Biodiversity body 'needs more science'

[LONDON] The United Nations' biological diversity convention needs to strengthen its scientific advisory body, delegates from member countries concluded at a meeting last week in London.

The meeting was held primarily to discuss the workings of the UN Convention on Biological Diversity, signed at the Earth Summit in Brazil in 1992. But delegates to the workshop spent much of their time considering the convention's Subsidiary Body on Scientific, Technical and Technological Advice (SBSTTA), focusing on the long-standing concern that the body's meetings tend to concentrate more on political issues than on science.

SBSTTA was set up to give scientific advice to member countries. Its remit also includes analysing national biodiversity inventories — the first batch of which are waiting to be read — assessing the state of biodiversity research, and commissioning new projects in response to specific requests.

But the body has met few of these objectives. It has met only three times since the signing of the convention in 1992. Discussions have taken on a political flavour because governments are frequently represented by diplomats instead of scientists. The last meeting of SBSTTA was dominated by a dispute about which UN convention should take precedence in formulating forestry policy (see *Nature* 390, 432; 1997).

It is often left to the convention secretariat to collect scientific advice for parties to the convention. "There is clearly a need for change," says Calestous Juma, executive secretary to the biodiversity convention who is based in Montreal. "There is not even a body that can synthesize the available scientific information."

Even the guide that has been produced — the comprehensive, 1,100-page *Global Biodiversity Assessment*, which involved 1,100 experts from 80 countries — was coordinated not by the biodiversity convention but by the UN Environment Programme.

At the workshop last week, the 35 participants brought together by the UK government considered several options.

One was to set up a parallel, but independent, body of scientific experts who would review the status of biodiversity research, commission new projects and provide relevant advice to parties to the convention.

This body would be similar to the UN's Intergovernmental Panel on Climate Change (IPCC) which, through its decade-long efforts, contributed critically to the adoption of the Kyoto Protocol on greenhouse gases last month.

But this idea was recognized as being the most costly of those considered, as well as being politically unworkable in the short

Out of focus: the convention is meant to boost biodiversity research, as here in Costa Rica.

term. The main reason for this is the reluctance of donor countries to invest in a new institution. Also, the Global Environment Facility, the UN's main environment funding mechanism, has spent most of its \$2bn initial budget.

Another option would be to make better use of informal scientific expertise through national and international academies of sciences, and through organizations such as DIVERSITAS, a group of biodiversity researchers drawn from six international scientific bodies that include Unesco and the International Council of Scientific Unions.

The lack of available structured scientific advice has meant that, five years on from the signing of the convention, little has been added to the sum of scientific knowledge on biodiversity, and a number of important questions remain.

To answer some of these, it is necessary to identify and classify the unknown 80 per cent of the Earth's species; to agree on a common method of classifying plants and animals; to begin to unravel the complex mechanisms

through which different species depend on each other for growth and survival; to find a consensus on the rate of biodiversity loss; and to carry out research into the environmental implications of genetically modified organisms.

Genetically modified organisms are the subject of a proposed protocol on biosafety due to be adopted at the end of this year. The protocol is controversial. Some observers have questioned the decision to include such organisms in an international convention on biological diversity.

Others challenge the wisdom of a deadline for a protocol when many aspects of the environmental impacts of genetically modified organisms remain unclear.

Meanwhile, the secretariat — in conjunction with member countries — has already begun to set research priorities and has agreed on a 10-year programme of scientific work in four main areas: marine biodiversity; the impact on biodiversity of agriculture; forests and inland waters; and research on the interdependence of species — known as the 'ecosystem approach'.

And DIVERSITAS will bring together 15 experts to explore the scientific questions stemming from each of the convention's articles for a meeting in March at the Autonomous University of Mexico (Unam).

Sir Ghilleen Prance, chairman of DIVERSITAS and director of the Royal Botanic Gardens at Kew in London, says he is keen to involve more scientists in the biodiversity convention. "Up till now the politics has dominated rather than the science", says Prance. We have a challenge on our hands to change things."

Ehsan Masood

South Africa sells research to its children

[CAPE TOWN] South Africa has declared 1998 the 'Year of Science and Technology'. The programme will be launched formally in Cape Town next month, when President Nelson Mandela will visit a school computer laboratory and receive e-mail messages sent by schoolchildren at other schools.

The main aim of the programme, according to member of parliament M. F. Cassim of the arts, culture, science and technology portfolio committee, will be "to reach out to every child in every corner of the land" to persuade them of both the excitement and the importance of science and technology.

This will be done through a series of 'focus weeks', staggered throughout the year, in each of the nine provinces. In many cases these weeks will be followed by additional activities in rural areas.

Foreign governments have agreed to support the programmes in four provinces. The Western Cape Province, which will host the first focus week, will be supported by France, and will include visits to research vessels launched in Cape Town harbour. Focus weeks in Mpumalanga, the Northern Province and the North West Province will be supported by Russia, the Netherlands and the United States respectively.

South Africa's eight science councils will be participating through a range of exhibitions, competitions, public lectures and open days. Each is responsible for a particular 'thrust', with the Foundation for Research Development, for example, promoting astronomy and space science, the Medical Research Council showcasing public health, and the Council for Geoscience responsible for archaeology and palaeontology.

Michael Cherry