



**Agreement on the Conservation of Albatrosses and Petrels**

**Fourth Meeting of Advisory Committee**

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**Title: Australia's Report on Implementation of ACAP**

**Author: Australia**



**Australia's Report on Implementation of ACAP  
December 2006 – April 2008**

The following information summarises activities undertaken, or being undertaken, by Australia in support of its obligations under the Agreement on the Conservation of Albatrosses and Petrels (ACAP) and in furtherance of the objective of the Agreement. The activities have been, or will be, undertaken primarily by government agencies, however many involve support from others, including the fishing industry and conservation organisations.

**1. Species Conservation**

Within Australia's jurisdiction, there are breeding populations for eight ACAP Annex 1 listed species, five albatrosses (wandering, black-browed, grey-headed, light-mantled sooty and shy albatrosses) and three petrels (the grey petrel, northern and southern giant petrels). The current status of the Australian breeding populations of these eight species is summarised in Table 1.

**Table 1:** Summary of Australian breeding populations of ACAP listed species

Species	Number of breeding pairs	Trend	Comments
<b>Wandering albatross</b> – Macquarie Island	6-15 (1995/96 to 2006/07)	Stable/ decreasing?	No evidence of recolonisation of Heard & McDonald Islands. Biennially breeding species, numbers vary each year; in 2007/08 there were only five.
<b>Black-browed albatross</b>			
– Macquarie Island	46 (2006/07)	Stable	Bishop and Clerk Islets are a collection of rocks offshore which are difficult to access.
– Bishop and Clerk Islets	~140 (1998/99)	Unknown	
– Heard & McDonald Islands	~700 (2000/01)	Increasing?	
<b>Grey-headed albatross</b> – Macquarie Island	~90 (2006/07)	Stable	
<b>Light mantled sooty albatross</b>			
– Macquarie Island	~1250 (2004/05)	Stable	Count approximate as nests typically inaccessible making assessment of population difficult.
– Heard & McDonald Islands	~500	Increasing?	
<b>Shy albatross</b>			
– Albatross Island	5000 (2007/08)	Stable	
– Mewstone	~9000 (2007/08)	Unknown	
– Pedra Branca	~250 (2007/08)	Decreasing	
<b>Northern giant petrel</b> – Macquarie Island	1840 (2006/07)	Increasing	
<b>Southern giant petrel</b>			
– Macquarie Island	2120 (2006/07)	Stable	There are inconsistencies in the data due to timing and irregularity of counts, which occurred in eight years between 1951 and 2003. No single season where all colonies were counted at the same time. Count units vary (eg chicks, nests, adults).
– Heard & McDonald Islands	~2000-3000	Unknown	
– Frazier Islands, Antarctica	248 (2001)	Unknown	Count unit was "occupied nests", ie at least one apparently breeding bird.
– Hawker Island, Antarctica	~40 (2007)	Unknown	Four independent counts, in two groups, were made in 2007 by four personnel. These counts were 21, 20, 18 and 19 chicks.
– Rookery Islands, Antarctica	2 (2007)	Unknown	

<b>Grey petrel</b> – Macquarie Island	74 (2006/07)	Increasing	Slowly
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Over the next three years, Australia aims to commence or continue with a range of activities to improve the conservation status of albatrosses and petrels listed under ACAP Annex 1, including:

- reviewing the implementation of Australia's 2001 national Recovery Plan for Albatrosses and Giant Petrels;
- developing a new national recovery plan to promote the improved conservation status of albatrosses and giant petrels, and which replaces the above 2001 Recovery Plan;
- finalising Australia's National Plan of Action on Seabirds;
- investigating the extent and nature of seabird bycatch in Australian trawl fisheries;
- population monitoring and demographic, tracking and other research, particularly at breeding colonies of Annex 1 species, including those in Australia's area of Antarctic operations;
- a seven year program to eradicate alien invasive species (rabbits, rats and mice) at Macquarie Island, a major breeding site for several albatross and petrel species listed under Annex 1;
- research into bycatch mitigation, with particular emphasis on developing improved mitigation measures for pelagic longline fisheries;
- educating fishers, scientists, fishery managers and others, in both national and international forums, about the conservation status of albatrosses and petrels and the urgent need to take action to improve that status;
- working within organisations – such as the IOTC, WCPFC, CCSBT and CCAMLR – responsible for managing high seas fisheries and to which Australia is a Party in order to minimise the impact of fisheries on seabirds and encourage the adoption of effective seabird bycatch mitigation measures and strategies; and
- actively participating in ACAP and implementing Australia's obligations under the Agreement.

