



Convention on the Conservation of Migratory Species of Wild Animals

Secretariat provided by the United Nations Environment Programme



THIRTEENTH MEETING OF THE CMS SCIENTIFIC COUNCIL

Nairobi, Kenya, 16–18 November 2005

REPORT OF THE THIRTEENTH MEETING OF THE SCIENTIFIC COUNCIL OF THE CONVENTION ON THE CONSERVATION OF MIGRATORY SPECIES OF WILD ANIMALS

I. OPENING REMARKS

1. The Scientific Council of the Convention on the Conservation of Migratory Species of Wild Animals (CMS) held its thirteenth meeting at the headquarters of the United Nations Environment Programme (UNEP), Nairobi, from 16 to 18 November 2005. Prof. Colin Galbraith, Chair of the Scientific Council, opened the meeting and welcomed all participants (the list of participants is contained in annex XI to the present report).
2. Opening statements were made by Mr. Bakary Kante, Director of the Division of Environmental Conventions of UNEP, on behalf of Dr. Klaus Töpfer, Executive Director of UNEP; Mr. Robert Hepworth, Executive Secretary of the Convention on the Conservation of Migratory Species of Wild Animals; Mr. John Mshelbwala, Vice-Chair of the Scientific Council; and Prof. Galbraith.
3. In his opening statement, Mr. Kante welcomed the participants on behalf of UNEP. He said that the work of the Scientific Council was critical to the success of the Convention, giving it the legitimacy and weight to be credible internationally, and enabling it to gain more consideration in budgets and in policy decisions. The members of the Council had valuable roles to play in their personal capacities as eminent scientists rather than as representatives of particular countries. He expressed hope that the Scientific Council would make wise and relevant recommendations that would assist the Conference of the Parties in its work.
4. Mr. Hepworth thanked UNEP and the United Nations Office at Nairobi for their support. He said that the Convention had always depended on independent but integrated science through the work of the Scientific Council. The separation of the scientific and negotiatory elements was a distinct tradition of the Convention and had ensured that its work was founded on proper screening and good science. The number of submissions for the Convention's Thesis Award was indicative of the quality of the science being carried out worldwide on migratory species.
5. He said that the Scientific Council had grown to over 80 members and now had a fully staffed Secretariat, giving it a critical mass beneficial to its effectiveness. Some important issues would be debated both in the Council and in the Conference of the Parties, including the budget that would be required for monitoring, research, project implementation and capacity-building. He also said that the Council might consider avian influenza and its relevance to migratory species, and offer guidance to the Conference of the Parties on that urgent issue.
6. Mr. Mshelbwala observed that a number of the agenda items were of particular importance to the constituency he represented, namely Africa. The continent, for example, was a receptacle for many migratory species during the northern winter and was therefore susceptible to avian influenza. He stressed the merit of increased coordination between the Convention and UNEP.
7. Prof. Galbraith said that the busy agenda reflected the urgency of the challenges faced. Many migratory species were in decline due to over exploitation in the marine and terrestrial environment; in addition, climate

change was modifying the environment in an unprecedented way. The quality and quantity of data were, however, increasing, and awareness of environmental issues was growing worldwide. Finally, he remarked that the members of the Scientific Council would best serve its ends by maintaining their scientific independence.

II. ADOPTION OF THE AGENDA

8. The meeting adopted the following agenda, on the basis of the provisional agenda that had been circulated in document CMS/ScC.13/Doc.1:

1. Opening remarks.
2. Adoption of the agenda.
3. Developing a strategy for the work of the Scientific Council:
 - 3.1 Draft CMS Strategic Plan;
 - 3.2 Further elaboration and adoption of the Strategy Implementation Plan for the Scientific Council; and
 - 3.3 Resources and working practices of the Scientific Council.
4. Small-scale projects funded by CMS.
5. Scientific Council tasks arising, *inter alia*, from resolutions, recommendations and other decisions of the Conference of the Parties:
 - 5.1 Concerted actions for selected Appendix I species and groups, according to resolutions 3.2, 4.2, 5.1, 6.1 and 7.1; and
 - 5.2 Cooperative Actions for Appendix II species (recommendations 5.2, 6.2 and 7.1);
 - 5.3 Other resolutions and recommendations (not already covered under previous agenda items):
 - (a) Resolution 7.2: Impact assessment;
 - (b) Resolution 7.4: Electrocuting of migratory birds;
 - (c) Resolution 7.5: Wind turbines and migratory species;
 - (d) Resolution 6.2 and recommendation 7.2: By-catch; and
 - (e) Other resolutions and recommendations under development.
6. Review of proposals for amendments to Appendices I and II of the Convention:
 - (a) Discussion and evaluation of proposals; and
 - (b) Conclusions and recommendations to the Conference of the Parties.
7. Progress on other matters requiring Scientific Council advice:
 - 7.1 Potential new agreements (including memoranda of understanding and action plans);
 - 7.2 2010 Global Biodiversity Target;
 - 7.3 Global Register of Migratory Species (GROMS) and CMS Information Management Plan;
 - 7.4 Assessments and reports of CMS interest (Millennium Assessment, GEO-4 report, Global Biodiversity Outlook);
 - 7.5 Impact of climate change on migratory species;
 - 7.6 Migratory species as vectors of diseases;
 - 7.7 Artificial barriers to migration and other threats to migratory species and their habitats; and
 - 7.8 CMS Thesis Award.
8. Collaboration with other intergovernmental and non-governmental organizations.
9. Report to Conference of the Parties on Scientific Council activities during 2003–2005.
10. Election of the Chair and Vice-Chair of the Scientific Council for the period 2006–2008.
11. Date and venue of the fourteenth meeting of the Scientific Council.
12. Any other business.
13. Closure of the meeting.

III. DEVELOPING A STRATEGY FOR THE WORK OF THE SCIENTIFIC COUNCIL

3.1 Draft CMS Strategic Plan

9. The item was taken up in the morning session on Wednesday, 16 November 2005. Dr. Biber (Switzerland), Chair of the CMS Strategic Plan Working Group, introduced the draft CMS strategic plan for the period 2006–2011, as set out in document UNEP/CMS/Res.8.2, and as submitted to the Conference of the Parties for consideration at its eighth meeting. Highlighting the main developments of the document since the Council's twelfth meeting, he observed that the draft was more pragmatic in its structure and that it would provide a sound basis for work over the following six years.

10. Issues raised in the ensuing discussion included the need to provide for the consideration of emerging issues such as avian influenza, the need to identify some means of assessing research standards, with a view to ensuring that they were of a sufficiently high level, and the possibility of establishing a fixed roster of experts in migratory species. In addition, attention was drawn to the importance of the intersessional workshops as a modality for the conduct of scientific work.

11. Following that discussion, a more detailed discussion of the issue was entrusted to an open-ended working group, comprising representatives of Algeria, the Democratic Republic of the Congo, Kenya, Morocco, Peru, Switzerland, the United Kingdom of Great Britain and Northern Ireland, the World Conservation Union (IUCN) and the UNEP World Conservation Monitoring Centre (WCMC).

12. In the morning session of Friday, 18 November 2005, the rapporteur of the working group, Dr. Biber gave a presentation on the discussions of the working group on strategic planning. The text of his presentation is attached to the present report as annex I. He noted that, following on from the discussion of the Scientific Council in plenary and further focused discussions of a contact group, chaired by Dr. Bagine, modifications had been proposed with respect to the following documents: the draft resolution on CMS strategic plan for 2006–2011 (UNEP/CMS/Res.8.2/Rev 1); the draft strategy implementation plan 2006–2011 the CMS Scientific Council (CMS/ScC.13/Doc.3); and the draft resolution on CMS and the 2010 biodiversity targets (UNEP/CMS/Res.8.7).

13. Alongside several proposals for adjustments to the text for the draft CMS strategic plan 2006–2011, Dr. Biber commented on concerns that had been raised during the plenary session of the Scientific Council, relating to the budgetary implications of the strategic plan. He emphasized that the goal and objectives of the draft strategic plan had no direct budgetary implications other than those addressed in the convention itself; all targets in place related to resolutions adopted in previous meetings of the Conference of the Parties. It would be for the Scientific Council and the Conference of the Parties to propose actions within the strategic plan and these would have budgetary implications, rather than the strategic plan itself.

14. **Summary/Action.** Summarizing the outcomes of the meeting concerning the item, the Chair noted that, in relation to the goals of the Strategic Plan, the Scientific Council was mindful of the scientific linkages between sustainable ecosystems and sustainable livelihoods but that a decision on the specific wording of the provision would be left to the Conference of the Parties. The Scientific Council also agreed with the contact group's contention that the issues of cooperation with other multilateral environmental agreements and involvement of partner organizations were adequately dealt with in the draft strategic plan. The Council considered that the strategic plan represented a significant and helpful clarification of the work of the Convention.

3.2 Further elaboration and adoption of the Strategy Implementation Plan for the Scientific Council

15. Introducing the item, the Chair drew attention to document CMS/ScC13/Doc.3, highlighting in particular the main developments since the Council's twelfth meeting. He outlined the process undertaken by the Scientific Council pursuant to the mandate conferred upon it by the Conference of the Parties at its seventh meeting "to produce a strategy on its scientific and conservation work, taking into consideration the ecology of species listed in the CMS Appendices as well as the factors which may threaten or endanger migratory species, leading to clear priorities for action and including appropriate considerations of monitoring and implementation of such strategy" (Res. 7.12), and reviewed the relevant documentation.

16. He highlighted, in particular, the recommendation by the Scientific Council at its eleventh meeting to convene the workshop held on 27 and 28 November 2003 in Edinburgh, United Kingdom, at which it had been concluded that the Scientific Council should develop a strategic implementation plan within the overall framework provided by the CMS Strategic Plan.

17. Following a process of reconciliation of the draft Council's Strategy Implementation Plan with the revised draft Strategic Plan, a revised draft CMS Scientific Council Strategy Implementation Plan 2006–2011 had been produced. He outlined the salient points of the plan and urged the Council to examine it carefully with a view to its finalization at its current meeting.

18. The task of reviewing the existing draft was entrusted to the open-ended working group set up under agenda item 3.1, to consider the draft CMS Strategic Plan 2006–2011. Reporting back to plenary on the work of the group in the morning session on Friday, 18 November 2005, the group's rapporteur, Dr. Biber, pointed out, with regard to the Strategy Implementation Plan of the Scientific Council, that once the secretariat had already reviewed the document, there was less need for the contact group to undertake a thorough evaluation of the text. With that in mind, only one adjustment to the wording was proposed and agreed. The revised version of the Strategy Implementation Plan 2006–2011 is contained in Annex II to the present report.

