Outlook and appraisal

Overview

The outlook for the Scottish economy appeared fairly certain when the Commentary last reported in July 2007. Growth was expected to remain above trend in 2007 and 2008 at 2.5% and 2.3% respectively. Prospects for the economy in the medium-term were considered to be good. Almost one year later, the comparative certainty of last July has evaporated.

Since July, winds of change have swept through the world economy, which, along with more specific local developments, have had significant consequences for Scotland and its economy. In this Outlook & Appraisal we take a look at some of the issues that have confronted the Scottish economy over the last year and which are likely to have a significant bearing on future performance: the credit crunch; rising oil prices and commodity/food prices; Scotland's business birth rate; rising public spending and crowding out; the Scottish government's economic strategy

We then turn to a consideration of recent trends in GDP and Output, concluding with a detailed consideration of the outlook for the Scottish economy and summarises our forecasts. Growth in Scotland falls to trend this year of 1.9% and then slows further to 1.7% in 2009, picking up slightly to 1.8% in 2010 and returning to the 1.9% trend in 2011. Throughout this period net jobs continue to be created in the Scottish economy, although at fairly low rates, largely driven by the service sector. Unemployment is maintained at and below present levels. Scottish growth outperforms expected UK growth of 1.8% and stays just above UK growth of 1.6% in 2009. But in 2010 Scottish growth slips behind the UK again as the UK rate rises towards its trend at 2.5%. With UK growth now predicted to be around 2.6% in 2011, we think it unlikely on present

information that the Scottish government's target of parity with UK growth by 2011 will be met.

The levels of uncertainty as to future outcomes are very high indeed given present conditions in the world economy. There is a considerable downside risk that growth and inflation in both Scotland and the UK will be worse than forecast here.

Issues facing the Scottish economy during the past year

Credit crunch

The United States is teetering on the brink of recession with unemployment already rising and jobs growth minimal. This, in an economy that has proved to be a veritable job generation machine averaging 187,000 net jobs per month in the Clinton years and 102,000 monthly in the Bush years.

It is now well understood that the trigger events in the US slowdown stemmed principally from the housing market: ending of the house price boom; house price falls and higher interest rates; massive foreclosures in the sub-prime mortgage market; significant bank and hedge fund losses as the value of innovative investments based on sub-prime mortgages collapsed; and the subsequent drying up of liquidity in financial markets, or 'credit crunch' as it is now popularly known.

While in the short-term rising export demand, due to the much weakened dollar, appears to have offset the decline in residential investment in the US to the third quarter of 2007, the risk of a US recession remains as indicated by the recent job numbers. The credit crunch is spreading outside the financial sector because the willingness to lend to finance investment appears to be much reduced. And, the risks for the UK economy are much the same. The loss of trust occasioned by the sub-prime crisis has thrown a huge spoke in the wheel of the global financial system. Moreover, the credit crunch is exceptionally serious because, as the well-known economist Paul Krugman notes, the problem with the markets isn't just a lack of liquidity, as in many previous financial crises, there's also a fundamental problem of solvency that is still not fully identified.

The openness of the Scottish economy to trade and investment ensures that the winds of economic change blowing from the US are reaching our shores. Scottish banks have not been unaffected by the crisis as the write-offs and 'rights' issues pursued by the Royal Bank and HBOS indicate. Domestic consumption may also hold up better in Scotland because Scottish households tend to be less reliant on debt. House prices are holding up better here

protecting domestic asset values and the jobs market is still relatively buoyant. But this does not mean that the performance of the financial sector in Scotland will escape the effects of the sub-prime crisis, or that overall economic growth will be unaffected.

Scotland cannot be insulated from wider forces. What is still uncertain is the extent of the sub-prime losses in the global banking system and because of that the degree to which the financial system is pulling back from traditional lending activities. If that pull back is marked then there is little doubt that growth will slow considerably.

Rising oil prices and commodity/food prices

Since we last reported, households and firms are facing significantly higher energy, transport, and commodity, including food, costs. In July last year the price of West Texas Intermediate Crude was just below \$75, almost a year later the price had reached \$139. The latest BP Statistical Review of World Energy 2008 reveals that the oil price has been on an upward path for the last six years, the longest period of rising prices since records began in 1861. But the acceleration has come over the last 18 months.

Rising oil and commodity prices produce both a price and income effect: they are a potential source of higher inflation and because demand is fairly unresponsive to prices rises they lower real incomes, reducing the demand for other goods and services and so lead to income and output reductions generally. The National Institute for Economic and Social Research (NIESR) in their latest Economic Review estimate that a permanent \$10 dollar rise in oil prices will lower UK output by an average of 0.12% per annum between 2008 and 2011 and by 0.34% between 2012 and 2018. Hence it would appear - on our, not NIESR, calculations - that a permanent rise in the price of \$100 would lower output by about 1% per annum over the next three years and by around 3% per annum in the later period. Clearly, if correct, that would lead to zero or negative growth, in the absence of countervailing behaviour such as significant energy substitution.

What is clear from such a simulation is that the level and duration of the oil price matters to our economic well being and so from a forecasting standpoint it is important to have some understanding of the likely course of oil prices. And in answering that question we need to establish the extent to which the higher price will be a permanent feature and at what level it will stabilise.

