



Innovation Policy at the Cabinet Table

Priorities for the Department for Innovation, Universities and Skills

NESTA welcomes the recent changes to how innovation policy is developed by the UK Government. For the first time, innovation policy has a seat at the Cabinet table. This move reflects the fundamental importance of innovation in meeting the economic and social challenges of the 21st century.

The Cabinet reshuffle has also brought both strands of the dual support system for higher education funding into one department, and linked innovation policy to skills – perhaps the single most important driver of the UK's future capacity for innovation.

To take full advantage of the opportunities that these changes provide, the newly formed Department for Innovation, Universities and Skills should build on the beginnings of the broad innovation agenda laid out by the Department of Trade and Industry, and work closely with other Government departments (particularly the Department for Business, Enterprise and Regulatory Reform) to develop world-leading innovation policy.

Innovation is essential to the future of the UK

Innovation is essential to the UK's economic and social development

Innovation is increasingly important to an advanced economy like the UK and has been recognised by HM Treasury as one of its five drivers of productivity.¹ It is equally essential in developing new approaches to seemingly intractable social challenges such as climate change, inequality and an ageing population.

Over the past few years, this has been recognised by government policy

As a result of the UK's long-standing poor performance on traditional innovation indicators, the last ten years have seen innovation become a high priority for policymakers across the UK. Compounded by analyses that have pointed to a persistent 'productivity gap' with main competitors, the UK Government has responded by incentivising R&D, encouraging businesses to collaborate with universities and substantially increasing public investment in scientific research.²

New machinery for innovation policy

The DTI – the traditional home of innovation policy – has been split

The Department of Trade and Industry (DTI) had a remit to 'work to create the conditions for business success and help the UK respond to the challenge of globalisation.' Its responsibilities included science and innovation, enshrined in the Office of Science and Innovation (OSI).

The DTI's responsibilities are now largely split between two new departments: the Department for Innovation, Universities and Skills (DIUS) and the Department for Business, Enterprise and Regulatory Reform (DBERR).

A new Department for Innovation, Universities and Skills, led by John Denham

DIUS is a new department that is built from parts of the Department for Education and Skills and the science and innovation responsibilities of the DTI. It has a 'responsibility to drive forward delivery of the Government's long-term vision to make Britain

1. HM Treasury (2000), Productivity in the UK: The Evidence and the Government's Approach, (HM Treasury, London).

2. NESTA (2006), The Innovation Gap, Why policy needs to reflect the reality of innovation in the UK, (NESTA, London).

one of the best places in the world for science, research and innovation, and to deliver the ambition of a world-class skills base.³ As part of its remit, it has been given the responsibility to 'drive forward business innovation.'

DIUS will be the new home for the majority of functions of the former OSI, which includes responsibility for funding basic research via the Research Councils. A new Office of the Chief Scientific Adviser will be created within the Department.

The creation of this Department will mean that both strands of the dual support system for higher education funding will be overseen by a single department.

The Technology Strategy Board (TSB) has recently been reconstituted with a remit to stimulate business innovation across the economy. It will now report into DIUS and continue to deliver Innovation Platforms, Knowledge Transfer Networks, Knowledge Transfer Partnerships and Collaborative R&D projects.

John Denham MP is the first Secretary of State for Innovation, Universities and Skills. He is supported by Ian Pearson MP as Minister of State for Science and Innovation, who is responsible for business and science, the research base, Research Councils and innovation. He will also have responsibility for NESTA, the TSB and the Design Council.

Bill Rammell MP is the Minister of State for Lifelong Learning, Further and Higher Education. He is responsible for skills strategy and implementation, including Leitch delivery, the Learning and Skills Council and the Higher Education Funding Council for England.

Also in the Department are David Lammy MP, Parliamentary Under Secretary of State for Skills, and Lord Triesman, Parliamentary Under Secretary of State for Intellectual Property and Quality.

A new Department for Business, Enterprise and Regulatory Reform, led by John Hutton

The new DBERR has been charged with ensuring that the UK develops a 'world-class business environment as the key to being a dynamic, flexible and competitive economy.' It will have responsibility for productivity, business relations, regional development, energy and better regulation.

The Department will also have joint responsibility with the Department for International Development (DfID) on trade policy, and with the Foreign and Commonwealth Office (FCO) on trade promotion.

John Hutton MP is the first Secretary of State for Business, Enterprise and Regulatory Reform. He is supported by five Ministers of State – Stephen Timms MP, Sir Digby Jones (jointly with FCO), Pat McFadden MP, Malcolm Wicks MP and Lord Drayson (jointly with the Ministry of Defence). Gareth Thomas MP is Parliamentary Under Secretary of State in DBERR (jointly with DfID).

The coherent portfolio of DIUS presents a significant opportunity for UK innovation

Developing the right skills for innovation

The low quality of workforce skills – particularly in intermediate skills – has been identified as being responsible for around one-fifth of the UK's productivity gap with France and Germany.⁴ The UK Government has placed a high priority on improving workforce skills, specifically through the creation of the Learning and Skills Council, Sector Skills Councils and Leitch Review of Skills.⁵

DIUS represents the first time that these initiatives have been explicitly connected to the wider innovation agenda. This should lead to a better understanding of how people can be equipped with the skills needed for innovation.