Several of these are described in more detail in other sections of this report.

Measures to eliminate, control or prevent introduction of non-native species to breeding sites	Action Plan Reference		AC Work Program Reference	Agreement Reference
	1.4	3	III (1) b)	

Macquarie Island pest eradication program – the Australian and Tasmanian Governments have jointly funded a AU\$24.6 million, seven year program to eradicate alien invasive species (rabbits, rats and mice) at Macquarie Island. Macquarie Island is a major Australian breeding site for four albatross and three petrel species listed under ACAP Annex 1. The program is planned to include dropping of anti-coagulant baits by helicopter, followed by the use of trained dogs, shooting and trapping to eliminate any remaining pests.

Increasing rabbit and rodent populations on Macquarie Island have caused serious impacts on native fauna and flora and, apart from the eradication program described above, there are currently no viable population control options for rabbits or rodents.

Rabbits favour the large leafy megaherbs and grasses, which provide critical breeding habitat for a range of burrowing petrel and albatross species. Rabbit grazing is changing areas of tall

tussock grassland to modified forms of herbfield, thereby affecting the breeding success of all burrowing seabird colonies on Macquarie Island. The loss of vegetation also causes destabilisation and erosion of steep slopes, including through an increased incidence of landslides, which also impacts on albatross, penguin and petrel nesting sites.

Black rats prey on seabird chicks and eggs and have been identified as a threat to at least nine bird species that currently breed on Macquarie Island. House mice feed primarily on vegetation matter and inhibit plant regeneration through seedling recruitment and seed consumption. They may also prey upon burrowing seabird eggs and chicks. On other subantarctic islands they have been shown to feed on chicks of large albatross species.

Up to 24 bird species are expected to benefit from the planned pest eradication on Macquarie Island. Some of these species breed in very small numbers – the breeding populations of five species of albatrosses and petrels range in size from two to 94 breeding pairs – and are particularly vulnerable to threats. A summary of the eradication plan can be viewed at:

[http://www.parks.tas.gov.au/publications/tech/mi\\_pest\\_eradication/summary.html](http://www.parks.tas.gov.au/publications/tech/mi_pest_eradication/summary.html)

Quarantine procedures at breeding colonies – most breeding habitats in Australia for ACAP Annex 1 species are protected areas, established under Australian or Tasmanian legislation, with quarantine procedures applicable to all visitation. The feasibility of introducing quarantine procedures and or increased protection for the remaining habitats will be investigated.

Measures to eliminate, control or prevent introduction of non-native species to breeding sites were included as management actions in Australia's 2001 Recovery Plan for Albatrosses and Giant-Petrels. It is expected that similar actions will be included in the new recovery plan for these species.

Exemptions to prohibitions on the taking or harming of albatrosses and petrels	Action Plan Reference	AC Work Program Reference	Agreement Reference
	1.1.2	III (3)	

All albatrosses and petrels listed under ACAP Annex 1 are fully protected and there have been no exemptions to the prohibitions on the taking or harmful interference to these species during the reporting period. Reporting of all deaths, including accidental deaths, of protected species is mandatory under Australian legislation.

Use and trade of Annex 1 Species	Action Plan Reference	AC Work Program Reference	Agreement Reference
	1.1.1, 1.1.2	III (3)	

Australia is a Party to the Convention on International Trade in Endangered Species of Wild Fauna and Flora 1973 (CITES). There has been no international trade approved by Australia for any ACAP Annex 1 listed species during the reporting period. A small number of Annex 1 species, taken as fisheries bycatch, have been moved within Australia for research purposes. Movement or "trade" within Australia requires a permit under the *Environment Protection and Biodiversity Conservation Act 1999*.

Single or multi-species conservation strategies / action plans	Action Plan Reference	AC Work Program Reference	Agreement Reference

1.1.3
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All ACAP Annex 1 species to which Australia is a range State are protected under Australian national legislation (*Environment Protection and Biodiversity Conservation Act 1999* (the EPBC Act)).

