

## TSC Pre Appointment Questionnaire

Andy Haldane

Chief Economist and Executive Director for Monetary Analysis

### A. PERSONAL/GENERAL

1. Do you intend to serve out the full term for which you have been appointed?

Yes.

2. Which of your publications or papers are of most relevance to your future work on the Monetary Policy Committee (MPC) and as Chief Economist and Executive Director for Monetary Analysis?

During my first 10 years at the Bank, I worked extensively on monetary policy issues, in particular the design of the UK's inflation targeting regime, central bank independence and the costs of inflation. I published extensively on these issues at the time, including editing one of the first books on cross-country experience with inflation targeting in 1995. During this period, I also worked with a number of overseas central banks in the design of their inflation-targeting frameworks.

Some of my other relevant publications over this period include:

*"Interest Rate Control in a Model of Monetary Policy" (with S Dale), Bank of England Discussion Paper No.17 and The Manchester School, 1998.*

*"Interest Rates and the Channels of Monetary Transmission: Some Sectoral Estimates" (with S Dale), European Economic Review, December (1995). Also Bank of England Discussion Paper No.18.*

*"Rules, Discretion and the UK's New Monetary Framework", Bank of England Working Paper No.40 (1995).*

*"Base Money Rules in the United Kingdom" (with B T McCallum and C K Salmon), Bank of England Working Paper No.45 (1996) and The Manchester School, Vol. LXIV, 1-27 (1996)*

*"Independence and Accountability" (with C B Briault and M A King), Bank of England Working Paper No.49, and in Toward More Effective Monetary Policy, Kuroda, I (ed.), Macmillan Press, 1997.*

*"Shoe-Leather Costs Reconsidered" (with J Chadha and N J Janssen), The Economic Journal, 1998.*

*"Some Costs and Benefits of Price Stability in the United Kingdom" (with H Bakhshi, N Hatch), NBER Working Paper No.6660 and in The Costs and Benefits of Price-Stability, M Feldstein (ed.), NBER (1999).*

*"On Inflation Targeting in the United Kingdom", Scottish Journal of Political Economy, 1998.*

*“Forward-Looking Rules for Monetary Policy” (with N Batini), NBER Working Paper No.6543 and in J B Taylor (ed.), Monetary Policy Rules, NBER (1999).*

*“UK Monetary Policy and Phillips Curves” (with D Quah), Journal of Monetary Economics, Vol. 44, 259-78, 1999.*

For most of the past 15 years, I have worked extensively on international monetary system and financial stability issues which, while closely related to monetary policy questions, cover distinct ground. Nonetheless, a number of my recent speeches and papers do have a direct bearing on monetary policy issues, in particular the interface between macro-prudential and monetary policy. This includes:

*“In favour of macro-prudential regulation”, Risk Magazine, 2012.*

*“Complexity, Concentration and Contagion” (with P Gai and S Kapadia), Journal of Monetary Economics, Vol. 58 (5), pages 453-470, 2011.*

*“Curbing the Credit Cycle” (with D Aikman and B Nelson), The Economic Journal (2014) doi: 10.1111/eoj.12113*

*“Ambidexterity”, remarks delivered at the American Economics Association Annual Meeting, Philadelphia, January 2014.*

*“The Age of Asset management?” speech given at the London Business School, April 2014.*

### **3. How has your experience to date prepared you for the role of Chief Economist and Executive Director for Monetary Analysis, including your role on the MPC?**

I have almost 25 years of experience at the Bank of England working as a macro-economist. Most of this time has been spent working on monetary and financial stability issues, domestically and internationally. My career has spanned both the monetary policy and financial stability wings of the Bank, with around a decade spent on the monetary policy side when I first arrived at the Bank.

During that earlier period, I worked on a wide range of monetary policy issues, including inflation-targeting from its inception, central bank independence prior to its introduction in the UK and helping develop the MPC's processes and procedures immediately after independence, among other things. I also helped in briefing the top of the Bank on macro-economic developments relevant to our advice to the Chancellor on the setting of monetary policy.