In practice, this will mean ensuring that the UK has the right supply of science, technology, engineering and mathematics (STEM) skills to meet a likely increase in demand over future years. However, it will also mean ensuring that people possess a full range of technical and cognitive skills, as well as the attitudes essential to innovation.⁶

Ensuring that universities fulfil their potential in converting research into innovation

UK universities are widely respected across the world, and are important in the innovation process of certain sectors of the economy. The UK produces nine per cent of the world's science papers and receives about ten per cent of the world's citations.⁷

3. For further information see <http://www.pm.gov.uk/output/Page12181.asp> (accessed 29 June 2007).

4. O'Mahoney and Boer (2002), Britain's relative productivity performance: updates to 1999, (National Institute for Economic and Social Research).

5. Leitch, S. (2006), Prosperity for all in the global economy – world class skills, Final Report, (HM Treasury, London).

6. NESTA (2007), Education for Innovation, (NESTA, London).

7. For further information see <http://www.universitiesuk.ac.uk/research> (accessed 29 June 2007).

8. UNICO Press Release (22 November 2005), Survey of UK University Commercialisation Shows a Doubling of Licensing Activity in 2004, available at <http://www.unico.org.uk/msurvey.doc> (accessed 17 May 2007).

9. Eurostat press release (2007), Fourth Community Innovation Survey, More Than 40 Per Cent of EU 27 Enterprises are Active in Innovation, (Eurostat, Luxembourg).

However, despite initiatives such as technology transfer offices, they have had mixed results in turning research into innovation. While some are 'international benchmarks of excellence', others are 'not engaged in the commercialisation of IP in any substantial way'.⁸ In fact, according to the Community Innovation Survey, only ten per cent of the UK's innovative businesses interact with universities.⁹

Uniting universities and innovation in one department should therefore help to ensure that universities are better able to fulfil their potential in driving up levels of innovation, and ensure that more businesses are able to benefit from the UK's world-class research base.

Ensuring human mobility drives knowledge flow

Aside from the transfer of knowledge from business to business and university to business, human mobility is perhaps the most important single driver of knowledge flow. Undergraduates carrying out placements and graduates entering the labour market take important knowledge with them to their new workplace.

Initiatives, such as Knowledge Transfer Partnerships, which fall under the remit of the TSB (and therefore DIUS) now have the potential to be better co-ordinated with the wider policy agendas around innovation and the role of universities.

Well-worn paths to other departments will be essential to making innovation flourish

Developing a broad innovation agenda

While the UK Government has successfully focused on boosting science to enable innovation, it has recently started to look at broader categories of innovation, including innovation in services. This broadening of the innovation agenda has been reflected in the revised remit of the TSB.

DIUS, as a Cabinet-level voice for innovation policy, now has the opportunity to build on these initiatives to develop a fuller innovation agenda that includes, but reaches beyond science and technology, to ensure that innovation is maximised across the UK's economy and society. This means acting as a champion of innovation across government, particularly in the area of procurement.¹⁰

Working closely with business

The innovation that matters varies widely across sectors. As such, innovation policy needs to focus at least as much on collaborative activity between businesses as it does on those between businesses and universities.

More generally, innovation policy needs to be sensitive to these dynamics already at work – but government cannot be expected to do this alone. In ensuring optimal conditions for innovation in the UK, the relationships between DIUS, DBERR, the TSB and the newly established Business Council for Britain need to be close and co-operative, particularly when considering important drivers of innovation like enterprise support, early-stage investment and framework conditions like taxation, competition policy and regulation.¹¹ The new Department should look in particular at the nascent Sector Innovation Action Groups announced by the DTI on 18th June 2007.¹²

Working to co-ordinate the innovation responsibilities of RDAs

Much innovation policy in the UK is actually developed and deployed by the devolved administrations and English Regional Development Agencies (RDAs). However, many of these strategies duplicate and overlap. For instance, of England's nine regional innovation or economic strategies, eight include biotechnology or health sciences as a priority area.

DIUS should therefore work with the DBERR, the Department for Communities and Local Government and the RDAs to broker suitable levels of co-ordination and coherence across RDA strategies. This should ensure that while there exists sufficient competition between regions to allow for local relevance, policy experimentation and the emergence of good ideas, there is not so much as to be destructive to the nation's ambitions or its use of public resources.¹³

Developing a coherent approach to skills across the educational system

While DIUS has a responsibility for skills, the Department for Children, Schools and Families (DCSF) has a responsibility for schools. Developing some of the most important skills and attitudes necessary for innovation is best done early in the educational process through both formal and informal education.¹⁴ It is therefore essential that DIUS works closely with DCSF to build a coherent approach to developing the skills necessary for innovation throughout the lifelong educational system.

10. Georghiou, L. (2007), *Demanding Innovation: Lead markets, public procurement and innovation*, (NESTA, London).

11. NESTA (2007), *Hidden Innovation, How innovation happens in six 'low innovation' sectors*, (NESTA, London).

12. DTI Press Release (19 June 2007), 'Britain's got talent for innovation', available at <http://www.gnn.gov.uk/Content/Detail.asp?ReleaseID=292805&NewsAreaID=2> (accessed 29 June 2007).

13. NESTA (2007), *Innovation in UK Cities*, (NESTA, London).

14. Visser & Krosnick (1998), *Development of Attitude Strength Over the Life Cycle: Surge and Decline*, *Journal of Personality and Social Psychology*, 1998, Vol. 75, No. 6, p1389-1410.

NESTA is working to transform the UK's capacity for innovation

NESTA is the National Endowment for Science, Technology and the Arts. With endowed funds of over £300 million, its mission is to transform the UK's capacity for innovation. It does this in three main ways: by working to build a more pervasive culture of innovation in this country; by providing innovators with access to early stage capital; and by driving forward research into innovation, with a view to influencing policy.

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- Establish a strong policy and research community around innovation

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