Under the EPBC Act, in 2001 Australia developed a Recovery Plan to promote the improved conservation status of Albatrosses and Giant-Petrels. That plan is now under review and a new national recovery plan is presently being developed.

Australia also adopted a Threat Abatement Plan for the incidental catch (or by-catch) of seabirds during oceanic longline fishing operations to minimise the effect on seabirds of bycatch in longline fisheries, a listed Key Threatening Process under the EPBC Act. The first such plan was approved by the Minister for the Environment in 1998, and was reviewed and a second plan approved in 2006. The plan obliges national authorities and fishers to undertake a range of activities to minimise seabird bycatch in Australian longline fisheries managed by the Commonwealth, including implementing mandatory fisheries bycatch mitigation measures, setting maximum bycatch rates for each fishery, achieving specified minimum levels of observer coverage, providing support for mitigation research and development activities, collecting bycatch data from logbooks and observers, collecting and returning to port all seabirds killed, as well as undertaking education and compliance activities.

As a result of the plan, notwithstanding that there appears not to be full compliance with all measures, seabird bycatch rates in longline fisheries have fallen steadily and are now significantly lower than in 1998 when the first plan was introduced. Compliance has been generally good, however there are some instances of known or suspected non-compliance, including:

- failure to reach the specified observer coverage in some areas (although the fishery as a whole may have reached the required coverage);
- failure to report bycatch incidents; and
- failure to retain seabirds killed and to send them for autopsy.

Table 2 below summarises seabird bycatch performance and related management arrangements in Australia's major longline fisheries, the minimum observer coverage in each, the maximum permitted bycatch rate, most recent annual bycatch rate and the overall level of fishing effort in that period.

**Table 2: Summary of seabird bycatch performance and related management arrangements in Australia's major longline fisheries**

<b>Fishery</b>	<b>Minimum observer coverage</b>	<b>Maximum allowed bycatch rate</b>	<b>Annual bycatch rate (birds/ 1000 observed hooks)</b>	<b>Annual effort (observed hooks)</b>	<b>Annual effort (logbook hooks)</b>	<b>Comments</b>
East Coast Tuna and Billfish	5% of all hooks set and hauled in all areas	0.05/1000 hooks	0.005	550 191	8 602 716	Observer coverage and bycatch mitigation measures are required south of 25° S; fishery is divided into 5° x 5° areas with observer coverage and bycatch limits applicable to all areas.
West Coast Tuna and Billfish	5% of all hooks set and hauled in all areas	0.05/1000 hooks	Currently only one vessel operates in this fishery, therefore commercial confidentiality issues do not permit data to be reported.			Observer coverage and bycatch mitigation measures are required south of 30° S; fishery is divided into 5° x 5° areas with observer coverage and bycatch limits applicable to all areas.
Coral Sea	10% of all hooks set and hauled	0.01/1000 hooks	Zero	21 000	134 000	Observer coverage and bycatch mitigation measures are required south of 25° S; fishery is divided into 5° x 5° areas with observer coverage and bycatch limits applicable to all areas.
South East Scalefish (hook sector)	10% of all hooks set and hauled	0.01/1000 hooks	Zero	271 000	6 778 050	Observer coverage and bycatch mitigation measures are required south of 25° S; fishery is divided into 5° x 5° areas with observer coverage and bycatch limits applicable to all areas.
Antarctic (toothfish) <ul style="list-style-type: none"> <li>• Heard Island</li> <li>• Macquarie Island</li> </ul>	20% of all hooks set and 40% of hooks hauled	0.01/1000 hooks in both fisheries	Zero Zero	~1.8 million 166 250	~1.8 million 171 000	Unlike all other fisheries in this table, these are both demersal fisheries. A minimum of two observers on every trip (ie 100% trip coverage). Longlining off Heard Island has occurred for over five years with zero birds killed. The management arrangements for this fishery include requirements set by CCAMLR (eg seasonal limits plus a bycatch limit of 3 birds in total for pre- and post-season extension trial periods). Longlining at Macquarie Island is being trialled – night-setting only allowed; in the one season of effort to date, zero birds have been killed. Australia also has set a total bird bycatch limit, varied by species, for this fishery.

