumer goods* sectors by around 10%. Since the peak in the FT-SE All-Share on 20 July, the *financials* and *services* sectors had been the main contributors to the fall of 22.5% in the index. There had been more company profit warnings in September 1998 than a year earlier, with a greater proportion citing emerging market turmoil and weaker UK domestic demand as factors behind the warning.

10 Measures of the riskiness of corporate lending had increased during the month. Credit spreads over gilts for a range of UK companies had widened since the previous MPC meeting and £ and \$ swap spreads over gilts and Treasuries had increased further. Real borrowing costs on high-rated debt had probably risen over the month.

Emerging markets

11 There had been some improvement in emerging-market sentiment since the previous MPC meeting. And markets appeared to have begun to differentiate risks between countries and regions better.

12 Emerging-market US dollar bond spreads over US Treasuries had initially fallen to around 1,200 basis points from around 1,400 basis points at the previous MPC meeting but had since edged back up to around 1,300 basis points. The cost of US dollar borrowing remained some 800 basis points higher than prior to the Russian crisis. Local currency borrowing costs had also increased. And there was evidence of credit-rationing for some international banks in the London market.

13 Emerging market equity prices had recovered a little. This was principally because of gains in Latin America; stock market prices in Asia and Eastern Europe, including Russia, had remained relatively flat. Compared with other Latin American countries, Brazilian stock prices had weakened and bond spreads had widened, reflecting concern about Brazil's fiscal position, worsened by the rise in short-term interest rates.

14 The on-balance sheet exposure of UK banks to Latin America totalled \$21.5 billion in December 1997 (\$4.6 billion of which was to Brazil)—about one third of that of US banks. But these were likely to be lower-bound estimates, because they excluded off-balance sheet exposures and indirect exposures via other counterparties.

II The international economy

15 In the United States, consumption had risen by 4.7% in the year to August, despite recent falls in consumer confidence. But industrial production had weakened, even after adjusting for the

General Motors strike, and business confidence had fallen. In July, export volumes were 3.5% lower than a year earlier, and the trade deficit had continued to widen. Consumer price inflation was 1.7% in August, restrained by falling import prices (down by 6.4% on a year earlier).

16 In the prospective euro area, GDP had risen by 0.5% in Q2, down from 0.7% in Q1. This was largely because of special factors, such as strong German consumption in Q1 in advance of a VAT increase. Underlying growth had remained strong (GDP is estimated to have risen by around 3% in the year to 1998 H1) with more accounted for by growth of domestic demand. However, there had been a build-up of inventories in Germany and Italy, which surveys suggested was involuntary. And industrial confidence indicators for Germany and France fell in August. Consumer confidence continued to rise in the prospective euro area in July, but at a slower rate. Harmonised consumer price inflation remained subdued in August, at 1.2%.

17 In Japan, GDP had fallen by 0.8% in 1998 Q2, due to weak domestic demand. There was little evidence of the April fiscal stimulus in Q2: final public demand had contributed negatively to growth. According to the September Tankan survey, manufacturers' confidence had weakened further, and inventories remained above desired levels. Although broad money growth remained robust, both consumer and wholesale prices fell in the year to August (by 0.3% and 0.2% respectively). Bank lending to business also fell in the year to August (by 2.3%), and firms in the Tankan survey have reported that banks have become 'less willing to lend'.

18 For the G7 as a whole, the external balance seemed likely to reduce growth as demand in emerging markets slowed down. Eastern Europe as a whole constituted Germany's second-largest export market. The United States was particularly exposed to Latin America. Brazil alone accounted for 44% of Latin American output and 3% of world output. The IMF had revised down its projections for world growth for 1998 by 1.1 percentage points to 2.0% since May, and had also revised down its projection for G7 growth in 1999 to 1.9%. In particular, the IMF's projection of UK growth in 1999 had fallen by 0.9 percentage points since May.

III Monetary conditions

19 Notes and coin had grown by 0.5% on the month and by 5.7% in the past twelve months, after adjusting for the introduction of the new 50p and £2 coins.

20 The twelve-month growth rate of broad money had fallen to 8.8% in August, its lowest since September 1995. The £0.4 billion fall in wholesale M4 in August had more than accounted for the slight fall in aggregate M4 (£0.3 billion). Retail M4 inflows had also been weak, with the three- and six-month annualised growth rates falling back below 5%. Personal sector M4 had grown by only 0.2% over the month, and the twelve-month rate had fallen to 6.3%.

