# Outlook and Appraisal

## Overview

There is little doubt that after five years since the start of the Great Recession we are now witnessing a stronger recovery, all be it belatedly compared to any recession in the last 70 to 80 years. And there are good reasons to be hesitant about whether the recovery can be sustained. Nevertheless, the Scottish economy has grown for five successive quarters to the second quarter of this year. The UK has grown for three successive quarters to the third quarter of the year. And the growth rate has been rising as 2013 unfolds.

In the second quarter, GDP in Scotland was -1.4% below the pre-recession peak, whereas UK GDP stood at -3.3% below its pre-recession peak 5 years ago. Overall, Scottish GDP has recovered by 4.4% since the trough of recession while UK GDP has recovered by 4.3% from its trough, suggesting that the broad track of the recovery has been similar in Scotland and UK. Removing falling oil & gas production from the UK data to compare like with like reveals that UK GDP (ex-oil & gas) has recovered by 5.3% from its trough. Hence, the UK recovery has actually been somewhat stronger.

The industry structure of the recovery differs between the UK and Scotland. The service sector is weaker in Scotland while growth in production and the manufacturing sector within it has been stronger in Scotland. But construction sector growth has been quite similar between the two countries with recovery weak. Financial services appear to have experienced a structural decline since the beginning of the recession in both Scotland and the UK. This decline may be bottoming out but whether the sector will return to 2007 levels of output is a moot point. It is clear that a strong recovery is now taking place in the important business services sector in Scotland and the recovery is stronger than in the UK. The recovery and growth of real estate activities and transport, storage & communications in Scotland is weaker, while that in distribution is stronger.

The different industrial pattern of the recovery in Scotland may account for some of the differences that have emerged between the Scottish and UK labour markets.

Despite recent strong job creation Scottish jobs are now -0.8% below their pre-recession peak, which is worse than the UK, where the jobs total is 0.8% *above* the pre-recession peak. But Scotland's unemployment rate of 7.3% is lower than the UK's 7.7%. However this is still, in Scotland, much above the

3.9% unemployment rate that existed before the recession began in 2008. Labour productivity in Scotland has improved relative to the UK, which has experienced a sharp drop in productivity. This may principally be due to the different pattern of industrial growth in the recovery in Scotland which has favoured more highly productive, capital intensive sectors. The recent improvements in the Scottish jobs market and unemployment have started to feed through into the employment population ratio. Previously this had remained persistently low because the jobs that were being created were not matching the rise in the working population. Nevertheless, with the ratio -3% below the pre-recession peak there is still plenty of spare capacity or unused labour resources in the Scottish economy. And this statistic takes no account of the large increase in the part-time and self-employed workforce due in large measure to a lack of full-time employment. In these numbers there lie hidden, unused labour reserves.

With a recovery in output and jobs now clearly occurring, the key question is whether it can be sustained over several quarters and even years. The recovery has a better chance of being sustained if growth is broadly-based. Unfortunately, this is not the case up to the first quarter 2013. What is clear is that household spending remains the main driver of growth, although investment is beginning to figure in the UK while net trade in Scotland remains weak. In addition, we are faced with more fiscal consolidation with £70 billion still to be taken out of the UK economy. So, the recovery is mainly dependent on growth in household spending. And the main drivers of household spending remain weak: real incomes are falling while asset prices are either flat or falling, or where they are rising, such as in stock and shares, they have only a limited significance for household spending. The Scottish household saving rate remains high at 8.1% and is nearly 4 percentage points higher than in the UK. This suggests that debt continues to be paid down.

But also the household savings ratio has been falling in Scotland over the past year: by more than 4 percentage points from 12.3% in the first quarter of 2012. Anecdotal and some statistical evidence suggest that households in Scotland as in the UK are borrowing more. Scots and others in the rest of the UK are buying more new cars. And a greater proportion is being bought on credit of one form or another. But if real incomes continue to fall and asset prices - mainly housing - remain flat, it is difficult to see how such borrowing and spending can be sustained. One way is highlighted by the growth of pawnbrokers on Scottish high streets, cash generators and pay-day loan operations. Impressionistically, it appears that many people are selling assets - cameras, electronic equipment, and musical instruments - to raise funds for current spending. This readymade mechanism for rapidly transferring assets

into cash could be giving a boost to the economy. But it is hard to see how it can last, without rising real incomes and asset values; the amount of saleable assets held by households is obviously finite.

It is against this background that we have prepared our latest forecasts.

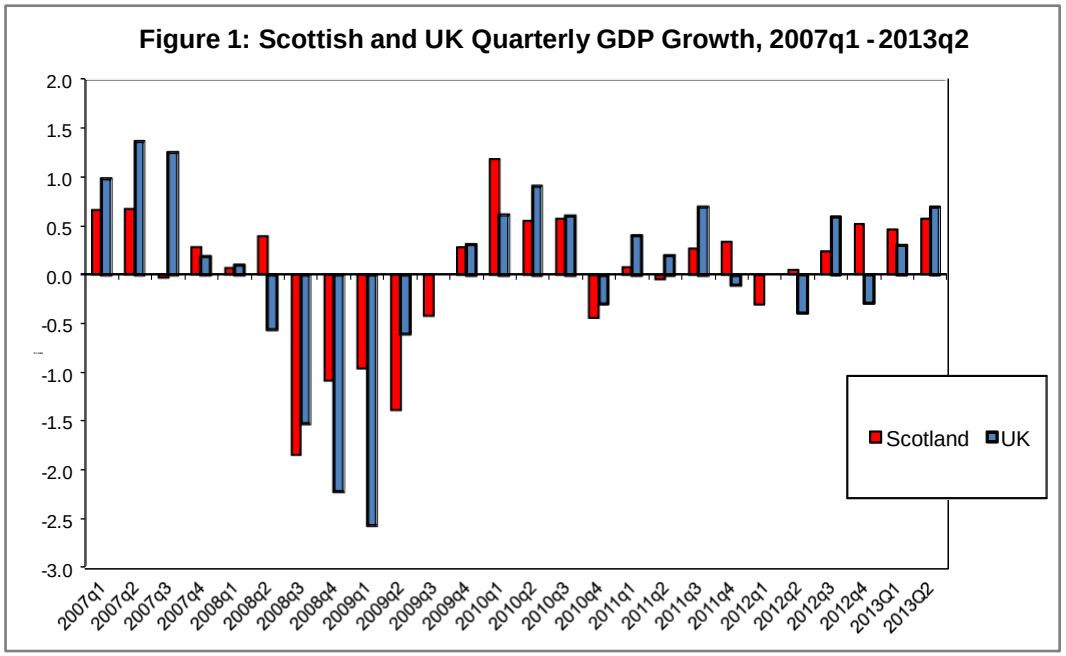
Our GDP forecast for 2013 at 1.3% has been revised upwards from our June and March forecast of 0.9%. For 2014 we have also revised up our forecast from the 1.6% predicted in June to 1.8%, while for 2015, we retain the same 2.1% prediction as in June. The forecasts for 2013 and 2014 are higher than in June because of better than expected outturn data on the growth of household spending and increasingly optimistic surveys during the summer and early autumn. But we are still predicting below trend growth next year reflecting the continued relative weakness of domestic demand, in particular government spending and consumer expenditure, and only slowly rising growth in eurozone markets but stronger growth in the rest of UK to which Scottish exports are so reliant.

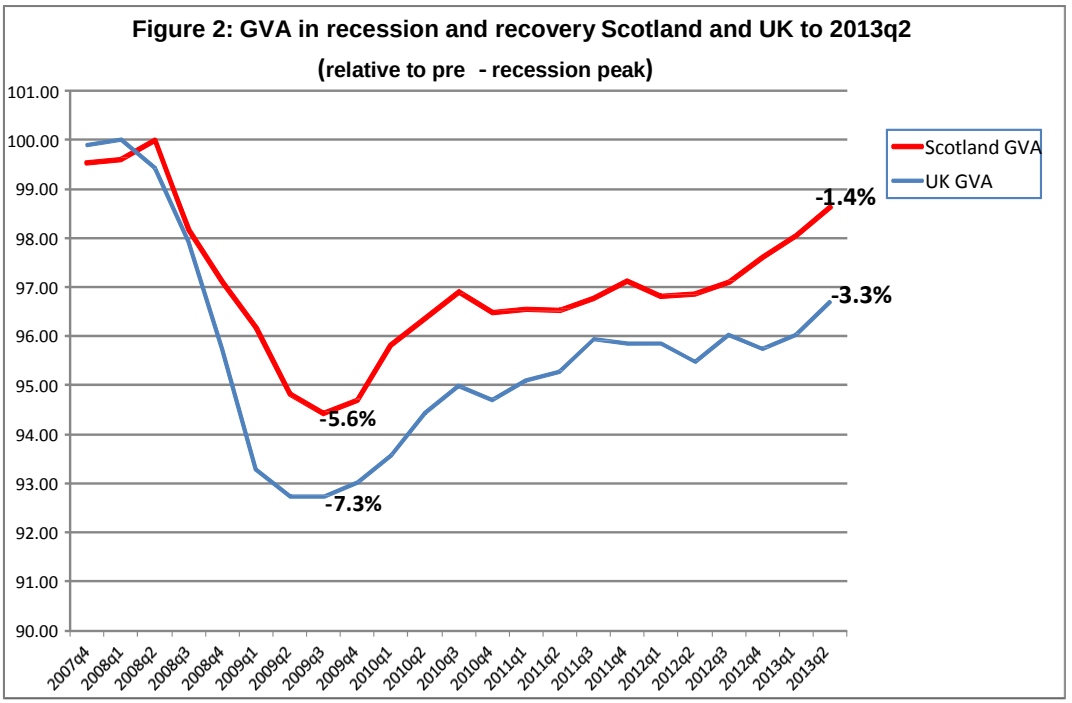
In the labour market, we predict rising employment, rising unemployment next year, and falling unemployment in 2015. On the central forecast, we are now forecasting that net jobs will rise by 21,200 in 2013, rising to 27,200 in 2014 and 38,400 in 2015. The majority of jobs created will be in the service sector. Our unemployment forecasts have been revised down again from June, reflecting higher employment given the growth of output. We are now seeing many workers re-entering the labour market as job prospects improve. This lowers our estimate of 'real' unemployment but may tend to raise measured unemployment as jobs are being created. The upshot is that unemployment may not fall as much as the job creation figures might suggest. Our projection for unemployment on the ILO measure at the end of 2013 is now 204,550 (7.6%). We continue to expect the unemployment position to deteriorate slightly in 2014 compared to 2013 due to relatively weak output and employment growth. Unemployment is now forecast to be 224,800 (8.4%) by the end of 2014 but then falls back to 186,450 (7.0%) by the end of 2015 as growth in the economy strengthens.

**Recent GDP performance**

The latest Scottish GDP data for the second quarter of this year show that Scottish GDP rose by 0.6% in Scotland in the quarter, slightly less than the 0.7% rise in the UK, see Figure 1.