The mainstream view is probably that the rising oil price principally represents fundamentals. That it is it is a reflection of demand outstripping supply. The rapid recent growth of the Indian and Chinese economies is considered to have pushed demand above supply. The BP Statistical Review of World Energy points out that global energy demand growth in 2007 was above the average for the fifth

year in succession. For various reasons energy supply has struggled to respond despite the significant reserves of oil, gas and coal.

On this argument energy prices and oil prices in particular will remain high and rising until consumers and producers respond to the price signals, with substitution and investment in favour of more energy efficient production processes, new production, new technologies and new energy sources such as wind, wave, solar and nuclear. Given the time that such responses are likely to take very high energy prices would appear to be with us for a long time.

One issue that appears to be neglected by those punting the view that the oil price very largely reflects fundamentals is that demand is being artificially supported by fuel subsidies, primarily in Asia, which keeps the price at the pumps artificially low. These subsidies are beginning to be called into question by several of the governments offering them because of their rising cost. Both Malaysia and India have begun to reduce subsidies, but it appears less likely that China will follow suit given its commitment to economic growth. Nevertheless, some demand destruction will ensue as the subsidies start to unwind. Further demand destruction will occur as growth in the world economy slows due to the rise in oil prices and the credit crunch.

But there are strong arguments that the rise in oil prices, especially over the last year, does have a significant speculative element, which in part cannot be divorced from the effects of the fallout from the problems of sub-prime and the credit crunch.

Many investors in the commodity markets trade indexes, which are a composite of various commodities in different percentages. The amount of funds invested in these products, including oil futures, has grown exponentially in recent times. This means that there is much more speculator money in the market. It is very important at the current time to understand the interaction between the oil and financial markets. When times are hard many people turn to real physical assets as a means of investment. The effect of the sub-prime crisis and the credit crunch is that investors have lost faith in complicated financial products and started to invest/diversify into commodities in general including oil futures. But for various reasons this process should unwind and the oil price will peak as speculators cover their positions. A peak to the oil price may also be reached as the balance of supply and demand adjusts.

The key issues then are: at what level is the price of oil likely to peak? When? And to what level will the price adjust? Goldman Sachs contends that oil prices may go to \$200 a barrel by the end of 2008. Recent suggestions from the head of Gazprom that the price will go to \$250 seem out of line with market expectations. Our judgement is that a peak will be reached in the next twelve months with the price moving down towards a more sustainable level with \$80 or

\$90 per barrel most frequently mentioned. But we have no basis for judging the timescale over which such a movement would occur.

Scotland's business birth rate

December 2007 saw publication of the latest Global Entrepreneurship Monitor (GEM) Scotland report from Strathclyde University's Hunter Centre for Entrepreneurship. The report provided disturbing reading.

On the GEM index of total early stage entrepreneurial activity (TEA) Scotland in 2006 ranked 6th bottom, or 37th top, from 42 sovereign nations plus Scotland. This compared unfavourably with the position in 2005 where Scotland ranked 14th bottom, 22nd top, from only 35 sovereign nations plus Scotland.

However, the report argued that the slippage in Scotland's relative position in 2006 was something of an illusion, because many nations have TEA rates around 5%. Moreover, while a rate of 4.2% in 2006 compared to 5.8% in 2005 resulted in an appreciable fall in Scotland's international ranking there was no statistically significant change in Scotland's rate relative to those other countries. Scotland's TEA rate in 2006 was not statistically different from its rate in 2005 but the rate is now significantly lower than the UK estimate of TEA for the first time in four years.

The GEM Scotland team were nonetheless sufficiently troubled by these findings to look at other proxy measures of new firm formation for the period. The data on business bank account openings published by the Committee of Scottish Clearing Banks showed no evidence of a decline in new enterprise activity in 2006. Moreover, the data on VAT registrations – a well-used proxy for new firm creation – shows an increase in starts between 2005 and 2006, with the rise greater in Scotland than in the UK.

So what are we to believe? If we prefer the CSCB and VAT data then this would not appear to augur well for the TEA statistic. If we accept the TEA data then we need to account for the deterioration. Moreover, all data sets imply that the business birth rate in Scotland remains low, which requires explanation in itself.

The current GEM Scotland report focuses in on their evidence that fear of failure is a major barrier to start up amongst Scots. The report effectively debunks the myths that most new starts are doomed to fail and that business closure and business failure are the same. Using VAT data the report demonstrates that only about 10% of businesses have deregistered after one year, with 10% per year going thereafter. Yet, this still means that more than half are gone after five years. Is not a fifty/fifty survival rate at five years a sufficiently daunting prospect to deter many would be Scottish entrepreneurs?

GEM Scotland's answer to this question is that deregistration and closure are not synonymous with business failure. The report points to evidence that the 'failure' component in closure rates is actually quite small. For example it provides data from a tracking study of new Scottish companies that business mortality was around 1.5% in the first year and averaged 11% to 12% after three years, significantly less than the deregistration rate for that period.

Yet, it seems unlikely that such fears explain the apparent deterioration in the Scottish firm formation rate as measured by TEA. Nor would fear of failure appear to be sufficient in itself to account for Scotland's historically low business birth rate. The myths about failure are clearly general and not simply confined to Scotland.