For the past five years, I have been the Bank's Executive Director for Financial Stability. I was a founding member of the new FPC and helped create its new processes and procedures. During the period of the FPC, we have worked increasingly closely with MPC colleagues when assessing risks to the economy and financial system – for example, on issues around the “financial stability knock-out” for forward guidance and, latterly, on housing market issues. There have been several joint meetings

of the FPC and MPC, a practice I anticipate intensifying in the period ahead given the similar issues facing both committees.

I have contributed, through published papers and speeches, to research thinking on monetary and financial stability issues throughout my career, publishing extensively and giving a great many speeches domestically and internationally. I have an extensive international network on both monetary policy and financial stability issues.

**4. What do you regard as the main challenges you will face in the next three years? What criteria do you suggest should be used to assess your record as Chief Economist and Executive Director for Monetary Analysis?**

The main challenges, and associated success criteria, are likely to include:

- Managing the exit from the UK's extra-ordinary monetary policy stance in an orderly and graduated way, through a combination of higher interest rates and a withdrawal of QE, so as to support the MPC's objectives of preserving price stability while supporting economic growth and financial stability.
- Contributing to thinking on the UK's monetary policy framework in the light of the crisis. This is likely to include issues around improved forecasting, enhanced transparency, increasing the role of financial and global factors in understanding the monetary policy transmission mechanism and considering appropriate policy instruments for securing the MPC's objectives. There are unresolved issues on all of these fronts. The UK's monetary policy framework should be seen to be at the frontier of international best practice on these issues.
- Contributing to the development of a framework for assessing the respective contributions of monetary and macro-prudential policies in the achievement of UK, and global, price and financial stability. This includes considering appropriate analytical inputs to, and interactions between, the MPC and FPC.
- Helping strengthen and deepen the Bank's research function, so that it can contribute to all of the key policy issues currently facing central banks - a "One Bank" research agenda. The Bank should seek to be at the frontier of international thinking on a number of these issues, including the interaction between monetary, macro- and micro-prudential policies.
- Contributing to thinking on the international transmission of monetary and financial stability shocks and their implications for policy, including the design of the international monetary system.

**5. Following the launch of the Bank of England's strategic plan, how do you think your role will differ from your predecessor's?**

In two main respects.

First, a new post of Director for Monetary Analysis is being created. This position will oversee staff inputs into the MPC process, including the forecast and briefing analysis to the Committee. This will allow a clearer separation between staff views on key macro-economic issues and my own as member of the MPC. This ought to strengthen the independence of the Chief Economist's voice on the MPC, as well as freeing up more of my time for the analysis of particular monetary policy issues. This separation is in line with the recommendations of the Stockton Review of the Bank's forecasting procedures.

The second key change is that the role of the Bank's Chief Economist is being expanded to cover, for the first time, Bank-wide research and data. In future, I will operate as Chief Economist for the whole of the Bank. A key plank of the Strategy Plan is to increase the quantity and quality of the Bank's research and data capabilities, including by having a "One Bank" research and data plan. The Chief Economist is expected to deliver on those objectives.

**6. How do you think the co-ordinated research agenda will change how the Bank of England operates?**

The benefits of a co-ordinated, One Bank, research agenda include:

- A more joined-up framework for analysis and decision-making between monetary, macro- and micro-prudential policies – for example, what sets of risks are more appropriately dealt with through macro-prudential rather than monetary policies? When are there complementarities, or conflicts, between the objectives of micro- and macro-prudential regulation?
- The development of innovative approaches to the analysis of risks to price and financial stability – for example, how great are the risks to UK price and financial stability from fluctuations in the price of global assets?
- The Bank playing an international leadership role on key central banking issues, including in the design and execution of monetary, macro- and micro-prudential policies – for example, what is an appropriate degree of co-ordination between these tools?
- The development of new approaches to assessing financial market developments and operations, new types of currency and finance and new approaches to financial system supervision – for example, how large are the risks from digital currencies? And how should the Bank's balance sheet be used to best secure price and financial stability?

