



**Natural  
Environment  
Research Council**

## **NERC Science Committee 15<sup>th</sup> Meeting**

### **Summary of Discussion**

**19 & 20 October 2022, UKCEH Lancaster**

**Members Present:** Dr Adrian Baker, Professor Nichola Beaumont, Professor Michael Bentley, Professor Jane Hill, Dr Anna Jones, Professor Christine Maggs, Professor Dan Parsons, Professor Stefan Reis, Professor Simon Vosper and Dr Doug Wilson (19 October only). **Via zoom:** Professor Graham Underwood (Chair) and Professor David Viner.

**Ex-Officio:** Professor Susan Waldron (NERC Director, Research and Skills)

**Apologies:** Professor Helen Williams and 20 October only Dr Doug Wilson

**Other Attendees: Whole meeting:** Dr Sarah Turner (NERC Associate Director, Strategic Programme Generation & Delivery, Jennifer Jennings (NERC Associate Director, Discovery and Highlight Science, Talent and Skills) and Professor David Hannah (incoming Chair). **19 October only:** Jessica Lucia (NERC Programme Manager, Discovery and Highlight Science) and Beth Taylor (NERC Senior Programme Manager, Discovery and Highlight Science). **20 October only:** Dr Iain Williams (NERC Director, Strategic Partnerships). **Item four:** Professor Sir Duncan Wingham via zoom. **Item five:** Wendy Matcham (NERC Head of Resilient Environment), Lizzie Garratt (NERC Head of Atmospheric & Polar), Simon Kerley (NERC Head of Terrestrial, Freshwater & Earth), Mike Webb (NERC Head of Marine), Simon Gardner (NERC Head of Digital Environment), Heather Birch & Liz Rowse (SPMs covering for Healthy Environment), Sarah Newport (SPM covering for Productive Environment). **Item seven:** Jessica Pollitt (Senior Programme Manager: National Capability) via zoom. **Item eight:** Lisa Bettington (Head of National Capability Research Facilities) via zoom. **Item nine:** Nigel Bird (NERC Director Major Programmes) via zoom.

**Secretary:** Gemma Davies

## **Key issues discussed**

### **Executive Chair update**

The Committee were updated on the ongoing considerations around whether the UK associated with Horizon Europe or not, on the new cross-council Strategic Theme 'Building a Green Future' which is putting together multilateral programmes of national priorities for the environment, and on the reduction in FTE and Opex budgets and efficiency challenges that NERC and UKRI are facing.

## **Highlight Topics (HTs)**

Science Committee discussed the 40 community ideas for HTs received and prioritised those with strong science excellence potential to be included in the forthcoming announcement of opportunity. A ranked list was recommended to the Executive to draw from to be developed for announcements of opportunity within the funding envelope available.

## **Recommendation for the 2023 Centre for Doctoral Training focus area (SC 22/32)**

The NERC postgraduate training portfolio includes CDTs. CDTs support strategically targeted, directed PhD studentships aimed at addressing specific research and skills gaps identified by NERC, our partners, and the wider community. The training should be delivered in collaboration with non-academic partners and students should have opportunities to undertake collaborative research and training with non-academic partners.

The focus area of a NERC CDT is informed, in part, by an evidence-gathering process that takes account of new evidence of skills gaps and training needs balanced against NERCs priorities. As part of this process, a new open [community request for evidence](#) launched earlier this year.

Using the submissions received through the community request for evidence, the NERC Talent and Skills team collated a long list of potential focus areas. From this, a shortlist of six priority areas was agreed by the NERC Talent and Skills team for further detailed consideration and ranking by a Task and Finish Group

Science Committee considered the Task and Finish group rank-ordered list of 2023 CDT focus areas.

## **Outline proposal for Round 2 National Capability Science Multi-Centre (Hydro-JULES)**

NERC [national capability](#) (NC) supports the UK to deliver world-leading environmental science, support national strategic needs, and respond to emergencies. NC Multi-Centre Science programmes bring multiple NC skill sets together to enable more ambitious science than a single NC could deliver, increasing the returns from investments by generating new science opportunities and leverage of additional benefits via other funding streams.

Science Committee provided advice on the appropriateness of the scientific challenges detailed in the Hydro-JULES outline proposal for NC Multi-Centre Science funding, both on the project and in context to the portfolio already commissioned, and of the potential for the outline proposal idea to deliver the Multi-Centre programme's aims in the context of [NERCs 2022 Strategic Delivery Plan](#). The full proposal will come back to science committee in January 2023.

## **National Capability Scientific Support and Facilities (S&F) Round 2 Commissioning**

NERC S&F are a ~ £10M p.a. portfolio which provide access to specialist services, measurement facilities and sample repositories. Their 'centralised' regional or national provision delivers a critical mass in operation, technical innovation, and financial efficiency.

Science Committee noted the scoping process to date to explore options for S&F Round 2 commissions (from 2024 onwards) and the next steps for commissioning. Science Committee recommended a preferred option for the Round 2 S&F portfolio and provided advice on any additional benefits or implications, not already noted.

## **NERC Carbon Pathway**

Science Committee were asked for advice and demonstrator examples on how NERC and

the community might work together to operate new methodologies on undertaking research, mostly in parallel to existing ways, to lower carbon (in addition to substitution activities). It was confirmed NERC will need to replace all existing infrastructure with low carbon or zero carbon infrastructure by 2040 and that with each round of commissioning a lower carbon footprint model is requested.

Science committee agreed that carbon consideration is something they could offer advice on and therefore requested to receive where possible information about the C footprint of proposed new activity (noting it may not be a decision-bearing factor). It was agreed that a low carbon demonstrator to show how better C-sustainability can be designed in is a good idea and supported the idea that sustainability considerations should be integrated into NERC/SC activity.

### **Terms of Reference Review**

Science Committee reviewed the Terms of Reference and identified areas for potential future papers for discussion with the Executive. Science Committee recommended some points of clarity and that EDI be more embedded and with these changes agreed that the Terms of Reference are still fit for purpose.

### **Standing items**

The Committee confirmed the minutes and noted council feedback and the information papers, Discipline Balance and Financial Forecasts, and the forward agenda.