



## **REPORT OF THE BREEDING SITES WORKING GROUP MEETING**

**Held 2 June 2006 , in Brasilia, Brazil**

### **1. Introduction**

Participants in the meeting of the Breeding Sites Working Group (BSWG) were Susan Waugh (New Zealand, Chair), Barry Baker\*, Rosemary Gales, Mike Double (Australia), Onildo Joao Marine Filho\*, Claudia Rocha Campos, Tatiana Neves, Leonardo V. Mohr (Brazil), Anjali Pande, Johanna Pierre (New Zealand), John Cooper\* (South Africa), Mark Tasker\*, Richard Phillips (United Kingdom), Kim Rivera (United States of America), (\*National coordinators). Mike Double and Anjali Pande acted as rapporteurs.

### **2. Progress to date**

Data were submitted for 168 of approximately 300 of the known breeding areas of ACAP species by Argentina, Australia, France, South Africa, New Zealand, and the United Kingdom. Data were submitted for 19 species. These data were used for testing the database and to produce extracts to illustrate the kinds of analyses that could be undertaken from the database. Data submissions took place very close to the closing date for the report (12 May 2006) therefore detailed analyses were not completed. It is significant to note however, that information on a broad range of sites and species is now compiled, and intersessional work will allow the BSWG to advance the work programme considerably before the next Advisory Committee meeting.

Extensive commentary was received from the BSWG members during testing, of the database and modifications made to the database structure and functionality to address relatively minor issues identified by users relating to the ease of data entry.

The BSWG agreed to accelerate the data submission deadlines, given the significant data contributions provided to date, and the need to produce comprehensive analyses of the information in time to contribute to reporting of the Status and Trends Working Group. Outstanding data would be sought from Parties prior to the end of 2006.

Data remained to be submitted for the following Breeding-Range States: Chile, Ecuador, and data for a number of sites remained outstanding for the remaining Breeding-Range States. The BSWG noted that the SCAR Group of Experts on Birds (SCAR-GEB) had not yet

submitted any data but it was acknowledged that SCAR-GEB had encountered technical problems with the database. John Cooper, as a member of SCAR-GEB, agreed to enable the submission of data to the Breeding Sites database before the end of 2006.

### **3. Membership**

The current membership of the Breeding Sites Working Group is appended in Annex 1.

#### 4. Review Terms of Reference and future direction

The BSWG agreed that the Terms of Reference (TOR) indicate that fisheries mortality and other marine-based threats were outside the scope of the BSWG and therefore should be removed from the list of threats.

The BSWG agreed that the TOR needed to include an updating and review process.

In relation to the work programme, the BSWG agreed that outstanding data could largely be submitted by December 2006.

The BSWG reviewed the TOR and identified the need to add a review to the TOR periodically. A revised work programme was therefore agreed:

1. Recommend data submission proforma
2. Identify suitable database structure
3. Collate and submit data and populate database
4. Conduct gap analyses to identify requirements for additional data for sites
5. Collect additional data to fill gaps and complete review
6. Coordinate with the ACAP Status and Trends Working Group, especially with respect to database structure.

The TOR should be reviewed periodically, as appropriate.

#### 5. Revised work programme

The BSWG agreed to the following revised work programme. This would allow coordination of analyses between the BSWG and the Status and Trends Working Group, and reporting of these at the third Advisory Committee.

Action	To be completed *already complete	Responsibility
Advise national coordinators	October 2005*	Parties and Signatories (Breeding Range States)
Examine options for data storage and access to information	November 2005*	Chair and WG members
Adopt terms of reference	December 2005*	Parties and Signatories (Breeding Range States)
Confirm a database format for use by ACAP	December 2005*	Chair and WG members
Revise proformas and implement data compilation	March 2006*	
Conduct initial gap analysis	May 2006*	
Data submission from Parties 1 <sup>st</sup> tranche (1/2 of available data) 2 <sup>nd</sup> tranche (remaining data) 3 <sup>rd</sup> tranche (newly collected data)	May 2006* December 2006 Annually	Parties and Signatories (Breeding Range States)
Report on the assessment of database structure and data quality issues and recommend analyses for prioritisation	June 2006*	Chair and WG members
Request a list of breeding sites from parties	July 2006	Chair
Revise the database lists and structures following the recommendations of the BSWG in June 2006	September 2006	Chair and WG member
Develop a list of alien species	July 2006	Chair and WG member
Develop analyses as set out in the report	March 2007	Chair and WG member

of the BSWG of June 2006		
Review analyses of data and gaps Recommend priority sites / threat management actions Recommend data-gathering priorities	June 2007 and ongoing	Chair and WG members
Work with other ACAP WGs to report on analyses of threats to ACAP species	June 2007 and ongoing	Chair and WG members