A copy of the Threat Abatement Plan is available from:  
<http://www.aad.gov.au/default.asp?casid=33720>

Implementation of the above plans has emphasised that achieving improved conservation status for some populations and species is a long-term process that requires actions within and beyond areas of national jurisdiction. It has also highlighted the importance of undertaking a balanced range of conservation activities which collectively address all significant threats; building and sustaining adequate resources and expertise; and achieving support for conservation activities from all affected stakeholders, including fishers and fishery managers; scientists; government agencies responsible for management of fisheries, breeding habitats and species conservation; non-government conservation organisations and academic interests.

Threat abatement plans for two other listed Key Threatening Processes – the ‘Injury and fatality to vertebrate marine life caused by ingestion of, or entanglement in, harmful marine debris’ and ‘Impacts of exotic rodents on biodiversity on Australian offshore islands of less than 1000 km<sup>2</sup> (100 000 ha)’ – are also under development. As at late-April 2008, the first draft plan was about to be released for public comment and the second draft plan was open for public comment.

Development of NPOA Seabirds – A draft Australian national plan of action is expected to be released for public comment mid-2008. It is expected that the Australian NPOA will be finalised in late 2008 or in early 2009.

Emergency Measures	Action Plan Reference	AC Work Program Reference	Agreement Reference
	1.2	VIII (11) e)	

Nil.

Re-establishment schemes	Action Plan Reference	AC Work Program Reference	Agreement Reference
	1.3		

Nil.

Any other conservation projects for ACAP species	Action Plan Reference	AC Work Program Reference	Agreement Reference

Nil not already reported elsewhere in this report.

## 2. Habitat Conservation



Measures (legal and policy instruments and actions) to implement protection and management of breeding sites including habitat restoration	Action Plan Reference		AC Work Program Reference	Agreement Reference
	2.1	3	III (1) a)	

Protected area arrangements and management plans have been completed for all known albatross and petrel breeding sites on Macquarie Island, the territory of Heard Island and McDonald Islands, and within Australia's area of Antarctic operations. All of these plans provide for the protection of critical breeding habitat, with access to the breeding sites of albatrosses and petrels strictly controlled and managed. A major, multi-year program to remove alien invasive pests and restore habitat at Macquarie Island is underway; more details are reported above.

Formal protection of the three remaining breeding sites is being considered, however it should be noted that Albatross Island is a declared Nature Reserve and the islands of Pedra Branca and the Mewstone are part of the South-west National Park which is within the South-west World Heritage Area. They are also naturally protected by their remoteness and the logistical difficulty of landing on them.

All ACAP listed species to which Australia is a range State are listed under the *Environment Protection and Biodiversity Conservation Act 1999* (the EPBC Act) as both 'migratory species' and 'threatened species'. Animals listed as migratory or threatened under the EPBC Act are considered to be a matter of national environmental significance and are therefore fully protected. It is also possible under the EPBC Act to protect important habitat by designating it as "critical" for a species' conservation. Albatross Island, Pedra Branca and the Mewstone are listed as Critical Habitat for the shy albatross. Macquarie Island is listed as Critical Habitat for the wandering albatross and the grey-headed albatross.

Australian State and Territory governments' legislation also protects albatrosses and petrels. A detailed listing of such legislation was included in Australia's report to the second meeting of the ACAP Advisory Committee in AC2 Doc 29.

Sustainable management of marine living resources which provide food for albatrosses and petrels	Action Plan Reference		AC Work Program Reference	Agreement Reference
	2.3.1 a)			

Responsibility for ensuring the ecological sustainability of Australian fisheries primarily rests with the Australian Fisheries Management Authority (AFMA). The activities of AFMA are governed and guided by the legislative objectives contained in Section 3 of the *Fisheries Management Act 1991*. The objectives of that Act require AFMA to ensure that the exploitation of fisheries resources and the conduct of any related activities occurs in a manner consistent with the principles of ecologically sustainable development (which include the exercise of the precautionary principle), in particular the need to have regard

to the impact of fishing activities on non-target species and the long term sustainability of the marine environment.

The *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act) requires that all fisheries managed by AFMA are strategically assessed at a broad, ecosystem-level. Strategic assessments for all fisheries operating in Commonwealth waters have now been completed. Further re-assessments under the EPBC Act are required to be undertaken at least every 5 years as part of the export approval process, or whenever there are significant changes in the management arrangements for a fishery.