19. **Summary/Action.** Summarizing, the Chair said that the Strategy Implementation Plan represented a key document, outlining the work schedule for the Council over coming years. It would be critical that the Council undertook its work in a more systematic and planned way in future. The Council adopted the plan, noting that the alignment with the Strategic Plan was essential part of its structure.

3.3 Resources and working practices of the Scientific Council

20. Introducing the item and the relevant documents, UNEP/ScC.13/Doc.7 and UNEP/CMS/Conf.8.19, the Chair noted that the Scientific Council had over the years made a significant impact on the work of CMS despite its very limited budget. He stressed the need to identify how the Council could become even more cost-effective in the accomplishment of its mission.

21. In the ensuing discussion, there was general agreement with regard to the modus operandi of the Council that it should remain a single body and not become fragmented into a number of regional bodies. One councillor pointed out that some reports and documents were published behind schedule because of lack of expertise in areas such as editing. He felt that such aspects of the work of the Council could be enhanced by the use of regionally based scientific advisors. Accepting that a certain amount of decentralization was possible, the Chair pointed out that appointed councillors constituted the bedrock of the activities of the Council.

22. In that context, the Chair informed the councillors that Dr. Pierre Pfeffer, appointed councillor for terrestrial mammals, and Dr. Noritaka Ichida, appointed councillor for Asiatic fauna, were no longer able to continue serving on the Council. Recognizing their contribution to the work of the Council, he proposed, and the Council agreed, that he write letters of appreciation to them.

23. Drawing attention to the difficulty associated with work on fishes because of lack of scientific expertise and noting that many fish species, and notably shark species were in an unfavourable conservation status, the appointed councillor for aquatic mammals and large fishes suggested the appointment by the Conference of the Parties of a specialist councillor for fishes. The Chair observed that the issue of fishes had been discussed in the Council for six years and that it was now timely to have an appointed councillor for fish.

24. During the special session on Africa held during the Council's thirteenth meeting, with a view to enhancing the coordination of African conservation issues, the meeting approved a proposal from the Chair that the Scientific Council recommend to the Conference of the Parties the creation of a position of Conference-appointed councillor for African fauna. The proposed post would have responsibility for coordinating activities within the region, guaranteeing that projects are properly implemented and ensuring that the African CMS parties are well served.

25. **Summary.** Summarizing, the Chair noted that the Council wished to retain its current format and that it proposed to the Conference of the Parties that posts of appointed councillor for Africa and appointed councillor for fishes should be created. He noted the contribution to the Council's work made by Dr. Pfeffer and Dr. Ichida.

IV. SMALL-SCALE PROJECTS FUNDED BY CMS

26. Dr. Marco Barbieri, Scientific and Technical Officer, provided an overview of the CMS Small Grant Programme, focusing on its future funding. He provided a brief summary of the issues raised in document CMS/ScC.13/Doc.4, highlighting that to date the programme had been supported primarily through withdrawals from the Convention Trust Fund surpluses. Since such reserves were close to exhaustion, there was an increasing need for a shift towards funding from current contributions of the Parties to the Convention. Furthermore, since at least some of the budget scenarios to be examined by the Conference of the Parties did not guarantee the availability of funds, there was a need to consider securing extra resources through voluntary contributions.

27. He said that the anticipated changes in funding might necessitate a reconsideration of the ways in which project proposals were identified and selected. One approach might be to adopt the mechanism used by some CMS-related agreements, notably the Agreement on the Conservation of African-Eurasian Migratory Waterbirds (AEWA) and the Agreement on the Conservation of Cetaceans of the Black Sea, Mediterranean Sea and Contiguous Atlantic Area (ACCOBAMS). According to that approach, the Scientific Council would assemble a list of priority projects for adoption by the Conference of the Parties, which could be used as the basis for attempts to locate resources. The Scientific Council was asked to consider the future status of the Small Grant Programme and the substance of any recommendations to be made to the Conference of the Parties on the matter.

28. In the subsequent discussion, there was general agreement that the Small Grants Programme constituted a vital tool for implementing the Convention's scientific and research work.

29. **Summary/Action.** Summarizing the discussion, the Chair identified a number of key conclusions: the Small Grant Programme remained an important priority for the Convention and the Scientific Council, particularly given the leverage that the funding conferred; strong emphasis should be placed on ensuring that projects undertaken under the Small Grant Programme were sustainable; such projects were of particular importance to developing countries, which sometimes lacked the resources to focus on environmental issues; bilateral projects could prove an effective means of undertaking conservation activities; in the future, selection of projects should continue to be undertaken by the Scientific Council; there was a need to publicize achievements by CMS better, in order to demonstrate the value of spending on such projects; efforts should be made to undertake joint work with other Conventions; and, finally, the Scientific Council should recommend to the Conference of the Parties that the Small Grant Programme be sustained and funding be secured through the Convention's regular budget rather than by means of ad hoc fund-raising exercises.

30. Project proposals submitted to the Council for consideration were evaluated within the taxonomic working groups, which also reassessed the situation of projects approved in principle by the Council at its twelfth meeting and that it had not been possible to support yet. The recommendations of the respective working groups concerning eligibility and prioritization of projects for funding are contained in the respective reports, appended to the present report as annexes IV–VII.

V. SCIENTIFIC COUNCIL TASKS ARISING, *INTER ALIA*, FROM RESOLUTIONS, RECOMMENDATIONS AND OTHER DECISIONS OF THE CONFERENCE OF THE PARTIES

5.1 Concerted actions for selected Appendix I species and groups, according to resolutions 3.2, 4.2, 5.1, 6.1 and 7.1

31. Under the item, the Council considered unresolved issues related to the new draft action plan for the lesser white-fronted goose (*Anser erythropus*). Introducing the item, Dr. Barbieri said that BirdLife International and a group of experts, under the auspices of the African-Eurasian Migratory Waterbird Agreement (AEWA), had been undertaking a revision of the 1996 International Action Plan for the conservation of this threatened species. The

experts involved in the activity had been unable to reach consensus on certain issues, however, particularly those concerning the genetic aspects of captive and released birds, and had sought the advice of the Scientific Council.

32. Elaborating on the issue, Mr. Sergey Dereliev, Technical Officer of AEWA, explained that the lesser white-fronted goose was a long-distance Palearctic migrant breeding in four disjunct subarctic populations and wintering in southern Europe and Asia. The free-flying Swedish population, reintroduced from captive stock, has been found to contain hybrid birds. At an expert workshop held in Lammi, Finland, in April 2005, no consensus had emerged on how to deal with that population, or on the process by which further reintroductions might take place. There was still controversy over the accuracy of methods used to detect alien DNA, and the extent to which the presence of minute quantities of genetic material from other goose species represented a risk to the wild population. The Council was being asked to offer its advice on a number of options related to three key issues: captive breeding policy; the status of the free-flying reintroduced population; and modification of flyways.

33. In the ensuing discussion, some councillors drew attention to the political issues involved. It was strongly felt, however, that the Council should address itself to scientific considerations only. The time factor was also mentioned, and one councillor suggested that an authoritative update of the status of the wild populations would help inform the timescale for any future interventions. One councillor thought that the issue should not be dealt with by the Council, because of the lack of full updated information, and its highly technical nature, on which even experts had been unable to reach agreement.

34. The Chair suggested that a small independent working group, led by Mr. John O'Sullivan, the Conference-appointed councillor for birds, be convened to review the clarity of the scientific issues and the questions being referred to the Council, with a view to assessing whether the information presented was sufficient for the Council to make any informed observations.

35. In its subsequent report (contained in annex III to the present report), the working group took into consideration the Council paper CMS/ScC13/Doc.9 summarizing the issues related to conservation of the lesser white-fronted goose, and the numerous representations received by CMS from interested parties, including an independent review obtained by the CMS Secretariat from a renowned population geneticist. A cautious approach had been taken, given the unresolved scientific issues.

36. The group had concluded that the wild Fennoscandian population, breeding in Norway, should not be interfered with, unless or until such interference might become inevitable. Every effort should be made to conserve these birds along their traditional flyways. A captive breeding population of birds from this source should be established as a priority. It was also recommended, given the possible risk to the genetic make-up of the wild Fennoscandian population posed by existing free-flying birds released from captive stock, that the latter be removed from the wild. The group did not support the introduction of lesser white-fronted geese into flyways where they did not occur naturally.

37. Some councillors expressed the opinion that some of the arguments in the paper were couched in non-scientific language. Mr. O'Sullivan, who led the working group, explained that a number of those who had made representations were heavily involved in conservation of the lesser white-fronted goose and were not specialist scientists, and this had been taken into account. The Chair advised that a clear scientific perspective be taken on the issue. The need for a continuing review of the situation was also stressed.

38. The report was welcomed by the Council. A councillor suggested that the Council should recommend an evaluation of the feasibility of capture of the free-flying population originally released from captivity, rather than recommending capture only. Others felt that the recommendation of capture should be retained; the Chair suggested that the Council recommend capture of the existing free flying population, preceded by a rapid feasibility study.

39. **Summary.** Summarizing, the Chair noted the Scientific Council's approval of the report of the working group. He also noted the need to undertake a feasibility study into the techniques contained in the working group's report.

40. The taxonomic working groups for aquatic mammals and large fishes, terrestrial mammals, birds and marine turtles considered Concerted Actions for selected Appendix I species and groups, according to resolutions 3.2, 4.2, 5.1, 6.1 and 7.1.

41. In its report (contained in annex IV to the present report) the working group on birds proposed two new species for Concerted Action: *Puffinus mauretanicus* and *Calidris canutus rufa*, subject to their inclusion on Appendix I by the Conference of the Parties at its eighth meeting. In its review of existing Concerted Actions, the working group reported that it had received updates on 12 Concerted Action species: Siberian crane (*Grus leucogeranus*), Andean flamingos (*Phoenicopterus andinus* and *Ph. Jamesi*), ruddy-headed goose (*Chloephaga rubidiceps*), great bustard (*Otis tarda*), slender-billed curlew (*Numenius tenuirostris*), lesser kestrel (*Falco naumanni*), aquatic warbler (*Acrocephalus paludicola*), white-headed duck (*Oxyura leucocephala*), lesser white-fronted goose (*Anser erythropus*), ferruginous duck (*Aythya nyroca*) and Humboldt penguin (*Spheniscus humboldti*). The councillor for Spain was the new focal point for the white-headed duck (*Oxyura leucocephala*). Three species added to the list of Concerted Action species at the seventh meeting of the Conference of the Parties were the subject of action plans currently in preparation, for which project funding had been allocated by the CMS: *Platalea minor*, *Eurynorhynchus pygmeus* and *Sterna bernsteini*. The working group noted the value of the birds section of the draft rapid review of concerted action species, but felt that an update was necessary to accommodate more recent data.

