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# Antarctica and the Southern Ocean in the context of the Strategic Plan on Biodiversity 2011-2020

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# Summary

In June 2015, SCAR, in partnership with the government of the Principality of Monaco, and several other supporters, held a meeting of biodiversity, legal and policy experts to assess Antarctic and Southern Ocean biodiversity and its conservation status in the context of the Strategic Plan on Biodiversity 2011 to 2020. To date, Antarctica and the Southern Ocean have not been adequately represented in associated global biodiversity assessments. The meeting considered the current status of biodiversity conservation in Antarctica and the Southern Ocean, available evidence for this status, and both their trajectory and evidence for this trajectory, in the context of each of the 20 Aichi Targets of the Strategic Plan on Biodiversity 2011 to 2020. The meeting recognized that for some areas of conservation, in the context of these Aichi Targets, Antarctica and the Southern Ocean are in a leading position globally. The meeting also recognized that some of the Aichi Targets provide no applicable context for conservation in the Antarctic region. The meeting concluded that it is essential to ensure that Antarctica and the Southern Ocean are fully represented when a report on the state of global biodiversity is presented at the end of the decade.

# Background

The Protocol on Environmental Protection to the Antarctic Treaty commits the Parties to the comprehensive protection of the Antarctic environment. This commitment includes the conservation of Antarctic Fauna and Flora, as Annexes II and V to the Protocol, and several subsequent ATCM Measures and Resolutions [e.g. 1, 2] make clear.

The field of Conservation Biology recognizes the conservation of fauna and flora under the broader rubric of *the conservation of biological diversity*, or, in its abbreviated form – biodiversity. Biodiversity is typically defined as: 'the variability among living organisms from all sources including terrestrial, marine and other aquatic ecosystems and the ecological complexes of which they are part' [3].

Many scientific reviews have concluded that global biodiversity is in decline. One of these, which appeared in 2010, recognized that despite numerous endeavours to reverse this trend, most indicators revealed a continuing decline in the state of biodiversity, with pressures on biodiversity, such as biological invasions, climate change, and overexploitation, showing increases [4].

Subsequently, renewed global commitments were made to reverse these trends, formulated formally in the Strategic Plan for Biodiversity 2011-2020, which calls for urgent action this decade, supported by a suite of 20 Aichi Biodiversity Targets [5]. A recent mid-term review of progress against these targets concluded that despite much endeavour in policy and management responses, the state of biodiversity is unlikely to have improved by 2020, and additional societal effort is required to achieve the Aichi Targets [6].

Despite the considerable richness of Antarctic and Southern Ocean biodiversity [7], the 2014 review of the state of global biodiversity [6] incorporated only minimal information from the region. Similarly, Antarctica and the Southern Ocean are inadequately represented in the Global Biodiversity Outlook [8]. In consequence, despite the significance of the region's biodiversity, and broad recognition of the general efficacy of the Protocol on Environmental Protection for the conservation of biodiversity (formally as Fauna and Flora) [9, 10], it seems likely that a report on the state of global biodiversity at the end of the decade will not adequately represent understanding of both Antarctic biodiversity and the efforts being made to conserve it through the Antarctic Treaty System.

## The Monaco Assessment of Antarctic and Southern Ocean biodiversity

To address this potential underrepresentation, SCAR, in partnership with the government of the Principality of Monaco, and several other supporters, held a meeting of biodiversity, legal and policy experts, in June

2015, to assess Antarctic and Southern Ocean biodiversity and its conservation status in the context of the Aichi Targets (www.scar.org/monaco-assessment).

These 20 Targets (see attachment A) are divided among five strategic goals:

- Address the underlying causes of biodiversity loss by mainstreaming biodiversity across government and society,
- Reduce the direct pressures on biodiversity and promote sustainable use,
- Improve the status of biodiversity by safeguarding ecosystems, species and genetic diversity,
- Enhance the benefits to all from biodiversity and ecosystem services,
- Enhance implementation through participatory planning, knowledge management and capacity building.

The meeting considered the current status of Antarctica and the Southern Ocean biodiversity conservation, available evidence for this status, and both the trajectory and evidence for this trajectory, in the context of each of the 20 targets. The meeting recognized that for some areas of conservation, in the context of these Aichi Targets, Antarctica and the Southern Ocean are in a leading position globally. For example, invasive alien species and pathways have already been identified and prioritized, priority species have been identified and have been eradicated in several cases, and measures are in place to prevent their introduction and establishment (Target 9). The meeting also recognized that for other areas of conservation, much effort is being directed to them. For example, safeguarding biodiversity through ecologically representative and well connected systems of protected areas and other effective area-based conservation measures (Target 11).

The meeting also recognized that some of the Aichi Targets provide no applicable context for conservation in the Antarctic region.

Following the meeting, much effort has been undertaken to draw together the full evidence base for each of the areas of conservation considered during it. This work is nearing completion and will be made available through two major routes: First, by means of a formal scientific publication in the peer-reviewed literature. Second, a comprehensive report will be provided to the Antarctic Treaty Parties, which will subsequently also be made public. Moreover, the outcomes will form a foundational introductory basis for SCAR's Antarctic Conservation for the 21<sup>st</sup> Century Report, which is nearing completion.

### **Conclusions**

A key conclusion of the Monaco Assessment meeting was that the five strategic goals under which the Aichi Targets fall, resonate well with the extensive and comprehensive work being undertaken by Parties, and by all those active in the Antarctic region, including organizations such as SCAR, COMNAP, IAATO and ASOC, to ensure comprehensive protection of its environment. In consequence, it is essential to ensure that Antarctic and Southern Ocean biodiversity and the efforts being made to conserve it through the Antarctic Treaty System, are fully represented when a report on the state of global biodiversity is presented at the end of the decade.

#### References

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