

IOP Institute of Physics

Institute of Physics submission to the House of Commons Science and Technology Committee inquiry into the role and priorities of UKRI interim chair

1. The Institute of Physics is a leading scientific membership society working to advance physics for the benefit of all. We have a worldwide membership of more than 50,000, from enthusiastic amateurs to those at the top of their fields in academia, business, education and government. Our purpose is to gather, inspire, guide, represent and celebrate all who share a passion for physics. And, in our role as a charity, we're here to ensure that physics delivers on its exceptional potential to benefit society. Alongside professional support for our members, we engage with policymakers and the public to increase awareness and understanding of the value that physics holds for all of us. Our subsidiary company, IOP Publishing, is world leader in scientific communications, publishing journals, ebooks, magazines and websites globally.
2. The IOP welcomes the opportunity to respond to the inquiry into the role and priorities of the UK Research and Innovation (UKRI) interim chair in both their role leading the new organisation and also as a champion of the research community.
3. Below we suggest a set of priority areas for the interim chair:
 - Appoint a chief executive with strong research experience and wide links across research areas
 - Ensure that UKRI and the Office for Students (OfS) establish links between themselves from day one
 - Quickly establish governance procedures which draw the executive chairs of the councils into the operational decisions of UKRI
 - Create strong, early links with higher education and research bodies within Northern Ireland, Scotland and Wales
 - Maintain the existing strong identities of the current research councils and research areas, including guaranteeing involvement by their respective research communities in as much consultation as possible
 - Launch a review of all UK research activity to establish areas of vulnerability which may arise from the UK's exit from the European Union
 - Provide explicit reassurances regarding the financial and operational independence of Innovate UK

Appointing a chief executive

4. One of the first roles of the UKRI interim chair will be to appoint a chief executive who will take control of UKRI when it officially comes into being in 2018. There are many qualities that will be sought in the appointee. However, importance should be given to a) having a strong, internationally significant, research record and b) having wide links to research communities in a range of fields. These qualities are of such high importance because the first chief executive will need to maintain a sense of

continuity for the UK research community in order to minimise disruption to ongoing work, and thus needs to be able to fully understand its priorities and concerns across all research areas. This means that the individual should have worked either outside of their field, or within a position that straddles many fields, or one that has led them to come into contact with representatives from a wide array of different research fields.

Cooperation between UKRI and the OfS

5. The provisions set out in the Higher Education and Research Bill separate the oversight of teaching and research into two distinct organisations – the Office for Students and UK Research and Innovation. Currently there are close links between the two, for example under the Higher Education Funding Council for England (HEFCE). Similarly, governmental responsibilities for teaching and research have been similarly split – teaching with higher education within the Department for Education (DfE) and research within the Department for Business, Energy and Industrial Strategy (BEIS).¹
6. Higher education teaching and research are highly-connected activities and universities will often not adopt a strict delineation between the two activities. The majority of staff within a university physics department will generally both teach and perform research, and the budgeting for both activities may be intertwined. Recent research by the Institute of Physics and the Royal Society of Chemistry has found that many physics and chemistry departments operate large deficits on their research and teaching activities.² The costings of these of these two activities are linked through staff time, and one activity may be supported and effectively subsidised by the other. With teaching and research organisationally separate, it will be of utmost importance that the interim chair creates systems to ensure that the existing strong linkages and symbioses are continued between the two. An important part of this will be ensuring that Part 4 of the HE and Research Bill includes a clearer stipulation for UKRI and the OfS to cooperate and share information.
7. The interim chair should prioritise the creation of a sub-committee of shared members between the OfS and UKRI which will feed into the boards of each organisation. The sub-committee would focus on issues that intersect between teaching and research, and provide input and recommendations to the operations and decisions of the OfS and UKRI. Following their creation, a framework for cooperation between UKRI and the OfS should be established from day one which sets out the areas on which cooperation should be prioritised, and the ways in which this is to be achieved. If not established within the HE and Research Bill, part of this framework should involve creating governance links between the two organisations – whether by hosting a shared sub-committee, or appointing members to sit on the board of each.