21 ICCs' M4 had again grown strongly in August. The three- and six-month annualised growth rates had been above 10%. By contrast, growth in OFIs' M4 had fallen in August, part of which had been accounted for by a fall in repo transactions following the large rise in July.

22 M4 lending had remained robust at 0.7%; the twelve-month growth rate had risen to 8.7% in August. Within the total, lending to persons had shown no signs of slowing.

23 Growth in total secured lending had been 5.8% in August, broadly in line with growth in the previous year. The number of loans approved for house purchase had fallen by 5,000 in August. Total unsecured lending had continued to be strong in August, at 1.5%. The twelve-month growth in net credit card borrowing had

increased further to 26.1%. The Bank's estimate of mortgage equity withdrawal had remained negative in Q2.

24 M4 lending to ICCs had been relatively robust in August. Data from the Major British Banking Groups suggested that the manufacturing sector had repaid debt in three of the last four months. ICCs' financial deficit had widened further in Q2, to £4.7 billion. However, within the total deficit, their net sterling recourse to banks (M4 lending minus M4 flows) had fallen, while their net capital issues and foreign-currency borrowing had increased.

25 M4 lending to OFIs had weakened in August; this had been accounted for by a fall in reverse repo transactions with the M4 private sector.

26 Turning to price indicators of monetary conditions, there had been little overall change on the month in retail interest rates. The rates on two and five-year fixed-rate mortgages had fallen slightly.

27 Estimates of short maturity real rates, derived using Consensus Economics short-term inflation expectations with a rolling horizon, had fallen by 42 and 34 basis points between early June and early September at the 12 and 24-month horizons, to 4.53% and 3.73%, respectively.

28 RPIX inflation expectations with respect to a fixed end-point, as surveyed by HM Treasury and Merrill Lynch, had fallen on the month; on the Consensus Economics survey, they had remained unchanged. Professionals' two-year spot inflation expectations with a rolling horizon, as surveyed by Barclays BASIX and Consensus Economics, had fallen between Q2 and Q3. Mean inflation expectations of the general public at 12 and 24 months ahead, as surveyed by BASIX, had risen slightly on the quarter. But this partly reflected an increase in outliers at the high end of the distributions: the modes of the survey distributions had both fallen, to 3% from 4%.

IV Demand and output

National Accounts revisions

29 The national accounts release for 1998 Q2 had been accompanied by substantial revisions to earlier data. These had resulted partly from a variety of statistical changes: the introduction of the new European System of Accounts (ESA 95); improved methodology for measuring government output at constant prices; rebasing to 1995 prices; the completion of the new Inter-departmental Business Register; the annual input-output reconciliation of the accounts for 1996; and re-balancing of 1989–95 data. In addition, there had been the usual revisions to the most recent estimates of growth based on new information.

30 Overall, the level of real GDP at market prices in 1998 Q2 was around 2% higher than had been previously recorded. This was concentrated on the latest ten years. Revisions prior to then had reduced the level of GDP, reflecting the introduction of ESA 95, the new European System of Accounts. But the impact on the annual growth rates in years before 1987 was not significant. Revisions to the latest decade were largely accounted for by new data and statistical changes other than ESA 95 or rebasing.

31 Investment spending was significantly higher than previously recorded over 1995–98. Only a small part of this had reflected the inclusion of new categories of spending, such as computer software, introduced as part of ESA 95. Rebasings to 1995 prices had reduced the investment deflator and so increased real investment between 1995–97, due to a higher weight being assigned to IT expenditure, where prices had been falling. Additional expenditure had also been recorded, following the use of

annual benchmarking surveys as part of the input-output reconciliation for 1996. As a consequence of these revisions to investment, the (real) business investment to GDP ratio was now higher than its previous peak in the late 1980s.

32 Consumption expenditure during the 1990/91 recession had been revised to be higher than had been previously recorded but had been weaker in recent years. Lower growth in spending on services and durables had been partly offset by stronger growth in non-durables spending. These changes had largely reflected information from new annual retail sales benchmarking surveys. Alongside revisions to household spending, there had also been downward revisions to disposable income and to the profile of the saving ratio. But these changes had largely reflected the re-classification of partnership income from the personal to the corporate sector.

33 Government consumption had grown at a faster rate in 1998 Q1 than previously recorded, partly because of changes to the measures of productivity growth. But this remained an area of uncertainty and measurement difficulty.