The requirements of the EPBC Act and the *Fisheries Management Act 1991* are compatible with the Specific Objectives and Actions of the 2001 Recovery Plan for Albatrosses and Giant-Petrels. That Plan required the dietary requirements of albatross and giant-petrel populations to be taken into account when management arrangements (e.g. Total Allowable Catch limits) of fisheries that overlap with the foraging grounds of albatrosses and giant-petrels are being developed or revised. It is, however, particularly difficult to accurately determine the level (and the effects) of competition for food resources between seabird populations and fisheries. Any assessment of the effects of competition for food resources requires a thorough knowledge of the dietary requirements of each species, including seasonal, annual and geographical variability; the foraging range of each species; the number and availability of prey items; and the distribution of fishing effort.

Australia is interested in discussing with other ACAP Parties what approaches they have considered or adopted to address this problem. Australia has sought to ensure that total allowable catches or other management arrangements for fisheries are conservative and ensure that the adverse effects of fishing on both target and non-target species are avoided where possible and otherwise either minimised or kept to an appropriate level.

Australia implements an ecosystem based fisheries management approach, and AFMA is presently undertaking a comprehensive ecological risk assessment and management process for all Australian fisheries. This risk management based approach systematically considers the environmental impacts of fishing on key target species, byproduct and bycatch species, all threatened, endangered and protected species, and marine habitats and communities.

Management and protection of important marine areas for albatrosses and petrels	Action Plan Reference	AC Work Program Reference	Agreement Reference
	2.3.2, 2.3.3	4	

Australia's Oceans Policy outlines the Australian Government's commitment towards the establishment of the National Representative System of Marine Protected Areas (NRSMPA) to protect Australia's extensive marine environment. The aim of the NRSMPA is to contribute to the long-term ecological viability of marine and estuarine systems, to maintain ecological processes and systems and to protect Australia's biological diversity at all levels. The NRSMPA is part of a broad range of national, State

and Territory mechanisms to conserve biodiversity and achieve sustainable management of Australia's marine jurisdiction.

The primary goal of the NRSMPA is to build a national system of marine protected areas that are:

- comprehensive – include marine protected areas that sample the full range of Australia's marine ecosystems;
- adequate – include marine protected areas of appropriate size and configuration to ensure the conservation of marine biodiversity and integrity of ecological processes; and
- representative – include marine protected areas that reflect the marine life and habitats of the area they are chosen to represent.

Consistent with Australia's Oceans Policy and its commitment at the World Summit on Sustainable Development in 2002 to establish a representative network of marine reserves by 2012, Australia is developing a national system of representative marine protected areas in Commonwealth waters as part of a broader regional marine planning process.

In 2004 the South-east Regional Marine Plan was released, providing the first opportunity to utilise a regional marine planning process to strategically design a comprehensive, adequate and representative system of marine protected areas in Australian waters. It was also the first time a system-wide approach had been taken to establish representative marine protected areas within a large-scale deep offshore marine region. A proposed system of reserves was released for public comment in late 2005. The final marine reserve network includes 13 reserves, in addition to the previously declared Macquarie Island Commonwealth Marine Reserve, and is the first temperate, deep sea network of marine reserves in the world, covering 226 458 square kilometres and containing representative examples of diverse seafloor features and associated habitats. The south-east marine region provides important breeding and foraging habitat for shy albatrosses and is also important for many other ACAP species.

The Macquarie Island marine reserve comprises a further 162 000 square kilometres, of which 104 000 square kilometres is declared as a species/habitat protection zone. Macquarie Island, which is also a protected area, provides breeding habitat for four albatross and three petrel species listed under ACAP Annex 1.

### 3. Management of Human Activities

Report on environmental impact statements related to albatrosses and petrels	Action Plan Reference	AC Work Program Reference	Agreement Reference
	3.1		

There have been no proposals for development or other human activities likely to adversely impact Australia's albatross and petrel breeding sites. As a result it has not been necessary to prepare and evaluate an EIA during the reporting period. It is expected

that an EIA will be prepared prior to the fieldwork component of the Macquarie Island pest eradication program discussed above.