However, over the year to the second quarter - four quarters on previous four quarters - Scottish GDP growth was weak at 1% but a lot stronger than the 0.4% outturn in the UK. These data suggest that the economy may have entered a stronger recovery phase, with positive growth recorded over the last 5 quarters. But the recovery continues to be much weaker than that experienced from any recession in the last 70 to 80 years. The effect of the new data on Scotland's recovery from recession is shown in Figure 2.

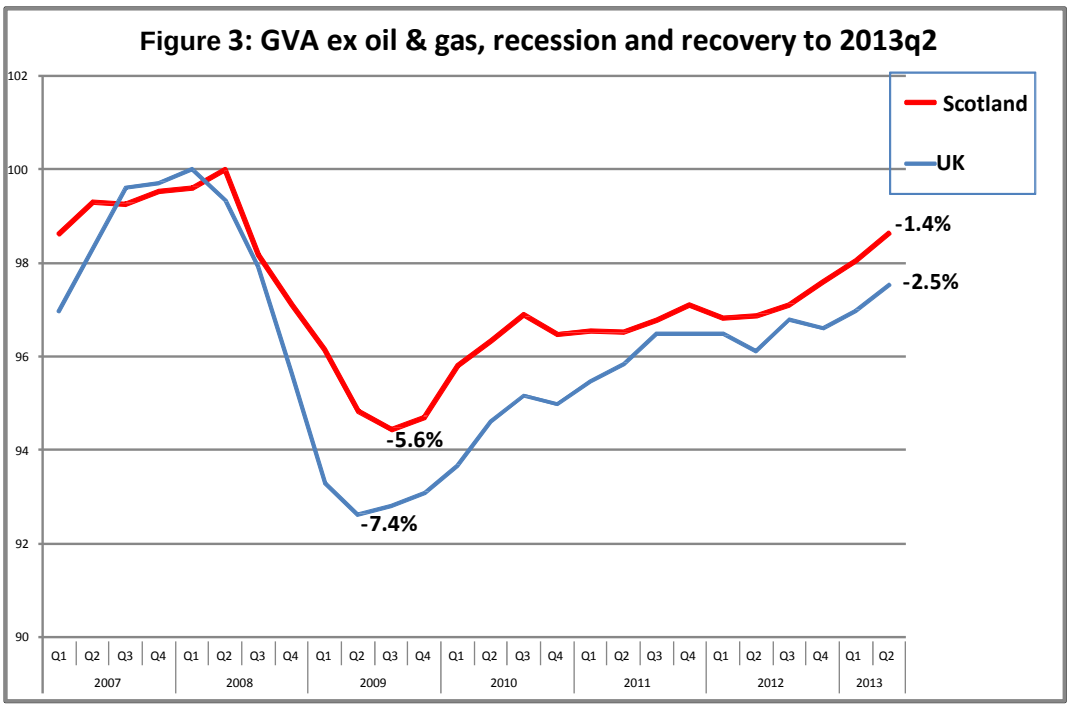



In the second quarter, GDP in Scotland was -1.4% below the pre-recession peak, whereas UK GDP stood at -3.3% below its pre-recession peak 5 years ago. What is clear from Figure 2 is that the UK GDP data have been significantly revised, and revised in a downwards direction. The scale of the recession now amounts to a fall in output of -7.3% as compared to -6.3% in earlier estimates. As a result, despite positive growth in the last two quarters, UK GDP is -3.3% below its pre-recession peak compared to -2.9% in the final quarter of last year. Hence, the gap between Scotland and the UK has widened in Scotland's favour. A stronger UK recovery to late 2011 was replaced by a stronger Scottish recovery

from mid 2012. Overall, Scottish GDP has recovered by 4.4% since the trough of recession while UK GDP has recovered by 4.3% from its trough, suggesting that the broad track of the recovery has been similar in Scotland and UK.

However, as mentioned in previous Commentaries, there is the complicating factor of oil and gas production - offshore production – which is included in the UK GDP data but not in the Scottish data. Removing oil and gas production gives us Figure 3.




When oil and gas production is removed, we find that both Scotland and the UK grew by 0.6% between the first and second quarters. So, after a long period of weakness oil and gas production actually boosted UK GDP overall in the second quarter. But Scottish growth - ex oil & gas - was still stronger over the year - 4 quarters on 4 quarters - at 1% compared to 0.6% in the UK. But the previous weak growth of oil and gas production gives the UK GDP - ex oil & gas - a stronger recovery from recession than Scottish GDP. Scottish GDP has recovered by 4.4% since the trough of recession while UK GDP - ex oil & gas - has recovered by 5.3% from its trough. So, by the second quarter of this year UK GDP - ex oil & gas - was -2.5% below its pre-recession peak compared to -1.4% for Scotland. Scottish GDP is closer to its pre-recession peak than the UK despite the recovery of GDP - ex oil & gas - being stronger in the UK. This is because the scale of the recession was much greater in the UK as a whole.

Turning now to individual sectors of the economy, we see that the Scottish service sector, which accounts for 72% of GDP in Scotland and 77% in the UK, was weaker in Scotland in the second quarter with GVA growing by 0.3% compared to 0.7% in the UK as Figure 4 shows.

Over the year - that is four quarters over previous four quarters - the service sector in Scotland grew by 1.2%, which was slightly worse than UK service sector growth of 1.4%. The state of the recovery in Scottish and UK services is presented in Figure 5.

After the revisions to the UK data which have reduced GVA across the board, the recovery of the service sector is now more similar in Scotland to the UK than previously. By the second quarter of this year, Scottish services GVA was -0.8% below its pre-recession peak compared to a UK position where the sector now stands, at -0.2%, just below its pre-recession peak. Note that we reported in the June *Commentary* that the UK service sector stood at 0.5% *above* its pre-recession peak output at the end of the fourth quarter last year. The loss of Scottish service sector output in the recession was -4.4%

somewhat less than the -5.5% output loss in services in the UK. So, after data revisions it now appears that the Scottish services sector's growth is closer to UK services than previously thought. Some recovery is evident but with growth of 3.8% since the trough of the recession compared to 5.6% in UK services the sector is clearly weaker than its UK counterpart. Although as we noted in the previous *Commentary* - and discuss below - there are some bright spots within Scottish services.

**Figure 4: Scottish and UK Services GVA Growth 2007q1 to 2013q2**

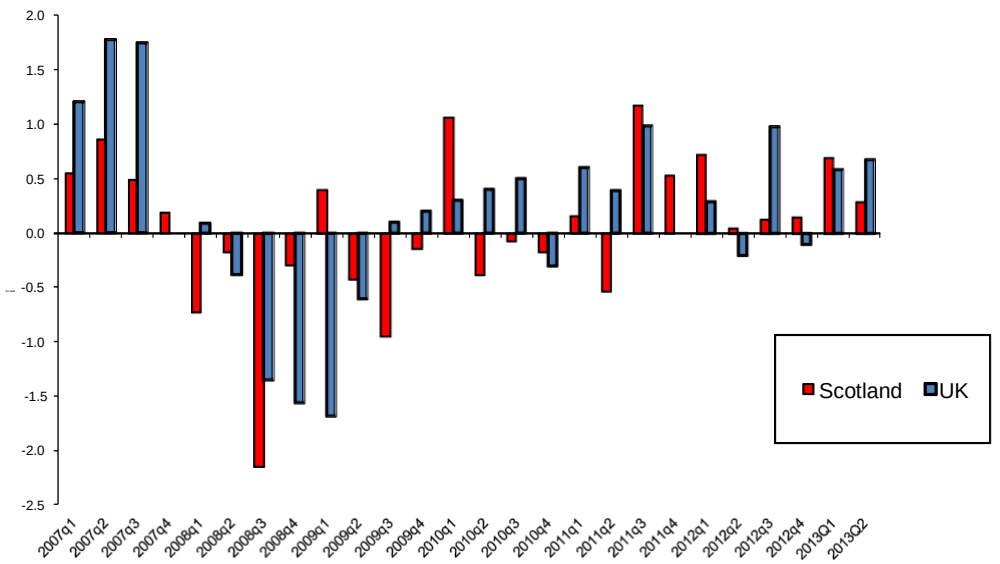
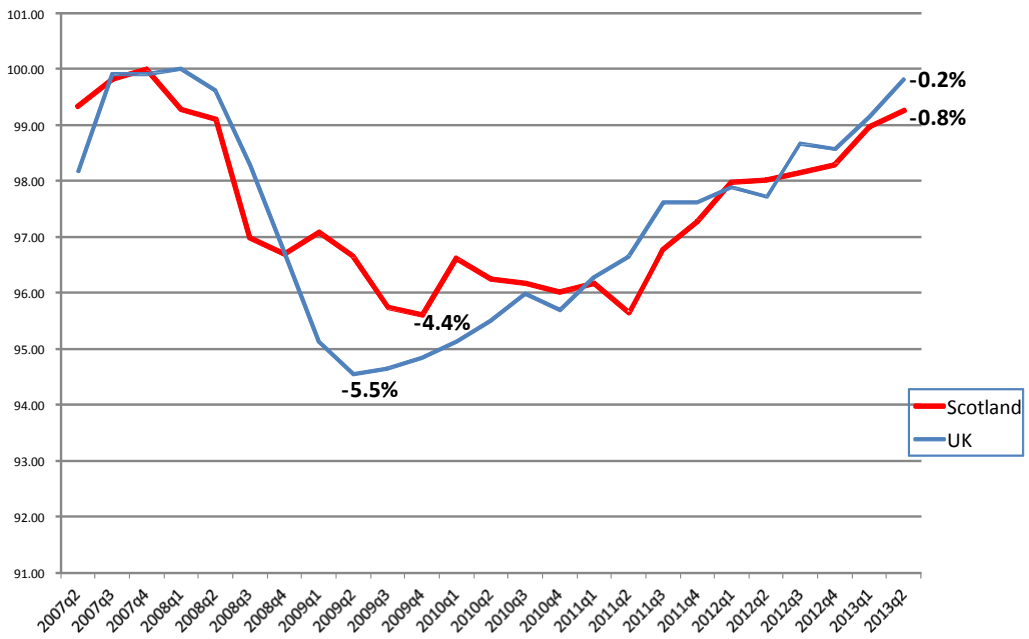



**Figure 5: Services GVA in recession and recovery Scotland and UK to 2013q2**

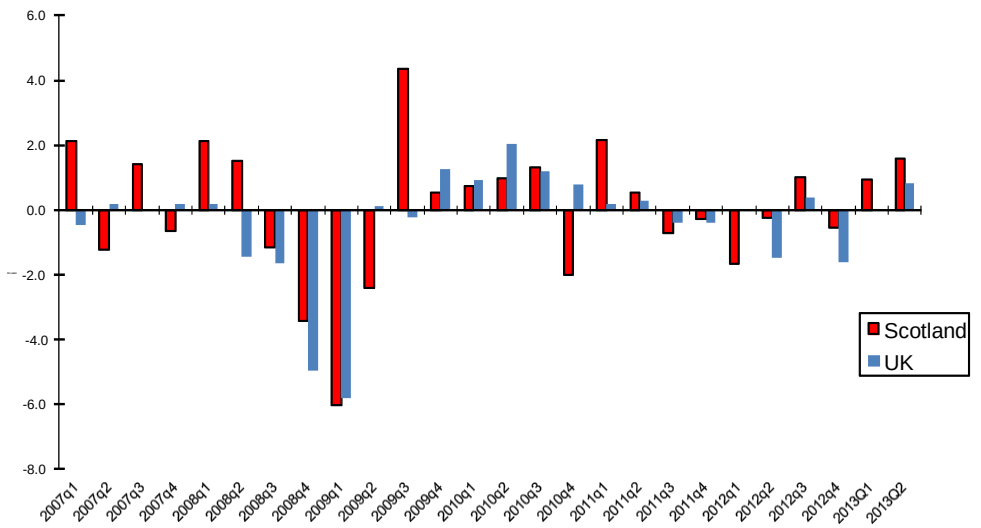



One final point to note about Scottish services is that its growth is underperforming the overall performance of the economy whereas that is not the case in the UK where the growth of the two is broadly similar. It is the production sector that has boosted Scottish growth, while conversely it has been a significant drag on UK growth.