## 6. Definition of 'site'

The original definition suggested a breeding area could be a colony, an island or an island group and was loosely defined as 'a single species breeding locality'. It was reported that most data had been submitted at the island level, as opposed to island group or colony. It was suggested that the term 'site' be removed from the data submission process because of its ambiguity and be replaced with 'breeding area'.

The BSWG acknowledged that entering site data at finer than island level created difficulties when some within-island breeding areas were well-researched and others not. This would make data amalgamation to island level difficult if census data were not available for less well known breeding areas. This problem would also impact island level submissions, as island totals for species might be greater than the sum of well-researched breeding areas.

The BSWG agreed that the following guidelines describe the appropriate level of resolution required for data submission:

*Data for the breeding sites (and status and trends) database are needed at the island level, or finer scale. Data may be entered at a finer scale than a whole island if suitable, particularly if the birds breed on continents or large islands (e.g. the Antarctic Continent, discrete parts of Kerguelen Island Group, or breeding areas within the South Island of New Zealand).*

The BSWG agreed that these guidelines negated the need for a strict definition of 'breeding site'.

- The chair would work members to compile a complete list of breeding sites.

## 7. List of threats and consistency in threat levels

The BSWG agreed that the current list of threats needed to be reduced for ease of reporting and to facilitate meaningful analysis of data. The BSWG recognised that there were problems with consistency in assigning threat levels in the current database, and current submissions would likely result in misinterpretation. If the list of threats is changed then it was recommended that the database manager consult closely with all data providers to ensure accurate conversion of threat categories.

The BSWG acknowledged that the database design must be able to accommodate potential listing of additional species by ACAP. The inclusion of data for species which were not listed was not recommended by the BSWG.

The BSWG agreed that the threats under consideration should be restricted to those impacting on birds at their breeding sites (i.e. not include threats encountered in the marine ecosystem such as plastic pollution, oil spills, or fishing mortality). The BSWG further agreed that the list of threats should not be restricted to anthropogenic threats and the following list was considered appropriate:

Category	Examples
Human disturbance	tourism, science, recreation, military action
Human take	hunting, poaching
Natural disaster	flood, volcanic activity, lightning strike
Disease	pathogens, parasites
Habitat alteration by alien species	invasive plant species, grazing
Habitat alteration by humans	agriculture, extraction
Predation by alien species	rats, cats, mice
Change in impact by native species	increasing seal numbers altering habitat
Contamination at breeding site	toxic waste, plastics, onshore oil

The BSWG noted that the data will not have to be re-submitted to use the revised categories above. The previous list of threats would be condensed after consultation with those that have submitted data to the database. Within these main threat categories, provision would be made for detailing the specific nature of threats, e.g. whether human disturbance was by military action, tourism, or research activity.

The BSWG agreed that the concept of potential threats was removed from the definition of low-level threat, as this appeared to lead to inconsistencies between submitters in what should be considered a potential threat. Threats defined in the database should be those for which there was evidence of an impact on an ACAP breeding population or individuals.

The BSWG considered that predation by native predators (such as skuas and sheathbills) should not be considered a threat unless there was anthropogenic perturbation in the system that had led to an increase pressure from native predators.

Non-native species were not to be considered a threat except where there was direct evidence of impact on ACAP species. The BSWG considered it useful, however, to list those alien species that could potentially have adverse effects on ACAP species, in a separate part of the breeding area record, in order to keep track of which species were present at a site.

- A list of alien species of relevance to the ACAP species conservation status is to be developed.

The BSWG recommended the following specific definitions for levels of threat at breeding areas:

**Low** – An existing threat that may be causing a slow decline, or slowing the recovery of a population.

**Medium** – An existing threat that is likely to cause a substantial decline, or substantially slow the recovery of a population.

**High** – An existing threat that is likely to be the main cause of a rapid or catastrophic decline, or reversal of recovery of a population, at a breeding area. The threat is likely to lead to the local extinction of a species from the breeding area.