42. In its report (contained in annex V to the present report), the working group on terrestrial mammals proposed a new concerted action for Central Asian and Caucasian mammals, described in an annex to its own report and situated within the broader concept of the arid lands strategy of the Convention. The working group also recommended extension of the Sahelo-Saharan antelope Concerted Action to other species of migratory large mammals occurring within the range, and extension of the concerted action for the mountain gorilla to the entire species *Gorilla gorilla*, subject to its inclusion on Appendix I. This latter recommendation prompted some discussion as to whether the gorilla was migratory; several councillors cited evidence to indicate that it was, according to the criteria of the Convention. The working group also recommended that all species presently on the Concerted Action list should be confirmed. The group noted that the draft rapid review of Concerted Action species constituted an interesting concept but failed in its implementation to meet the needs of the Convention.

43. In its report (contained in annex VI to the present report) the working group on aquatic mammals and large fishes presented a review of the four existing concerted action species: Mediterranean monk seal, Franciscana dolphin, marine otter and southern river otter. The group had previously noted a number of deficiencies in the draft rapid review of concerted action species; members of the group were encouraged to send comments to the Secretariat.

44. In its report (contained in annex VII to the present report), the working group on marine turtles expressed dissatisfaction with the turtles section of the draft rapid review of Concerted Action species, which failed adequately to incorporate peer-reviewed literature.

45. **Summary.** Summarizing the discussion, the Chair noted the Council's agreement to the revision of the concerted actions listings, and stressed the need for action to enhance the conservation of these species.

5.2 Cooperative Actions for Appendix II species (recommendations 5.2, 6.2 and 7.1)

46. Dr. Barbieri introduced the document entitled "Concerted Actions, Agreements and Cooperative Actions – the operational tools of CMS" (CMS/ScC.13/Doc.6), prepared by Dr. Pierre Devillers, Scientific Councillor appointed by the European Community. The document had been revised in the light of the outcomes of the Council's twelfth meeting, held in Glasgow, April 2004. Dr. Barbieri stressed the crucial need for a common understanding of what Cooperative Actions were and for the list of such actions to be revised to remove all existing inconsistencies. Elaborating further on the document, Dr. Devillers clarified that, in its original concept, the inclusion of a species on the list of Cooperative Actions meant that, although the development of an agreement for the species was not imminent, some action was to be taken for the species. Those species listed in the Cooperative Actions recommendation required cooperative efforts amounting at least to monitoring of individual actions, and at most to the implementation of an action plan, whereas for those listed only in Appendix II and not in the Cooperative Actions recommendation, further steps had to be taken towards the preparation of an agreement.

47. In the ensuing discussion, the question was raised as to whether a species could and should be included on the Cooperative Actions list in the medium term as a safety measure pending a possible agreement. Dr. Devillers expressed the view that such action was possible since to be on the Cooperative Actions list did not necessarily mean that an agreement was not possible. Dr. Barbieri suggested that the lack of a common understanding of the procedures had to date been the principal impediment preventing development of the Cooperative Actions tool to the same level as the Concerted Action tool. Inconsistencies in terms of the reasons for the listing of the species had led to confusion as to the type of action that should be taken in their regard. Accordingly, it was vital to clarify the concept to give Parties a clear indication of what they were seeking to achieve with the listing of species and to ensure that follow-up actions were consistent with the listing. He stressed the need to keep such grey areas to an absolute minimum.

48. One councillor suggested that a combination of a memorandum of understanding and an action plan for a particular species could be a useful tool where a species was threatened. As a memorandum of understanding generally had a lighter burden of administration than an agreement, it would offer a more flexible option and could have useful potential for species under Appendix I. Another councillor suggested that there should be some mandatory requirement to finalize agreements at some point, so as to avoid situations where listings became indeterminate.

49. It was agreed that a small group, comprising Dr. Devillers, the representative of the Secretariat and the Conference-appointed councillors, would consider the issue further.

50. In his report on the deliberations of the working group, the representative of the Secretariat said that the group had considered the most fruitful approach to be a return to the principles of the original recommendation 5.2, Cooperative Actions for Appendix II species, adopted by the Conference of the Parties at its fifth meeting in Geneva in April 1997. It was important to avoid confusion regarding the purpose of including, in the list of Cooperative Actions species, a species listed in Appendix II. The composition of the current list of Cooperative Actions species indicated that such confusion had occurred in the past.

51. **Summary/Action.** Summarizing, the Chair said that it was clear from the second paragraph of recommendation 5.2 that the designation of a species for Cooperative Action was intended for those species that could not reasonably be expected to become the object of an agreement during the forthcoming triennium, but for which conservation action was required. Recommendation 5.2 mandated the Council to prepare a list of Appendix II species requiring such special attention; this task had not always been performed with sufficient rigour in the past. It might be advantageous to reword the second operational paragraph of recommendation 5.2 to stipulate that inclusion on the list of species for Cooperative Action was intended for those Appendix II species of unfavourable conservation status for which conclusion of an agreement was not anticipated during the forthcoming triennium. He noted that the working group suggested that the Secretariat, in coordination with the appropriate councillors, use this clarification of the initial mandate to undertake a revision of the Appendix II species listed for Cooperative Action, using as a basis the list in recommendation 7.1 of the seventh meeting of the Conference of the Parties.

52. The taxonomic working groups considered Cooperative Actions for Appendix II species (recommendations 5.2, 6.2 and 7.1).

53. In its report (contained in annex IV to the present report) the working group on birds presented updates on four Cooperative Action species: corncrake (*Crex crex*), black-necked swan (*Cygnus melanocorypha*), quail (*Coturnix coturnix*) and African penguin (*Spheniscus demersus*).

54. In its report (contained in annex V to the present report), the working group on terrestrial mammals proposed that the Conference of the Parties be requested to take the measures necessary to formally establish a new Cooperative Action for African bats. This would necessitate the placement on the Cooperative Action species list of African populations of *Miniopterus schreibersii*, *Otomops martiensseni* and *Eidolon helvum*.

55. In its report (contained in annex VI to the present report), the working group on aquatic mammals and large fishes stated that since a memorandum of understanding was being pursued, the whale shark should be removed from the list of species for Cooperative Action. The group also reported that studies were being carried

out in southern Chile on South American dolphins *Cephalorhynchus eutropia* and *Lagenorhynchus australis*, and took note of the alarming current situation for sturgeon populations in the Black Sea and Caspian regions.

5.3 Other resolutions and recommendations (not already covered under previous agenda items)

Resolution 6.2 and recommendation 7.2: By-catch

56. In the afternoon session of Wednesday, 16 November 2005, the meeting agreed to give consideration to the by-catch issue, and notably to the draft resolution on by-catch (UNEP/CMS/Res.8.14) through the existing working group on by-catch coordinated by Mr. Barry Baker, councillor for Australia.

57. Mr. Baker presented the working group's discussions on the issue in the morning session of Friday, 18 November 2005. The group's report is contained in annex VIII to the present report. It was noted that by-catch remained a key threat to migratory species across the world and that despite important conservation efforts at national, fishery and species-specific levels, international coordination of this work remained weak. The need for CMS recognition of the by-catch issue was stressed, as well as the need for CMS to identify means of engaging with the matter in a cost-effective manner that focused closely on migratory species. With these considerations in mind, draft resolution 8.14 was supported. The working group recommended also that the resolution provide for the appointment of a specialist by-catch councillor to the Scientific Council, who could develop a taskforce to research the by-catch issue further.

58. **Summary.** In accordance with a proposal from the Chair, the Scientific Council agreed that the desire for a by-catch councillor should be noted and that Mr. Baker should continue to monitor the issue of by-catch intersessionally. The issue would be highlighted for the attention of the Conference of the Parties and, should it wish to appoint a by-catch councillor to work with the Scientific Council, that would be welcomed. More generally, Scientific Council agreed that the by-catch issue should be tackled in an innovative fashion, focusing in particular on the adoption of an international, multi-species approach. The Chair concluded by noting that the Council supported draft resolution 8.14 on by-catch.

Other resolutions and recommendations under development

(a) Sustainable use

59. In the afternoon session of Wednesday, 16 November 2005, the meeting agreed to give consideration to draft resolution 8.1 on sustainable use through the establishment of a working group entrusted to examine the draft resolution and the associated Addis Ababa Principles and Guidelines for the Sustainable Use of Biodiversity (UNEP/CMS/Inf.8.15).

60. In the afternoon session of Friday, 18 November 2005, Dr. Michael Donoghue, observer from New Zealand, gave a report on the discussions of the working group. The report is contained in annex IX to the present report. In view of the perceived conflicts between the draft resolution on sustainable use and the Convention on Migratory Species, in particular Article III paragraph 5 of the Convention, the working group felt that the draft resolution should not be supported in its present form.

61. The Chair expressed concern at the restricted membership of the working group and suggested that the draft resolution on sustainable use appeared in fact to be fairly uncontentious, since it implied few changes to existing practice and that he considered the topic relating to the use of species listed on Appendix I and Appendix II of the Convention to be effective given the previous discussions at meetings of the Scientific Council.

62. Mr. Eric Blencowe (United Kingdom) supported this interpretation, noting that the sustainable use Principles and Guidelines had already been considered by other environmental conservation agreements. Mr. David Morgan of the Secretariat of the Convention on International Trade in Endangered Species (CITES) confirmed that parties to that convention had reflected on the question of the compatibility of the agreement with the Principles. It had ultimately been agreed that the CITES Scientific Committee should explore the applicability of the principles and guidelines to the Convention and report back to the Conference of the Parties on its findings.

63. In response, Mr. Barry Baker argued that the working group's position should be given further consideration, since the notion of sustainable use of species listed on Appendix I of CMS was inappropriate.

64. **Summary.** The meeting approved the Chair's summary of the position of the Scientific Council on the issue: the Scientific Council noted the resolution submitted by the secretariat, the need for clarity on the relationship between the Principles and Guidelines and CMS from the scientific perspective, and the fact that previous discussions had taken place on the relationship between the Principles and Guidelines and other biodiversity-related agreements; the Scientific Council was pleased to offer the Conference of the Parties to the Convention further advice on the matter on an intersessional basis; and the issue should feature on the agenda of the next Scientific Council meeting.

(b) *Human induced impact on cetaceans*

65. The Council expressed doubts about aspects of the draft resolution on human-induced impact on cetaceans. The proposal suffered from grammatical inaccuracies and a lack of clarity. Accordingly, while the proposal enjoyed widespread support in principle, it was likely to require some amendment before being submitted to the Conference of the Parties.

(c) *Marine turtles*

66. Further recommendations were approved by the Council following discussion of the work of the taxonomic working groups. Recommendation 8.17 on marine turtles was supported by the working group on marine turtles and strongly approved by the Council.