However, the report does suggest an indirect route through which fear of failure might inhibit new starts. Bankers may take the view that new firm lending is more high risk than it actually is if they believe that failure rates are much greater than in practice. In such circumstances the cost of start up funds may be greater than it could be or less funding may be made available.

The Scottish banking sector has made a strong case that funds are available to new start entrepreneurs that have appropriate business ideas and start-up skills such as ability to write business plans. They would contend that a low Scottish business birth rate is not a problem of the supply of finance but rather a problem of lack of suitable opportunities and hence demand.

Yet, academic research suggests that bank lending to new starts in the UK might be greater in areas and regions with higher rates of home ownership. If correct this implies that banks prefer to lend to founders using houses as prime collateral, which would be a classic market imperfection that should be addressed by policy or the banks themselves. Much finance for new starts comes from friends and family and not the formal financial sector. But with Scotland's home ownership rate still much below the rate in England and the south, institutional limits on the supply of appropriate finance to new starts may still be one factor in Scotland's low business birth rate.

Rising public spending and crowding out

During the year the Scottish Parliament approved the Government Budget. While, quite properly, there was much discussion about the size of the increase and specific spending proposals there was little or no consideration in the Parliament or in the media of the question whether the scale of public spending in Scotland is damaging our economic growth.

It is clear that there are many people in Scotland who view the level of public spending in Scotland with some concern.

Many argue that with public spending amounting to 52% of GDP compared to around 41% in the UK, funds and resources are being diverted from more productive private sector use to the detriment of economic growth. We have discussed this issue in the Commentary before but it is worth reprising the arguments.

How valid is this argument about the crowding-out effect on the private sector of high public spending in Scotland?

We can't say with certainty that the argument is invalid, but we can say that it is dubious. It is dubious because public spending in Scotland is higher than in UK because the UK taxpayer funds it. It is therefore wrong to claim that over half the economy is absorbed by public spending. What is more relevant is the tax burden of 37% (2005 data). Hence, the fiscal crowding-out effect on the private sector of this 37% tax burden will be no different from the UK since the tax structure and the tax burden are the same in Scotland and the UK.

But is this tax burden likely to produce crowding-out effects in both Scotland and the rest of the UK?

There is little doubt that, other things remaining equal, very high tax rates serve as a disincentive to effort and enterprise. But there is a question as to how 'high' is 'high'! Moreover, other things are not equal. If high taxes are associated with high amenity provision through public spending e.g. good public transport facilities, an efficient health and education service etc., then incentives may not be damaged. Individuals may be content to take a return that comprises a social as well as a private wage. This appears to be the case in Norway (taxes 44% of GDP rank 6th on tax, and 7th on growth) and Luxembourg (39% of GDP rank 11th on tax, and 4th on growth). And the tax burden there is certainly higher than in Scotland and the UK, which at 37% rank mid-table (15th) from 30 OECD countries in 2005 by tax burden (tax revenues to GDP) and 12th and 11th respectively, by growth. Conversely, Switzerland (30% tax burden ranking 25th from 30) and Japan (27% tax burden ranking 26th from 30) have low taxes but also fairly low growth. (GDP per head growth from 1990 to 2004 ranking 29th Japan and 30th Switzerland from 30 OECD countries.)

Recent survey evidence from researchers in Austria (Handler et al) on the optimal size of the public sector, suggests that overall crowding out effects only occur when own-financed public spending amounts to around 40% of GDP - a figure above, although close to, the tax burden in Scotland and the public spending ratio in the UK.

Yet, since Scotland runs a large fiscal deficit compared to the UK can this cause crowding out and lower growth? The answer must be no, because Scotland shares the UK interest rate, which is influenced by net borrowing at the UK not the Scottish level. Finally, on public spending, if it is higher per head in Scotland than in the UK won't that lead to prices and wages being bid up here to the detriment of the competitiveness of the economy? The answer to this is, yes, at least initially, but not necessarily to the overall detriment of growth. Model simulations at the Fraser of Allander Institute discussed in a previous Commentary suggest that the positive effect of higher public spending on demand and output outweighs the negative effect of higher wages and input prices on private sector output. Moreover, since markets tend to adjust more effectively between regions and countries that are part of a stable monetary union, resources flow readily in response to price and quantity signals. Hence, any pressure on price and supply due to the increased public spending is eventually eased.

So, evidence at the national and international level that high levels of public spending may be associated with slower growth, is probably not as relevant at the sub-state level because of the ease with which supply can adjust through in and out-migration of resources.

Are there routes other than taxation, spending and interest rates, through which the size of the public sector may crowd-out private sector activity and reduce growth even at the sub-state or regional level?

The answer to this question is also, yes.

One key route is the effect of the role of the public sector as a producer. The public sector currently (3rd Quarter, 2007) accounts for 23% of employment in Scotland compared to 20% in UK; this is much less than the 52% share of public spending in GDP. So, the public sector as a producer is larger here than in the UK but not dramatically so.

Why should a large public sector producer serve to crowdout private sector activity and reduce growth?