34 The overall trade picture had not been changed significantly by revisions, other than in the latest year. The current account surplus in 1997 was now recorded at £8 billion compared with £4.5 billion previously, largely owing to a higher services surplus. The constant-price trade balance (goods and services) had continued to fall in recent quarters, but less sharply than had been previously recorded, largely because of higher service exports. Goods exports and imports had both been revised upwards. Revisions to exports had increased the estimated UK share of world imports and particularly EU imports, but a large fall over the past year had remained evident.

35 On the output side of the national accounts, growth in services output had been revised upwards in 1996 and 1997, primarily owing to higher government services output. However, annual growth in services output in 1998 Q2 had been little changed at 3.8%, compared with 3.6% previously. Annual growth in manufacturing output had been revised to 0.7% in 1998 Q2, from -0.1% previously. And growth in 1997 had been revised down. A clear contrast remained between ONS and survey data in recent years.

36 It was noted that the revised data had, to varying degrees, resolved some of the puzzles in the data in recent years, particularly the relatively slow growth in investment prior to the latest revisions.

Recent data

37 In 1998, quarterly growth in GDP at market prices was unrevised at 0.5% in Q2 and 0.8% in Q1 (though annual growth had been revised to 3.0% from 2.6%, following stronger growth in 1997 than previously recorded). But domestic demand growth in 1998 Q2 had been revised from 0.6% to 0.3% and final domestic demand had grown by 0.1% in 1998 Q2.

38 Consumption had increased by 0.4% in 1998 Q2, compared with 0.5% in 1998 Q1. Services spending had fallen by 0.2%, having grown by more than 1% in the previous two quarters. Durables spending had also fallen over the quarter, mirroring weak car registrations data, while non-durables spending had grown by 1.1% after falling in 1998 Q1. The quarterly pattern of household spending had been very erratic in the past year, and the extent of the slowdown in the second quarter might have been exaggerated by relatively poor weather. Nonetheless, a slowdown in the growth of spending had remained evident.

39 Weak final domestic demand had also been accounted for by a 1.4% fall in investment in 1998 Q2. After an erratically high first quarter, business investment had fallen by 2.7% (revised up from -5.5%), of which -1.8 percentage points had been accounted for by a fall in private services investment.

40 Inventories had increased by £1,597 million in 1998 Q2, and by £777 million excluding the quarterly alignment adjustment. There had been a large increase in manufacturing stocks (+£357 million) and a second quarterly rise in retailing stocks (+£278 million). Overall, inventories contributed 0.3 percentage points to GDP growth in 1998 Q2.

41 There had been only limited data covering the third quarter. Retail sales volumes had risen by 0.4% in August, following July's revised 1.1% increase. There had been the first two consecutive monthly rises since mid 1997. Growth in 1998 Q3 was expected to exceed that in 1998 Q2, but with an underlying slowdown in demand remaining evident. Consumer confidence had risen slightly in September, to -2.8 percentage points in the GFK survey, though it had remained weaker than its level over the past two years. The MORI survey had weakened further in August, falling to -27 from -21 in July, well below its average level since 1992.

42 The housing market had continued to show signs of moderating. The Nationwide house price index had fallen again in September (by 0.2%), to 7.5% above its level a year earlier. The Halifax index had risen in September (by 0.3%), to 5.4% higher than a year earlier. Survey data had remained subdued. RICS balances for sales and stock of instructions per agent had both fallen in August. Instructions per agent had fallen to their lowest levels since the survey began (1986). Housing turnover, measured by number of particulars delivered, had increased for the third consecutive month, consistent with recent increases in lending secured on dwellings. But turnover had remained below the average level in 1997, and lending had fallen back in August from its high July level. The Housebuilders' Federation survey had continued to show lower balances for site visitors over the summer months (-7 in August). The net reservations balance had recovered to -3 in August from -17 in July, though it had remained below June's level (+1).

43 Manufacturing survey data had continued to point to a contraction in manufacturing output. The CBI Industrial Trends survey had recorded a further fall in the total order book balance: -36 in September, compared with -31 in August. Output expectations had remained negative: -13, compared with -15 in August. The CIPS survey showed manufacturing output falling for the sixth consecutive month, though the rate of contraction eased (46.8 in September up from 42.4 in August). More consistent with survey evidence, ONS data had recorded a fall in manufacturing output in August of 0.5%. But it had remained 0.3% higher in the latest three months than the previous three months. The CIPS report on services had recorded continued growth in incoming business (52.3), but at a slowing rate. And the outstanding business index was below 50 for the fourth consecutive month.