In the Scottish production sector output continued to grow strongly. Output rose by 1% in the quarter compared to a rise of 0.8% in the UK. Over the year - four quarters on four quarters - production GVA rose by 1.3% in Scotland compared to a large fall of -2.1% in the UK. A key feature in the differential performance is the erratic behaviour in electricity & gas supply production in Scotland. We noted in the June *Commentary* that the strong growth of 8.8% in electricity and gas supply in Scotland in the final quarter of last year may have been due to structural reasons such as a power plant coming back on stream after maintenance shut down. If so, a fall in output or flat growth would be expected in the first quarter. This proved to be the case with output falling by -5.4% in the first quarter. In the second quarter, electricity & gas GVA rose by 2.9% in Scotland while falling by 2.1% in the UK. But, reflecting the erratic nature of production, output fell by -1.5% over the year in the sector in Scotland but rose by 2% in the sector in the UK. Mining & quarrying production contracted by -3.1% in the second quarter in Scotland but GVA rose by 6.7% over the year. In contrast, UK mining & quarrying rose 1.5% in the quarter but contracted by -8.2% over the year. Some of the volatility in the UK production figures of mining & quarrying appears to be structural due to oil production issues in the North Sea.

Manufacturing is, however, the main component of the production sector accounting in Scotland for 63% of production and 12% of total GVA.

**Figure 6: Scottish and UK Manufacturing GVA Growth at constant basic prices 2007q1 to 2013q2**



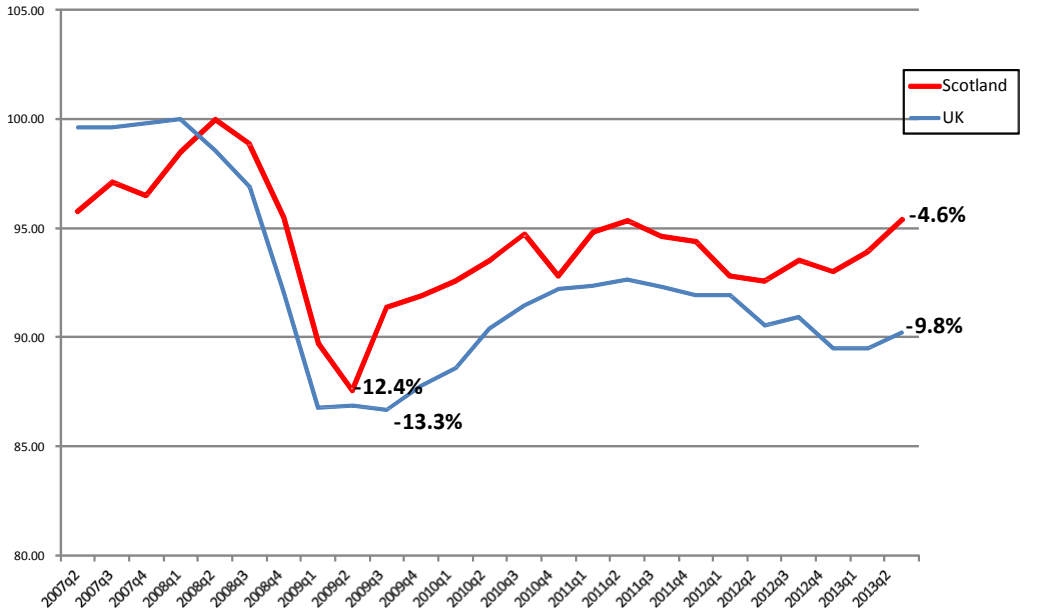

Manufacturing GVA rose by 1.6% in the quarter in Scotland after growth of 0.9% in the first quarter and a fall of -0.5% in the final quarter of last year - see Figure 6. UK manufacturing, in contrast, has fared worse than the sector in Scotland for the last 5 quarters with output rising by 0.8%. Over the year to the second quarter, Scottish manufacturing GVA rose by 0.4% while UK manufacturing output fell by -1.8%. Figure 7 shows the impact of the latest data on the manufacturing sector's recovery from recession.

Scottish manufacturing GVA now stands at -4.6% below the 2009-09 pre-recession peak, while the figure for UK manufacturing is -9.8%, with the overall level of UK manufacturing GVA revised downwards in the latest revisions. The favourable gap between Scotland and UK manufacturing performance has therefore widened.

Within manufacturing, the main boost to growth in the second quarter came from the food and drinks sector and other manufacturing, which account for 28% and 21%, respectively, of manufacturing GVA. Output rose by 3% and 2.2%, respectively in the two sectors, in the quarter. Over the year - four quarter on four quarter - food and drink grew by 2% while other manufacturing contracted by -0.6%. Textiles and clothing grew by 2.6% during the quarter but the sector contributes little to manufacturing output - about

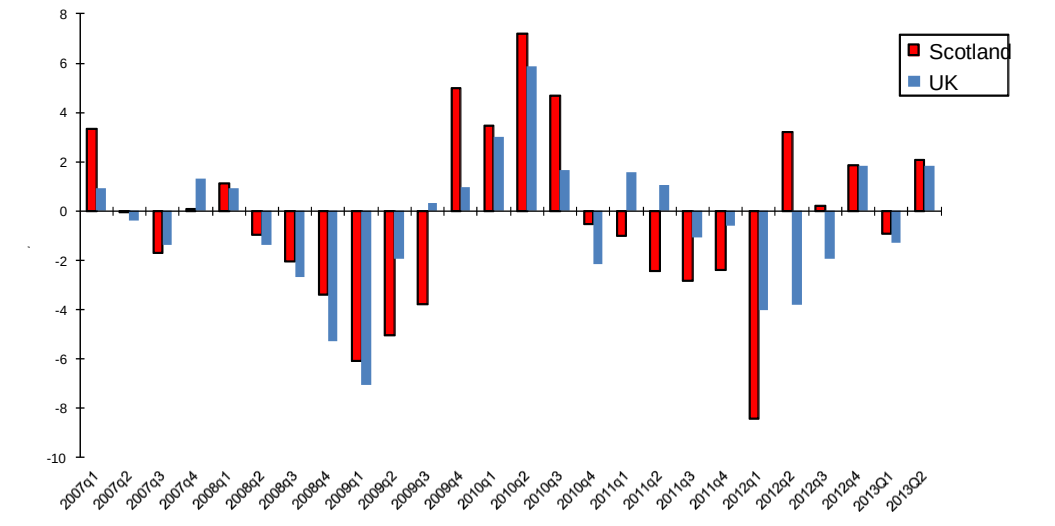
2.5%. Refined petroleum, chemical and pharmaceutical products, which account for 12% of manufacturing GVA, grew by 1.8% in the quarter but contracted by -2.4% over the year. The main sectors holding back manufacturing growth in the second quarter were: computer, electrical and optical products (electronics), and transport equipment, which contracted by -0.5% and -0.1%, respectively, during the quarter. However, "electronics" grew by 2.2% over the year, while transport equipment contracted by -3.2%.

**Figure 7: Manufacturing GVA in recession and recovery Scotland and UK to 2013q2**



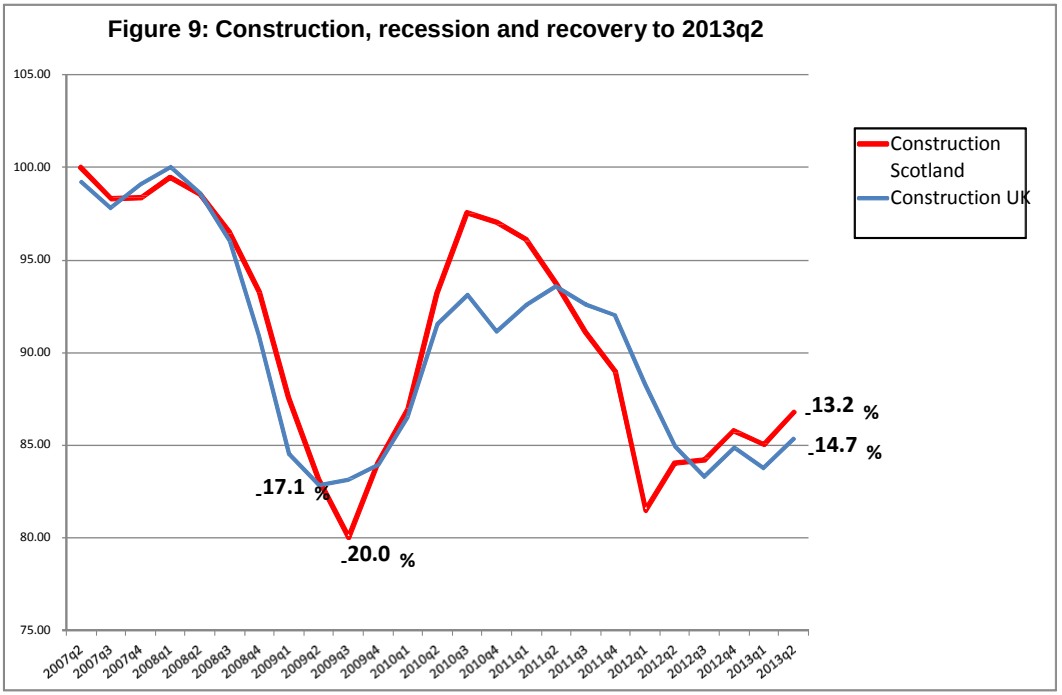

Turning now to construction, the latest data are presented in Figure 8.