The main possibility for a negative effect would appear to be if workers diverted into the public sector become less entrepreneurial. There is international evidence from the south of Italy (Alesina) that the scale of public employment has damaged entrepreneurial activity. But our work in the Centre for Public Policy for Regions on new firm formation in Britain suggests a positive relation between public sector share and the business birth rate. Moreover, Henley and Thomas (2001 – Regional Studies) found a weakly positive relationship between public sector employment growth and private sector employment growth across the British regions. The relationship was more strongly positive in Scotland and the North of England. The jury is, therefore, still out on this issue.

Other international research by Afonso and others finds that the performance and the efficiency of the public sector itself are negatively related to its scale. This might imply that the previous Scottish Executive and the current SNP Government's drive to improve performance and efficiency,

while welcome, may ultimately run up against the diseconomies of scale that may be the inevitable outcome of a large public sector.

And one final point. The latest international econometric research on government expenditures and economic growthⁱ published at the end of 2007 in the journal Fiscal Studies, by Pak Hung Mo of Hong Kong Baptist University, offers an interesting finding. His work suggests that government consumption expenditures have a negative impact on economic growth while government investment outlays have a positive impact. Hence, a reallocation of 1 percentage point of government consumption to government investment raises the GDP growth rate by 0.38 percentage points – so a 3% point reallocation would raise growth by 1.1 percentage points. This evidence would appear to underline the significance of the debate about the nature, scale and funding of public investment in Scotland.

In summary, what can be said is that there is little or no theoretical or evidential support for increasing the size of the public sector and spending in Scotland. But there may be a case for cutting it, on efficiency grounds at least, and for considering some rebalancing in favour of investment to encourage a more favourable outcome for economic growth.

We should end this section on public spending by stressing two caveats. First, this whole area is subject to measurement issues and the tendency to fail to compare like with like. Secondly, most of the academic evidence on the relation between the public sector and economic growth is for sovereign states and not for region or sub-state entities. Since regions are more open, supply can adjust much easier through the in and out-migration of resources making crowding out effects due to resource constraints less likely.

Scottish government's economic strategy

In November 2007 the Scottish government launched its economic strategy.

Before devolution in 1999, Scotland benefited from UK economic policy initiatives and regional policy in particular – the massive inflow of inward investment in the electronics industries in the 1980s and 1990s being an example. And Scotland also profited from the activities of the enterprise agencies, with many of their policies regarded as state of the art far beyond our shores. But there was a lack of strategic thinking about the Scottish economy.

The publication by the first Scottish Executive coalition of a Framework for Economic Development in Scotland (FEDS) in June 2000 changed all that.

FEDS specified the vision underpinning the Executive's desire to stimulate economic development, the perceived drivers of growth, specific outcome and enabling objectives,

the role of economic development policy and the interrelationship with other policies.

In February 2001, further flesh was put on the bones of FEDS with the launch of Smart Successful Scotland which sought to focus the enterprise networks on the challenges confronting the Scotlish economy: productivity, entrepreneurship, skills and digital connections. To aid monitoring, performance indicators formed the basis of an annual exercise, outsourced to external consultants, and published as Measuring Scotland's Progress towards a Smart Successful Scotland.

This exercise, on balance, identified clear progress in entrepreneurship, spending on R&D, skills and learning enhancement, and in developing global connections. But there was no clear improvement in Scotland's long-term rate of growth, which stands at 1.9% per annum for the period 1976 to 2006 compared to 2.3% in the UK.

Development policies do take a long while to work and so the jury must remain out on the previous Executive's approach to Scotland's economic development. Nevertheless, against this background the new economic strategy should be both welcomed and assessed.

Interestingly, a close reading of the new strategy suggests that it has more similarities than differences with its predecessor. There is some shuffling of the conceptual and linguistic pack but both approaches seek to raise Scotland's growth rate and seek to do so by encouraging faster productivity growth. The perceived drivers of productivity are almost identical: investment, skills, R&D/innovation and enterprise. Little if anything is new here.

It might be argued that the adoption of specific targets for growth is an improvement on FEDS, which eschewed targets because of the undoubted difficulty of precisely linking policy inputs to the growth of a complex national economy. A task that is much more difficult than that facing a company seeking to target faster growth; and we know how difficult that in itself can be!

The Scottish government's primary aim is to raise Scotland's GDP growth rate to the UK level by 2011 and to match the growth of the small independent EU countries by 2017. This might appear to provide a clear means of judging the success of the strategy. But on what basis is Scotland to match such growth? Is the target to shift Scotland's long-term annual trend rate of growth to match the UK trend by 2011, or will one or two quarters of comparable growth around 2011 do? The latter is a much less stringent requirement than the former as the recent matching of Scottish and UK quarterly growth rates indicates.

Where the strategy clearly has made progress is in the adoption of some of the research findings and evidence that post-date the FEDS and SSS documents. So, a greater emphasis is placed on providing greater support for pre-

school and early learning. There is more recognition of the importance of tapping into international knowledge flows and technology transfers. And there is a proper appreciation of the role of cities in economic development. All of this is to be applauded.

