

14 March 2023

The Rt Hon Jeremy Hunt MP
Chancellor of the Exchequer
HM Treasury
1 Horse Guards Road
Westminster
London
SW1A 2HQ

Copied to the Prime Minister

Dear Chancellor,

In advance of the Spring Budget, I am writing to highlight three of the critical challenges that the Government must now address in order to make real progress against its Research, Development and Innovation (RDI) ambitions to deliver tangible benefits for people across the United Kingdom and cement its position as a world-leading research nation:

1/ International collaboration

Research is an international endeavour and improved global collaboration will be essential for the UK to maintain its thriving research and innovation environment. The Academy encourages the Government to swiftly pursue negotiations with the EU to achieve association to Horizon Europe following the announcement of the Windsor Framework.

Association to Horizon Europe is essential to deliver on our ambitions for UK global RDI. The opportunities to collaborate through Horizon Europe with some of our closest international partners, facilitate international mobility and support world-class discovery research are critical for the success of UK research and innovation. Associating to Horizon Europe now will also enable the UK to engage in the development of future Framework Programmes to our and our partners' benefit.

We have seen increased co-operation with the European Union following the conflict in Ukraine, and as Sir Paul Nurse concluded in his recent review, the UK will not be able to meet its goals as a research power if it stands alone and is not part of a European network.

Furthermore, UK immigration costs are uncompetitive compared with other leading research nations.¹ Even the Global Talent visa, which has many benefits, compares poorly in cost terms with equivalent offerings in Japan, the USA, South Korea, and Germany. A reduction in work and study visa costs alongside a fast and efficient immigration system that welcomes researchers and their dependants, led by trusted organisations in the sector, will better allow institutions to attract and retain talented individuals from overseas.

2/A science and research superpower

To realise the Government's Science and Research Superpower ambition, it is vital to establish a long-term strategy for research and innovation underpinned by sustainable, diverse, ring-fenced funding which is committed for the long term. The strength of the UK economy is founded on our ability to create, share and translate new knowledge into the development of new products, services and approaches. This strength is underpinned by our excellence in research and innovation. However, the UK has historically underinvested far below most other leading scientific nations and lower than the OECD average.

Transformative innovation underpinned by excellent research and researchers requires a globally competitive level of funding; it is not enough to aim for the average. The Government should recommit to the target of investing £20bn in R&D funding by 2027. Funding must also be guaranteed over a multi-year period to support ambitious projects and attract private and foreign direct investment. Framework Programmes such as Horizon Europe run for a seven-year period, providing certainty and confidence, enabling deep collaborations to be forged. The Government should aim to meet such a length of funding settlement, or better improve on it through a ten-year settlement, which would place the UK at a similar leading level to Germany.

Research and innovation will also be central to addressing the UK's productivity challenge and has the potential to offer greater prosperity and opportunity right across the country – investment in innovation was responsible for an estimated two-thirds of the UK's private-sector labour productivity growth between 2000 and 2007. Yet, since the global financial crisis of 2008, the R&D intensity of the UK economy has declined substantially. Strategic investments in research and innovation will help economic sectors and places leverage ground-breaking technologies, utilise skills, and adopt new approaches to boost productivity growth.

¹ <https://royalsociety.org/-/media/policy/Publications/2019/international-visa-systems-explainer-july-2019.pdf>

3/Support all the disciplines so that they can work together to solve the most pressing challenges

Insights from the humanities and social sciences (SHAPE) have been and will remain crucial to our success as a nation. These disciplines, alongside knowledge and discoveries from across STEM, will deliver real benefits for people across the United Kingdom and help us solve our most pressing challenges.

Research analysing the human impact of machines and how design helps communities better use data are just two examples of the crucial work already underway. Indeed, solving global challenges such as Net Zero, will require us to understand human behaviour, culture, design, incentives, politics and structures alongside technological innovations. We are ready to bring these insights to bear by using our convening power as we have recently done with a series of roundtables on productivity for your Growth and Innovation team.

SHAPE subjects also underpin some of the fastest growing areas of the economy, particularly the creative industries and cultural heritage sectors. They are integral to the UK's ability to become a science superpower. As Chancellor, you have the power to provide the investment that will drive the UK's productivity, delivering benefits to the UK's economy and its population. We look forward to working with you and your department to ensure that we unleash our world leading research and innovation for the benefit of society as a whole.

Yours sincerely,

Professor Julia Black PBA



President of the British Academy