The eighth session of Antarctic minerals talks resumed with the now ritual calls for faster progress. Whether this progress will occur is uncertain.

There have been extensive bilateral consultations since the Paris session in September-October last year. These have laid the foundation for more focused work. However, some caucuses have hardened their positions on key articles, reducing the likelihood of a new draft minerals regime being circulated at the end of this meeting.

In particular, the claimants are forcefully raising the issues of revenue sharing, control over inspections and other aspects of compliance, and a veto over activities in 'their' areas. These positions are anathema to non-claimants.

Developing countries are a stronger force in the negotiation than previously. Their interests are, however, in conflict with the technologically advanced nations' desire not to share technology or to be bound to mandatory joint ventures. Leaders of the LDC group have called for concrete steps to be taken to ensure their involvement in all activities.

The high-tech mining states want these questions treated as factors to be considered in evaluating competing applications.

Several LDCs are proposing that the Advisory Committee should circulate extensive information about proposed activities and facilitate joint ventures and training programs. While this might be expected to be non-controversial, the technologically advanced states do not appear to favor it.

Almost all serious suggestions for an accommodation with LDCs have been rejected so far. ECO questions whether there is a genuine desire on the part of the developed states to have any such accommodation.

Interestingly, the cost of travelling to Hobart seems to have reduced the NCP presence but not their level of participation this session. No NCP, however, has so far put forward serious proposals to amend the draft text.

The non-claimants are becoming increasingly critical of a number of aspects of the draft. These include any veto by individual claimants over activities and the automatic right of claimants to four seats on every Regulatory Committee, particularly in view of the ever increasing number of non-claimants. Some believe the claimant bloc should not have a special "group" veto in the Regulatory Committees.

Some delegations are also critical of the favored position of the USA and USSR, these states being guaranteed seats on every Regulatory Committee by Beeby's "Package Deal" document.

Early in this session it seemed possible that regular working groups on Environmental Issues and Exploration/Development would be constituted, but this has not happened. Instead, small informal groups began working on these issues at the end of the first week, but without precise terms of reference or broad participation, in contrast to the Legal Working Group.

Continued on page 4
BRAKES IN THE SYSTEM?

One of the most serious environmental deficiencies of "Beeby II" is the lack of a decision-break-point before the development stage begins.

Article XXXV(6) of the draft text states: "Upon receipt of the original or modified Management Scheme, the Commission shall, without further review, authorise the issue of a development permit...."

This deficiency is intended to accommodate the USA and other mining interests such as FRG and Japan, which fear political obstructions to mining or drilling proposals of their companies.

From the environmental point of view, there is no problem with giving the holder of an exploration licence priority in applying for a development permit. To give an automatic right to begin commercial exploitation, however, goes too far in appeasing mining interests at the expense of good management and environmental protection procedures. The change in scale of excavation and introduction of full-scale processing technologies at the development stage represents a vastly increased hazard to environmental quality. The simple review of a management plan under limited circumstances, as currently proposed in "Beeby II", is inadequate.

Such a change in circumstances must precipitate a full and exhaustive consideration of all the implications for the Antarctic on an "ecosystem as a whole" basis, including procedures for environmental impact assessment and review of the management plan as if it were a new draft. This must include the possibility of refusing a development licence permit on the basis of unacceptable damage to the environment, unacceptably high risks of such damage, or inconsistency with other uses and values -- such as scientific research.

Scientists are beginning to consider long term research programmes that make use of the unique characteristics provided by the Antarctic. Scientific research is best viewed as a continuum of possibilities rather than a set of specific existing uses. That continuum deserves considerable weight in evaluating other possible uses, such as minerals development.

To preclude the possibility of the Commission collectively saying "No" at the penultimate stage would constitute a de facto encouragement to exploit -- presenting less control of mining and drilling operations than is to be found in the domestic legislation of several ATCPs. To allow an automatic right of progression to the development stage will reduce investment risk for would-be exploiters at the expense of much greater risks to scientific values and the environment.

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Quote Of The Day

"DON'T WORRY !
THERE'S NO NEED TO GET ULCERS ABOUT ANTARCTICA !
THE ENVIRONMENT WILL BE TAKEN CARE OF...
overheard at Beeby I...
II...III ad infinitum...

1986 1999
BREAKFAST IN BRUSSELS

Bad news for private expeditions - or at least some private expeditions. It seems that a hard line policy towards certain private expeditions was discussed and agreed to over a heads of delegation breakfast at the Consultative Meeting in Brussels last year. Two private expeditions which left Australia late last year came under close scrutiny by members of the Antarctic Treaty System.