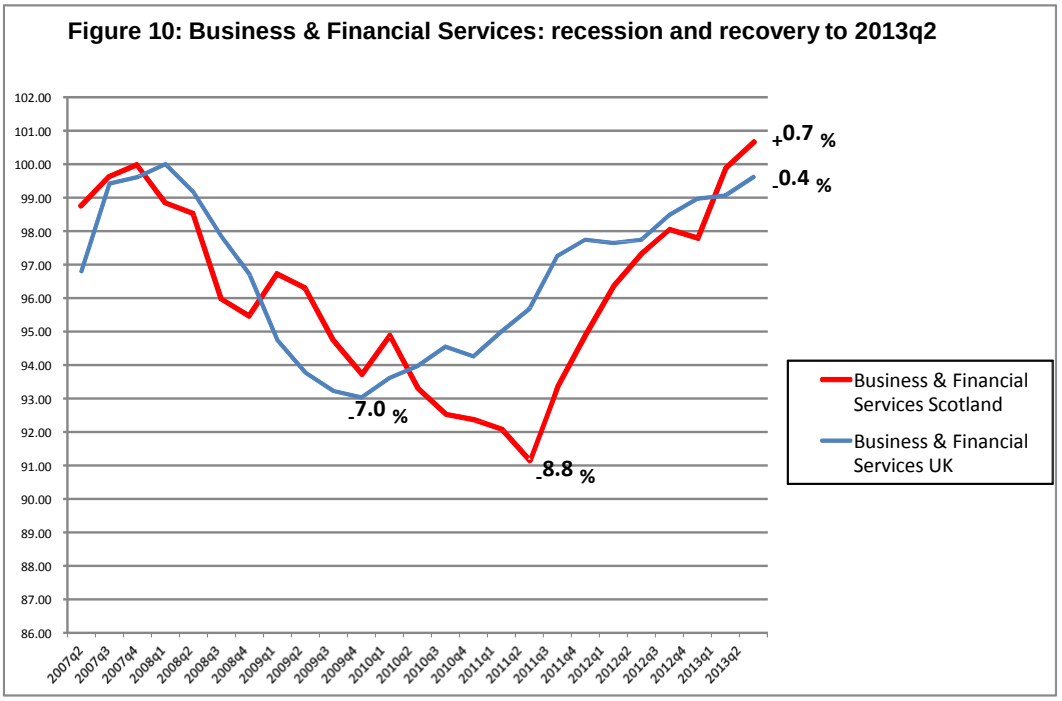
**Figure 8: Scottish and UK Construction GVA Volume Growth 2007q1 2013q2**




Scottish construction GVA rose by 2.1% in the quarter but fell by -1.1% over the year. UK construction, in contrast, grew a little weaker in the quarter at 0.8% and contracted by a lot more, -5.7%, over the year. Growth in the sector does appear to have picked up since the dark days of 2010q4 to 2012q1 and

a recovery may now be underway, but the upward trend is erratic with negative growth still occurring in some quarters as Figure 9 shows.

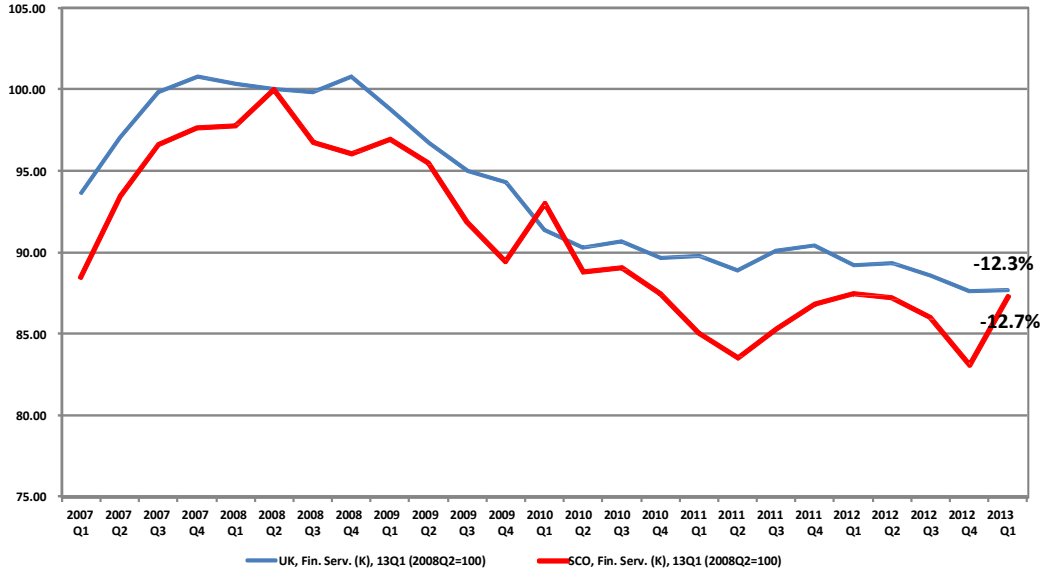



Within services, we noted in the previous *Commentary* the importance of the growth of business and financial services to the Scottish economy. In the second quarter of this year, the sector grew by 0.8% and by 3.8% over the year. In the UK, the sector grew at a similar rate of 0.7% in the quarter but at the slower rate of 1.5% over the year. Figure 10 shows the growth of the sector in Scotland and UK during the recession and recovery.

By the latest quarter, the sector in the UK was -0.4% below its pre-recession peak but its Scottish counterpart was 0.7% above. Moreover, as noted in the June Commentary, aggregate GVA data for business and financial services in Scotland mask significant differences between the performance of financial services on the one hand and business services on the other. There is only disaggregated data published for Scotland but Scottish Government statisticians have kindly made available UK figures on a like-for-like basis. Figure 11 shows what has been happening to financial services since peak output in the second quarter of 2008.

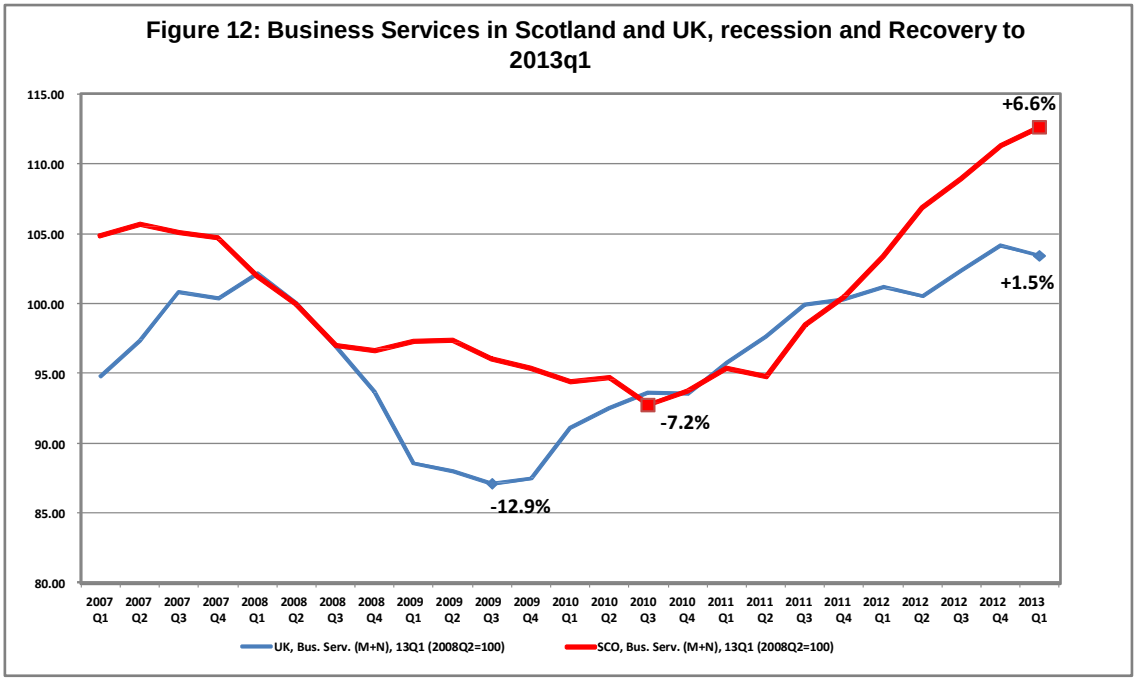
**Figure 11: Financial Services Scotland and UK, recession and recovery 2008q2 to 2013q1**



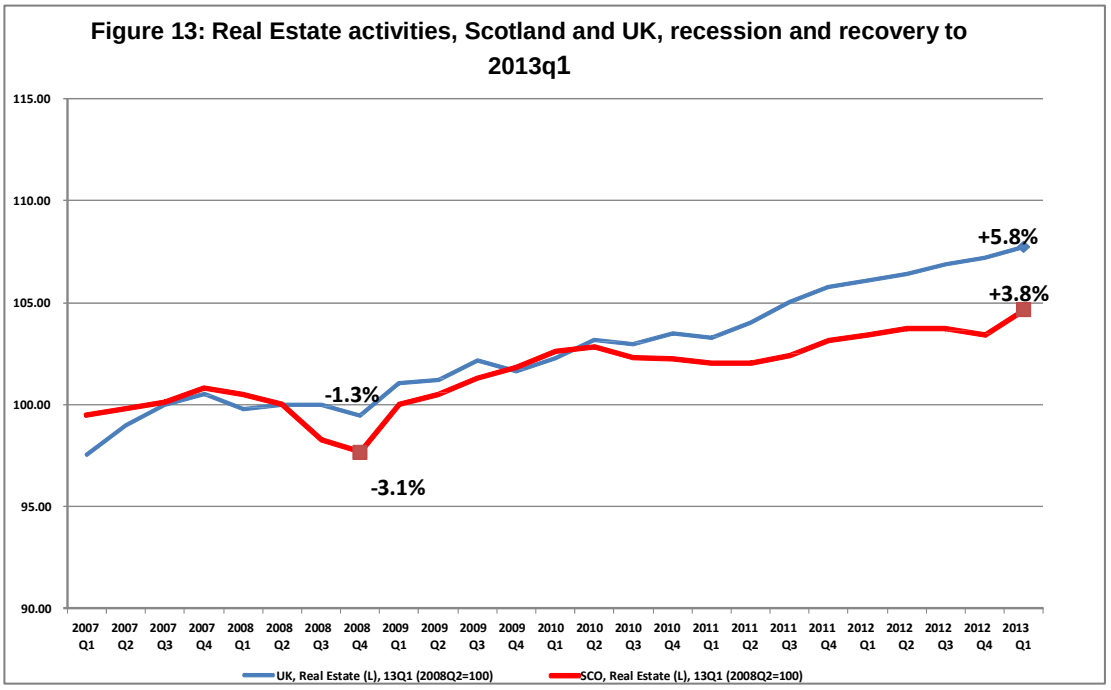

These data suggest that a structural decline has been taking place in financial services in both Scotland and the UK. GVA had fallen by about 13% below the pre-recession peak in both Scotland and UK. There is a strong likelihood that some of this lost output may never return. When we now turn to business services on its own - a combination of professional, scientific, administrative & support services - we see a very different picture as Figure 12 reveals.