As noted above the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act) requires that all fisheries managed by the Australian Fisheries Management Authority be strategically assessed at a broad, ecosystem-level at least every 5 years. Impacts on relevant ACAP Annex 1 listed species are routinely considered as part of this process.

Measures to reduce or eliminate incidental mortality in fisheries	Action Plan Reference	AC Work Program Reference	Agreement Reference
	3.2	6	

Australia has adopted two, successive national Threat Abatement Plans to eliminate or reduce the bycatch of seabirds, including ACAP Annex 1 listed species, in longline fisheries. As described above, amongst other requirements, the current plan mandates bycatch mitigation measures, observer coverage, the retention of dead seabirds, and support for mitigation and other research; it also sets a maximum bycatch rate for each fishery. As a result, during the life of these plans, seabird bycatch in Australian longline fisheries has been significantly reduced and seems likely to continue to decline.

Australian scientists are engaged in research to develop improved seabird bycatch mitigation measures in pelagic longline fisheries, including those targeting tunas and swordfish. The main thrust of the research is the development of the underwater bait setting capsule, a system designed to deliver baited hooks underwater beneath the line of vessel propeller turbulence. The underwater setter is being developed by a Queensland-based marine engineering company and is currently at the stage where initial sea trials are about to occur. Following the initial trials (and technical refinements) the setter will be operationally tested on commercial fishing vessels in Australia's Eastern Tuna and Billfish Fishery through 2008. The aim is to develop a fully functioning unit by the end of 2008. In 2009 the seabird deterrent effectiveness of the device will be tested experimentally in collaboration with overseas colleagues.

Seabirds killed in Australian longline fisheries are required to be collected by fisheries observers and crew members and returned to shore for autopsy and analysis to determine species, subspecies, provenance (where possible), age, sex and breeding status. In combination with logbook and observer data about the location, time and other characteristics of the fishing activity, this work is helping to assess risk to seabirds and improving knowledge of fishery impacts. Further information and key findings from this project are provided in section 4 below.

The management arrangements for several Australian fisheries include a combination of spatial and temporal controls which restrict fishing at specified times in areas important to breeding seabirds.

Measures to combat illegal, unregulated, and unreported (IUU) fishing	Action Plan Reference	AC Work Program Reference	Agreement Reference
	3.2 4	6	

Australia is a leader in efforts to stamp out IUU fishing and has vigorously pursued a range of national and international actions. These include allocating \$217.2 million over five years for fisheries surveillance and patrols in Australian subantarctic waters, including around Heard and McDonald Islands where illegal demersal longline fishing was then occurring. As a result of these actions, IUU fishing within Australian waters has been eliminated or significantly reduced, however IUU fishing continues on the high seas, with resultant adverse impacts on seabirds.

There are strong collaborative efforts to counter IUU fishing. Australia has worked very closely with several countries, notably including France, South Africa, New Zealand and the UK. Alone and in combination with other countries, Australia has pressed for stronger international action against IUU fishing in a range of forums, including CCAMLR, IOTC, WCPFC, CCSBT and the FAO Committee on Fisheries. Australia considers that while considerable progress has been achieved in combating IUU fishing, it remains a significant threat to the conservation of fish stocks and the broader marine ecosystem and IUU fishers' longlines continue to kill ACAP Annex 1 listed seabirds.

Measures to minimise discharge of pollutants and marine debris (with reference to the International Convention for the Prevention of Pollution from Ships (MARPOL))	Action Plan Reference	AC Work Program Reference	Agreement Reference
	2.3.1 b), 3.3		

Australia is a party to MARPOL. Australian flagged vessels are required to comply with MARPOL requirements, including a prohibition on the disposal at sea of toxic, hazardous or persistent wastes, such as plastics. Several regional organisations, of which Australia is a member and which are responsible for management of high seas fisheries, have also imposed measures to reduce marine debris.

In August 2003, "Injury and fatality to vertebrate marine life caused by ingestion of, or entanglement in, harmful marine debris" was listed as a Key Threatening Process under the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act). Development of a Threat Abatement Plan to manage this threatening process is underway and a draft plan is expected to be released for public comment in mid-2008.