VI. REVIEW OF PROPOSALS FOR AMENDMENTS TO APPENDICES I AND II OF THE CONVENTION

(a) *Discussion and evaluation of proposals*

67. The representative of the Secretariat summarized the process for review of proposals for amendments to Appendices I and II to the Convention. Proposals had been submitted by 14 CMS Parties concerning the listing of a total of 25 species in Appendices I and II. The Council agreed that the merits of those proposals would be evaluated through the various taxonomic groups and recommendations would be presented to the Conference of the Parties on acceptance or rejection of the listed proposals.

(b) *Conclusions and recommendations to the Conference of the Parties*

68. The taxonomic working groups reviewed all the proposals, and supported them as submitted, with the exception of the proposal for the inclusion on Appendix I of the maccoa duck *Oxyura maccoa*. Where this species was concerned, the working group on birds found that the status of the species was unclear. A subgroup had been formed to elucidate this, made up of representatives from Kenya, the AEWA Secretariat and Wetlands International, together with the appointed councillor. Using the latest available data, the subgroup had determined that the species was on the borderline of "Vulnerable" status. The group therefore recommend not to proceed with the proposal to list on Appendix I. It was noted that the species is the subject of a forthcoming action plan under the auspices of AEWA, which should ensure that appropriate conservation attention was focused on it. The group also noted that the Council might wish to review the situation at its next meeting. The meeting confirmed the recommendation of the working group.

69. There was a significant discussion concerning the proposal for the listing of the basking shark (*Cetorhinus maximus*), in relation to the modalities with which population estimates had been obtained, and on the relative absence of population data for the Southern Hemisphere. The working group on aquatic mammals and large fishes strongly endorsed the listing on Appendix II. Where inclusion on Appendix I was concerned, while there was strong support for the listing of the Northern Hemisphere populations, it was not so for the populations of the Southern Hemisphere. Some members of the group favoured a precautionary approach in the absence of population data for the Southern Hemisphere, others believed that that was overly precautionary. In the absence of a consensus, the group referred the Appendix I proposal back to the full Council for discussion.

70. In the plenary discussion, the councillor for Australia noted that the proposal submitted to the Conference of the Parties concerned the entire population of the species, and it was unclear whether the Council could recommend the listing for a part of the total population only. The councillor for the European Community expressed the view that, according to the Convention, it was sufficient that a part of the population met the criteria for listing to allow the inclusion of the entire species on CMS Appendices.

71. The representative of IUCN informed the meeting that the Food and Agriculture Organization of the United Nations (FAO) was preparing a report on the revision of the species covered under the United Nations Convention on the Law of the Sea. The basking shark was listed on Annex I, and in the revision it was assessed as overexploited or depleted.

72. The observer from the United Kingdom stated that, on the basis of the best available evidence, the species was meeting the criteria of listing on Appendix I. In reply, the councillor for Norway noted that it was hard to assess the species as depleted, considering that baseline population data were unknown. Overexploitation had been inferred from reduction of landings, but this was in his view due rather to the loss of economic interest in the fisheries.

73. Requested to express his personal view, Dr. Perrin, Conference-appointed councillor for aquatic mammals and large fishes, said that, although he was not himself a specialist of the species, he found the document supporting the proposal very thorough and compelling. He was therefore supporting the proposal.

74. The Chair noted that the issue was complex and suggested that he would have a separate discussion with the appointed councillor for aquatic mammals and large fishes.

75. **Summary.** Reporting on his discussions with the appointed councillor for aquatic mammals and large fishes, the chairman suggested the following:

- (a) That the Scientific Council supported listing of the basking shark on Appendix I and II;
- (b) That the Scientific Council noted that the Convention allowed that where a population was threatened the entire species could be listed on the Appendices;
- (c) That the Scientific Council noted that there was no effective population baseline data for the species at the global level;
- (d) That the Scientific Council had made a range of comments, stressing the requirement for enhanced data and information, but that the majority view was still in support of listing; and
- (e) That the Scientific Council would discuss the relevance of the precautionary principle at one of its future meetings.

76. The Council supported the summary by the Chair.

77. As for the proposal for the listing of the entire species *Gorilla gorilla* on Appendix I, this received support from the working group on terrestrial mammals. During the plenary discussion, the councillor for the Netherlands expressed some doubts about the actual migratory status of the species. The observer for IUCN expressed similar considerations. In reply, several other participants, including the councillors for Belgium, Congo, Democratic Republic of the Congo and Nigeria and the observers from Burundi and the United Kingdom confirmed the migratory status of the species, notably in relation to transboundary movements of animals. As a result, the meeting supported the proposal as submitted.

VII. PROGRESS ON OTHER MATTERS REQUIRING SCIENTIFIC COUNCIL ADVICE

7.1 Potential new agreements (including memorandums of understanding and action plans)

78. Mr. Nick Williams, Chief Wildlife Inspector, Department for Environment, Food and Rural Affairs, United Kingdom of Great Britain and Northern Ireland, presented the findings of the scoping study proposed at the Council's twelfth meeting, in Glasgow in 2004, identifying threats made to migratory raptors and presenting information on their habitats and routes. The purpose of the study had been to assess whether or not an international agreement to conserve raptors should be established under the auspices of CMS covering the African-Eurasian region. If agreed by the Scientific Council, a draft document would be drawn up and an outline for a budget prepared accordingly. Following a tendering process, a company had been selected to conduct the study and a small steering group set up, headed by Mr. David Stroud (JNCC) and Mr. John O'Sullivan, Conference-appointed Councillor for birds.

79. A status report had been prepared with the aid of the extensive world bird database of BirdLife International and the conservation needs of each species identified. The report's key finding showed that 10 raptor species had an unfavourable conservation status at global levels. It noted massive habitat loss for many species. Happily, it had been found that raptors had a low susceptibility to avian influenza and were unlikely to carry or transfer the virus. Detailed knowledge of raptor populations and habitats remained poor in most of Asia, the Middle East and Africa. Although raptors were included in Appendix I and II, there was a general lack of focus for their conservation and rapid action needed to be taken. He also informed the Council that the United Kingdom offered to host an intergovernmental meeting, which could also be held in range States and not necessarily in the United Kingdom.

80. **Summary.** Summarizing, the Chair thanked the United Kingdom for its initiative in relation to birds of prey. He also thanked it for its offer to take discussions forward with relevant Parties.

81. Several proposals for new agreements arose in the course of discussion of the work of the taxonomic working groups.

82. The Council supported a proposal arising from the birds working group, which provided for the development of two agreements, the first relating to grassland birds in South America and the second to Andean flamingos.

83. A number of potential new agreements were discussed in the context of the report from the working group on aquatic mammals and large fishes. Recommendation 8.15 relating to dugongs would provide for the establishment of a memorandum of understanding and it was noted that the forthcoming establishment of such an agreement could justify removal of the species from the list of species designated for Cooperative Actions under CMS. Recommendation 8.19 likewise provided for a memorandum of understanding relating to cetaceans in the Pacific. Both recommendations were approved by the Council. The Council was also informed of efforts led by Australia and the Philippines aimed at agreeing a regional memorandum of understanding or action plan concerning whale sharks. The issue of potential synergy between such an agreement and recommendation 8.16 concerning migratory sharks was discussed.

84. **Summary.** Summarizing, the Chair thanked Australia and the Philippines for their work. He noted the Council's support for recommendations 8.15 and 8.19.

85. Discussion of the possibility of agreements relating to the conservation of sturgeons and to human induced impact on cetaceans proved a little more contentious. The working group on aquatic mammals and large fishes reported interest on Germany's part in the conclusion of some form of agreement under CMS aimed at protecting sturgeons. Subsequent Scientific Council discussion revealed concerns over potential synergy with existing agreements. Additionally, Dr. Morgan of the Convention on International Trade in Endangered Species (CITES) suggested that the current failure to protect sturgeon adequately primarily resulted from the lack of implementation of existing obligations, rather than a shortage of agreements. CMS might be able to contribute more usefully through efforts to raise awareness about the problems with sturgeon conservation amongst consumers of related products in developed States. The Council noted however, the urgent need for action and requested the Secretariat to develop an effective way forward in liaison with the secretariat of CITES.

7.2 2010 Global Biodiversity Target

86. Introducing the item, Dr. Barbieri noted the important roles played by the Convention on Biological Diversity, the UNEP World Conservation Monitoring Centre (WCMC) and the Convention on Wetlands of International Importance especially as Waterfowl Habitat (Ramsar Convention) in developing indicators relevant to the 2010 Target, and pointed out that the approach adopted by the Ramsar Convention to the development of indicators was in line with that followed by CMS.

87. Drawing attention to two species-related indicators of particular relevance for the CMS framework, namely, the Living Planet Index (LPI) and the Red List Index (RLI), he stressed that those indicators, used in conjunction with other information on species trends, would be invaluable in the assessment of progress at the global level in attaining the 2010 biodiversity target.

88. Issues to which attention was drawn in the ensuing discussion included the need to plan beyond the target date of 2010, the link to the other conventions at the scientific level and the need to establish the actual contribution of the CMS to the 2010 target and to determine how the Convention could continue to contribute beyond 2010.

89. **Summary/Action.** On the matter of UNEP/CMS/Res.8.7 relating to the 2010 biodiversity targets, the Scientific Council expressed its support for the resolution and agreed to recommend an amendment to the text, in line with the recommendations of the contract group and supplementary comments of the Moroccan representative. Summarizing, the Chair noted that the proposed amendment served to clarify the meaning of the provisions, as well as removing unnecessary constraints imposed on CMS activity.

7.3 Global Register of Migratory Species (GROMS) and CMS Information Management Plan

90. Referring to document UNEP/CMS/Conf. 8.12, Dr. Francisco Rilla, Information and Capacity-Building Officer of the CMS Secretariat gave a presentation on the evaluation of the Global Register of Migratory Species (GROMS) that had been carried out in accordance with resolution 7.8 of the Conference of the Parties. The review had focused on the quality of the information stored in GROMS, its consistency, accessibility and compatibility with other information systems.

91. Dr. Rilla explained the methodology of the review. He noted that, according to the results of the evaluation, the GROMS database needed to move to its finalization phase, for which about 18 months were considered necessary. The findings of the review suggested that it would be important for the Scientific Council to appoint among its members a technical scientific committee to evaluate the techniques, quality and future of GROMS. Specialists in the taxonomic groups should meet to judge the quality of information stored. Equally important would be efforts to ensure that the data met the needs of CMS but was also available in a range of formats to serve other institutions, including academia.