It is clear that a strong recovery is now taking place in business services in Scotland and the recovery is stronger than in the UK. The contraction in Scottish business services in the recession was less and more drawn out than its UK counterpart, with decline from peak of -7.2% and -12.9% respectively. From then on Scottish business services began to recover strongly, attaining its pre-recession peak between the first and second quarter of last year. By the end of the first quarter 2013, GVA stood 6.6% above its pre-recession peak. In this analysis, unlike in the June *Commentary* we have separated real estate activities from business services. The relative Scottish and UK performance of real estate is given in Figure 13.

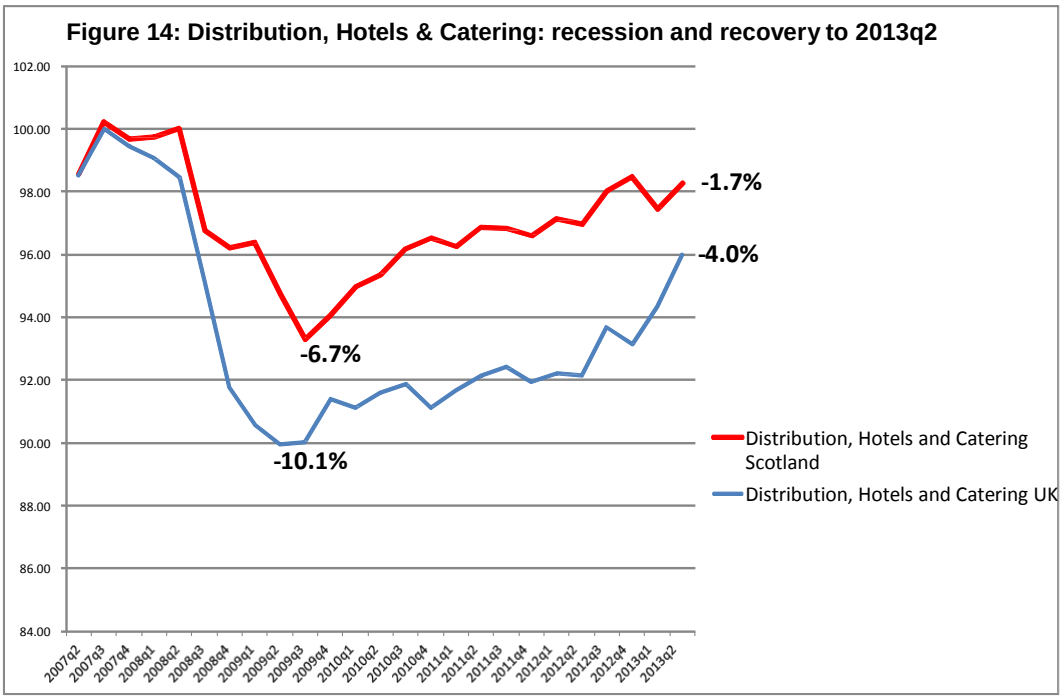
Real estate activities experienced a much shallower recession in UK than in Scotland with output falling by -1.3% and -3.1%, respectively. Moreover, since the middle of 2010 the rate of recovery in the sector slowed compared with the UK, perhaps indicating the weaker state of the housing market in Scotland. Nevertheless, while house prices are currently still falling in Scotland, real estate activities stood at 3.8% above the pre-recession peak in the first quarter of this year. But the stronger UK recovery since 2010 has resulted in the sector in the UK reaching 5.8% above its pre-recession peak by the first quarter.



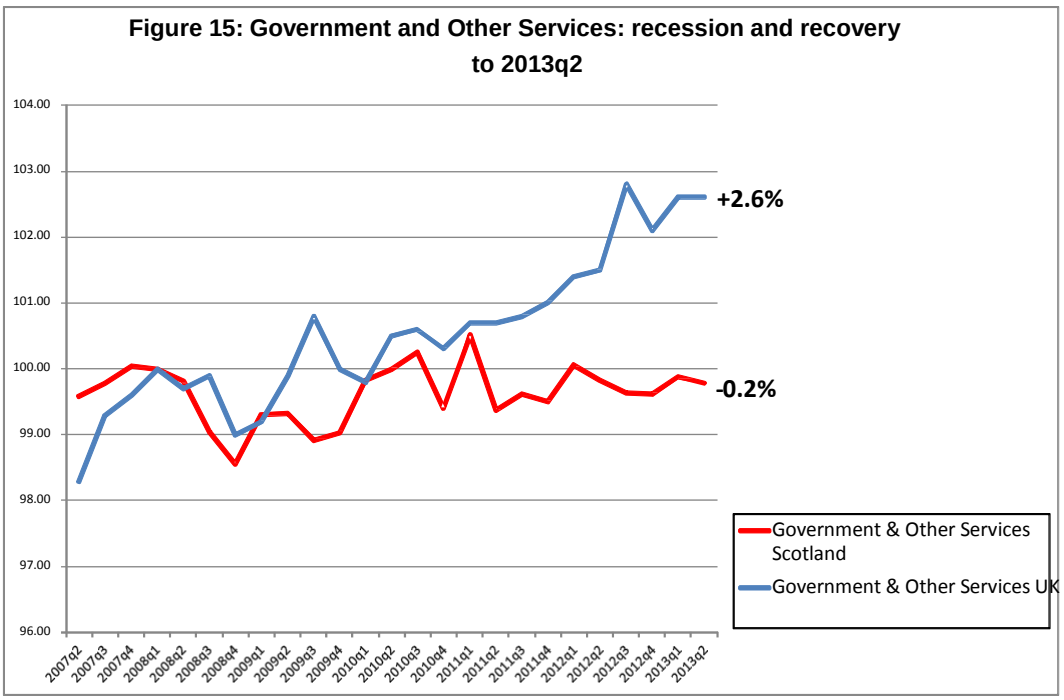

Elsewhere in private services, the main sector is distribution, hotels and catering, accounting for 19% of services sector output in Scotland; this grew by 0.8% in the second quarter compared to an increase of 1.8% in the UK. Over the year, the sector grew by 1.2% in Scotland compared to 2.3% in the UK. Figure 14 shows the performance of the sector during recession and recovery.




From Figure 14 we can note that up until the last year the sector has performed much better in Scotland throughout both recession and recovery. Until recently retailing and spending in the high street may have held up better in Scotland than in the UK, but as the SNAP data show Scottish households persist with a higher savings rate even though it is now falling.



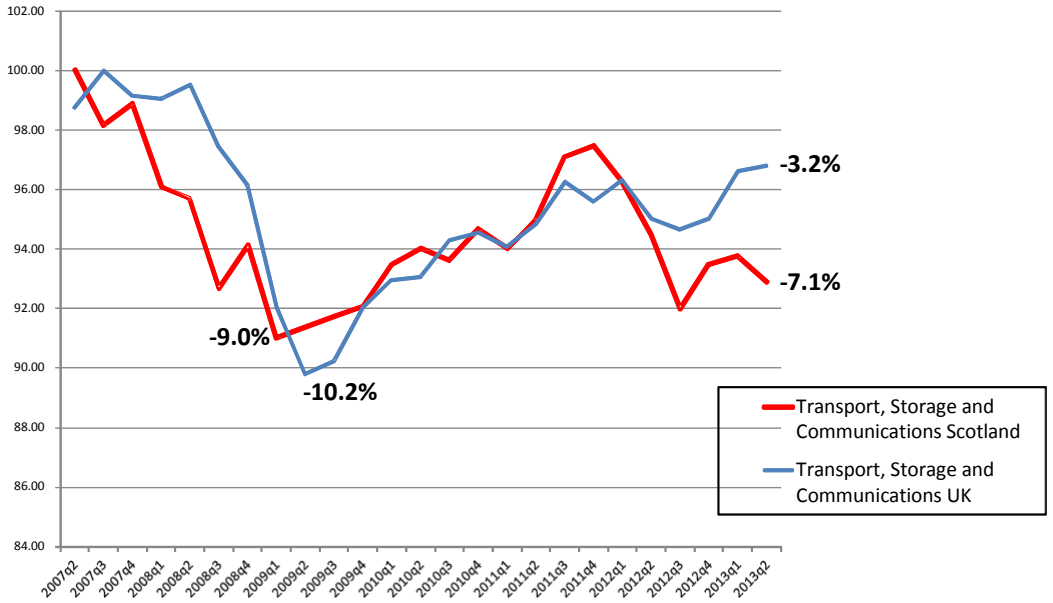

Government & Other Services GVA contracted by -0.1% in Scotland in the second quarter compared to no change in the UK. Over the year, measured value added in the sector was flat in Scotland compared to a *rise* of 1.3% in the UK. Figure 15 shows performance in recession and recovery.




We again continue to find the growth in the sector in the UK difficult to understand, at a time of fiscal consolidation, while the Scottish sector's performance is more intuitively reasonable. What is clear though, is that the downward revisions to the UK GVA data have reduced the level of GVA in this sector too. As a result, the gap between Scottish and UK performance is much narrower than before the revisions.

Finally, Figure 16 highlights the performance of transport, storage & communications in Scotland and UK in recession and recovery. The sector accounts for nearly 8% of total GVA and about 11% of service sector output.