Measures to minimise disturbance in marine and terrestrial habitats	Action Plan Reference	AC Work Program Reference	Agreement Reference
	3.4		

Australia has implemented guidelines for visitor behaviour around Antarctic animals, including birds. In respect of ACAP Annex 1 listed species, these require that a

separation distance of 100 metres be maintained from southern giant petrels. Persons, including researchers, wishing to get closer than these distances or proposing activities that might disturb, injure, take or interfere with Antarctic animals are required to have prior statutory authorisation. Typically this authorisation would be in the form of a permit that imposes limits and conditions on the duration and nature of permitted activities. Permits are usually only granted for compelling scientific or management purposes and for activities which cannot be conducted elsewhere or in a less impacting manner. Research activities involving animals must also be approved by an animal ethics committee.

There are similar constraints in place to minimise disturbance at Australia's subantarctic islands (Macquarie Island, and Heard and McDonald Islands). Visitors to both subantarctic island groups require prior permission to land and, in the case of Heard and McDonald Islands, to enter the surrounding 12nm territorial sea. Organisers of tourist or other types of operations in the Antarctic must also submit an environmental impact assessment describing their proposed activities and how they intend to minimise or mitigate the associated impacts.

As described above, extensive marine protected areas have been declared off both Heard and McDonald Islands, and Macquarie Island, in part to protect known foraging areas of animals breeding on those islands.

#### 4. Research and Monitoring

Ongoing research programs relating to the conservation of albatrosses and petrels	Action Plan Reference	AC Work Program Reference	Agreement Reference
	4.1		

##### Population monitoring and related research

Long-running population monitoring programs for all ACAP listed species that breed on Macquarie Island (wandering, black-browed, grey-headed and light-mantled albatrosses; southern and northern giant-petrels; grey petrel) and around Tasmania (shy albatross) were maintained. Data analysis and publication of results from these studies are ongoing.

Australia has submitted population data on Southern giant-petrels and a short paper describing related issues to the Scientific Committee on Antarctic Research (SCAR) in preparation for its workshop on 19 and 20 May 2008 to assess whether the species meets the IUCN regional criteria for assessment of endangerment and should be considered for designation as a Specially Protected Species under Annex II of the Protocol on Environmental Protection to the Antarctic Treaty. The workshop will present its findings to the June 2008 meeting of the Committee for Environmental Protection through a working paper to be submitted by SCAR.

##### Mitigation and bycatch research

The Australian Antarctic Division has recently shifted the main focus of its seabird bycatch mitigation research from demersal to pelagic longlining. The demersal research

was instrumental in developing new seabird-friendly fishing gear – such as the integrated weight longline – and improved mitigation techniques for toothfish fisheries managed by CCAMLR. While the pelagic research project is in its early stages, it is expected that its results will be applicable to many pelagic longline fisheries, including those targeting tuna on the high seas.

The Marine Division of the Commonwealth Scientific and Industrial Research Organisation (CSIRO), based in Hobart, is presently undertaking an assessment of the spatial overlap of flesh-footed shearwaters and Australia's major pelagic longline fishery, the East Coast Tuna and Billfish Fishery (ETBF). A final report is expected in August 2008.

Research on seabirds killed in Australia's ETBF continued. This project seeks to record a wide range of data useful to improving knowledge on the level and nature of seabird interactions with the fishery. From the seabirds collected and fishers' logbooks, data on species, subspecies, provenance, age category, sex, breeding status, morphometric characteristics, time and area of interaction, moon phase, hook type and bait type (species and live or dead bait) are gathered. Results to date have included:

- that most species of birds killed were characterised by unequal representation of sex and age cohorts;
- that live bait is implicated in significantly more seabird deaths than dead bait;
- significantly more birds were captured in day and crepuscular shots compared to night for all species combined, and for flesh-footed shearwaters and albatross considered individually;
- moon phase appears to be influential on the probability of seabird bycatch on night time shots, with more bycatch than expected around new moons for flesh-footed shearwaters, and new moons and full moons for albatross;
- significantly more seabirds were captured in spring than autumn. Winter showed significantly less captures than autumn when all species are treated together, but not when albatross and flesh-footed shearwaters are considered separately;
- for all species combined, and for flesh-footed shearwaters considered individually, there were significantly more seabird captures for live fish, mixed live and dead fish, and mixed squid and dead fish, when compared to shots using only squid as bait. For albatross, shots using live fish, live fish/squid, and dead fish/squid showed higher bycatch rates than those using only squid; and
- identification of areas and times where fishing poses higher risks for seabirds.