Unfortunately, we are not offered much in the way of new policy initiatives to stimulate the drivers of productivity and growth. It is clear that the government believes in the power of competitive taxation to promote economic development but offers no radical proposal to significantly cut nondomestic rates. The strategy does argue for a lower rate of corporation tax in Scotland compared to the UK but bemoans the absence of full tax raising and spending powers in Scotland. However, the creation of a Council of Economic Advisers should also be viewed as a key strand in the new strategy. Staffed by an array of distinguished economic and business talent, many from outside Scotland, the Council can be viewed as an important innovation from the Government. It offers the prospect of interesting new policies being developed to raise Scotland's trend rate of growth. One problem though is that the policy benefits from the creation of such a body are likely to take some time to come to fruition.

GDP and Output

Trends since 1998 and 2005

The Scottish economy, in terms of gross value added (GVA), or GDP at basic prices, performed strongly during 2007, with growth above trend in the final three quarters and above UK growth in the second half of the year – see Figure 1. The growth of UK GDP weakened in the second half of 2007 to 0.63% per quarter, which is below its quarterly growth trend of 0.68% since the first quarter of 1998 – see Table 1. The Scottish economy does tend to perform better relative to the UK when the UK economy is slowing and last year proved to be no exception.

Nevertheless, Scottish growth did strengthen last year both absolutely as well as relatively. During the last three quarters of 2007, quarterly GVA growth averaged 0.78%, compared to the trend quarterly average from the first quarter of 1998 of 0.51%. Indeed, the data show that Scottish growth has been on an upward trend since the first quarter of 2005, with quarterly growth averaging 0.61% compared to an average of 0.47% between 1998Q1 and 2005Q1. This trend improvement did not occur at the UK level, where quarterly growth averaged 0.68% between 1998Q1 and 2005Q1 and 0.69% since 2005Q1.

The improvement in Scotland's growth performance since the beginning of 2005 is evident in both services and manufacturing – see Figures 2 and 3 and Table 1.

From 2005, manufacturing began to shake-off the some of the problems posed by the recession in electronics in the

early years of the decade. Quarterly growth in manufacturing averaged 0.18% from the first quarter of 2005, compared to an average quarterly contraction of -0.41% between 1998Q1 and 2005Q1. This marked improvement in the performance of manufacturing accounts for about half of the improvement in overall Scottish GVA between the two periods.

The improved performance of the much bigger service sector, where growth averaged 0.70% to 2005Q1 rising to 0.81% thereafter, accounts for the other half of the improvement in overall Scottish GVA between the two periods. It should be noted that the other principal sectors, construction, electricity, gas & water, mining & quarrying and agriculture – accounting together for around 12% of overall Scottish GVA – experienced deterioration in their trend performance between the two periods.

Within services the main sub-sectors that contributed to the improved performance of the Scottish economy post 2005 were real estate & business services (19% of economy GVA) where quarterly growth improved to 1.3% from 0.94%, retail & wholesale (11% of economy GVA) with improved quarterly growth from 0.4% to 0.85%, transport & communication (7% of economy GVA) from 1.06% to 1.89%, and other services (6% of economy GVA). Figure 5 shows that it is transport & communication and real estate & business services, followed by financial services, which have displayed the strongest growth since 2004.

However, financial services (8% of economy GVA), for a long time a key driver of the Scottish economy, began to stutter in the post 2005Q1 period with quarterly growth averaging 0.98% compared to 2.03% in the earlier period. The weakening performance of financial services was much influenced by the downturn in the second and third quarters of last year with GVA falling by 3% and 2% respectively. What remains unclear is how much this weaker performance was related to the "credit crunch" and/or whether other factors contributed. Growth in the public sector also slowed in the post 2005Q1 period with quarterly growth averaging 0.3% compared to 0.47% earlier.

Finally, the performance of hotels & catering suffered something of a collapse between the two periods, with GVA contracting by 0.38% per quarter post 2005Q1 compared to positive growth of 0.12% per quarter between 1998 and 2005.

Performance in fourth quarter 2007

The latestⁱⁱ official outturn data for the Scottish economy refer to the fourth quarter 2007. Total Scottish GVA rose by 0.9% in the quarter and by 2.2% over the year. The comparable UK figures were 0.6% and 2.9%. So, despite Scotland's strong growth performance in the quarter both absolutely and relative to the UK, growth over the year, while above trend, remained below the UK.

Both the service sector and manufacturing, with growth of 1.3% and 1.5% respectively, outperformed their UK counterparts where growth was 0.7% and no change. Construction performed comparably during the quarter, with growth of 1% in Scotland and growth of 1.1% in the UK. In contrast, the other principal sectors were all weaker in Scotland. Electricity, gas & water contracted by 7.8% compared to an increase of 2.8% in the industry in the UK. Mining & quarrying experienced a 4.3% contraction in comparison to a small fall of 0.1% in the UK. Finally, agriculture, forestry & fishing grew by 0.6% in Scotland compared to 2.1% in the UK.

Within Scottish services all principal sub-sectors exhibited positive growth in the fourth quarter with the strongest performing sectors financial services (4.6% growth) and other services (5.5%). The public sector exhibited the weakest growth, a not insignificant 0.5%, above its trend rate since 1998.