V Labour market

44 LFS employment had grown by 70,000 (0.3%) in the three months ending in July, compared with the previous three months. There had been no sign in the data that the rate of increase was slowing. The increase in employment in May to July had been almost entirely in full-time employment, a reversal of recent trends. But total hours worked were unchanged over the quarter, implying that hours worked per person had fallen (down by 0.3%), and were flat on a year earlier.

45 Interpretation of the LFS figures was made difficult by the fact that the latest data for the Workforce jobs measure of employment had shown a 124,000 (0.5%) fall in the three months to June, after two quarters of much faster growth than the LFS measure. Given the higher sampling variability of the Workforce jobs figures, Bank staff were inclined to place more reliance on the LFS figures, and there was some evidence that the latter may have been depressed by special factors around the survey date.

46 Turning to survey information, the CIPS September survey had shown manufacturing employment continuing to fall, construction employment growing marginally and employment in services still expanding, but at a slowing pace. This broad sectoral picture had been supported by Agents' reports. Looking ahead to the fourth quarter, the Manpower survey of recruitment intentions had suggested that the outlook for manufacturing employment had deteriorated further, but that overall employment prospects remained positive.

47 The stock of vacancies and new notifications had shown little change in August, but the stock of vacancies nevertheless remained high. There had been a further increase in national press advertising in August to a new record high, though the rate of growth had weakened. The FRES report had shown further strong increases in recruitment agency business in September, but there had been evidence of easing in its rate of growth, reflecting in particular weaker demand for engineering and construction workers.

48 LFS unemployment had fallen by 55,000 in the three months to July from the previous three months. The rate had fallen from 6.4% to 6.2%. This was a larger fall than in the previous three months, though lower than the average fall over the previous year. The claimant count had also fallen in August (by 16,000), taking the rate down by 0.1 percentage point to 4.6%. But while the July fall of 28,000 had been influenced by the lower number of young people signing on, there was no obvious special factor affecting the August count. There appeared to have been little impact from the New Deal so far.

49 The ONS had announced revisions on 6 October affecting the average earnings figures back to May, following the discovery that the introduction of new firms into the sample had induced a downward bias in the official figures. On the basis of the revised figures, headline whole-economy earnings growth in the three months centered on June was now 5.0%, down from 5.2% in May and 5.4% in April. Service sector headline earnings growth had fallen to 5.4% in June (from 5.5% in May) and manufacturing earnings had fallen to 5.0% (from 5.1%). While private sector headline earnings growth had fallen to 5.6% in June (from 5.8% in the preceding month), public sector earnings growth had risen slightly to 3.3% (from 3.2%). On the more volatile monthly measure, public sector earnings had fallen to 2.6% in July (suggesting the re-emergence of negative wage drift).

50 ONS estimates had suggested that, despite having fallen back since May, the contribution of irregular bonuses and profit-related pay to earnings growth had been higher than last year's contribution. The fall in earnings growth over the last few months had therefore partly reflected weaker growth in 'regular pay', which had dropped back from 4.6% in May to 4.5% in June and 4.2% in July (for the whole economy). The deceleration in regular pay had been difficult to explain. There was no indication of any slowdown in wage settlements. The twelve-month average of settlements in the whole economy had been 3.7% since May and the three-month measure had not been slowing. Nor, according to LFS figures, was there any evidence that hours had been lower than a year ago (which would have depressed average earnings, calculated on a per-head basis). However, there was some tentative evidence from the Reward group that overtime hours were weak in July and had subsequently risen. Other possible explanations of lower earnings growth—lower regular commissions and bonuses, compositional effects, etc—had been difficult to corroborate. The lack of a completely convincing explanation had made it difficult to distinguish between the competing hypotheses that regular pay had been erratically high in April, May and June or that regular pay had been erratically low in July. A further complication was that the data were to be rebased in October, with uncertain consequences.

51 According to the new national accounts, the level of whole-economy productivity in 1998 Q1 had been 2.6% higher than

previously thought. Unit wage costs in Q1 had been revised down by 1.6%, and unit labour costs by 1%. On the new data, whole-economy productivity growth had slowed to 1.8% in the year to Q2, from 1.9% in the year to Q1. And unit wage costs were up by 3.7% in the year to Q2, from 3.1% in Q1.

