Presentation script for Tim Adams

Discussion Panel B

Vulnerable marine ecosystems in the Pacific islands region

Introduction

Co-chairs: Because I am a last-minute stand-in for a subject-matter **specialist**, I would warn the meeting not to expect an enormously charismatic presentation, or an indepth analysis of a particular vulnerable marine ecosystem. What I will simply try to do here, as a **generalist**, is describe a range of key marine ecosystem issues and their

including the islands administered by France, New Zealand, UK and USA, as well as the Pacific Islands Forum countries. The "Pacific Community" is thus a useful collective term that covers the entire work area of all the members of the Council of Regional Organisations in the Pacific (CROP).

Vulnerable marine ecosystems

Pacific Islands are worried about the vulnerability of several of their key marine ecosystems, particularly the following:

Coral reefs are a prime concern, particularly as scientists have so far plumbed little of the depths of their complexity, thus making scientifically-based management difficult, but I won't dwell on them here, since these are covered by another speaker.

I would however note that:

- The Pacific Community region is devoting considerable new resources to evaluating the limits of sustainability for exploitation of Pacific coral reef ecosystems, developing practical management guidelines, and, for the first time, evaluating nearshore fisheries impacts in a systematic way across the region. SPC has recently set up a regional Reef Fisheries Observatory, with assistance particularly from the EU, for this purpose.
- Many Pacific Island countries are also putting a new focus onto coral reef fishery governance systems. There has been an overall strengthening of traditional pride in tenure and stewardship, and increasing recognition by governments of traditional and community systems, despite the loss of some of the traditional knowledge and institutions that have evolved to sustain these systems since the initial colonisation of each Pacific island.
- New hybrid and co-management systems are emerging, and whilst Pacific Island coral reef fisheries can in no way be considered safe, the ground for sustainable management and conservation is considerably more fertile than it was 20 years

populations in Melanesia, and sea-grass is important grazing for the green sea-turtle. But seagrass is also the key nursery habitat for all of the highest-value species of seacucumber – very important to the rural economies of many islands. Seagrass beds, of course, are themselves very vulnerable to human impacts – not just physical damage, but eutrophication, and invasive species.

Mangroves are not present across all of the Pacific Islands region, but are important in the west. The presence of mangroves permits the survival of whole communities of organisms, and thus has a major knock-on effect in the maintenance of western Pacific biodiversity. There have been great social strides made in recent years to recognise that mangroves are not just smelly swamps occupying prime areas of seafront, but are essential for maintaining the current shoreline and balance of marine life in many countries. contribution to our

sensitive in my own field of fisheries management, but if the precautionary approach is applied in a realistic manner as a management tool, rather than as an excuse for prohibition, and with the principle of "reasonable doubt" firmly in mind, it is reasonable to put the onus on the potential exploiter to improve the information and monitoring necessary for managing their activities.

We will never, of course, have sufficient information and knowledge to completely understand these extremely complex ecosystems, but with effective governance mechanisms, with effective linkages to realistic monitoring mechanisms, we probably have enough knowledge to take effective action on many issues.

That having been said, it is important to have management frameworks that are not completely prescriptive – not set in legal stone – but where actions can be modified as basic knowledge improves. We will never be entirely sure that we are monitoring the most critical indicators, or that we have taken all ecosystem interactions into account, and I would point out that some countries are now finding that it may be difficult to apply the ecosystem approach under existing fisheries management legislation without major re-tuning.

Another point about information is that many Pacific small island countries lack the capacity to sustain much marine ecosystem monitoring at the government level, and must rely on international and regional organisations to supply or pool scientific expertise for occasional major surveys, and on communities and NGOs to monitor locally-important events and indicators. In many cases, there is no formal mechanism to link all of these processes together, and this is one of the reasons that the Pacific Islands Forum region h0.frumm)-9.8(a) \mathcal{R} n)-110..1(ndic)809 the basicmaf110..1(a)8 trade, the protection of aspawning aggregations from excessive exploitation at certain points in time is critical. For the protection of mangroves, agreement on coastal development planning and effective zoning can be of primary benefit. The cont arolmaof effluent is likely tao be aof agrat im aportance for the maintenance of aseagrasses. For the protection aof sea-turtles, the survival aof hatchlings from nesting beaches is of huge imtance, whilst for the protection of tuna fisheries, regial agreement on the limits of aextation is acritical. For severely impacted vulner $\langle m$)-1bbrl $\langle te$ -13tm0.9(gem)1JT0.0002 T. $\langle a$)-0ro-of pa a-9. $\langle on$)10n-of ban s5(r)3t1.1591 ae l n-of pf

This whole exercise is also part of a type II partnership initiative emerging from the Johannesburg summit on sustainable development, and through this the Pacific Islands region will be seeking to engage partners and share lessons learned – some of which may be applicable to other regions.