Within manufacturing, of the key sectors electrical & instrument engineering (electronics) exhibited the fastest growth, growing by 6% during the quarter but contracting by 2.9% over the year. This was followed by mechanical engineering with 4.6% growth during the quarter and 9.3% over the year, drink, 2.3% in the quarter and 5.3% over the year, and chemicals, 1.3% in the quarter and 5% over the year. At the other extreme the weakest manufacturing sectors in Scotland were, transport equipment, which contracted by 5.4% during the quarter and by 2.9% over the year, textiles, footwear, leather & clothing, with a fall of 1.5% in the quarter and by 7.3% over the year, and paper, printing & publishing, where GVA fell by 1.2% in the quarter and by 4.6% over the year.

Outlook

The outlook for the Scottish economy appeared fairly certain when we last reported in July 2007. Growth was expected to remain above trend in 2007 and 2008 at 2.5% and 2.3% respectively. Prospects for the economy in the medium-term were considered to be good. Almost one year later, the comparative certainty of last July has evaporated.

The July 2007 Commentary cautioned that surging oil prices were adding to inflationary pressures, with the direct consequences augmented by the possibility of knock-on effects on earnings and wage settlements. It also recognised that the slowdown in the US housing market was putting US, and implicitly world, growth at risk.

What we didn't appreciate was that the oil price would continue its surge to \$139 to date and as discussed above with every prospect that it will go quite a bit higher before subsiding. Nor did we understand the magnitude of forces that would be unleashed following the downturn in the housing market: house price falls and higher interest rates;

massive foreclosures in the sub-prime mortgage market; significant bank and hedge fund losses as the value of innovative investments based on sub-prime mortgages collapsed; and the subsequent drying up of liquidity in financial markets, or what we now know as the 'credit crunch'.

The world economy has been caught in a tightening vice of financial restriction, financial insolvency and illiquidity on the one hand, and depressed real incomes with rising inflationary expectations on the other, due to the significant oil and commodity price rises. The twin crises have effectively blown away the settled expectations of the last 15 years, in the major OECD economies at least, of steady growth with low or no inflation. (See the detailed discussion of recent developments in the world economy later in this Commentary.)

The spectre of stagflation now stalks the major economies. The risk of accelerating inflation combined with low, zero or even negative growth has risen considerably. A return to the instability of the 1970s and early 1980s now has a much higher probability.

Yet, it is not all 'doom and gloom'. There is still hope that the crises can be negotiated without economic catastrophe. World trade continues to be strong with growth of 6.6% forecast in 2008 and 6.7% in 2009. Growth of GDP continues strongly in China, and other parts of Asia, while growth in the Euro area, Japan and even the US is forecast to slow in 2008 and 2009, the expected slowdown is not dramatic (See Table 1 of World Economy section.) Overall, growth of real GDP in the OECD is projected to slacken but not dramatically, from 3.1% and 2.7% in 2006 and 2007 to 2% and 2.1% in 2008 and 2009 respectively. Conversely, the overall OECD inflation rate is forecast to rise from 2% in 2007 to 3.1% in 2008 and 2.7% in 2009. But, given the heightened levels of uncertainty all forecasts must be treated with even more caution than would be the case at other times.

The UK and Scottish economies cannot be immune from the greater prospect in the world economy of sustained higher inflation, slower growth, and an eventual weakening of the labour market with declining job creation and rising unemployment. Yet the flexibility, especially in the labour market, and resilience displayed by the UK economy over the past ten to fifteen years may help in negotiating the current crisis (See the article by Gurney, 2008, cited in the UK Economy section below). UK growth has in recent years been strong by international standards while inflation has remained comparatively low. Much credit for this can be taken by the Monetary Policy Committee of the Bank of England in providing a stable monetary framework through judicious interest rate setting. Gurney, also cites the policy of less stringent product and labour market regulation as further contributors to the flexibility and resilience of the UK economy.

That said, the rapid weakening of the housing market, the tightening of credit in both housing and in other markets, the significant hike in oil prices, rising commodity and food prices, weakness in key export markets, will together serve to slow consumption, investment and export demand to the detriment of UK growth. The \$64k question is to predict the extent of these wider shocks on the demand for UK and Scottish produced products and hence predict the impact on UK and Scottish economic growth. Moreover, the inflationary consequences, in the light also of the recent decline in the exchange value of sterling with the effective rate falling by around 12% since July 2007, remain difficult to predict.

Against this background, we take the view that UK growth will slow this year and next, from 3% in 2007 to 1.8% this year and then 1.6% in 2009. But growth should pick up thereafter. The consensus on inflation is for CPI to rise by 2.8% in 2008 and by 2.1%, rising slightly to 2.2% in the two years after that, still above the 2% target.

What, then, is the outlook for Scottish GDP growth?

At the turn of the year, the Scottish economy was clearly outperforming the UK in terms of GDP growth with, as noted above and in the Forecasts of the Scottish Economy section below, manufacturing exhibiting positive growth and both manufacturing and services doing better in Scotland than in the UK. The data for GDP growth in 2008Q1 are not published until 23rd July, so we must rely on survey data to monitor the performance of the Scottish economy in 2008 and to assist in the preparation of our forecasts for the medium term.

Our Review of Scottish Business Surveys presented below reveals, as might be expected, an overall slow down in orders and activity but with export trends remaining positive. The demand for labour is also found to be easing and there is clear evidence of increasing cost pressures and accelerating prices. For those surveys that take a forward look the expectation is for a further weakening of demand, further increases in cost pressures and an overall slow down in the economy. The Bank of Scotland's Index of Leading Economic Indicators latest report (June 2008) suggested that Scottish economic growth is set to continue expanding over the coming quarters but with growth easing in 2008 reflecting the global economic trends. Conditions in the labour market continued to be fairly firm and this would help bolster domestic consumer spending.