UKRI governance

¹ <https://www.timeshighereducation.com/news/higher-education-moved-dfe-theresa-may>

² http://www.iop.org/publications/iop/2015/file_66515.pdf

8. Within the proposed UKRI structure, there are only weak formal links between the UKRI board and the nine councils (the existing Research Councils, Research England and Innovate UK) that will exist beneath it. The current councils have strong links with the research communities that comprise their fields of activity and the chief executives, and in future the executive chairs, will have a good understanding of these fields. To preserve this strength, the interim chair should ensure the implementation of Sir Paul Nurse's recommendation in his review of research councils³ that an Executive Committee be created within the governance of his proposed Research UK. This Committee would include the Chief Executive and the heads of the Research Councils. The committee would aim to achieve a number of ends, including establishing best practice in research funding, the formulation of research strategy and supporting cross-cutting activity across the councils.
9. The interim chair should work to ensure that the HE and Research Bill is amended to include the creation of such an Executive Committee. In the absence of this, the interim chair should work with the incoming chief executive to establish a committee, with similar terms of reference to those proposed in the Nurse Review, as soon as is practicable. This would help to support a more seamless transition into UKRI, give the research communities more confidence, and maintain the profile and importance of the research councils.

Links between UKRI and bodies in devolved administrations

10. UKRI will have responsibility for research across the whole of the UK. But in Research England UKRI also has specific responsibilities that apply only to England. The interim chair should ensure that Research England, and UKRI more generally, creates close links with funding bodies in Northern Ireland, Scotland and Wales at a very early stage to ensure that existing commonalities and areas of cooperation are maintained and enhanced.
11. The interim chair should consider establishing, at a very early stage, methods of communication, collaboration and cooperation between UKRI, the Scottish Funding Council, the Higher Education Funding Council for Wales, and the Department for the Economy in Northern Ireland. This could be within the context of a formal relationship – for example through inviting representatives of each body to sit as observers on the board of UKRI. This would ensure that lines of communication between the bodies in different nations are maintained, and that expertise and experience can be shared as and when necessary.

Research communities

12. The current fields of activity and their separation under each council are well understood and their respective research communities have well-established relationships with their respective councils. To maintain the current domestic and international reputations of the research councils the interim chair should ensure that the HE and Research Bill stipulates that the Secretary of State must consult with

³ https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/478125/BIS-15-625-ensuring-a-successful-UK-research-endeavour.pdf

research communities before any substantive changes are made. In the absence of this, a commitment should be made by the interim chair to the executive chairs of the councils that they will work to ensure that no changes will be made to their current makeup or fields of activity without first consulting with them and their research communities. Consultation with affected research communities should also be prioritised when other decisions are made as a matter of course.

13. Following the result of the referendum on the UK's membership of the European Union, there is concern within many research communities with regards to people, collaborations, access to facilities, funding, and regulation. These concerns are heightened in smaller research areas which may be much more vulnerable to rapid changes in the wider environment. For example, smaller research areas may rely heavily on expertise and talent currently sourced from EU nations. Funding is a similar concern, as some smaller, specialist research areas may rely heavily on funding from EU sources, and will need to quickly find replacement funding from UK sources. If access to the most talented scientists and funding streams is restricted or made more challenging, these research areas may not be able to continue to operate in the UK, which may have a negative impact on UK research and its ability to support innovation and economic growth. In conjunction with, or to complement existing processes where this has already begun, the interim chair should make it a priority to review all research areas to establish which are most vulnerable in the event of UK's exit from the EU, and set out the steps to be taken to guarantee their long-term viability.

Innovation

14. Moving Innovate UK underneath UKRI and alongside the Research Councils will mean that UKRI has oversight of all major research and innovation bodies. However, as Innovate UK is the only body under its auspices which is solely focused on innovation it is of utmost importance that the independence of Innovate UK is sustained – both operationally and financially - and that its ability to provide support for innovation is not impaired in any way. Businesses need stability in order to make decisions and effectively invest in innovation, and so the UKRI interim chair must ensure that as much continuity as possible is maintained in the way that Innovate UK is operated and funded. The interim chair should ensure that funding for Innovate UK is ring-fenced as separate from the balanced (or dual) funding system. This would ensure that it does not have to compete with the research-focused bodies - the Research Councils and Research England. The interim chair should make it an immediate priority to give explicit reassurances to Innovate UK and its executive chair that its independence, both operationally and financially, will be maintained and to include this within the UKRI framework document.

**For further information, please contact
Alex Connor, Head of Policy (alex.connor@iop.org)**