92. In the ensuing discussion, the Chair expressed gratitude to the Government of Germany for its assistance. The councillor from Germany noted that there were still shortcomings in GROMS and that it should be made more user-friendly. Drawing attention to the apparent rivalry between GROMS and the CMS Information Management System, he stressed that the two systems should complement each other. He also recalled that, at a recent meeting in Bonn, many developing countries had voiced their preference to receive information on compact discs because they had difficulty gaining access to the Internet in the countries. The councillor from Poland said that his country was cooperating with seven other countries on a project on bats and noted that Latvia would be keen to cooperate with GROMS.

93. The representative of the Secretariat indicated that the Secretariat would have reported to the Conference of the Parties the availability of the Council to provide guidance for the further development of GROMS through the GROMS scientific committee. The Chair agreed that the members of the board should have sound scientific knowledge.

94. **Summary/Action.** The Scientific Council noted draft resolution 8.9. It stressed the need for synergy between GROMS and the CMS Information Management System including the creation of a board to steer future

developments and the need for the work of the Scientific Council to be underpinned by accurate and up-to-date data and information.

7.4 Assessments and reports of CMS interest (GEO-4 report, Millennium Assessment, Global Biodiversity Outlook)

(a) GEO-4

95. Mr. Munyaradzi Chenje, African Regional Coordinator of the Division of Early Warning and Assessment of UNEP, gave a presentation on the work of the Global Environmental Outlook, and summarized progress being made towards the production of the report Global Environment Outlook-4: Environment for Development, or GEO-4, due to be launched in September 2007. He said that the Global Environment Outlook, whose work targeted a wide range of governmental, non-governmental and private sector organizations as well as the general public, played a major role in analysing and raising awareness of the causes and impacts of environmental change. GEO-4 would provide an overview of the state of the world's environment, including major trends; human dimensions and interlinkages; and the future outlook.

96. Regarding linkages between GEO-4 and CMS, he said that there were opportunities for CMS to participate in the review process; in addition, GEO-4 would be a useful source of data for CMS, and long-term collaboration between GEO and CMS would be beneficial to both parties.

97. At the end of the morning session of Friday, 18 November 2005, Ms. Elizabeth Migongo-Bake, Programme Officer in the GEO Section of the Division of Early Warning and Assessment (DEWA) and the focal person for UNEP on GEO-multilateral environmental agreement linkages made a presentation on the GEO Data Portal as an important source of data for CMS on migratory species. She elaborated through a video clip on the versatility of the tool in the creation of maps, graphics and charts from existing datasets that could enhance the reporting on status trends and indicators on variables related to migratory species. She added that partnership between GEO and CMS in addressing related data gaps would be welcomed by UNEP as an important component in the process of strengthening the linkages between GEO process and CMS and especially in the current GEO process in the development of GEO-4. Finally she thanked the CMS Secretariat for hosting, in October 2005, the first GEO-multilateral environmental agreement consultation in Bonn and attended by representatives of several multilateral environmental agreements.

98. The Chair welcomed the presentation and noted the link between the GEO Data Portal and GROMS and the importance of the two working together. He said that the Scientific Council of CMS, under the guidance of the Secretariat, was ready to support initiatives that would enhance GEO and CMS in strengthening scientific data information and related knowledge management.

99. **Summary.** The Chair, on behalf of the Council, welcomed the presentation and noted that the Council gave the initiative full support, and was ready to assist in progress towards the final draft.

(b) Millennium Ecosystem Assessment

100. The Chair gave a presentation on the outcomes of the Millennium Ecosystem Assessment of particular relevance to CMS. There had been, in recent years, an unprecedented and accelerating change in ecosystems, and a great increase in the species extinction rate. Such changes had significant consequences for human well-being; there had been, for example, a considerable decline in access to ecosystem services, and a large proportion of the planet's population was undernourished. Degradation of dryland ecosystems was of particular concern.

101. Future predictions indicated continuing and increasing change, particularly in tropical and subtropical grasslands and forests. Climate change was becoming more dominant as a driver of biodiversity loss and changes in ecosystems, and CMS needed to be clear regarding its role and input on this key issue.

102. **Summary.** The Council noted the particular relevance of those two information-gathering exercises to its work, with both providing key contextual information.

7.5 Impact of climate change on migratory species

103. Dr. Ian McLean, JNCC, introduced a study on the impact of climate change on migratory species, prepared by the Government of the United Kingdom (Department for Environment, Food and Rural Affairs) made available to the Scientific Council and the Conference of the Parties as document UNEP/CMS/Inf.8.19. Presenting the main findings of the report, he drew attention to the vulnerability of habitats and species to the direct and indirect consequences of unprecedented changes in the global climate; the reasons why migratory species were at particular risk; and what could be done at the global level (including by CMS) to alleviate the effects of climate change. He noted the linkages with draft resolution 8.13 on climate change and migratory species, to be considered by the Conference of the Parties at its eighth meeting.

104. In the ensuing discussion attention was drawn to the impact of climate change on the ability of species and habitats to adapt to other environmental changes, the role of CMS in helping to minimize the range of other threats to species survival, and the need to learn from positive examples of how species and habitats had successfully adapted to climate changes.

105. *Summary.* Summarizing, the chair thanked Dr. McLean for his report and the United Kingdom for taking this important initiative. The Council supported draft resolution 8.13.

7.6 Migratory species as vectors of diseases

106. In discussing this item the councillors had before them the following documents: CMS/ScC.13/Inf.11; CMS/ScC.13/Inf.12; and CMS/ScC.13/Inf.13. Introducing the item, the Chair stressed the need to identify the disease-related work areas in which the Council could contribute. One councillor expressed disappointment that a working group that had been appointed to work on diseases two years earlier at the Council's twelfth meeting in Glasgow appeared to have had limited activity, while another pointed out that the discussions in Glasgow had focused on birds. In response, it was suggested that the Council could now take measures to reactivate the working group set up in Glasgow.

107. The representative of the secretariat noted the topical importance of avian influenza and reported on the initiatives undertaken in this context within CMS and other frameworks, such as AEWA and the Ramsar Convention, notably the convening of a task force on avian influenza and wild birds. Resolutions concerning avian influenza had been issued at the recent third session of the AEWA Meeting of the Parties and the ninth meeting of the Ramsar Conference of the Parties. He suggested that a resolution be drafted tailored to the CMS context. One councillor cautioned, with regard to avian influenza, that it was very difficult to distinguish information from misinformation and stressed the consequent need to determine what constituted good information and where it came from. The representative of the Secretariat recalled concerns expressed in organizations dealing with migratory birds about the paucity of scientific knowledge on the issue and observed that, although there was a great deal of information on migratory birds, there was very little information on the role of birds in the transmission of diseases such as influenza. Avian influenza was known to exist in wild birds but the role played by migratory birds in its propagation was not known.

108. The councillor from Kenya said that Africa was very concerned about the threat of avian influenza. Noting the finding that ducks were hosts of the avian influenza virus, he informed the meeting that Kenya had established an avian influenza task force, adding that there was a need to screen migratory birds in order to obtain information that could help to deal with the threat. He urged developed countries to look for ways of assisting developing countries to confront the threat. It was also noted that scientists had only recently begun discussing the issue of migratory birds as vectors of diseases.

109. The Chair proposed that a working group should be established, led by Mr. Ward Hagemeyer and Dr. Roberto Schlatter (appointed councillor for neotropical fauna), Head of Biodiversity and Ecological Networks of Wetlands International, to draft a resolution on migratory species and highly pathogenic avian influenza for submission to the Conference of the Parties. The working group subsequently presented a draft resolution for consideration by the Council (contained in annex X to the present report).

110. In his introduction to the draft resolution, Mr. Hagemeyer explained that the opportunity had been taken, in a long preamble, to summarize the state of current knowledge regarding avian influenza. Many countries, he said, had been experiencing difficulty defining their own situation and responding accordingly. The

recommendations in the operational paragraphs addressed a number of key issues, including knowledge needs, strategy advice, funding and CMS engagement.

111. **Summary/Action.** The Council recognized the significance of the issue and approved the draft resolution in principle, given the observation by the Chair that the forthcoming round-table discussion would offer an opportunity to comment in more detail. Summarizing, the Chair also noted the risk to human and veterinary health. The risk to the health of migratory species, however, tended to be overlooked, and there was a need for effective research and risk analysis to help prioritize action in general and, specifically, for migratory species along their migratory routes.

7.7 Artificial barriers to migration and other threats to migratory species and their habitats

112. As no significant progress was to be reported on this issue, and in view of time constraints, the Chair decided to defer consideration of this issue to a subsequent meeting.

7.8 CMS Thesis Award

113. Dr. Francisco Rilla provided a presentation on the CMS Thesis Award, which was to be given for the first time in 2005. The award had been financed by the National Geographic of Germany and Lufthansa and aimed to reward the author of the best doctoral thesis produced in recent years on the matter of migratory species. The eight best entries were mentioned individually and it was noted the award would be presented at the opening ceremony of the eighth meeting of the Conference of the Parties on 20th November 2005. The Chair noted that the selection process had been very productive, in particular insofar as it had enhanced contacts between CMS and the research community.

VIII. COLLABORATION WITH OTHER INTERGOVERNMENTAL AND NON-GOVERNMENTAL ORGANIZATIONS

114. Mr. Barry Baker, representing the Agreement on the Conservation of Albatrosses and Petrels (ACAP), drew attention to information paper UNEP/CMS/Inf.8.14.4, which provided an update on the work of ACAP. He reported that two successful meetings had been held in Hobart, Australia, and that the number of Parties to the Agreement had reached eight with the addition of France and Peru. The Chair thanked Mr. Baker for the report and also thanked Australia for its continued support to the agreement.

115. The representative of AEWA outlined the progress made since the last meeting of the Council. The Technical Committee had met in Mauritius and had suggested a number of issues for consideration at the Meeting of the Parties held in Senegal in October 2005, including the definitions of biogeographical populations of waterbirds, and of long-term decline in waterbirds populations. There were 52 Parties to the Agreement, representing 45 per cent of range States. The Chair noted the good progress being made by AEWA.

116. Dr. Colin Limpus, on behalf of the Chair of the Advisory Committee of the Indian Ocean –South-East Asia (IOSEA) Marine Turtle Memorandum of Understanding, gave a brief synopsis of its recent work and planned activities. The scope of activities was being extended to include several East Asian countries, and support from various signatory countries and CMS had strengthened the secretariat in Bangkok. A major focus on communication including operation of an effective interactive website, and designation of 2006 as the Year of the Turtle. A study was to be undertaken of the impacts of the 2004 tsunami on coastal communities and on different aspects of the environment, including marine turtles and their habitat.