In the light of the GDP outturn data and the evidence from the latest survey data, we expect the growth of demand to moderate in the Scottish economy in 2008 and 2009. The growth of consumer spending moderates but does not slow as much as in the UK. This reflects the relative strength of both the housing and labour markets in Scotland. The growth of private sector investment demand also slows. The slowdown in the growth of domestic Scottish demand is in addition affected by the planned slowing in the growth of

Key Forecasts of the Scottish Economy

	2007	2008	2009	2010
GVA %				
Overall	2.2	1.9	1.7	1.8
Manufacturing	0.7	1.4	1.8	0.8
Construction	-1.5	-2.1	1.4	1.6
Services	3.4	2.5	1.8	2.2
Jobs change – nos	8,500	8,800	9,900	17,900
Unemployment %				
ILO	4.8	4.6	4.4	4.2
Claimant count	2.8	2.3	2.2	2.0

public spending. To be set against this is a strengthening of export demand from outside the UK, which reflects the benefits of the decline in the exchange value of sterling and continued growth in Scotland's principal export markets.

When fed into our Medium Term Model these demand projections generate a forecast for GVA/GDP in the aggregate for the Scottish economy and by sector. Table 2 in the Forecasts of the Scottish Economy section below provides a summary of the main forecasts. A truncated version is presented here.

Growth in Scotland falls to trend this year and then slips below trend in 2009 picking up slightly but remaining below trend in 2010 and returning to the 1.9% trend in 2011. Throughout this period net jobs continue to be created in the Scottish economy, although at fairly low rates, largely driven by the service sector. This helps maintain unemployment at and below present levels.

Scottish growth outperforms expected UK growth of 1.8% this year and stays just above UK growth in 2009. But in 2010 Scottish growth slips behind the UK growth as the UK rate rises towards its trend at 2.5%. With UK growth now predicted to be around 2.6% in 2011, we think it unlikely on

present information that the Scottish government's target of parity with UK growth by 2011 will be met.

However, these forecasts come with a significant health warning. The levels of uncertainty as to future outcomes are very high indeed given present conditions in the world economy. There is a considerable downside risk that growth and inflation in both Scotland and the UK will be worse than forecast here. This will especially be the case if the price of oil fails to stabilise and subside and the deterioration in the housing market and the problems confronting the financial markets are worse than anticipated.

Endnotes:

Conducted across 60 countries for the period 1970 to 1985.

ⁱⁱPublished on the 23rd April. First quarter 2008 data are expected on 23rd July.

Brian Ashcroft 13 June 2008

Figure 1: Scottish and UK Quarterly GDP Growth, 1998q2 to 2007q4

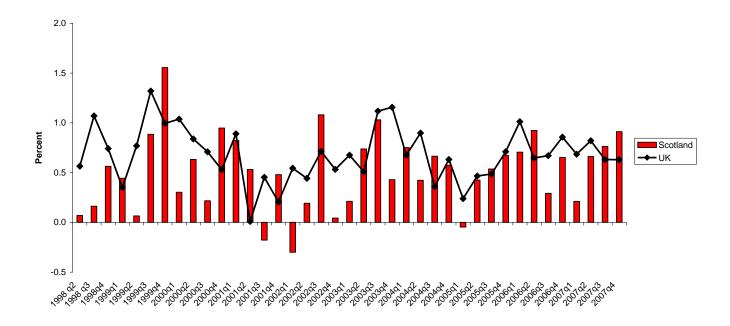


Figure 2: Scottish and UK Services GVA Growth at constant basic prices 1998q2 to 2007q4

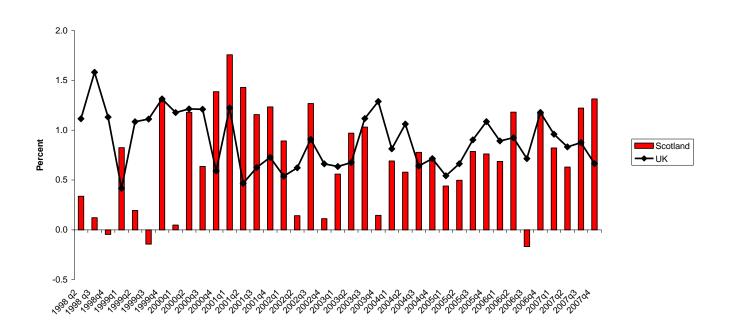


Figure 3: Scottish and UK Manufacturing GVA Growth at constant basic prices 1998q2 to 2007q4