VI Prices

52 Commodity price deflation had been unusually persistent. The Bank's sterling commodity price index had fallen further in August, driven in particular by a fall in domestic agricultural prices. The *Economist* index had also fallen strongly in both dollar and sterling terms. More recently, the oil price had recovered somewhat, rising by 6.3% in sterling terms in September. But it was too early to tell whether this signalled the start of a period of sustainably higher prices. There had been some signs of a reduction in oil supply, with some US production halted by the two George hurricanes, and continued attempts by oil-producing countries and oil companies to support prices. But this had to be set against the prospects for slower growth in world demand.

53 Manufacturers' material input prices had fallen by 0.9% in August, leaving the price level 20.1% lower than in April 1996, the most recent peak. Excluding excise duties, manufacturers output prices were flat in August, giving annual deflation of 0.3%. The outlook was for a further weakening in output prices, with the CBI survey of price expectations pointing to further falls in the months ahead. The gap between input price inflation (-10.0%) and total output price inflation (0.5%) was close to historic highs. And output prices were still falling more rapidly in countries such as the United States and Germany.

54 There had been downward revisions to the rate of change of export and import prices. Goods export prices were now estimated to have fallen by 4.5% in the year to July, and by 10.8% between August 1996 and June 1998, compared with 7.6% before the revisions. And goods import prices were now shown to have fallen by 11.0% over the same period (compared with 10.1% before the revisions). This more sustained deflation was a little easier to reconcile with the expected impact of the appreciation.

55 Measures of annual domestically generated inflation had risen in Q2 as the result of new data and had been revised in earlier quarters following the changes to trade and National Accounts data. The measure based on RPIX excluding import prices was a little over 5% in Q2, and the measures based on the GDP deflator excluding export prices and on unit labour costs adjusted for trend productivity were both around 4%.

56 The GDP deflator at market prices rose by 2.4% in the year to Q2. Within this, upward revisions to the consumption deflator in the past few years had been offset by downward revisions to the investment, export and government consumption deflators.

57 The harmonised measure of consumer price inflation had fallen to 1.3% in August from 1.5% in July, and this was the lowest rate since the series started in 1996.

58 Annual RPIX inflation had fallen to 2.5% in August, in line with the August *Inflation Report* forecast. Much of the fall had been accounted for by the remaining part of last year's petrol duty increase dropping out of the annual comparison. Seasonal food prices had risen by 7.3%, the second-highest August rise since 1976. Apart from a small number of sector-specific shocks, recent inflation had been extremely stable: the standard deviation of RPIX inflation had reached a historic low over the past three years.

VII Reports by the Bank's Agents

59 The Bank's regional Agencies had conducted an informal survey of contacts on the recent behaviour of stockbuilding. They found that weaker-than-expected sales and orders had led to a rise

in stocks of finished goods among 40% of the contacts they had surveyed, particularly within the manufacturing sector. The picture was more mixed among retailers and distributors. Most firms surveyed were taking action to reduce stock levels, with many cutting back production. In the medium term, the introduction of better stock-control techniques meant that more than 70% of contacts had expected to see stock levels fall relative to sales in the medium term.

60 The Agents also reported on the results of more general discussions with their contacts. The slowdown in activity had

become more widespread and possibly more rapid. Manufacturing firms' experience was more in line with the CBI and other surveys than with the more buoyant ONS data. Services growth had slowed to below trend, with weakness now more widespread, affecting sectors such as pubs and restaurants. Retailing was more patchy, with activity generally flat, in line with the CBI distributive trades survey. The housing and car markets were both weak. The labour market had also weakened somewhat, with tightness more confined to specific areas. Looking ahead, contacts had become much gloomier in the previous few weeks. This could probably be attributed to the international outlook.

Text of Bank of England press notice of 8 October 1998

Bank of England reduces interest rates by 0.25% to 7.25%

The Bank of England's Monetary Policy Committee today voted to reduce the Bank's repo rate by 0.25% to 7.25%.

The international economic and financial environment has deteriorated since the Committee met in September. In the domestic economy, surveys and reports from the Bank's regional Agents have indicated a decline in business and consumer confidence. The outlook for demand and output has therefore weakened. Despite continuing tightness in the labour market and the fall in the exchange rate, the Committee judges that the risks of inflation falling below the target of 2.5% have increased and that a reduction in interest rates of 0.25% is now appropriate.