117. Dr William Perrin, representing the International Whaling Commission, reported on the 2005 meeting of the Scientific Committee of the International Whaling Commission (Ulsan, Korea, 30 May – 10 June 2005), providing a summary of deliberations and actions relating to cetacean species on CMS Appendices I and II and of other relevant general issues. A detailed report prepared by Dr. Perrin was before the meeting (CMS/ScC13/Doc.10). The Chair welcomed the report and thanked Dr. Perrin for his continuous efforts to ensure the liaison between the Council and the Scientific Committee of IWC.

118. WDCS introduced a proposal for an enhanced partnership between CMS and WDCS. As outlined in CMS/ScC.13/Inf.10, under a formal Partnership Agreement with CMS, WDCS intended to develop a Joint Work Programme to harmonize WDCS activities with the CMS Strategic Plan 2006–2011, in order to maximize the effectiveness of WDCS, CMS and its agreements and memorandums of understanding. To make this effective, WDCS proposed the creation of a standing WDCS working group in support of CMS cetacean research and conservation priorities, to prioritize projects to be submitted to CMS as a contribution to the CMS Strategic Plan 2006–2011. The working group would also seek to increase the flow of information into formal CMS processes through the CMS Appointed Scientific Councillor for Aquatic Mammals and Large Fishes.

119. WDCS sought the Council's acknowledgment of the Partnership Agreement between WDCS and CMS that would enable WDCS to share its scientific information resource with CMS; endorsement of the proposal to convene a standing WDCS working group in support of CMS cetacean research and conservation priorities (WGCP) to develop and agree on WGCP contributions to the joint work programme, which would support the cetacean-related priorities within the CMS Strategic Plan 2006–2011; and agreement to review the progress in collaboration between WDCS and CMS at its 2007 and 2008 meetings. All the points were taken by the Council.

120. *Summary.* The Chair expressed his satisfaction at the number of observer organizations participating in the Scientific Council meeting but stressed that there was scope for improved liaison and dialogue between the Scientific Council and the scientific organizations that underpin its work. He affirmed that the Scientific Council was content with progress being made in this area. The Scientific Council was keen to draw on the expertise of other organizations and regarded interaction with such bodies as fundamental to its work. He particularly welcomed the proposal from WDCS for enhanced cooperation with the Council.

IX. REPORT TO THE CONFERENCE OF THE PARTIES ON SCIENTIFIC COUNCIL ACTIVITIES DURING 2003-2005

121. The Chair provided the Scientific Council with a preview of the draft presentation on Scientific Council activities during 2003–2005 that he intended to present to the Conference of the Parties at its eighth meeting. The presentation focused on three key areas, namely background issues relating to conservation of migratory species, specific actions by the Scientific Council during the triennium, and future plans. He invited Scientific Council members to submit comments on the draft and explained that the presentation would be finalized and cleared with the Secretariat on 20 November 2005.

X. ELECTION OF THE CHAIR AND VICE-CHAIR OF THE SCIENTIFIC COUNCIL FOR THE PERIOD 2006-2008

122. The representative of the Secretariat said that the following nominations had been received for the positions of Chair and Vice-Chair of the Scientific Council for the period 2006–2008: Chair, Mr. John Mshelbwala; joint Vice-Chairs, Dr. Colin Galbraith and Dr. Pierre Devillers. There were no further nominations.

123. A councillor asked whether the election of joint Vice-Chairs was compatible with the rules of procedure of the Council. The representative of the Secretariat replied that if one accepted the interpretation that it was the function of Vice-Chair that was being elected, to be carried out by two persons alternating as appropriate, then the procedure was within the Council's rules.

124. The councillor from Germany proposed that Mr. Mshelbwala be elected Chair of the Council, and Dr. Galbraith and Dr. Devillers Vice-Chairs. The nominations were seconded by the councillor from Switzerland, and the proposal was carried unanimously. Dr. Galbraith expressed thanks on behalf of his colleagues.

XI. DATE AND VENUE OF THE FOURTEENTH MEETING OF THE SCIENTIFIC COUNCIL

125. The date and venue of the fourteenth meeting of the Council was discussed. It was agreed that the Council would meet intersessionally towards the end of 2006 or in early 2007. The venue was yet to be decided but would

probably be the new CMS Secretariat building in Bonn, made available through the generosity of the Government of Germany.

XII. ANY OTHER BUSINESS

126. A special session on CMS initiatives in Africa was held on the afternoon of Thursday, 17 November 2005. The session was chaired by Mr. John Mshelbwala, councillor for Nigeria and Vice-Chair of the Council, assisted by Dr. Richard Bagine, councillor for Kenya as rapporteur.

127. Dr. Roseline Beudels-Jamar of the Royal Belgian Institute of Natural Sciences provided a report on the progress of continuing concerted action aimed at conserving various species of Sahelo-Saharan antelopes. She noted that a variety of species were severely threatened, but support from CMS and the Fonds Francais pour l'Environment Mondial had served as a catalyst for regional coordination aimed at improving understanding of the status of the species concerned and launching conservation efforts, in particular through translocation of animals. She also described specific actions being taken in Niger, Mali, Chad and Senegal.

128. She stressed that conservation of Sahelo-Saharan antelopes was important not just for the antelopes themselves, but also for other animal species and local human populations. She provided a brief outline of new publications relating to the concerted action programme and it was noted that a draft of an updated status report would be presented to the Conference of the Parties, amendments to which could still be proposed. She further noted that range States had expressed a desire to conclude a memorandum of understanding on conservation efforts and that a first draft of such an agreement would be circulated in the coming year. Partnerships with other organizations in the region, for instance the Sahara Conservation Fund, also represented valuable initiatives. Looking forward, she stressed that conservation of the rich biodiversity in the Sahelo-Saharan region would require sustained and strong support from CMS.

129. Subsequent discussion of the issues raised focused heavily on the impact of hunting tourism on the status of Sahelo-Saharan antelopes. Dr. Beudels-Jamar noted that the problem was particular to the region and stemmed primarily from hunters from the Persian Gulf region. Experience in Morocco, however, suggested that exploitation of the commercial interest in hunting could also serve as a mechanism for conserving fauna. It was also noted that other factors had played an important role in the deterioration in the status of Sahelo-Saharan antelopes, including military conflict, famine, poverty and the difficulty of policing such a vast geographical area.

130. Dr. Borja Heredia Armada provided a report on the action plan for the recovery of the Mediterranean monk seal in the eastern Atlantic Ocean. Conservation efforts were being sponsored by CMS and constituted a joint venture undertaken by the four Range States concerned, namely, Morocco, Mauritania, Portugal and Spain. The main output of the concerted action was an action plan that had been finally approved in 2004. The action plan consisted of a natural history of the species, focusing on its population status and perceived threats, and a programme of recovery actions.

131. Dr. Heredia noted that the Mediterranean monk seal constituted a very severely threatened species and outlined the principal threats arising both from natural and human related factors. It was noted that while the historic causes for the collapse in seal numbers, namely commercial harvesting and human persecution, were no longer key threats, human activity in the form of fishing in the range area remained the core problem. Achieving the goal of a recovery in seal numbers to the point of achieving favourable conservation status would require wide-ranging actions, in particular through preserving habitat, raising awareness of local fisherman and providing them with financial incentives for protection of the species, drafting special protocols aimed at safeguarding seals and regulating fisheries. CMS could play an important role by creating mechanisms for coordinating and financing strategies and actions. The core result of the action plan should be the creation of a network of specially protected areas for the monk seal. Several potential zones were outlined and it was emphasized that their success would depend on commitment of adequate financial and human resources.

132. Mr. Anthony Michael Hutson of the United Kingdom Bat Conservation Trust gave a presentation on African bats, which had been prepared in cooperation with the Agreement on the Conservation of Bats in Europe (EUROBATS). Noting that there were some 40 bat species in Africa, he said that the World Conservation Union (IUCN) had carried out a global mammals assessment and produced maps indicating where various species were

located and documenting the key habitats of African bats, which included forests and caves. The fact that less than half of bat species were safe was a major concern for conservationists. Specific threats to bats included, among others, the disturbance of caves, negative public attitudes, the perceived association of bats with disease and their electrocution on power lines. Bats were known to migrate as far as 1,500 kilometres and the main reasons for migration included foraging and the search for maternity sites. In addition, he said that the next step with regard to the conservation of African bats would be the development and signing of a bat agreement for Africa.

133. Subsequently, Mr. Hutson provided some further information on the status of African migratory bat species, highlighting the need for further research in this area. He noted the existence of several local bat conservation groups in South Africa, adding that they could serve as the model for establishing groups elsewhere in the continent. Bat conservation efforts were also likely to benefit from the African Bat Conservation News journal in South Africa and further forthcoming publications. The Chair expressed the Scientific Council's gratitude for Mr. Hutson's contribution to its work and summarized the key issues raised, namely the need for capacity building in African states, improved education and greater understanding of the conservation status of bats.

134. In the discussion on the issue, one councillor noted the importance of bats for ecosystems. Another noting that not much research on bats had been conducted in Africa, particularly with respect to migratory bats, said that there was a need for awareness raising on the subject among African people.

135. Dr. Bagine concluded the session by summarizing the presentations. He recalled the endangered status of Sahelo-Saharan antelopes and the need to find a solution to the problem, noting with optimism the progress in the use of translocation as a conservation measure. Commenting on the action plan for conservation of the Sahelo-Saharan antelope, Dr. Heredia suggested that it would be advantageous to integrate the work of Spain's Centre for Rescue of Saharan Flora and Fauna into the action plan.

136. With regard to monk seals, Dr. Bagine noted that there were natural and human-induced threats that could not be overlooked and welcomed the conservation efforts that were being made, including the coordination mechanism that was being put in place. He noted, however, that there was also a need for legal protection. Concerning bats, he pointed out that it would be a good idea to borrow ideas on the conservation of bats from EUROBATS, and underlined the problem of lack of awareness, resources and knowledge in Africa, as well as the need for capacity-building in the area of bat conservation. There was also a need for partnerships and to determine how activities could be coordinated. He appealed for support from CMS, which could be in the form of finance or small-scale projects.

XIII. CLOSURE OF THE MEETING

137. Following the customary exchange of courtesies, the Chair declared the meeting closed at 5.45 p.m. on Friday, 18 November 2005.

REPORT OF THE CONTACT GROUP ON THE STRATEGIC PLAN

Following the short introduction made by the Chair of the Open-ended Working Group on the Strategic Plan of the Convention during the first session of the thirteenth meeting of the Scientific Council, several statements from councillors made it clear that some issues were to be discussed in a smaller group. Accordingly, a contact group was set up under the chairmanship of Dr. Richard Bagine, Kenya, with the task of gathering and discussing comments on the Strategic Plan, the SIP of the Scientific Council and the 2010 target resolution. The group met a first time on 16 November from 2 till 3 p.m. It had a fruitful discussion on the Strategic Plan. On 17 November it spent an hour of fruitful silence from 2 to 3 as only the Chair, the Rapporteur and one participant appeared. At its third meeting from 6.30–8 p.m. last night, the group discussed the SIP and the 2010 target resolution.