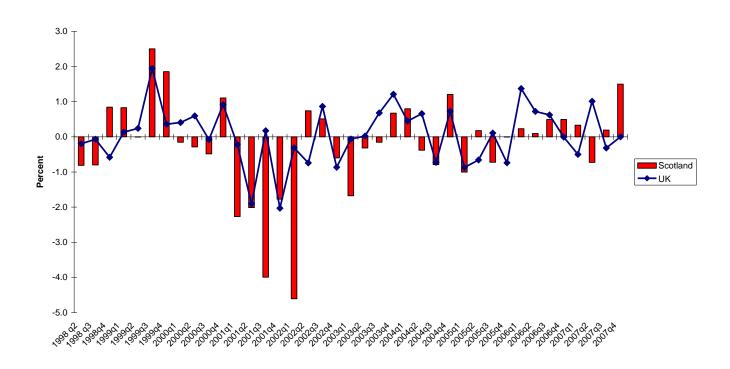


Figure 4: Scottish and UK Electronics GVA Volume Growth 1998q2 - 2007q4

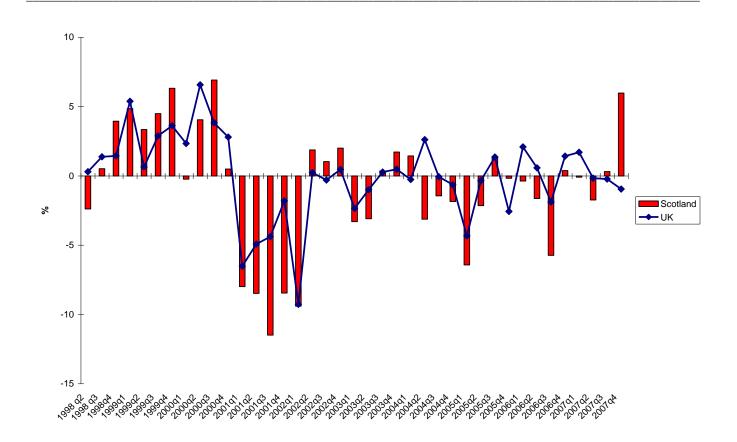


Figure 5: Growth of key sectors in Scotland 1998q2 to 2007q4

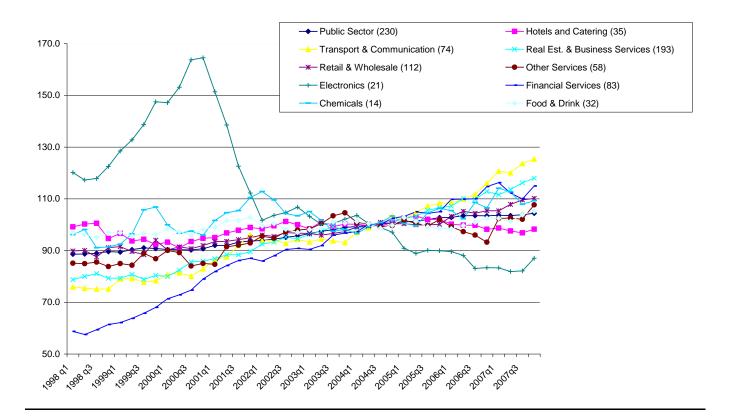


Table 1: Scottish and UK Quarterly GVA Percentage Growth from 1998Q1 to 2007Q4 and by Sub-Periods

SCOTLAND									
Weights	1000	992	16	11	27	139	68	738	11.
	All	All	Agriculture	Mining &	Electricity Gas &	Manufacturing	Constn	Services	Retail 8
		less oil & Gas	forestry & fish	Quarrying	Water				Wholesale
Whole period growth	0.51	0.53	0.04	-0.89	-0.38	-0.24	0.61	0.73	0.53
Growth to 2005q1	0.47	0.48	0.15	-0.41	-0.19	-0.41	0.71	0.70	0.40
Growth from 2005q1	0.61	0.64	-0.26	-2.11	-0.85	0.18	0.37	0.81	0.8
UK									
Weights	1000	980	10	22	17	147	61	744	122
	All	All	Agriculture	Mining &	Electricity Gas &	Manufacturing	Constn	Services	Retail 8
		less oil & Gas	forestry & fish	Quarrying	Water				Wholesale
Whole period growth	0.68	0.71	0.26	-0.94	0.39	0.06	0.46	0.89	0.86
Growth to 2005q1	0.68	0.71	0.11	-0.81	0.50	0.02	0.48	0.90	0.9
Growth from 2005q1	0.69	0.73	0.64	-1.27	0.11	0.14	0.39	0.88	0.74
SCOTLAND									
Weights		35	74	83	193	230	58	-47	
		Hotels	Transport	Financial	Real estate &	Public admin,	Other	FSA	
		& catering	& Comm	Services	Business Serv	Educn & health	Services		
Whole period growth		-0.02	1.30	1.74	1.04	0.42	0.61	1.76	
Growth to 2005q1		0.12	1.06	2.03	0.94	0.47	0.64	1.90	
Growth from 2005q1		-0.38	1.89	0.98	1.30	0.30	0.52	1.42	
UK									
Weights		31	78	79	244	183	53	-46	
		Hotels	Transport	Financial	Real estate &	Public admin,	Other	FSA	
		& catering	& Comm	Services	Business Serv	Educn & health	Services		
Whole period growth		0.83	1.21	1.57	1.25	0.49	0.50	2.33	
Growth to 2005q1		0.77	1.32	1.29	1.24	0.52	0.37	2.00	
Growth from 2005q1		0.99	0.95	2.29	1.29	0.39	0.85	3.18	

Note: FSA is Financial Services Adjustment

Source: Scottish Government GVA statistics and FAI calculations