Research collaboration: Maximising the UK’s research strengths

Introduction

UK research faces significant challenges over next few years, with a tight funding settlement and unprecedented international competition in terms of investment in research and in research performance. Sustaining the excellent performance of the UK’s research base must be an urgent priority for the UK; moreover, this must be achieved with fewer resources.

We suggest that increased collaboration between universities in the UK will be necessary both to rise to the challenge of limited funds, and to exploit fully the UK’s research strengths. This briefing proposes that research policy and funding should support greater collaboration between institutions as a necessary response to the significant challenges that universities face, in particular by establishing a dedicated fund to support collaborative partnerships. We believe that this would ensure that the concentration of research funding on excellence can be balanced with sustaining the dynamism of the UK research base.

The challenges of maintaining excellence

Limited resources for higher education and research funding mean that it is important to think about how research funding can best be deployed to sustain excellence. In particular, the UK will need to consider seriously about how it will maintain a world-class research base and continue to support its leading universities to compete with the best in the world as international competitors make substantial investments in higher education and research. We welcome the Government’s indication of support for ensuring greater concentration of research funding on excellence, which will be important to sustain the UK’s research performance.

Greater research collaboration would provide a way of making the most of all of the UK’s research talent and ensuring that our greatest research strengths are combined, rather than set against each other in competition. The Council for Science and Technology recently noted that the competitive environment for research in the UK will need to be balanced with encouraging more strategic research collaboration if the UK is to compete successfully on a global scale.

There is considerable benefit to be gained from re-balancing research policy, which is currently skewed towards promoting competition at the expense of promoting research collaboration. Increased research collaboration between institutions is the solution to many of the pressing challenges facing universities (including cost pressures, greater competition for student places, diversity of providers, and intensifying international competition to exploit fully the UK’s research strengths).

Benefits of collaboration: strengthening the UK research base

Research collaboration works successfully by combining complementary and distinct strengths and can be highly valuable, particularly in terms of facilitating co-investment in expensive research and in uniting efforts to deliver world-leading research. Greater research collaboration would provide a way of making the most of all of the UK’s research talent and ensuring that our greatest research strengths are combined, rather than set against each other in competition.

By combining collective expertise, collaboration at the institutional level can:

- expand research capability and capacity and enhance research strengths
- allow the opportunity to share expensive facilities and equipment
- bring talented individuals and research groups together

---

1 The Royal Society has provided a wealth of evidence of the scale of investment by established and emerging competitor nations, which pose a serious challenge to the UK’s position. (The Royal Society. The Scientific Century: securing our future prosperity. March 2010.)


facilitate access to a high-quality research environment
allow joint grant applications, joint research appointments and joint supervision of doctoral students
facilitate novel cross-disciplinary research.

However, research collaboration between institutions in the UK remains comparatively rare, due to the dominance of a competitive ethos in research policy, and a lack of dedicated resources to develop collaboration, particularly in the initial stage. It is essential that such strategic collaborations have dedicated funding and support to sustain them from initial establishment through to maturity.

We therefore suggest that the UK should seek to facilitate greater collaboration between:
• peer (research-intensive) institutions where established research strengths can be combined to capitalise on mutual activity (such as those recently announced between Birmingham and Warwick, and Liverpool and Lancaster)
• research-intensive institutions and ‘pockets of excellence’ in other institutions, in order to maximise and fully exploit research potential.

Collaboration on this latter model would ensure support is maintained for excellent researchers wherever they are based, without risking the dilution of resources that could undermine our leading institutions or damage the UK’s research infrastructure. It would allow the most efficient use of resources and would sustain concentrations of excellence while ensuring the dynamism of the research base and making the most of all the UK’s research talent. It would also enable institutions to work collectively to share complementary strengths while pursuing distinct missions.

Supporting research collaboration

While strategic collaborations will incur costs initially, investing time and resource will yield returns in increased research synergies, shared resources and training opportunities, and enhanced success in research grants. Indeed, as universities start to realise the benefits of collaboration, attempts are being made to overcome the competitive mindset to develop a wider strategic vision on collaboration.

We propose that Government should establish a funding initiative specifically to support collaborative research between universities with ‘pockets of excellence’ and research-intensive universities. Funding would be awarded on a competitive basis to pairs of institutions that demonstrate complementary research strengths, a vision for developing research collaboration, and a willingness to both initiate and sustain it at a strategic level.

Such a funding scheme – the University Collaborative Partnership scheme – would offer funding to universities that wanted to establish institutional-level collaboration, aimed at generating shared programmes, facilities and training. We suggest that this could be delivered at a cost of £450,000 per collaboration, over three years. Perhaps 30 such pairings could be supported at a total cost of £13.5 million.

Funding would include: support for a dedicated ‘facilitator’ in each university to facilitate collaboration; travel and meetings; and pump-priming activity. The funding could be delivered through the Funding Councils as a national programme to support institutional strategies. Universities would then assume responsibility for sustaining the collaboration, recognising the financial benefits that accrue, including the stimulation of collaborative research bids to other funders. Ultimately collaborations could become self-sustaining and would secure and strengthen the potential and vitality of the ‘pockets of excellence’ by bonding them to a comprehensive research university with appropriate complementary expertise.

Increased collaboration between institutions at a variety of levels will help to maintain the international competitiveness of the UK research base and ensure that concentrating funding on research excellence can be balanced with sustaining the dynamism of the UK research base. Funding for research collaborations should be aimed at ensuring the full exploitation of the UK research base and intellectual capital in both established strengths and ‘pockets of excellence’ in order to strengthen the UK’s research capacity and capability.

Professor David Price
UCL Vice-Provost (Research)