- The injection of fresh ideas, including from outside institutions and from other disciplines, to improve the diversity of Bank thinking on key central banking issues.
- More imaginative use of new data, and new data techniques, to tell stories about risks to price and financial stability – for example, using supervisory data on mortgages better to understand developments in the housing market.
- Helping the Bank become a more open, transparent and self-improving organisation by publishing open research questions, making available new datasets to answer these questions and working collaboratively with outside institutions.

## **B. MONETARY AND ECONOMIC POLICY**

### **7. What do you regard as the major risks to the outlook for the UK economy?**

These include:

- Slower than expected growth in emerging market economies, including the possibility of a harder-than-expected landing in China. This would provide a headwind to world, and hence UK, growth.
- A resumption of financing and growth problems in peripheral European countries – for example, as a result of growth not resuming sufficiently quickly to stabilise debt dynamics.
- Sustained weakness in UK productivity which undermines confidence in, and retards medium-term growth prospects of, the UK economy.
- A disorderly exit from the extraordinary international monetary policy stance, which causes dislocations in financial markets and hence damages international growth prospects.
- A material strengthening of the international search for yield, which results in excessive risk-taking and debt-accumulation, with damaging implications for the sustainability of global growth prospects over the medium term.
- A further material strengthening of the UK housing market, with an accompanying slackening of mortgage underwriting standards, causing a further rise in household indebtedness, with potentially damaging implications for the sustainability of UK growth prospects over the medium term.

### **8. What do you regard as the difference between the OBR's measure of the output gap, and the Bank of England's measure of spare capacity, and what would your estimate of both be?**

The MPC's concept of "spare capacity" and the OBR's definition of the "output gap" are somewhat different, reflecting the different uses to which they are put. The MPC's concept of spare capacity describes the quantity of additional output that could be produced in the economy without creating inflationary pressures. This concept is consistent with the MPC's short to medium-term inflationary objectives.

The OBR defines the output gap as the additional output that could be produced once all shocks to the economy have worked through the system. It is a longer-run definition of the extra output that the economy could produce. This concept is consistent with the OBR's medium to longer-term fiscal objectives.

The MPC's definition of spare capacity can usefully be decomposed into measures of slack within companies and measures of slack within the labour market. On this definition, and as set out in the Bank's February *Inflation Report*, the MPC judged the central estimate of spare capacity to lie in the range 1 – 1½% of GDP, though there are a range of views around that central estimate. All of that slack was felt to exist in the labour market, rather than within companies, with around half reflecting the MPC's judgement of how far unemployment could fall without generating wage pressures and the other half reflecting how far average hours worked could increase without generating wage pressures.

These seem like reasonable central estimates of economy-wide slack in the UK. Inevitably, they are likely to be measured with a high degree of imprecision. For example, there are considerable uncertainties about how far unemployment could fall without generating inflationary pressures and about the permanence of workers' appetite for working longer average hours. And these factors may themselves change as the economy picks up pace, as Martin Weale has recently argued.

In addition, it is worth noting that the relationship between the output gap and inflation has, over recent years, been weaker than in the past. There are a number of possible explanations for this. The anchoring of inflation expectations, due to the higher credibility of monetary policy regimes, is one.

The changing nature of the production process within firms is a second. For some businesses, it may be possible to expand output without increasing significantly the intensity with which labour and capital are used - for example, in some software or high-tech businesses. It is too early to know for sure how significant these structural changes might be over the medium term.

All of this argues against assuming too mechanical a link between any measure of the output gap or spare capacity and future growth and inflation prospects.

## **9. What is your view of the UK's 'productivity puzzle'?**

UK private sector productivity has been strikingly weak since the financial crisis struck. Its shortfall relative to its pre-crisis trend may be as high as 16%. Productivity growth has remained disappointing even as the economy has picked up pace and is not expected by the MPC to return to 2% annual growth until 2016. UK productivity experience stands in sharp contrast to experience in the US.