A range of Australian institutions are involved in the above research and conservation activities, including the Department of the Environment, Water, Heritage and the Arts (Australian Antarctic Division), the Australian Fisheries Management Authority, the Department of Agriculture Fisheries and Forestry and the Tasmanian Department of Primary Industries and Water. Assistance has also been received from several fishing companies and conservation organisations, and these and other organisations have contributed directly and financially.

Observer programs to monitor fisheries bycatch of albatrosses and petrels	Action Plan Reference	AC Work Program Reference	Agreement Reference
	4.2	5.1	

The Australian Fisheries Management Authority routinely collects data for all longline fisheries known to interact with, or potentially interact with, species of seabirds vulnerable to fisheries bycatch through independent observer programs. The level of observer coverage in these fisheries is described in more detail in section 1 above but generally is commensurate with the level of fishing effort and the risk posed to populations of all bycatch species, but particularly to seabirds, turtles and sharks. The levels of coverage vary between fisheries in accordance with national requirements, such as the Threat Abatement Plan to reduce seabird bycatch in longline fisheries, and international requirements, such as those set by CCAMLR and other regional organisations.



## 5. Education and Public Awareness

Dissemination of information / training for 'user audiences' e.g. scientists, fishermen, conservation bodies, and decision-makers	Action Plan Reference	AC Work Program Reference	Agreement Reference
	6.1		

Several methods have continued to be used to convey information to key "user audiences". These include:

- key information on scientific programs related to the conservation of albatrosses and petrels is available on Australian Government websites;
- Australian Government organisations provide a briefing to vessel masters and crew on Australian-flagged vessels licensed to fish in CCAMLR waters, including on seabird mitigation and observer requirements, at the start of each fishing season;
- the Longline Fishing Threat Abatement Plan (TAP) Consultative Forum meets annually to review performance of the TAP, assess ways to further reduce seabird bycatch, and provide reports to stakeholders about seabird bycatch levels in Australian fisheries; and
- information about the TAP and mitigation measures is provided to fisheries observers deployed in Australian longline fisheries to raise awareness of seabird conservation and related issues; similar information is also provided to fishers.

Dissemination of information to the general public	Action Plan Reference	AC Work Program Reference	Agreement Reference
	6.2		

Dissemination of information to the general public has occurred in several ways, including via Australian Government organisation websites which provide access to albatross and petrel conservation information; key policy documents such as recovery plans, threat abatement plans and bycatch action plans; fishery effort data and reports on observer findings.

Preparation is currently underway for a public exhibition, in the Australian Parliament House in Canberra, of photographs of many ACAP species. The exhibition will promote greater awareness of the need for national and international action to conserve these species. Australia gratefully acknowledges the assistance and provision of material by nationals of other ACAP Parties. An educational brochure is being developed to raise awareness of seabird conservation in visitors to the exhibition, which is expected to open on 16 June 2008.

## 6. Implementation

Summarise progress to implement decisions of previous Meetings of the Parties	Action Plan Reference	AC Work Program Reference	Agreement Reference
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Australia has completed domestic actions necessary for the ratification of the amendments to Annex 1, which gave effect to the decision to adopt a revised taxonomy for albatrosses, made at the second Meeting of the Parties to ACAP in December 2006.

Australia has completed, or is in the process of completing, a range of actions arising from MoP2 and AC3, including those relating to provision of assistance in the design and development of the ACAP species database, the submission of data for species assessments, and the development of draft templates and a process for the working groups of the Advisory Committee to submit funding applications to the Committee.

With the change in Australia's national government at the 2007 election, it was necessary, under Australia's constitution, to recommence the domestic process to ratify the ACAP Headquarters Agreement. Australia is now well advanced with the necessary ratification actions and this is reported in more detail in a separate paper to AC4.

### Publications since last report

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- Terauds A, Gales R, Alderman R and Baker GB (2006). Population and survival trends of wandering albatrosses breeding on Macquarie Island. *Emu* 106: 112-118.
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- Thalmann S, Baker GB, Hindell M, Double MC, Gales R (2007). Using biometric measurements to determine gender of Flesh-footed Shearwaters, and their application as a tool in long-line by-catch management and ecological field studies. *Emu* 107: 231-238.
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