

UK Biodiversity Partnership Standing Committee

UKBSC/03/07
Report from Biodiversity Research Advisory Group

29 September 2003

Summary report of the 2nd full meeting of UK Biodiversity Research Advisory Group (BRAG), The Royal Botanic Gardens Edinburgh, 19th September 2003

Background

Since the 1st UK BRAG meeting on 06/03/03, *Just Ecology* have produced a review of research needs for the non-native species theme. This formed the basis for discussion at a sub-group meeting held on 18/09/03, and the presentation of recommendations to the full UK BRAG. In addition to this, a brief discussion paper was prepared about socio-economic issues. This was also presented to the full UK BRAG.

Actions

Terms of Reference

UK BRAG members agreed the revised Terms of Reference.

Membership

SNH had nominated John Baxter as their representative, which strengthened marine expertise on the Group. BRAG also approved nominations of Prof Charles Perrings (Department of Environment, University of York) and Dr Mary Gibby (Director of Science, RBGE). Full membership now stands at thirty-three (including Chair and Secretariat) and it was agreed that no further additions would be sought.

Comment:

Comment:

Website and communications

JNCC/Secretariat agreed to develop a bulletin board within the UKBAP website.

Socio-economic research

Des Callaghan (*Just Ecology*) gave a presentation of the findings of a brief review of the coverage of socio-economic research needs in the Biodiversity Research working Group (BRWG) research themes. Concern was voiced that the definition used emphasised economic issues, but there was a strong acceptance that UK BRAG needed to address both social and economic issues in more depth. This must draw on the needs of the country strategies. A recommendation was made to set up a sub-group on socio-economics within UK BRAG.

Wildlife and Countryside Link paper on biodiversity research needs

Jane Sears (RSPB) and Andrew Pullin (University of Birmingham) gave a joint presentation in which it was proposed that UK BRAG should address: (1) development of adequate survey and monitoring for priority species and habitats, and (2) development of an evidence-based framework to support decision-making in biodiversity management. It was agreed to establish a second sub-group to coordinate and communicate ideas relating to science-based monitoring and habitat management. This should be taken forward jointly with UK Biodiversity Reporting and Information Group (BRIG). Paul Rose was asked to take the lead on this group, acting as a convenor to

ensure link between BRIG and BRAG. This sub-group will report to the 3rd BRAG meeting in June 2004.

Non-native species sub-group

Des Callaghan (Just Ecology) reported results of the non-native species sub-group meeting held on the previous day. Research priorities were presented using the driver-pressure-state-impacts-response (DPSIR) framework.

DRIVERS and PRESSURES

Understanding longer term changes and large-scale processes, e.g. economic, social, demographic, technological. Identifying and understanding trends in: (1) pathways and vectors, (2) latent invasives, and (3) environmental change.

STATE

Priorities for action were: (1) quantitative audit (geographical range, population size, trends); surveillance (early detection); and monitoring (a review of gaps, new schemes, and status); and (2) improvements in taxonomy and nomenclature.

IMPACTS

Research on impacts needed to be species and pathway specific: e.g. health impacts, biodiversity impacts, economic, ecosystem services impacts.

RESPONSES

Priorities for action were: (1) generic needs (research assessment method), broad and rapid assessment of species and pathways; fuller assessments of highest risk species & pathways; development of action plans; codes of conduct; and (2) specific needs, e.g. incentives and disincentives, action plans, substitution of aliens with natives, control techniques and habitat management.

The sub-group noted that several ongoing research projects were already addressing these needs. In particular the Defra Horizon Scanning project on Biosecurity would look at future trends in driving forces and pressures (ie pathways and vectors). New EU and Defra projects would be developing risk assessment methods. Other research on specific impacts and responses was ongoing on particular problem species (eg Japanese Knotweed, Mink) and pathways (eg ballast waters). A stepwise approach was needed to develop and test a risk assessment methodology and then apply this to known and potential invasive species. The major gap identified at this stage was co-ordination. Responsibility for co-ordination of work on non-native species would be considered in the Government response to the Non-Native Policy Review Group, expected shortly. In the meantime it was proposed that the UK BRAG Secretariat could play a useful role in co-ordinating ongoing research and that the sub-group would review progress in 12 months time. Summary of action on non-native species:

- BRAG Secretariat to publish a report based on the work undertaken by *Just Ecology* (use UKBAP website).

