From Wilson's White Heat to Cameron's Catapults: The role of Academic Research in Industrial Policy- 50 years of change.

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Research Domain:

Higher education policy (HEP)

Abstract:

This presentation analyses the changing policy agenda concerning academic research in a broader framework considering the policy areas of civil research and industrial policy. The research uses a political science policy analysis approach involving analysis of major UK Policy Reviews, Government Bills and Acts of Parliament from 1963 to the present. The study identifies how the conventional wisdom on the role of research in innovation and the politically desirable type of state intervention in the innovation process, have both evolved throughout the 50 year period transforming these policy areas. Alongside this, increased attention has been paid to the outcomes flowing from all public funded research, resulting in a substantial accountability agenda. The presentation explores where academic research has been situated relative to the changing nature of industrial policy, the rising expectations the state places on academia, and the changing role of academic research in delivering economic change through policy interventions.

Paper Summary:

This paper places the changing public policy agenda concerning academic research into a broader framework. This includes also considering the policy areas of civil research and industrial, innovation and technology policy. The research rests on the rationale that in order to understand the contemporary character of academic research policy drivers, and how these have changed, we need to consider adjacent policy domains more thoroughly. From this, we can consider where academic research has fitted as a 'piece' into the wider government 'jigsaw' of political agendas and public spending.

The study aims to contribute to the debate on the dynamics of academic research policy, focusing on how academic research should serve the world outside the academy. It also documents the changing relationship between universities and the state in the United Kingdom. It draws on established broad studies of higher education policy, including Palfreyman and Tapper (2014) and Shattock (2012). The research uses a political science policy analysis approach based on Mintrom (2012). The methodology involves documentary analysis of major United Kingdom Policy Reviews, Government Bills, Acts of Parliament, and the proceedings of the both the Houses of Parliament. These were studied alongside a range of academic literature from higher education, political science, history and science and technology policy studies.

The analysis begins in 1963, the year both the Robbins (1963) committee on higher education and the Trend (1963) enquiry into the organisation of civil science reported to government. It also was the year Harold Wilson delivered his speech proposing a 'New Britain' tempered in the furnace of a 'White Heat' technological revolution (Edgerton, 1996).

The fiftieth anniversary of these events provides an opportunity to map out the trends across half a century of higher education policy change.

The research seeks to provide a summary of the main trajectory of policy development across the various governments from Harold Wilson (1964 to 1970) to David Cameron (2010-). The study concludes with an analysis of Coalition government policies, making reference to *Research Impact* and Technology Strategy Board's *Catapults* designed to enhance the UK's innovation capability (TSB, 2011).

The study identifies how the conventional wisdom on the role of research in innovation and the politically desirable type of state intervention in the innovation process, have both evolved throughout the 50 year period. This has not only transformed civil research and industrial policy, but it also has implications for how the state views the purpose of academic research.

Industrial, and in latter periods innovation, policy has gone through several generations (Pryce, 2012) since the middle of the 1960s. Before 1979, the first phase of policy was highly interventionist with state direction and ownership a common feature. Public and subsidised civil and industrial research and development (R&D) were seen as legitimate and effective.

A second generation of industrial policy commenced after 1979 with the first Thatcher government. This saw the preceding period as being a failure and the influence of the state in the economy had to be rolled back. Market forces would rule and private sector was encouraged to grow. Public financial support for R&D in individual companies ended and applied civil research was scaled back, while funding for basic research continued but was controlled through selectively.

In the early 1990s a third generation of industrial policy emerged with Michael Heseltine at the Department of Trade in Industry and William Waldegrave as Science Minister. This continued throughout the New Labour period and is embodied in the 1998 White Paper *Our Competitive Future - Building the Knowledge Driven Economy* (DTI 1998). This phase of policy starts from the premise that markets work well, but are subject to market failure, thus providing a legitimate role for government to deliver the socially optimum rate of economic activity.

A characteristic of this period is a wide range of policy interventions, including initiatives to encourage all public funded research - including academic research - to better serve the knowledge economy. These are diverse and include schemes to reduce the cost to business of carrying out R&D and reducing the time between 'concept to commercialisation' and 'idea to invoice'. The government is therefore more active than in the second period. Authors such as Mazzucato (2013) argue the state should not merely fix market failures but actively create the favourable conditions for the knowledge economy.

Alongside this, increased attention has been paid by successive governments to the outcomes flowing from all public funded research, resulting in a substantial accountability agenda. This began with extending the rationales of New Public Management into academic research but now involves a sophisticated agenda to measure the 'public value' flowing from public financed research (Moore, 1995; Ferlie, 2009).

The findings explain how policy in this area has changed, account for the rising expectations the state places on academia and help to conceptualise with greater clarity where academic research is situated relative to the changing nature of industrial policy.

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