**Figure 16: Transport, Storage & Communications: recession and recovery to 2013q2**



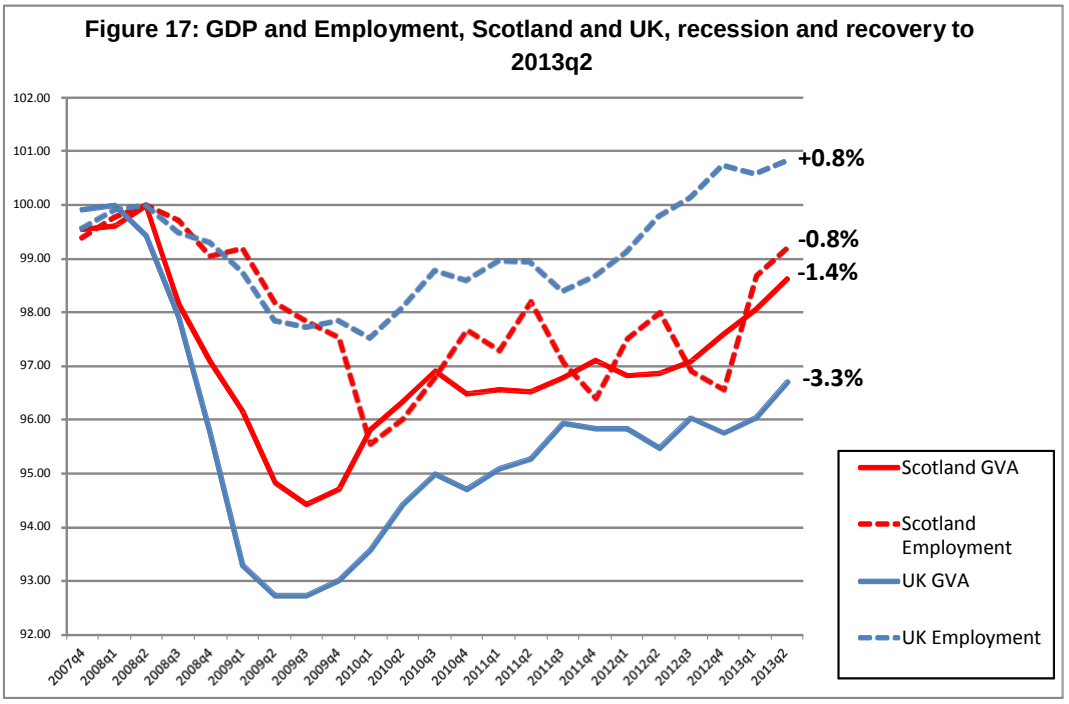

It is now evident after revisions to UK data that the sector experienced a slightly shallower recession in Scotland rather than a worse recession as reported in the June *Commentary*. However, it remains the case that the recovery in Scotland that was occurring has fallen away so that by the second quarter GVA was still more than 7% below the pre-recession peak compared to just over -3% in the UK. In the latest quarter GVA contracted by -1.7% compared to an increase of 0.2% in the UK. And, over the year, output in the sector fell by -3.4% in Scotland while remaining flat in the UK.

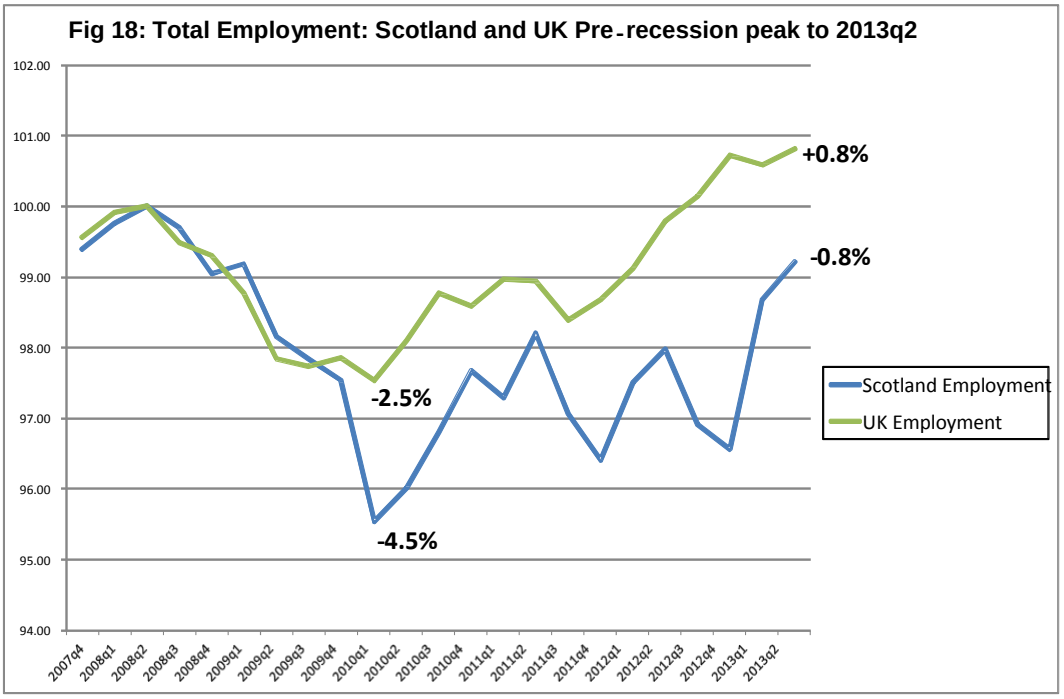
**The Labour Market**

The latest labour market data (see *Overview of the labour market* below) provide further evidence of an improvement in conditions in the Scottish labour market. In the quarter June to August employment continued to rise at a faster rate than in the UK but at a slower rate than in the first quarter. Jobs rose by 37,000, or 1.5%, compared to a rise of 155,000, a rise of 0.5%, in the UK as a whole. In addition unemployment fell by more than 3,000 to 201,000, or a rate of 7.3%. In the UK, unemployment fell more slowly by 18,000 maintaining the same unemployment rate of 7.7%.

As Figures 17 and 18 show these recent changes have brought the Scottish jobs market performance more into line with the performance of Scottish GDP and somewhat closer to UK jobs market performance. But as can be seen there are wide differences between UK GDP and UK job creation, with the faster growth in jobs clearly indicating a fall in labour productivity, which has not occurred to the same extent in Scotland.

Scottish jobs are now -0.8% below their pre-recession peak, which is still worse than the UK, where the jobs total is 0.8% *above* the pre-recession peak.

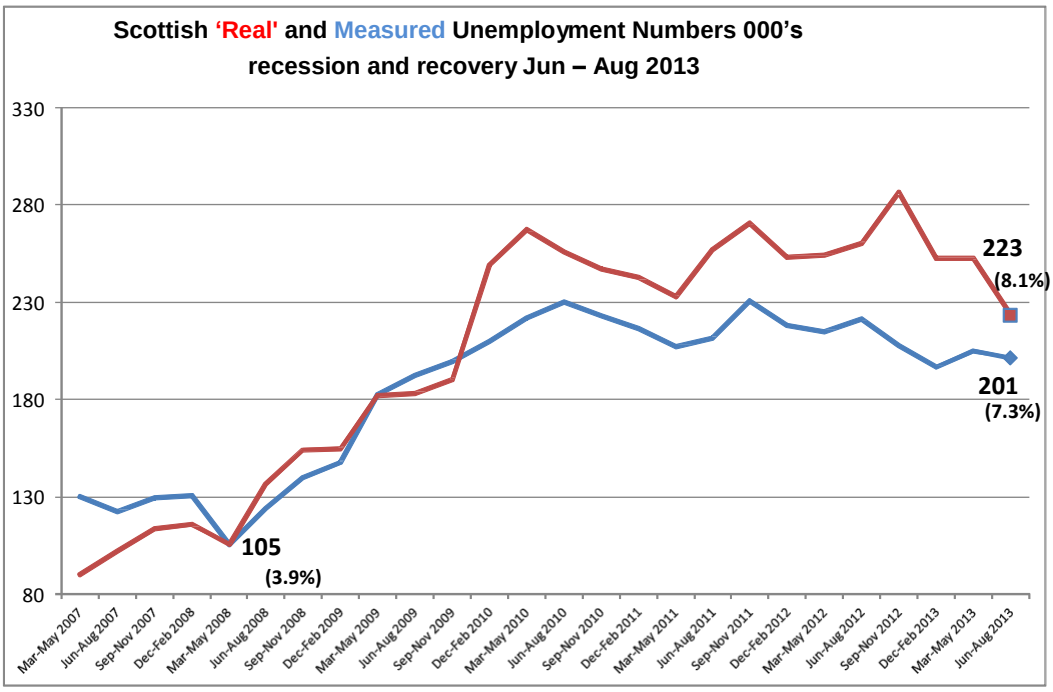



The August *State of the Economy* report from Dr Gary Gillespie, the Chief Economist of the Scottish Government, provides *inter alia* an excellent analysis of recent trends in labour productivity in Scotland and the UK. The report also seeks to account for the greater deterioration in labour productivity in the UK compared to Scotland. We are persuaded by some of the report's arguments and think it highly probably that a different pattern of sectoral growth, given sectoral differences in labour productivities, could be a key reason explaining the greater deterioration in labour productivity in the UK. Other possibilities include factor substitution in favour of labour and away from capital given falling labour costs thus lowering labour productivity. But the evidence provided by the Scottish Government is that the fall in

real wages between 2009 and 2012 of -8.1% has been less than the fall in the UK but not by much, with the fall in the UK being -8.5%. Demand deficiency, while, in our view, still clearly depressing output - confirmed by the report's estimates of the size of the output gap in Scotland - cannot explain the differences in productivity performance between Scotland and UK. The weaker output and demand position in the UK could be associated with greater labour hoarding in UK than Scotland but why would employment rise more quickly? Equally, the misallocation of capital argument allowing so-called 'zombie' firms to continue in production might account for a greater loss of GDP than jobs in the recession and it might mean that firms cannot get enough capital to expand. But it doesn't seem to explain why jobs would grow much more rapidly than output in the UK. A switch from full-time to part-time and self-employed jobs could raise the number of jobs even when output and the demand for labour is weak or even falling. But the differences between Scotland and the UK on these indicators are not sufficient, we believe, to account for a labour productivity 'puzzle' in the UK but not in Scotland.

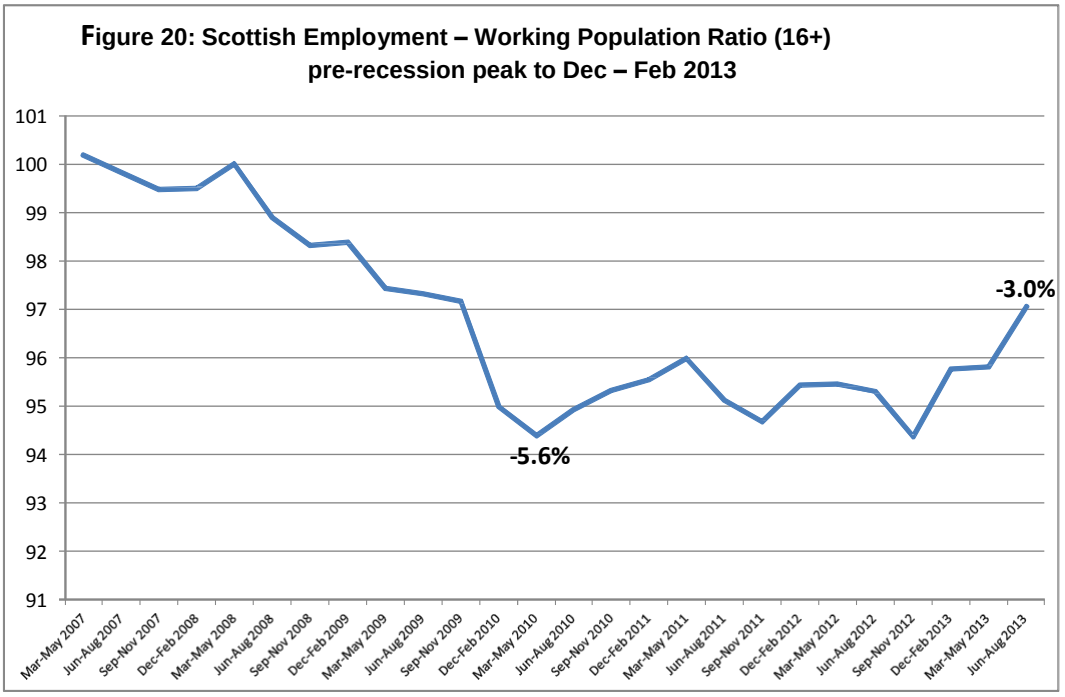
One interesting consequence of the recent burst in job creation in Scotland is the effect it has had on our estimate of the 'real' unemployment position compared to measured unemployment. This is shown in Figure 19 below.