The minutes of the meeting held in September will be published at 9.30 am on Wednesday 14 October. The Committee has decided that it will in future publish the minutes of its monthly meetings on the Wednesday of the second week after each meeting takes place. The minutes of the meeting which ended this morning will therefore be published at 9.30 am on Wednesday 21 October. A fuller statement on the publication of the minutes will be released shortly.

Text of Bank of England press notice of 5 November 1998

Bank of England reduces interest rates by 0.50% to 6.75%

The Bank of England's Monetary Policy Committee today voted to reduce the Bank's repo rate by 0.50% to 6.75%.

Since the August *Inflation Report* was published, news about the international environment and the prospects for domestic activity have led the Committee to moderate its forecast for growth next year and to revise downwards its projection for inflation over the next two years. As a result, the Committee concluded that a reduction in interest rates of 0.50% was appropriate in order to maintain a path for inflation consistent with the target. The latest projections will appear in the *Inflation Report* to be published on 11 November.

The minutes of the meeting will be published at 9.30 am on Wednesday 18 November.

Glossary and other information

Glossary of selected terms

RPI inflation: inflation measured by the retail price index.

RPIX inflation: inflation measured by the RPI excluding mortgage interest payments.

RPIY inflation: inflation measured by the RPI excluding mortgage interest payments and the following indirect taxes: council tax, VAT, duties, car purchase tax and vehicle excise duty, insurance tax and airport tax.

HARP index: a price index that replaces the mortgage interest payments component of the RPI with a Bank estimate of the user-cost of housing.

THARP index: the HARP index excluding indirect taxes.

M0: notes and coin in circulation outside the Bank of England and bankers' operational deposits at the Bank.

M4: UK non-bank, non building society private sector's holdings of notes and coin, together with all sterling deposits (including certificates of deposit) held at UK banks and building societies by the non-bank, non building society private sector.

Divisia money: a measure of the money stock in which each component is weighted according to an estimate of its likely use for transactions.

Abbreviations

AEI: Average Earnings Index.

BCC: British Chambers of Commerce.

BRC: British Retail Consortium.

CBI: Confederation of British Industry.

CIPS: Chartered Institute of Purchasing and Supply.

DGI: Domestically Generated Inflation.

EFSR: Economic and Fiscal Strategy Report.

EMU: Economic and Monetary Union.

ERI: Exchange rate index.

ERM: Exchange rate mechanism.

ESA: European System of Accounts.

FT-SE: Financial Times Stock Exchange.

GfK: Gesellschaft für Konsum, Great Britain Ltd.

ICPFS: Insurance corporations and pension funds.

IDBR: Inter-Departmental Business Register.

IMF: International Monetary Fund.

HICP: Harmonised Index of Consumer Prices.

LFS: Labour Force Survey.

MORI: Market Opinion Research International.

MPC: Monetary Policy Committee.

NES: New Earnings Survey.

OECD: Organisation for Economic Co-operation and Development.

OFCs: Other financial corporations.

OFIFAs: Other financial intermediaries and financial auxiliaries.

ONS: Office for National Statistics.

OPEC: Organisation of Petroleum Exporting Countries.

PNFCS: Private non-financial corporations.

PPI: Producer Price Index.

PPIY: Producer Price Index excluding excise duties.

PRP: Profit-related pay.

RICS: Royal Institute of Chartered Surveyors.

WFTC: Working Families Tax Credit.

WTD: Working Time Directive.

Three-month annualised: the percentage change in a series over three months, expressed as an annual rate.

Glossary of new terms

(GDP at) market prices: Prices paid by the purchaser including transport costs, trade margins and taxes.

NPISH: Non profit making institutions serving households: non-market bodies serving the interest of households, eg charities.

Household final expenditure: Formerly known as consumers' expenditure minus NPISH.

Inventories: Formerly known as stocks.

Symbols and conventions

Except where otherwise stated, the source of the data used in charts and tables is the Office for National Statistics (ONS). The measures of inflation included in this *Report* have been adjusted by the Bank for an ONS error in under-recording RPI and RPIX inflation between February and May 1995.

n.a. = not available.

Because of rounding, the sum of the separate items may sometimes differ from the total shown.

On the horizontal axes of graphs, larger ticks denote the first observation within the relevant period, eg data for the first quarter of the year.

Other information

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