One of these expeditions, "In the Footsteps of Scott" (British), was bound for Cape Evans near the United States' McMurdo base and New Zealand's Scott base. The other, the Greenpeace Antarctic expedition, was also bound for a site on Ross Island. Both expeditions were subjected to intensive hostility which was totally unnecessary and which has created a very dangerous precedent in Antarctica. Conservationists consider that this precedent will be used to discriminate against future private, environmentally based expeditions.

Listed below are just a few of the more important incidents that occurred:

- All requests for weather and ice reports were denied to the support ship for the British expedition, the "Southern Quest", until this refusal was made public by the press.
- Greenpeace was refused licences for satellite and HF communication by the New Zealand government, thereby placing the Greenpeace expeditioners at risk. The refusal was transmitted by the Ministry of Foreign Affairs, not the communications authorities. Up until the moment that the licence was denied the expedition had been under the impression from their dealings with the telecommunications authorities that a licence would be granted.
- Two of the Scott Base personnel were sent home early, ostensibly for communicating to the press their unhappiness at the treatment dealt to the "Footsteps of Scott" and Greenpeace teams.
- While Greenpeace's helicopter was in the vicinity of McMurdo, air traffic control would not even supply basic flight safety information to the pilot. The helicopter was also actually denied permission to land at nearby Scott Base.

ECO understands that in the case of "Footsteps of Scott" several of the National Science Foundation personnel at McMurdo felt concerned enough to send a letter to members of the crew, apologising for the harsh treatment and promising to write to their congressmen to complain. The correspondents disassociated themselves from the hard official line.

In light of the incidents listed above, one can only assume that future private expeditions with an environmental or conservation focus will be discriminated against. ECO wonders if private mining expeditions will also be subjected to such dangerous hostility.

International cooperation is one of the hallmarks of the ATS. Clearly, cooperation is on a selective basis. Neither expeditions requested any help over and above the normal courtesies such as weather and ice reports, acknowledgements of radio messages and air traffic information, which would be expected under international and maritime conventions anywhere in the world.

ECO can only conclude that the ATCPs fear the political repercussions of private expeditions with a conservation or environmental protection agenda.
ECO hopes that a formal working group will be convened at the next session in Tokyo to consider in detail the exploration and development phases, from the environmental point of view. This is critical to ensuring that environmental objectives and principles in Articles II and III of "Beeby II" are fully reflected in the practical working of the regime.

The Chairman's proposal for a Special Meeting of all States Party to the regime (that is, both Consultative and Non-consultative Parties) to decide whether to open an area to exploration and possible development was also discussed. This was to be a key aspect of the larger accommodation for Non-consultative Parties, which have no role on the important Regulatory Committees.

The proposal found no favour with most ATCPs who, it seems, fear being outvoted on a development proposal by an increased number of NCPs. Although it remains unclear whether the Special Meeting concept is totally dead, there seems no possibility of such a body having any formal decision making power.

The status of the Chairman's Package Deal must be in doubt. Several delegations assert that the only negotiating document on the table is MR 17, Revision 1, or 'Beeby II.' Still, no one has come forward with a more coherent set of compromises. Every delegation knows there must be compromises if the regime is to be completed.

One negotiator commented to ECO, "only when a firm timetable for ending the negotiation has been agreed will compromises occur". The most that can be said at present is that another session will take place this year in Tokyo, probably in November.

So, whilst a sense of urgency to complete the regime still underpins the negotiations, the pace is still as slow as ever. ECO asked several delegates for their best estimate of when a regime would be completed. 'Four or five years' was a popular answer. ECO is willing to act as bookmaker to set odds on this question, with an open-ended chart of possibilities — all the way to 'never'!

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ANNOUNCING

THE SEVENTH CONTINENT:
Antarctica in a Resource Age
by Deborah Shapley
Published by Resources for the Future

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In any discussion of Antarctic mineral resources, consideration must be given to other Antarctic non-renewable resources. Coastal ice-free land and inland oases are the most limited of Antarctica's non-renewable resources. However, they have been ignored as resources in their own right in the few discussions by ATPCs on terrestrial impacts. Similarly, little thought has been given to the uniqueness of the Southern Ocean ecosystem.

The first impacts of minerals development would be observed in coastal oases—the areas in which land-based support installations would be constructed. The Group of Specialists on the Environmental Impact Assessment of Mineral Resource Exploitation in Antarctica (EAMREA), convened by SCAR, has stated that massive terrain modification in coastal areas is unavoidable if minerals development is allowed. EAMREA concludes that construction activities would have major adverse effects on the terrestrial permafrost regime, destroying or modifying the soils and terrestrial biota.