What has happened here is that as jobs have been created and the expectations of those without a job of finding employment has risen, the number of so-called inactive workers has fallen.

Finally, the recent improvements in the Scottish jobs market and falling unemployment have started to feed through into the employment population ratio. Previously this had remained persistently low because the jobs that were being created were not matching the rise in the working population. This is shown in Figure 20.

Nevertheless, with the ratio still -3% below the pre-recession peak there is still plenty of spare capacity, or unused labour resources in the Scottish economy. And this statistic takes no account of the large increase in the part-time and self-employed workforce due to a lack of full-time employment - see Figure 2 in *Labour Market Overview* below. In those numbers there lies hidden, unused labour reserves.




**Forecasts**

*Background*

The preliminary estimate for UK GDP growth in the third quarter - published on 25 October - was a rise of 0.8% in UK GDP. This followed an increase of 0.7% in the second quarter, a 0.4% rise in the first quarter of this year, and a -0.3% fall in the final quarter of last year. Growth in the UK between the third quarter of 2012 and the third quarter of 2013 is reported as 1.5%. But in the third quarter last year the Olympics were held in London and this boosted UK GDP growth. It is therefore better to estimate annual growth as the latest 4 quarters over the previous 4 quarters. When we do this growth is 2.05%, a better approximation of where the economy is. With improving growth over the past 3 quarters in the UK, it seems clear that we have a more stable and, to use the jargon, that it is beginning to have 'traction'.

The preliminary estimate for the third quarter is output-based, so no estimates are provided of the contribution of the individual components of aggregate demand to growth. What the release does highlight is that output increased during the quarter in all four main industrial groupings within the economy: agriculture, production, construction and services. Output rose by 1.4% in agriculture, 0.5% in production, 2.5% in construction, and 0.7% in services. Given the dominance of services - 78% of the economy - the sector provided the main driver to overall growth. Moreover, this quarter's data is notable because GVA in the sector in the third quarter rose above its previous peak for the first time since the recession began 5 years ago in 2008. We must go to the UK quarterly national accounts for the second quarter to get an appreciation of the contribution of the individual components of aggregate demand to growth. These reveal that investment, household spending and government consumption were the three drivers of the 0.7% GDP growth reported in the quarter. Net trade made a zero contribution. However, within the investment figures, business investment made a negative contribution to growth and the growth of inventories was positive. Nevertheless, the ONS argued that " this suggests an improvement in investment appetite in the most recent quarters." But it is not much of an improvement and follows three quarters of negative growth in investment.

In Scotland, we will not have third quarter GDP until mid-January 2014. In the second quarter as we note above, real GDP rose by 0.6% in Scotland while rising by 0.7% in the UK. The economy has now been growing for the last 5 quarters with some indication that the growth rate is rising. The latest business

surveys - see *Review of Scottish Business Surveys* below - suggests that the recovery maintained and strengthened in the third quarter. But all this begs the question:

*Will the recovery be sustained?*

The recovery has a better chance of being sustained if growth is broadly-based. Unfortunately, this is not the case up to the first quarter. From the latest *Scottish National Accounts Project* (SNAP) data - published with corrections on 29 August 2013 - Scottish GDP in *current market prices* rose by 1.1% in the first quarter. When we disaggregate this change into the contribution of the different (expenditure) components of aggregate demand, we obtain Figure 21 below.

**Figure 21: Expenditure Components Percentage Contribution to Nominal Scottish GDP Growth in 1st Quarter 2013**

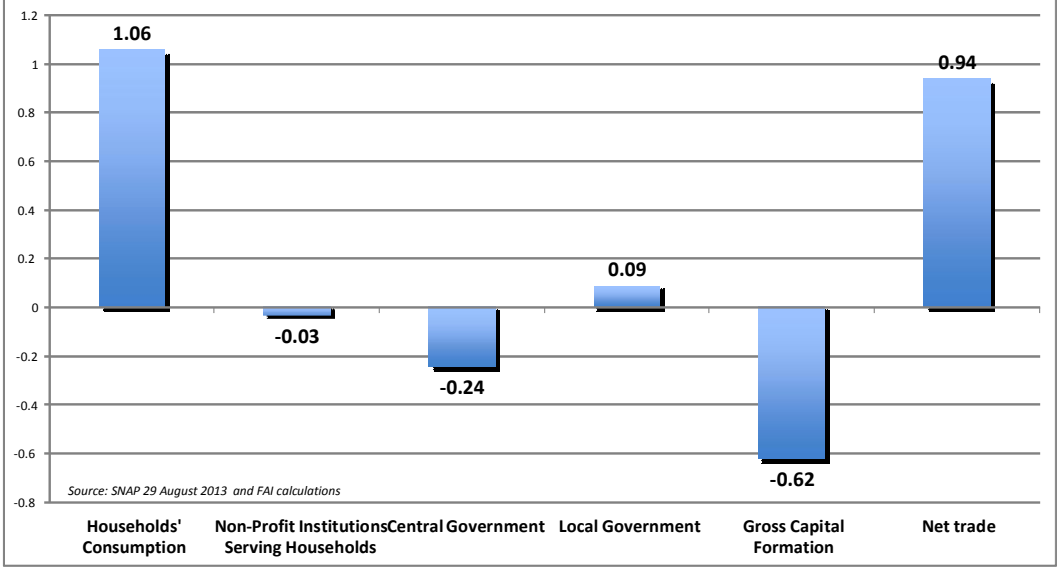



Figure 21 shows that both consumption and net trade made a positive contribution to growth in the first quarter. The positive contribution of net trade is somewhat encouraging given the need, reported in previous *Commentaries* to rebalance growth away from private domestic consumption to external demand and capital investment. This is certainly not happening with respect to investment, although we saw that investment was starting to make positive contributions to UK growth in the second quarter and to a lesser extent in the first quarter after three quarters of negative contributions. Moreover, the positive contribution of net trade only occurs because the trade deficit fell in the first quarter, so the dampening effect of the trade deficit on growth was reduced. The Scottish Government reports that this narrowing of the trade deficit was due to growth in current prices of the value of exports totalling 3.0%, largely to the rest of the UK, while the value of imports grew by only 1.6%. Whether this stronger performance of exports relative to imports will continue remains to be seen. Net trade made a negative contribution to UK growth in the second quarter as we noted above.

Some encouragement on the trade front is provided by the recent performance of manufacturing exports. In the second quarter, manufacturing exports grew by 3.5% at constant prices, although over the year to the second quarter the volume of manufactured exports fell by 1.8 per cent. Since July 2013, the methodology underpinning the series has been updated and improved, with revised outturn figures for previous quarters. The Scottish Government in its *Statistical Bulletin* reports that the pickup in exports was primarily due to an upturn in overseas sales of manufactured goods from Engineering & Allied Industries, and to continued growth in international exports of Refined Petroleum, Chemical & Pharmaceutical Products. The Bulletin notes that these are two of Scotland's largest export industries, respectively accounting for 26.5 per cent and 24.3 per cent of total sales of manufactured goods to the rest of the world. With nearly a quarter of manufacturing exports coming from Refined Petroleum,

Chemical & Pharmaceutical Products, we can see just one indicator of how much the Scottish economy is at risk were the Grangemouth petrochemical plant and refinery to close. (See Box 1 for a discussion of the impact on GDP, jobs and employment income of the closure of Grangemouth.)

### Box 1: Impact on the Scottish economy of the closure of Grangemouth

The announcement by Ineos on 23 October 2013 of the closure of its petrochemicals plant at Grangemouth and the possible closure of the adjacent refinery would be a major blow to the Scottish and even the UK economy. Though this has now been averted, it is useful to consider what the scale of the closure would have been on the Scottish economy.

The plant employs some 1370 direct jobs on the site, with 800 in the petrochemicals plant and 570 in the refinery and perhaps c.2,000 sub-contractor jobs. Refined petrol and chemicals account for nearly a quarter of Scottish manufactured goods sold to the rest of the world. The loss of Grangemouth would remove most of those exports.

We can use this data, plus some plausible estimates and Type II multipliers from the 2009 Scottish Input-Output tables published by the Scottish Government, to estimate the likely impact of closure on GDP/GVA, jobs, and employee income in the Scottish economy.

The monetary values and ratios to GDP and employee income are in 2009 prices, while jobs and jobs share relate to current 2013 figures. The I-O tables have a sector 27 which comprises coke, petroleum and petrochemicals. We have assumed that Grangemouth accounts for 75% of the value of output in this sector. We also assume that GVA is divided between the refinery and the petrochemicals plant in the same proportion as employment. This is an assumption and could be erroneous but we hope not by much.

This exercise suggests that closure of the *petrochemicals plant* would result in an economy-wide impact of: -0.7% of GDP; -4,240 jobs (0.2% of total employment); and -0.3% of employee income. For the *refinery*, the comparable numbers would be: -0.5% of GDP; -3,021 jobs; -0.1% of employment; and -0.2% of employee income.

Closure of the *whole Grangemouth site* would lead to: a -1.2% fall in Scottish GDP, the loss of 7,261 jobs (0.3% of employment) and a loss of 0.5% of employee income: a very significant impact on the Scottish economy, from what is a single – albeit very large – industrial site.