This is not all bad news. The flipside of the weakness in productivity has been the strength of employment in the UK, with 1.3 million extra people in jobs compared with four years ago. A jobs-rich recovery is better than no recovery at all. And, longer-term, preserving jobs may be beneficial for medium-term growth if it helps prevent the loss of human capital skills otherwise associated with unemployment.

Although difficult to identify precisely, a number of potential explanations have been put forward for the UK's "productivity puzzle". The Bank's own research, and its contacts with industry practitioners, academics and businesses, have tended to confirm these explanations. They include:

- Labour hoarding by firms - for example, to help preserve valuable skills among the workforce which might otherwise be lost through redundancy.
- Labour market flexibility – for example, workers being willing to accept lower real wages or weaker terms of employment to preserve their jobs and those of colleagues.
- Reduced investment by firms in innovation, research and development, which may have retarded labour-saving technical progress.
- Restrictions on credit supply and lender forbearance, which may have helped keep low-productivity older firms in business and restricted the supply of credit to higher-productivity new businesses.
- The rapid rise in self-employment, which may have reduced scale efficiencies in production.

In practice, no one of these explanations is likely to account fully for the UK's productivity puzzle. But some of them, at least, are likely to be temporary in their impact. For example, there are recent signs of a rise in business investment and a loosening of credit constraints, which may help boost future UK productivity. Nonetheless, uncertainties around future productivity trends are likely to remain very considerable for some time.

## **10. How far is the banking system holding back the UK recovery?**

The impairment of UK banking sector balance sheets as a result of the global financial crisis has, in my view, provided a significant headwind to the UK economy over the past 5-6 years, as reflected in the chronic weakness in bank lending in particular to smaller UK businesses.

There has been a debate over this period about whether the weakness of credit growth reflected demand or supply factors. I suspect there have been elements of both. For example, it would have been very surprising had the crisis not heightened risk aversion and uncertainties about future demand among both banks and companies. This will have blunted both banks' willingness to lend (credit supply) and companies' willingness to borrow (credit demand).

The Bank's own analysis has tended to assign perhaps a little more than half of the weakness in credit growth to supply-side factors since the crisis. The evidence from Sir Andrew Large's report on lending practices at RBS is consistent with that general impression. I suspect some of the supply-

side constraints on lending have related as much to lack of good processes and qualified personnel within banks, as shortages of capital and liquidity.

If so, this suggests it may take time for lending capacity to be rebuilt durably among incumbent banks. This increases the importance of new entrants to the lending market. Encouragingly, there are recent signs this appears to be happening.

The other piece of good news is that there is some evidence from credit conditions surveys to suggest that credit market headwinds to growth may be beginning to abate. At least part of the reason for that is the strengthening of the capital and liquidity positions of UK banks which occurred partly as a result of the FPC's stress testing exercise in 2012/13.

#### **11. How successful was the first phase of forward guidance? Do you support the second phase of forward guidance?**

Since its inception, the UK's inflation-targeting regime has been close to best practice as regards monetary policy transparency. This has been fundamental in the success of this regime.

Transparency increases the effectiveness of monetary policy by helping shape expectations about the future path of policy.

I see forward guidance as a natural evolutionary step towards further strengthening that effectiveness. Forward guidance, in the UK and overseas, aims to provide greater clarity about the future policy path, beyond that which is conveyed by existing transparency devices such as published minutes, speeches and forecasts.

There is some evidence that businesses and households in the UK valued the greater clarity about future monetary policy actions offered by the first phase of forward guidance. This may have better enabled them to plan their future spending and saving. It is also possible that, given the positive news on the economy over the past year, financial markets may have anticipated a steeper rise in interest rates in the absence of forward guidance, which would have tended to hold back the recovery we have experienced.