EAMREA did not discuss the effects of waste heat on local ice regimes, sewage, or the effects of station personnel visiting local areas. Yet logistic support of exploration activities would generate those impacts before the development phase even began.

The most disturbing environmental impacts would occur in the event of a major oil spill, such as the Gulf of Mexico blow-out in the late 1970s. Although the effects of oil on mammals and birds are comparatively well-known, the possible impacts of oil on the Southern Ocean ecosystem are not.

The Southern Ocean differs from other oceans in many respects. Zonal currents circulate around the entire continent, occasionally forming large eddies or gyres many hundreds of miles in diameter. Examples are found in Prydz Bay and the Weddell Sea. This means that any oil could be carried vast distances and be dispersed around the continent.

A vast area of the Southern Ocean is covered by annual sea-ice. Primary biological production is limited to the eight months between mid-August and April, because of limited light.

In most of the world’s oceans, solar energy is trapped by microscopic algae (phytoplankton) and used to fix carbon which provides the energy for the rest of the ecosystem. The phytoplankton is usually found actively photosynthesizing throughout the water column to a depth where there is about 1% of incident radiation. In the Southern Ocean, however, light is limited for much of the year, so when spring arrives there is a large bloom of micro-algae. At this stage the sea-ice has not begun to melt, and it reduces much of the available light. For this reason there is insufficient light for the microalgae to grow except immediately under the ice, or inside microscopic brine tubules within the ice. These algae form the sympagic (ice-associated) flora. Primary productivity in springtime is concentrated into a narrow band about two metres deep.

The sympagic flora is thought to account for approximately 10-15% of the annual primary productivity in the Southern Ocean and, during spring, this flora accounts for nearly all the primary production. It is likely to be the first available food source for krill after they have ended their enforced winter fast.

The sea/ice interface is the place where oil would collect after a spill. Like micro-algae, oil also migrates up into microscopic brine tubules within the ice. Should a major spill occur in a region such as Prydz Bay in summer, it is possible that the ocean currents and eddies would spread the oil over a vast area. With the onset of autumn and formation of new annual sea ice, the oil could be bound up within the structure of the ice. The following spring the sympagic flora may be unable to bloom as previously. This could reduce the energy budget of the system considerably. While this impact would occur at the micro-algae level, its effects would extend throughout the food web. All Antarctic marine life, without exception, ultimately is dependent on the micro-algae.

Normally, the oceans are considered to be systems extraordinarily well buffered from the effects of environmental pollutants, but the Southern Ocean may be much more sensitive. With our present limited knowledge we do not know whether these gloomy forecasts are likely to prove correct. Any proposal which involves the risk of an oil spill cannot be contemplated until far more is known.
The debate at the UN has contributed to greater worldwide understanding of the Treaty's special role, and has led to increased participation in Antarctic affairs by nations formerly on the sidelines. This trend must continue.

ECO hopes that all members of the Treaty will submit responses to the Secretary General by the May 1 deadline, and looks forward to reviewing the updated Study.

**UN UPDATE**

Following from earlier debates in 1983 and 1984, the 1985 General Assembly adopted three resolutions on Antarctica. These request the Secretary General to update and expand the 1984 Study on Antarctica. Input was invited from all member states and interested organizations on the availability of information from Antarctic Treaty Consultative Parties to the UN about their activities and deliberations; the involvement of relevant specialized agencies and intergovernmental organizations in the Antarctic Treaty System; and the significance of the UN Convention on the Law of the Sea in the Southern Ocean.

In addition, the ATCPs were asked to submit information about their efforts to negotiate a minerals treaty, and to respond to the resolution calling for South Africa's participation to be curtailed until there has been a change in the government there.

In part because of the dispute over South Africa's status, the consensus between all nations developed during the prior General Assembly debates was lost. Most ATCPs chose not to participate at all in the three votes, although India and China both voted in favor of the resolution on South Africa, and China formally abstained on the other two resolutions.

If the ATCPs decide to have nothing further to do with the UN on Antarctica until consensus is restored, there is little likelihood of recovering consensus on Antarctica at the UN. Nothing could be more certain to result in Antarctica being the object of international discord, which the Antarctic Treaty was designed to prevent.

It appears that many members of the Treaty would prefer to uncouple the South African question from substantive Antarctic issues, treating South African participation in the Antarctic Treaty as a political question on which all nations could state their views. If that issue were separated, a consensus on continued UN involvement with Antarctic issues would not be difficult to achieve.

The wildlife and environment of the Antarctic belong to no nation or small group of nations, but are part of the world's natural heritage. It is appropriate for the United Nations to consider the region's present and future management. The study completed in 1984 is widely viewed as an excellent document, which has markedly increased awareness in the international community of Antarctica's values.