- BRAG Secretariat to have an ongoing role in facilitating communications between different projects.
- BRAG Secretariat / JNCC to develop a web-based catalogue of research on non-native species (as a prototype for a wider research catalogue).
- BRAG Secretariat to liaise with Phil Hulme (CEH) and Andrew Pullin (University of Birmingham) re. a proposal for a conference (possibly with the BES) on non-native species; and assist in developing an agenda for this meeting.

Updates

UK BRAG members were updated on a number of research-related initiatives: (1) UKPopNet, (2) UKBAP, (3) European Platform for Biodiversity Research Strategy (EPBRS), (4) Convention on Biological Diversity (CBD) and the Subsidiary Body on Scientific, Technical and Technological Advice (SBSTTA), (5) Defra Horizon Scanning, (6) Rural Economy and Land Use (RELU). There was a discussion about the interface between BRAG and the Country Groups. It was agreed that the Secretariat would write to the Chairs of the Country Groups explaining the role of BRAG, the current BRAG work programme and inviting views on how BRAG could help Country Groups in meeting their research needs.

Comment: May need to provide a bit more explanation because these initiatives won't be understood by the Standing Committee

Date of next meeting

It was agreed to meet in June 2004. The two sub-groups on socio-economic issues and science-based monitoring and management would report to UK BRAG at this meeting.

Annex 1

Description of projects outlined at the 2nd meeting of UK BRAG, 19/09/03

UKPopNet is a national population biology network, with annual core funding of £500K from NERC. It comprises six UK institutions: Universities of Aberdeen, East Anglia, Leeds, Sheffield, and York, plus CEH. The network includes scientists with expertise in population biology, microbiology, ecosystem science, conservation biology and socio-economics. English Nature has provisionally agreed to become a full partner in UKPopNet, contributing directly to the core science programmes.

UKPopNet seeks to provide a focus for a truly national research programme, and will forge links with a wide range of other funding bodies, researchers, and user groups.

The programme will start in April 2004, and will fund a series of research projects, a programme of workshops, and a visitor programme. Three programmes have been identified: (1) understanding change, (2) predicting change, and (3) managing change.

European Platform on Biodiversity Research Strategy (EPBRS)

EPBRS is an informal forum for exchange of information and promotion of science to support development of biodiversity policy in Europe. Meetings are

held twice annually under the EU Presidency. Countries are invited to send one senior scientist and one science policy adviser to each meeting.

BioPlatform, a thematic network, exists to support EPBRS. It aims to improve the effectiveness and relevance of European biodiversity research, to contribute to the European Research Area for Biodiversity, and to promote the dissemination of current best practices and information regarding the scientific understanding of biodiversity conservation.

The two groups are hosting an e-conference prior to their next joint meeting, "*Genetic biodiversity in agricultural and natural systems: measurement, understanding and management*", to be held in Florence from 20-24th November 2003.

Defra Horizon Scanning

Defra's *Horizon Scanning Strategy* for Science is designed to fund research projects which challenge Defra's current thinking and help to develop policy based on sound science. The overall goal of the horizon scanning programme is to improve Defra's capability to anticipate and prepare for new science risks and opportunities. Horizon scanning encourages cross-cutting thinking that covers natural and social scientific activities and research.

Five main themes have been identified:

1. Re-thinking the food economy,
2. Coping with threats,
3. Environmental constraints
4. Future landscapes,
5. Meeting people's future needs

Rural Economy and Land Use (RELU)

The RELU programme receives £20m over three years, enabling ESRC, BBSRC and NERC to develop a programme which will help deliver modern, sustainable and competitive farming, protect the environment and achieve beneficial social and economic outcomes for people in rural areas. This Cross-Council Programme is co-funded by the Scottish Executive Environment and Rural Affairs Department

RELU has four interdisciplinary themes as its core areas of research:

1. Integrated solutions for land and water resource use and management
2. The environmental basis of rural economies and regeneration
3. Successful and sustainable food products and food chains
4. Economic and social interactions with the rural environment

RELU's funding criteria require research applications to address both Rural Economy and Land Use issues; to be integrative and interdisciplinary (involving ESRC plus BBSRC and/or NERC); to be fundamental and strategic; to be policy-relevant, not policy-led; to provide opportunities for interdisciplinary capacity building; and to

encourage scaling-up - at region, catchment and landscape scales. Applications may be up to 5 years in duration, and should address more than one research challenge within any given theme, in order to achieve an integrated project with strong interdisciplinary coverage.