In my view these are clear benefits. Though their impact is difficult to judge, it is likely to have been positive, if not huge, in macro-economic terms. The second phase of forward guidance usefully moves the framework forward, away from a focus on a single, published unemployment metric and towards a more generic assessment of spare capacity. This, too, is a natural evolution in the framework. Given the conceptual and measurement issues associated with "spare capacity", it will be an on-going challenge to provide the necessary degree of clarity on future policy intentions. As a Committee, we will need to work hard to achieve that clarity.

**12. What consideration should be given to asset prices, including house prices, within the framework for inflation targeting? In particular, how should monetary policy react to asset price bubbles?**

I think financial factors in general, and asset prices in particular, play a more central role in explaining the dynamics of the economy than is typically reflected in macro-economic models, even after the experience of the crisis. For example, existing macro-economic models tend to underemphasize:

- Open economy or international factors, in particular international financial factors such as movements in the international flows of funds and in international risk appetite.
- Financial factors, including the importance of bank and non-bank financing, the terms of this financing and flows of funds between the household and corporate sectors and the broader financial system.
- Movements in asset prices and, in particular, in the price of risky assets in determining saving and spending decisions.

As one example, the huge accumulation of pre-crisis debt was assigned little significance as a risk to the economy, despite the fact that credit booms more often than not in the past have presaged financial crises. The post-crisis debt overhang on the balance sheets of companies, households and governments was similarly given insufficient emphasis in explaining the weakness of output. Most mainstream forecasters did not weigh financial factors sufficiently, pre or post-crisis. And this is one of the main reasons why most forecasters missed both the crash and the weakness of the resulting recovery.

As a second example, in the current environment global risk factors (such as the search for yield) appear to be having a fundamental influence on global growth and risk prospects, including here in the UK. This includes in the UK's domestic housing market. There is a question about whether these global financial factors are being weighed sufficiently in judging the fortunes of the UK and other economies.

These issues are related to, but distinct from, the question of whether asset prices ought to form part of a consumer price index. Because the costs of housing services form such a considerable component of households' overall consumption spending, it is odd they are not reflected in headline CPI. A CPI which incorporates the user cost of housing services has been developed and is now published by the ONS. It is ultimately for Government to determine the appropriate index for the MPC to target.

There is a long-standing debate about whether other (than housing) asset prices should be incorporated into a price index. I am open-minded on this issue. In theory, the price of goods both today and tomorrow are relevant to determining spending decisions now and in the future. In others

words, a “cost of life” index, as distinct from a “cost of living” index, is the relevant concept (to use the language of Alchian and Klein from the 1970s). I think such an index, even if not officially used as an objective of policy, might be a useful metric for gauging risks to price and financial stability. More generally, I think it is a mistake to partition goods and asset prices, and price and financial stability issues, too strictly. That was one of the big policy mistakes made in the pre-crisis era.

A deeper question still is whether monetary policy, or other set of policies such as macro-prudential policies, are better equipped to deal with issues such as financial imbalances, leverage and asset prices. It is clear that even existing flexible inflation-targeting regimes have some scope to lean against these problems by altering the horizon at which inflation is brought back to target. And, as Jeremy Stein at the Federal Reserve Board has recently argued, there is a case for considering whether monetary policy should have a more explicit role in addressing financial market vulnerabilities, to the extent these risk disrupting the future functioning of the economy or financial system. I am open-minded on the future role monetary policy might play in dealing with these vulnerabilities.

At the same time, the addition of a second macro-economic instrument, in the form of macro-prudential policy, provides an alternative means of tackling financial imbalances before they risk disrupting the wider economy and financial system. Some of my recent research has considered the benefits of this “two handed”, or ambidextrous, approach to macro-economic policy. It suggests that, in dealing with some of the financial imbalance problems of the past, use of a macro-prudential instrument would have very usefully complemented monetary policy in smoothing the fortunes of the economy and wider financial system.

Those benefits arise in part from having a second pair of policy hands and in part because macro-prudential policy interventions can be targeted at particular sources of financial system stress. Recent co-ordination between the FPC and MPC, when dealing with potential risks around the UK housing market, are an example of these benefits of co-ordination in practice.