As a consequence of statements made in plenary and issues raised during the meeting of the contact group, the following modifications are suggested with respect to the draft CMS Strategic Plan for 2006–2011 as annexed to document CMS/Res.8.2/Rev.1. Before I name the suggested modifications I have to draw your attention to the problem that there are in fact two Rev.1 documents that seem to differ slightly: the contact group decided to refer to the more recent one dated 5 October 2005 and suggests to this meeting that it be renamed Rev.2.

The first modifications concerns chapter 3: “The role of CMS” in the introductory part of the draft Strategic Plan. In order to recall that we are applying the definition of migratory species as given in the text of the Convention, we propose to add under para. 13 :

“13. Since migratory species, *in the sense of the definition given in the text of the Convention*, can be conserved

The next comment relates to the two terms figuring the square brackets in the Goal (on p. 7 of the English version). It was felt that “sustainable livelihoods” is the preferable term as it is standard term, whereas “global sustainability” does not seem to be. It is up to the councillors to decide whether this is a scientific issue they want to deal with and to make a respective recommendation to the Conference of the Parties.

The next modification applies to subtitle 4.5 “Targets and milestones” on p.8 of the English version. In order to be logical, considering the headings of the table, the contact group proposes to add “*indicators*”: “Targets, *indicators* and milestones”.

The last proposed modification relates to the table. It was felt that emerging issues like that of avian influenza and other diseases or vectors did not receive the attention they deserve in the targets. It is proposed to reword target 1.4 on p.13 of the English version as follows:

Emerging and existing threats to migratory species and obstacles to migration identified and reviewed at regular intervals and guidelines for appropriate actions developed

As to the other comments made by councillors with respect to the draft Strategic Plan, the chair of the Open-ended Working Group on the Strategic Plan, who also participated in the contact group, provided the following response (in those cases where he did not respond in plenary when the issues were raised) to the concern raised about the budgetary implications of the Strategic Plan.

“As a chair of the Open-ended Working Group on the Strategic Plan, I must be very clear: the goal and objectives of the draft Strategic Plan have no budgetary implications other than those addressed in the text of the Convention, and all the targets as they are formulated relate to resolutions that have been adopted at previous meetings of the Conference of the Parties”.

The chair of the Open-ended Working Group on the Strategic Plan may have to come back to that during the current session of the Conference of the Parties.

Financial implications will arise from the implementation!

Now, turning to the SIP in doc. CMS/ScC/13/Doc.3, it was proposed that an additional activity should be inserted under the heading No. 1.3. on p.5 of the table, which is the annex to doc CMS/ScC13/3. In order to be consistent with the change proposed in target 1.4 of the Strategic Plan, it is suggested that the following activity be introduced between Nos. 1.3.6 and 1.3.7. :

Identifying emerging threats to migratory species and obstacles to migration and prioritize those to be addressed by Convention on the Conservation of Migratory Species of Wild Animals

The contact group did not recognize any other issue with respect to the detail of the SIP and refrained from going through the SIP line by line in order to check whether the SIP fitted into the Strategic Plan. Indeed, this cross-checking has been performed thoroughly by the secretariat with the help of the facilitator of the SIP workshop, Dr. Mike Moser. The contact group suggests, however, that the Scientific Council may set priorities for the proposed activities, especially with regard to their financial implications.

An animated debate took place on resolution 8.7 on CMS and the 2010 Biodiversity Target, which finally led to the following proposal:

Resolution 8.7

1. *Requests the Convention on the Conservation of Migratory Species of Wild Animals Secretariat to continue to liaise with the Convention on Biological Diversity Secretariat and the other Biodiversity-related conventions and relevant institutions with a view to adopt agreed indicators to the need of Convention on the Conservation of Migratory Species of Wild Animals to measure the achievement of the 2010 target;*
2. *Deleted;*
3. *Unchanged.*

on the move to
2010

**CONVENTION ON THE CONSERVATION
OF
MIGRATORY SPECIES OF WILD ANIMALS**

CMS SCIENTIFIC COUNCIL

STRATEGY IMPLEMENTATION PLAN
2006 - 2011

INTRODUCTION

This Strategy Implementation Plan describes the contribution that the CMS Scientific Council will make to the implementation of the CMS Strategic Plan for 2006-2011¹ and is a response to COP Resolution 7.12.

The specific functions of the Scientific Council are defined in the text of the Convention, and can be summarised as:

- providing scientific advice to the Conference of the Parties, and all other bodies of the Convention, including Agreements;
- recommending and evaluating research on migratory species;
- making recommendations as to the migratory species to be included in Appendices I and II;
- making recommendations as to specific conservation and management measures to be included in Agreements on migratory species; and
- recommending solutions to problems relating to the scientific aspects of the implementation of CMS, in particular with regard to the habitats of migratory species.

The work of the Scientific Council therefore contributes to the overall CMS Strategic Plan particularly through its first two Objectives, which are:

1. *To ensure that the conservation and management of migratory species is based on the best available information; and*

2. *To ensure that migratory species benefit from the best possible conservation measures*

However, the work of the Scientific Council also provides much information for raising awareness about the work of the Convention (Objective 3), and also needs to link well with the other instruments of the Convention, as well as other Multilateral Environmental Agreements (MEAs) and partners (Objective 4).

This is the first Strategy Implementation Plan to be adopted by the Scientific Council, representing a major shift to a more strategic and outcome-focused way of working. The main changes are:

1. The development of a number of strategic rolling documents to summarise key information for decision-making by the Convention, including a regular review of the status of species on Appendix I.
2. Improved scientific integrity of the Convention's Appendices (taxonomy and completion).
3. Enhanced attention to species on Appendix I.
4. Enhanced attention to issues concerning habitat loss and fragmentation.
5. Greater scientific cooperation between the Scientific Council and CMS Agreements, and with the technical bodies of other conventions.

Each Activity has been designed to be measurable, with defined milestones for completion, so that progress can be assessed regularly. It is recommended that evaluations of the implementation of this plan be presented to the ninth and tenth meetings of the COP. The format of this Implementation Plan is organised around the four Objectives of the CMS Strategic Plan, with actions cross-referenced to the relevant Targets.

¹ In order to plan for this period, some activities that began in 2004 and 2005 have also been included.

CMS STRATEGIC PLAN OBJECTIVE 1

TO ENSURE THAT THE CONSERVATION AND MANAGEMENT OF MIGRATORY SPECIES IS BASED ON THE BEST AVAILABLE INFORMATION

				Strategic
No.	Scientific Council Action	Indicators, Milestones		Plan Target
1.1	Ensure that the best information is available for the conservation and management of endangered migratory species with regard to CMS Appendix I			
1.1.1	Undertake summary scientific reviews of the main taxonomic groups of migratory species, to identify outstanding candidate species for listing on Appendix I (based on the scientific criteria defined in CMS Res. 5.3). This process should also clarify the level of completion required with respect to already listed populations / partial listings. This work should be done using, to the fullest extent possible, the expertise in the Scientific Council.	ScC14 Aquatic mammals review assessed ScC14 Aquatic reptiles review assessed ScC14 Terrestrial mammals review assessed ScC14 Birds review assessed ScC14 Bats review assessed ScC16 Fishes review assessed ScC16 Invertebrates (Butterflies) review assessed		1.1
1.1.2	Using the results from action 1.1.1, and following review by the Scientific Council, prepare and maintain a list of species which meet the scientific criteria for listing on Appendix I (see CMS Res.5.3), but which have not yet been listed. This list, which should be prioritised according to the IUCN Categories of Threat and should include a list of range states, should become known as the <i>ScC Appendix I Candidate List</i> , and should become a regular internal working document of the Scientific Council.	ScC13 Concept/format for List approved ScC14 1st additions to the List approved ScC16 List reviewed and updated		1.2, 2.1
1.1.3	Prepare a prioritised list of Appendix I species for concerted action taking into account also the feasibility of achieving positive conservation outcomes. Include with this list a record of all concerted actions so far undertaken by CMS and others. This information should be included in the <i>CMS Appendix I Action for Recovery Table</i> .	ScC13 Concept/format for Table approved ScC14 Prioritised list approved		2.4
1.1.4	Review the availability of action plans for all Appendix I species, including format, dates of preparation and review, source, comprehensiveness / adequacy. Include this information in the <i>CMS Appendix I Action for Recovery Table</i> , and make appropriate recommendations to meetings of the COP.	ScC13 Concept/format for Table approved ScC14 Review completed and information included in Table ScC14 Prioritised list of species requiring action plans approved, deadlines and owners agreed ScC15 Rec. submitted to COP9 ScC16 Table reviewed ScC17 Rec. submitted to COP10		2.4
1.1.5	Prepare new Action Plans (prioritised according to threat status), according to the CMS format, for the protection and recovery of all Appendix I species that do not yet have one, to identify key priorities and provide a framework for concerted action and evaluation. Where information or resources are lacking, a review report (preliminary action plan (See Res. 3.2)) should be prepared as a first step.	ScC16 Review progress on new action plans ScC17 Report on progress on new action plans		2.4
1.1.6	Undertake a complete review of Appendix I for consideration at every 3 rd COP (starting with COP9). This review should include the following items: a review of the status of the Appendix (level of completion); review of the principles and procedures for listing or de-listing; adoption, if necessary, of changes to the taxonomic reference systems.	ScC13 TOR and procedure for review agreed ScC14 Results of review considered ScC15 Rec. submitted to COP9 ScC17 Progress reviewed		2.1

