

Royal Society's response to the Royal Commission on Environmental Pollution's 27th report and special study

December 2005

This document is the Royal Society response to the Royal Commission on Environmental Pollution's (RCEP) consultation request for comments regarding proposals for their 27th report and special study for 2006. We endorse the proposals 'implementation of environmental policies' for the 27th report and 'nuclear energy: framing the environmental debate' for the 2006 special study.

This submission has been prepared in consultation with our Energy Policy Advisory Group (EPAG) and Environmental Advisory Network (EAN) and has been approved by the Biological Secretary and Vice-President Professor David Read FRS.

Comments on the RCEP proposals for the 27th report

We welcome the opportunity to respond to the RCEP's invitation to comment on proposals for the 27th report and special study for 2006. The following points reflect our view on both the appropriateness of the subjects identified and initial thoughts about their treatment and also highlight other relevant major studies which might help.

We recommend the topic 'Implementation of environmental policies' be the subject of the 27th report although we are also very supportive of the 'Water in the UK' proposal. For the 2006 special study, we recommend the topic 'Nuclear energy: framing the environmental debate'. We have arranged the major study topics in order of our preference and have identified some of the key issues for each.

27th report proposal preference - implementation of environmental policies

Given the current policy context we are strongly supportive of an analysis of the effectiveness of environmental policy development and implementation in the UK (and EU as appropriate). We agree that this is an important topic, particularly in the context of the EU Lisbon Strategy and the "Better Regulation" agenda. We believe that it is important to be able to demonstrate that environmental legislation is justifiable and delivers on its objectives, particularly at a time when there is increasing pressure at both the EU and UK levels to minimise the administrative and financial costs of regulation to the business sector.

The RCEP proposal noted the work currently underway in the UK to improve the regulatory environment. Also relevant is the Defra programme aimed at reducing the administrative burden which falls upon business as a result of environmental regulation by 25%. This reduction will be achieved through regulatory rationalisation. Defra have recently published a "simplification plan" aimed at achieving this target. Similarly, the European Commission is planning to simplify the European Community body of legislation (the '*acquis*') over the next three years. Consequently the RCEP proposal is particularly timely and we suggest that the RCEP uses the simplification framework proposed by Defra and the work programme of the European Commission to identify the key environmental policy areas that would benefit from an independent and objective analysis.

In terms of other relevant work underway in this area we draw attention to the two recent reports published by the European Environment Agency (EEA a & b 2005). These were pilot studies aimed at evaluating the effectiveness of the implementation of urban waste water treatment policies, and packaging waste management systems respectively in selected countries in the EU. The recent report of the Institute for European Environmental Policy (IEEP 2005) is also relevant. This concluded that there is a need to embrace coherent regulation which integrates the environment into sectoral policies; for better implementation of existing legislation; and, stronger, more balanced stakeholder and citizen participation.

2006 special study preference - nuclear energy: framing the environmental debate

The Royal Society strongly supports the proposal for a special study on 'Nuclear energy: framing the environmental debate'. We consider that this work would be timely for feeding into the current political debate and that the preparation of an independent, scientifically robust framing of the debate is crucial for ensuring an informed and constructive evaluation of the energy options. For example the Terms of Reference for the forthcoming UK Government Energy Review recently published by the UK Department for Trade and Industry (DTI) mean that a study which aims to frame the principles, processes, participants and options of the debate across the nuclear fuel cycle in the UK could be very influential on energy policy. The RCEP study could help to catalyse a balanced and constructive debate among politicians, scientists, the media, public and other stakeholders.

Other comments – 27th report proposals

Water in the UK

We are also very supportive of a study on water in the UK. On balance we concluded that this study would benefit from being delayed until after the work on the implementation of environmental policies has been concluded. This will enable the results of this work to be utilised in the preparation of the water study and any future recommendations.

However in the event that the RCEP decides to go ahead with a study on water we have listed some of the issues below that EPAG and EAN identified.

- *Taking a long-term future view:* We believe that the value of this study lies in its long term view and encourage you to consider the issue within the context of the next 50-100 years.
- *Drivers of change:* The study should consider the primary drivers for change in the availability and quality of the resource, such as demographic change, climate change and rising temperatures, changing precipitation patterns, pollution from existing and new technologies, and how the numerous interactions between these factors impact on water resources.
- *Impacts of regional climate change:* In addition the study should consider the impact of regional climate change on water in the UK. For example, by addressing changing precipitation trends, identification of consequential impacts on spatial and temporal changes in aquifer recharging, recovery of freshwaters from acidification and the impact of climatic extremes on water quality and availability.
- *Cumulative impacts:* In addition to the content indicated in the RCEP consultation document, the study could consider how primary drivers interact and the impacts accumulate to affect water in the UK. For example, climate change and pollution may interact to affect water quality and availability.

Assessing the environmental effects of novel materials and applications

We agree that consideration of this issue is timely, but as noted by the RCEP consultation document, this is an area already subject to investigation. As a result we considered that this topic was of a lower priority relative to the others proposed. However, we believe this is an important area, most notably due to the increased use of novel materials (such as nanoparticles) in technological and medical advances. Environmental concerns highlighted by the Royal Society and Royal Academy of Engineering (RS-RAEng 2004) include the impact of nanoparticles on soil and water. The public are also becoming increasingly aware of nanotechnologies and their potential impacts. We recommend therefore that the RCEP monitors the outputs from current studies, and if appropriate, contributes to the debate in the future.

Noise and light pollution

All the respondents agreed that the RCEP could consider a study on noise and light pollution in the future because both are growing problems in the UK. However, relative to the other proposals this topic was considered to be a lower priority.

References

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