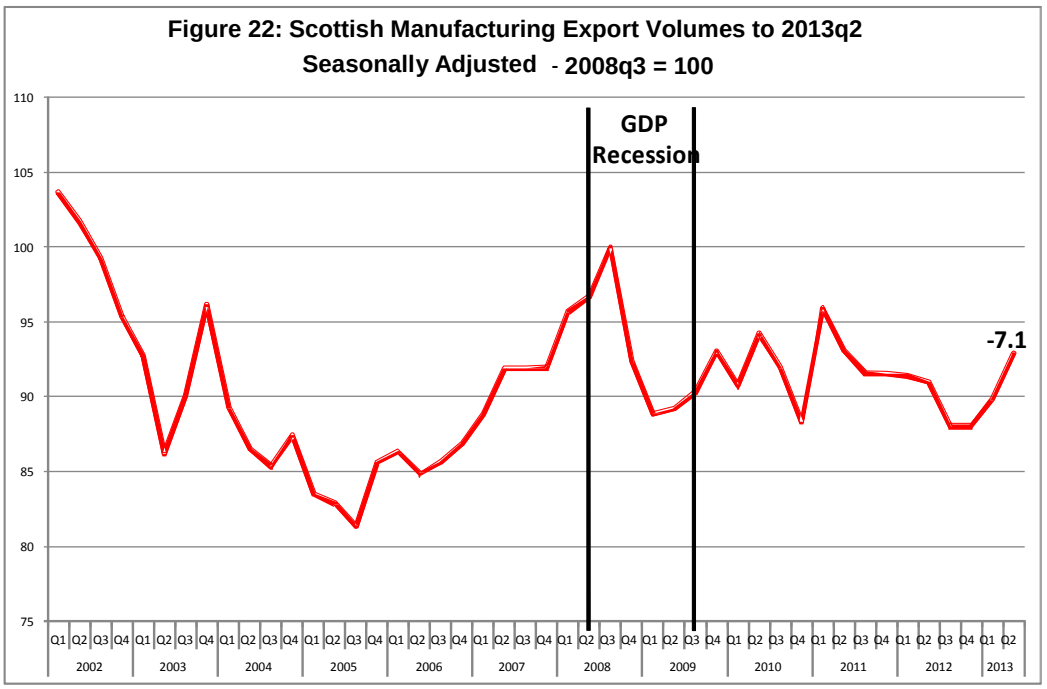
Figure 22 depicts the recent trends in manufacturing exports during recession and recovery in relation to the pre-recession peak in 2008q3.

After falling by just over 11% in the recession, export volumes have behaved erratically with no sustained recovery. However, recent growth during the past two quarters means that they now stand just over -7% below their pre-recession peak. It is to be hoped that this improvement continues.

So, what is clear from Figure 21 and the above is that household spending remains the main driver of growth, although investment is beginning to figure in the UK and net trade in Scotland. But the main drivers of household spending remain weak - see *Forecasts of the Scottish Economy section* below.

The growth of private sector pay in the UK - and presumably in Scotland - remains low with growth of 1.2% over the year to July 2013. This is less than the rate of inflation and so indicates a continuing fall in real wages, which in turn must affect household spending. The housing market continues to be weak. Lending to both first time buyers and existing owner occupiers is rising slowly but is significantly below peak. Both starts and completions of new build are still in decline. And Scottish house prices continue to fall as prices begin to rise elsewhere in the UK. With no growth in house prices there is no boost to household wealth and increased spending. Equity prices are rising again and remain high compared with 2012. But it is unlikely that this will have much impact on consumer spending because of the relatively low levels of share ownership in Scotland. The Scottish household saving rate remains high at 8.1% and nearly 4 percentage points higher than in the UK. This suggests that debt continues to be paid down.

However, the household savings ratio has been falling in Scotland over the past year: by more than 4 percentage points from 12.3% in the first quarter of 2012. Anecdotal and some statistical evidence suggests that households in Scotland as in the UK are borrowing more. Scots and others in the rest of the UK are buying more new cars: new car registrations in Britain rose by 12.1% for the 19th consecutive month in September. And a greater proportion are being bought on credit of one form or another. But if real incomes continue to fall and asset prices - mainly housing - remain flat, it is difficult to see how such borrowing and spending can be sustained. One way is highlighted by the growth of pawnbrokers on Scottish high streets, cash generators and pay-day loan operations. Impressionistically, it appears that many people are selling assets - cameras, electronic equipment, and musical instruments - to raise funds for current spending. This readymade mechanism for rapidly transferring assets into cash could be giving a boost to the economy. But it is hard to see how it can last, without rising real incomes and asset values; the amount of saleable assets held by households is obviously finite.




This lack of *real* household income growth combined with negative or weak investment, a weak net trade position and the burden that continues to be imposed upon the UK economy by the Coalition Government's programme of fiscal consolidation, with more than £70 billion still to be taken out of the economy, raises a large question mark over whether the recovery can be sustained. The Deputy Governor for Monetary Policy of the Bank of England Charlie Bean argued in a speech on 22 October that the nascent resurgence in growth that we have seen this year will be sustained principally because first, UK banks are now well-placed to provide the credit necessary to support a recovery, due to improved capital positions and lower bank funding costs, and second, because the 'existential' crisis in the eurozone has ended. But for these changes to boost growth they have to impact on the key components of aggregate demand: household spending, investment and net trade. While the crisis in the eurozone does appear to have abated (somewhat), there are still question marks over the long-term future of the euro in its present form. The eurozone is still in, or just emerging from, recession so while we might expect some boost to the demand for UK exports in the coming year it is unlikely to be rapid. Moreover, a greater propensity to lend on the part of the banks in the UK needs to be met by a willingness to borrow. Large companies appear to be sitting on large cash reserves and are still unwilling to undertake major investments (presumably based on their low expectations of future growth). Households are borrowing more and may be induced to borrow more by a greater willingness of lenders to lend. But household spending can only be sustained if there are increases in *real* household incomes and the value of assets held, no matter what the banks do.

It is against this background that we have prepared our latest forecasts.

*GVA Forecasts*

For our latest GVA forecasts we continue the presentational procedure adopted in earlier Commentaries. We present only a central forecast but use estimated forecast errors to establish the likely range within which the true first estimate of the growth of Scottish GVA will lie.

Table 1 presents our forecasts for Scottish GVA - GDP at basic prices - for 2013 to 2015. The forecasts are presented in more detail in the *Forecasts of the Scottish Economy* section of this Commentary below.

**Table 1: Fraser of Allander Institute Forecast of Scottish GVA Growth, 2013-2015**

| GVA Growth (% per annum) | 2013 | 2014 | 2015 |
|---|---|---|---|
| **Central forecast** | **1.3** | **1.8** | **2.1** |
| *June forecast* | *0.9* | *1.6* | *2.1* |
| **UK** mean independent new forecasts (October) | 1.4 | 2.2 | na |
| Mean Absolute Error % points | +/- 0.287 | +/- 0.516 | +/- 1.204 |

*Source: Fraser Economic Commentary Vol. 37, No. 2*

Table 1shows that our GDP forecast for 2013 at 1.3% has been revised upwards from our June and March forecasts of 0.9%. For 2014 we have also revised up our forecast from 1.6% in June to 1.8%, while for 2015, we retain the same 2.1% prediction as in June. The forecasts for 2013 and 2014 are higher than in June because of better than expected outturn data on the growth of household spending and increasingly optimistic surveys during the summer and early autumn. But we are still predicting below trend growth next year reflecting the continued relative weakness of domestic demand, in particular government spending and consumer expenditure, and only slowly rising growth in eurozone markets but stronger growth in the rest of UK to which Scottish exports are so reliant. After 5 years since the start of the Great Recession we are now witnessing a much stronger recovery. But as discussed above there are good reasons to be hesitant about whether the recovery can be sustained.

Table 1, also compares our GVA forecasts with the median of latest independent forecasts for the UK in, 2012 and 2014 and the average of the new independent medium-term forecasts for 2015 that are published by the UK Treasury. These show that we expect Scottish growth to continue to be a little weaker than UK growth this year and next year. So, we are now forecasting growth of 1.3% in 2013, 1.8% in 2014 and 2.1% in 2015. Given our previous forecast errors the lower and upper bounds for growth in 2013 are expected to be 1.01% and 1.59%, for 2014, 1.28% to 2.32%, and for 2015, 0.90% to 3.30%.

Production and manufacturing continue to be the major sectors exhibiting the fastest growth in 2013, 2014 and 2015. In 2013, production is projected to grow by 1.5%. Services and construction display positive growth this year at 1.2% and 1.0% respectively. This relative performance continues in both 2014 and 2015 as forecast growth across all sectors increases. Production grows by 2.2% and 2.5% in 2014 and 2015, while service growth is projected to be 1.7% and 2.0%. The construction sector

continues to lag but picks up to 1.4% and 1.3%. We have therefore revised up the forecast of growth in all the major sectors in 2013 and 2014.

*Employment Forecasts*

Table 2 presents our forecasts for net employee jobs for the years 2013 to 2015 in terms of a central and upper and lower forecast.

**Table 2: Fraser of Allander Institute Forecast of Scottish Net Jobs Growth in Three Scenarios, 2013-2015**

| | 2013 | 2014 | 2015 |
|---|---|---|---|
| Upper | 27,900 | 38,100 | 68,750 |
| *June forecast* | *22,600* | *50,500* | *64,300.* |
| **Central** | **21,200** | **27,200** | **38,400** |
| June *forecast* | *14,150* | *28,200* | *38,700* |
| Lower | 15,750 | 16,450 | 11,400 |
| *June forecast* | *2,450* | *4,450* | *16,400.* |

*Source: Fraser Economic Commentary Vol. 37, No. 2*

We have generally raised our forecasts for job creation in 2013 compared to our June forecast. This reflects the stronger jobs performance noted in the recent data and our raised GVA forecast. On the central forecast, we are now forecasting that net jobs will rise by 21,200 in 2013, rising to 27,200 in 2014 and 38,400 in 2015. This year, we now expect just over 19,000 service sector jobs will be created, with small numbers of net jobs added in production due to expected productivity increases given the growth in output, and somewhat stronger jobs growth in agriculture. A slight fall in construction jobs is anticipated this year. In 2014/2015, the bulk of the jobs created are expected to be in the service sector with an additional 24,000 to 30,500 jobs forecast, with 400 to 4,250 added in production, 1,800 to 2,150 in agriculture and 950 to 1,550 in construction.

*Unemployment Forecasts*

The ILO rate is our preferred measure since it identifies those workers who are out of a job and are looking for work, whereas the claimant count simply records the unemployed who are in receipt of unemployment benefit. Our unemployment forecasts have been revised down again from June, reflecting higher employment given the growth of output. We also now see many workers re-entering the labour market as job prospects improve. This lowers our estimate of 'real' unemployment but may tend to raise measured unemployment as jobs are being created. The upshot is that unemployment may not fall as much as the job creation figures might suggest. Our projection for unemployment on the ILO measure at the end of 2013 is now 204,550 (7.6%). We continue to expect the unemployment position to deteriorate slightly in 2014 compared to 2013 due to relatively weak output and employment growth. Unemployment is now forecast to be 224,800 (8.4%) by the end of 2014 but then falls back to 186,450 (7.0%) by the end of 2015 as growth in the economy strengthens.

The key unemployment forecasts are summarised in Table 3.

**Table 3: Fraser of Allander Institute Forecasts of ILO unemployment 2013-2015**

| | 2013 | 2014 | 2015 |
|---|---|---|---|
| *ILO unemployment* | | | |
| Rate (ILO un/TEA 16+) | **7.6%** | **8.3%** | **6.9%** |
| June forecast | 7.9% | 8.4% | 7.0% |
| Numbers | **204,550** | **224,800** | **186,450** |

*Source: Fraser Economic Commentary Vol. 37. No. 2*

**Prof. Brian Ashcroft**
**Fraser of Allander Institute**
**25 October 2013**