- The BSWG noted that the Parties submitting data would need to be contacted to request re-assessment of low-level threats submitted.

## 8. Potential outcomes from the Breeding Sites database

The BSWG recognised that the database would be used initially to provide the following products:

1. The number/percent of a) global population of a species, and b) breeding areas affected by particular threats. This analysis would guide the assessment of which were the most significant threats.
2. A list of 'key' breeding areas requiring urgent management in order of priority for each Party and internationally. This list would be arrived at by a combination of the above analyses and expert opinion of the BSWG.
3. A list of breeding areas that require management plans.
4. The ability to compare the suite of threats that are affecting different classes of ACAP-listed species – for example surface-nesting species and burrow-nesting species.

The BSWG noted that there was merit in carrying out a range of analyses along the themes of those listed above, and that these should be considered by the next meeting of the BSWG for further examination. It was recognised that national priorities would also have to be taken into account by Parties. Both national and international priority lists would require further assessment by the BSWG before submission to the Advisory Committee

- The Chair would work with members to develop / review a range of methodologies for these analyses intersessionally, and preliminary analyses would be circulated prior to the next meeting of the BSWG.

## **9. Publication**

The BSWG agreed that simple summaries of the data within the database should be published on the ACAP website, where this was consistent with the TOR of the BSWG. It was noted that some data providers were sensitive to the general availability of the database and so it was considered unlikely that the full database would be made freely available.

- The Chair would work with the ACAP Secretariat to deliver database extracts and appropriate levels of access to Parties and via the ACAP website to the wider public.

## **10. Integration with Status and Trends WG**

The BSWG noted that there would be considerable benefit of a greater collaboration with the Status and Trends Working Group and this association will be discussed and developed in Status and Trends Working Group meeting. The need for compatibility of databases was recognised in the revisions to the detail of the BSWG database.

## **11. Gap analysis**

A similar analysis to that described under threats prioritisation was considered appropriate to identify important gaps in the information contained in the database.

## **12. Software**

The BSWG discussed the continued use of Microsoft Access, given one member's reports of high institutional licence fees. Fees became problematic, given the number of users required to contribute data to the database and verify its content. Other Working Group members did report difficulties with the use of Microsoft Access. Suggestions were put forward to resolve the issues identified by New Zealand, such as exporting tables which would allow data entry in Microsoft Excel.

The BSWG members agreed that it was not advisable to develop and implement an alternative, internet-based data entry interface given the high cost and time investment, and technical challenges that this would entail.

The BSWG agreed that data submissions in formats other than MS Access would not be accepted in the future.

## **13. Other matters**

The members of the BSWG thanked New Zealand and the Chair of the BSWG in particular, for building the Breeding Sites Database and coordinating data submissions. The BSWG also thanked Anjali Pande of New Zealand for her significant contribution to the development of the database.

## **14. Recommendations from the Breeding Sites Working Group to the Advisory Committee**

The BSWG recommend that the Advisory Committee:

- Accept the report of the BSWG, and the proposed work programme contained therein;
- Recommend changes to the TOR, as appropriate;
- Support the analyses proposed in Sections 6 and 11; and
- Transfer responsibility of the development and maintenance of the ACAP Breeding Sites Working Group Database to the ACAP Secretariat.

## Annex 1: List of Breeding Site Working Group members and other contacts

Breeding Range States	Working Group members (*National Coordinators)(# chair)
Argentina (National Coordinator TBC)	Flavio Quintana Maria Laura Tombesi
Australia	Barry Baker* Rosemary Gales
Chile	Marcelo Garcia Alvarado*
Ecuador (National Coordinator TBC)	Augusto Corriere Gabrielle Montoya
France	Henri Weimerskirch* Martine Bigan
New Zealand	Simon Banks* Susan Waugh#
Norway (National Coordinator TBC)	Oystein Storkersen
South Africa	John Cooper* Robert Crawford
United Kingdom	Mark Tasker* Richard Phillips
Signatories that are not Breeding Range States and Interested Non-Signatories	Contacts
Brazil	Onildo Marini-Filho
Peru	Liliana Gomez
Scientific Committee on Antarctic Research (for Antarctic Continent)	Eric Woehler John Cooper
United States of America	Kim Rivera
BirdLife International	Ben Sullivan John Croxall