### **13. Are there circumstances where you might tolerate higher than target inflation for wider economic reasons?**

The UK, as with many other countries, operates a regime of flexible inflation-targeting. This includes flexibility over the horizon at which inflation might be brought back to target in the event of a temporary deviation. In my view, the sorts of events that might justify such a deviation from target, whether above or below, include:

- A cost or other supply-side shock which causes output and prices to temporarily move in opposite directions.

- A particularly deep or prolonged recession which risked generating medium-term deflationary pressures or causing lasting damage to productivity and growth.
- Financial imbalances, such as the build-up of excessive amounts of debt among banks, households or companies, which could pose a risk to sustainable longer-term growth.
- Excessive risk-taking within the financial sector, or excessive adjustments in asset prices, which could also put at risk longer-term growth and stability.

Whether to allow temporary deviations from the medium-term inflation target will depend also on how well-anchored are inflation expectations. The better anchored these expectations, the stronger the case for temporary deviations from target. At present, inflation expectations in the UK appear to be pretty well-anchored at around the inflation target, suggesting some scope for using the flexibility built in to the inflation-targeting regime.

**14. What is your assessment of the effectiveness of the policy of quantitative easing in the UK, and of what needs to be considered when preparing for the eventual unwinding of quantitative easing? What is your view of the distributional effects of QE?**

The evidence we have on the effectiveness of QE is, by its nature, partial and event-specific. Nonetheless, this evidence has tended to paint a reasonably consistent picture, suggesting that QE has played a useful role in supporting the economy at the zero lower bound on interest rates in the UK and US. Events studies of financial asset price movements around the time of QE announcements are consistent with that. But so too are more recent empirical estimates of its impact on GDP and inflation - for example, the recent Bank discussion paper by Weale and Wieladek which points to quite large effects. On the Bank's estimates, in the absence of QE, the UK economy would be between 2% and 3% smaller than today, although the confidence intervals around these estimates are wide.

This evidence is consistent with developments in financial markets since the onset of QE. One of the key channels through which monetary policy and QE is intended to work is by stimulating risk-taking – for example, by lowering short and long-term interest rates and by encouraging portfolio rebalancing towards higher-risk assets by institutional investors. This, in turn, would tend to boost asset prices. There is evidence of all of these channels having been at work over the past few years, as part of a global search for yield. Existing models may, if anything, have under-emphasized the potency of these channels in boosting global GDP.

Exiting this extraordinary degree of monetary accommodation will need to be done in a staged and sequenced fashion. The fewer the surprises around exit, the less the scope for destabilising financial flows which could upset the recovery. In its written publications, the MPC has already signalled:

- That any tightening of monetary policy is likely to be effected first through higher interest rates, not least in case this needs subsequently to be reversed. Rates will be raised in a graduated and proportionate manner.
- That any withdrawal of QE will involve an explicit programme of asset sales and/or non-replacement of maturing gilts. This programme will be agreed and publicised in advance and co-ordinated with the UK's Debt Management Office (DMO).

These seem like sensible elements of an exit strategy and I look forward to working on developing this plan further with the Committee.

As for the distributional impact of monetary policy, all public policy is re-distributional, whether across people or across time. Monetary policy is no different. But, unlike some other arms of public policy, monetary policy can only influence activity and risk-taking at an economy-wide level. That is essentially what central banks globally have been doing over recent years, supporting aggregate income and employment directly and economy-wide asset prices and lending indirectly.

While these benefits will not necessarily have been shared evenly across the population – borrowers versus lenders, old versus young – the alternative of lower aggregate income and employment and lower asset prices and lending would have been a worse one for the vast majority, perhaps all, of the UK population. The Bank's published research is consistent with that being the case.

None of this is to dismiss the potential for policy, including monetary policy, to have a distributional impact which could potentially be harmful to medium-term growth and stability. For example, there is now strong empirical evidence of rising inequality being damaging both to financial stability and to long-term growth. But the public policies best suited to tackling these problems are not typically in the hands of central banks.