

# COMMUNICATION OF RESULTS

An effective impact assessment is usually characterised by the establishment of good communications between researchers and other interest groups. Three lines of communication are important for researchers: with other researchers, with policy-makers and with the public.

## 5.1 Communication among Researchers

Two issues are of critical importance in communicating and evaluating research results among researchers: the reporting of results and peer review.

### 5.1.1 Reporting of results

There is a burgeoning literature on the possible effects of future climate, but as yet there has been little attempt to co-ordinate or standardise either the approaches used or the reporting of results. It is critical that the methodology, assumptions and results of studies are transparent. A number of important requirements for reporting results are listed here:

- Methods of assessment should be detailed in full.
- Information from climate models used in scenario construction should be correctly interpreted and original sources accurately cited.
- The major assumptions of a study need to be outlined and substantiated.
- Impact models should be properly tested, fully documented or cited, and accessible to other researchers so that results are easily reproducible.
- All results should be accompanied by estimates of their attendant uncertainties

### 5.1.2 Peer review

The peer review of results is a vital element ensuring the quality control of published research. Proper vetting by expert reviewers is the only means by which non-specialists are able to evaluate the quality and significance of research.

Most reputable scientific journals subject submitted papers to a rigorous review process. However, there are some cases where, given the interdisciplinary nature of the research, specialist review cannot be offered for some elements of a study. Therefore, researchers bear some responsibility for ensuring that all their methods and models are exposed to such a review process from appropriate experts. Indeed, many large projects organize their own review process, whereby specialists are asked to provide formal reviews of results prior to final publication.

## 5.2 Communication with Policy-makers

Much climate impacts research seeks to answer questions that impinge on or are specifically defined by policy. Thus, communication between policy-makers and researchers is essential, the former demanding of the latter solutions to problems and the latter alerting the former to issues of importance and requesting the resources to research them.

One of the major problems of communication between researchers and policy-makers is the need to convey the considerable uncertainties attached to future estimates, while demonstrating that there is a problem to be addressed. Moreover, the recent upsurge of interest in environmental issues, has led to a rapid increase in the demands on researchers to communicate results directly to policy makers (e.g., through government hearings). Since many of the goals of policy-makers are short-term, there may be advantages in presenting research results in the form of the types of impacts likely to be experienced in the early stages of a more general climatic change. Such results could usefully be expressed, for example, in terms of the risk of certain events occurring that are of immediate concern (e.g., drought or coastal flooding). Nonetheless, there are still major issues that should be addressed over a longer time perspective (for example, potential impacts such as extinctions, that are irreversible, or more tangible planning questions such as construction of dams or coastal defences).

## 5.3 Communication with the Public

Ultimately, most policy-makers are answerable to the public, and public opinion plays an important role in determining policy. It is important, therefore, that the public is kept well-informed about progress in research. Effective communication is thus vital, and it is brought about partly through education but primarily via the mass media. While researchers have a responsibility to communicate their work in a clear and concise manner to the public, the media also bears a great responsibility for accurate reporting of the research. Unfortunately, there has been a tendency by some to report only the most dramatic or controversial aspects of climatic change and its impacts, rather than to present a more balanced view. Researchers should be wary of checking thoroughly any material which is to be communicated to the public in this way.