1.1.7	Through the CMS-IMS, the Scientific Council will report to each meeting of the COP on the population status (size and range) of all Appendix I species and level of protection in each range state, using the most up to date information available. This will be achieved by means of a standardised report (included within the <i>CMS Appendix I Action for Recovery Table</i>). Methods will be developed to show clearly whether the status of each species is stable, increasing or declining.	ScC14 Methodologies for reporting approved ScC15 Report agreed for submission to COP9, with Rec. ScC16 Report reviewed ScC17 Report agreed for submission to COP10, with Rec.	1.1, 2.2, 4.1
1.1.8	Through the CMS-IMS, the Scientific Council will report to each meeting of the COP on the concerted actions being undertaken for all Appendix I species, using the most up to date information, by means of a standardised report (included within the <i>CMS Appendix I Action for Recovery Table</i>).	ScC14 Methodologies for reporting approved ScC15 Report agreed for submission to COP9, with Rec. ScC16 Report reviewed ScC17 Report agreed for submission to COP10, with Rec.	1.1
1.2 Ensure that the best information is available for the conservation and management of migratory species with an unfavourable conservation status (Appendix II species (Art. IV))			
1.2.1	Undertake summary scientific reviews, by taxonomic group, to identify those migratory species and groups of species with an unfavourable conservation status that would significantly benefit from new CMS Cooperative Actions, including Agreements. This work should be done using, to the fullest extent possible, the expertise in the Scientific Council.	ScC14 Aquatic mammals review assessed ScC14 Aquatic reptiles review assessed ScC14 Terrestrial mammals review assessed ScC14 Birds review assessed ScC14 Bats review assessed ScC16 Fishes review assessed ScC16 Invertebrates (Butterflies) review assessed	1.1
1.2.2	Using the results of activity 1.2.1, and following review by the Scientific Council, prepare and maintain a list of species which meet the scientific criteria for listing on Appendix II, but which have not yet been listed. This list, which should be prioritised according to the IUCN Categories of Threat, should become known as the <i>ScC Appendix II Candidate List</i> , and should become a regular working document of the Scientific Council.	ScC13 Concept/format for List approved ScC14 1st additions to the List approved ScC16 List reviewed and updated	1.2, 2.1
1.2.3	Develop and maintain an overview of all Agreements, regional initiatives, and other cooperative actions/initiatives being undertaken under CMS and other auspices for migratory species with an unfavourable conservation status. This should be known as the <i>CMS Appendix II Agreements and MOUs Table</i> , which should become a working document of the Scientific Council.	ScC13 Concept/format for Table approved ScC14 1st additions to the Table approved ScC16 Table reviewed and updated	1.2
1.2.4	Undertake a complete review of Appendix II for consideration at every 3 rd COP (starting with COP10). This review should include the following items: a review of the status of the Appendix (level of completion); review of the principles and procedures for listing or de-listing; adoption, if necessary, of changes to the taxonomic reference systems.	ScC15 TOR and procedure for review agreed ScC17 Results of review considered and Rec. submitted to COP10	2.1
1.2.5	Develop a rolling programme of outcome-focused reviews of the effectiveness of CMS Agreements and other cooperative actions in conserving species on Appendix II. This should also include review of any initiatives to launch a Cooperative Action that have stalled for more than 3 years. Following consideration of the results of such reviews, submit recommendations to meetings of the COP for their enhancement and to improve synergies.	ScC13 TOR and list of reviews agreed ScC14 50% of reviews completed and assessed by Scientific Council ScC15 All reviews completed and assessed by Scientific Council. Rec. submitted to COP9	2.5

1.3 Ensure that the best information is available to identify and assess the major threats to migratory species			
1.3.1	Review the results of scientific work on climate change under the auspices of other bodies, as well as by Contracting Parties. Assess the relevance and importance of such work for the conservation of migratory species and the aims of the CMS (Rec 5.5).	ScC12 TOR for review agreed ScC13 Review considered and Rec. submitted to COP8	1.4, 2.6
1.3.2	Review the effects of hunting (taking) on migratory species, particularly marine mammals/large fish, marine turtles, large terrestrial mammals and birds, to identify priority issues to be addressed through CMS.	ScC13 TOR for review agreed ScC14 Review considered ScC15 Rec. submitted to COP9	1.4, 2.6
1.3.3	Review the effects of by-catch and unregulated fisheries on migratory species, particularly of marine mammals, large marine fish, marine turtles and albatrosses/petrels to identify priority issues to be addressed through CMS.	ScC13 TOR for review agreed ScC14 Review considered ScC15 Rec. submitted to COP9	1.4, 2.6
1.3.4	Review the effects of habitat loss, fragmentation and degradation on migratory species in terrestrial and coastal environments (particularly wetlands, forests, grasslands, arid lands) to identify priority issues to be addressed through CMS.	ScC15 TOR for review agreed ScC16 Review considered ScC17 Rec. submitted to COP10	1.4, 2.6, 2.7
1.3.5	Review the effects of barriers to migration on migratory species.	ScC13 TOR for review agreed ScC14 Review considered ScC15 Rec. submitted to COP9	1.4, 2.6
1.3.6	Review the effects of pollution (including oil pollution – see Res. 7.3), disease and alien invasive species on migratory species to identify priority issues to be addressed through CMS.	ScC15 TOR for review agreed ScC16 Review considered ScC17 Rec. submitted to COP10	1.4, 2.6
1.3.6 bis	Identify emerging threats to migratory species and prioritize those to be addressed by CMS	ScC14 Methodology approved ScC15 Report submitted to COP9 ScC16 Review prepared ScC17 Report submitted to COP9	1.4, 2.6
1.3.7	Identify (through the Action Plans described under Operational Objective 1.3) networks of critical sites for Concerted Action species throughout their range.	ScC13 Methodology approved ScC15 Critical Sites identified for >50% of species listed on Appendix I ScC17 Critical Sites identified for >90% of species listed on Appendix I	2.2, 2.3, 2.7
1.3.8	Identify, in the framework of Agreements or the preparation of Cooperative Actions, important ecological networks of sites/habitats and key migration corridors required by Appendix II species.	Adequacy of knowledge determined in reviews under Activity 4.1.1 ScC15 Rec. submitted to COP9 identifying priorities for further work	2.7
1.3.9	Build on work already initiated by the Scientific Council (Doc. UNEP/CMS/ScC 5.3) through a commissioned study, to advise how CMS can most effectively address the problems caused by obstacles to migration. Special attention should be given to impacts on Appendix I species.	ScC13 TOR for study approved ScC15 Study reviewed and Rec. submitted to COP9	1.4
1.3.10	Undertake regular evaluation of the contribution that CMS has made to controlling, removing or mitigating threats to animal migration	ScC17 1 st evaluation completed, and Rec. submitted to COP10	1.4, 2.6, 4.2
1.4 Ensure that strategic research provides the necessary evidence to address the major issues affecting migratory species			
1.4.1	On the basis of the reviews described in Activities 1.1.1 and 1.2.1, and species Action Plans, identify the main strategic research priorities required to address the conservation of migratory species.	ScC16 Research priorities for Appendix I and II species assessed	1.6

1.4.2	Maintain a <i>List of CMS Research Priorities</i> , as identified in 1.4.1, that can be promoted widely to national and international research funding bodies.	ScC13 Concept/Format of List approved ScC13 1 st draft of List submitted to COP8 with Rec. ScC15 List submitted to COP9 with Rec. ScC17 List submitted to COP10 with Rec.	1.6
1.4.3	Explore the best ways and means to promote and facilitate scientific and technical co-operation and research on migratory species (including via the CBD Clearing House Mechanism).	ScC14 Options reviewed ScC15 Rec. submitted to Cop9	1.6, 1.8
1.4.4	Use the information gathered under actions 1.4.1 and 1.4.2 to prepare a report to each meeting of the COP on the progress in research, and the outstanding research priorities, as summarised in the <i>List of CMS Research Priorities</i> .	ScC15 Progress reported to COP9 ScC17 Progress reported to COP10	1.6
1.4.5	Ensure that all Action Plans for Appendix I species adequately address the priority needs for monitoring and research on these species.	Assessment completed through Actions 1.1.4 & 1.1.5	1.6, 2.4
1.4.6	Review standards of recent CMS-commissioned research reports, and develop guidelines for improved quality control and standardisation	ScC14 Review completed and Guidelines agreed	1.7
1.5	Ensure that effective monitoring provides the necessary evidence to address the major issues affecting migratory species		
1.5.1	Incorporate in the <i>CMS Appendix I Actions for Recovery Table</i> , information showing whether or not adequate monitoring information is being provided per Range State for each Appendix I listed species. Advise each meeting of the COP to address any gaps in monitoring, and to provide any necessary support to increase the capacity of developing countries to undertake monitoring, particularly of Appendix I species.	ScC15 Table reviewed and draft Rec. submitted to COP9 ScC17 Table reviewed and draft Rec. submitted to COP10	1.5, 1.6
1.5.2	On the basis of monitoring information provided through the CMS-IMS for Appendix I species, include a simple assessment of population trend (stable, increasing, declining, unknown) for each species in the <i>CMS Appendix I Actions for Recovery Table</i> .	ScC15 Assessment included in Table ScC17 Updated assessment included in Table	1.3
1.5.3	Through the development of closer scientific liaison with daughter Agreements, promote collaboration and enhancement of monitoring programmes, where necessary through appropriate recommendations to the COP and capacity building.	Adequacy reviewed through Activities 4.1.1 and 4.1.2	1.6
1.5.4	Use the information gathered under actions 1.1.1, 1.2.1 and 1.5.1 to prepare a report to each meeting of the COP on the progress in monitoring of migratory species, and the outstanding monitoring priorities.	ScC15 Progress reported to COP9 ScC17 Progress reported to COP10	1.6
1.5.5	Identify experts on migratory species who could be included on the CBD roster of experts, to aid development of indicators.	ScC13 Experts identified	1.3, 1.6
1.5.6	Organize a technical workshop or commission a study to examine migratory species as indicators, as a contribution to the CBD work programme on indicators (Action 9.4 of CMS-CBD JWP).	ScC14 Workshop organised and results reviewed	1.3, 1.6
1.5.7	From a candidate list of indicators identified in 1.5.6 (including Appendix I species, marine / coastal / terrestrial / freshwater species, threats), select and develop 1-3 SIMPLE indicators of the status of migratory species, as a contribution to WSSD targets and to support a CMS bid for Action Funds.	ScC15 Draft indicators submitted to COP9 with Rec.	1.3, 1.6
1.6	Contribute to an effective CMS Information Management System		
1.6.1	Prepare guidance for the Secretariat on the Scientific Council's requirements from the proposed CMS Information Management System, and review effectiveness of the IMS once it has been established.	ScC14 Define ScC requirements from CMS Information Management System (IMS) ScC16 Review effectiveness of CMS-IMS	1.8

CMS STRATEGIC PLAN OBJECTIVE 2			
TO ENSURE THAT MIGRATORY SPECIES BENEFIT FROM THE BEST POSSIBLE CONSERVATION MEASURES			
No.	Scientific Council Action	Indicators, Milestones	Strategic Plan Target
2.1	Ensure the best possible conservation measures for endangered migratory species with regard to Appendix I		
2.1.1	Support Contracting Parties (particularly developing countries) to prepare and submit standard proposals for listing of species that are on the <i>ScC Appendix I Candidate List</i> , using CMS-IMS, GROMS and IUCN Red Lists as information resources.	ScC15 Listing proposals reviewed/submitted to COP9 for >50% of species on List ScC17 Listing proposals reviewed/submitted to COP10 for >50% of species on List	2.1
2.1.2	Review Appendix I to identify any candidate species for de-listing. Formulate a proposal to the COP to remove these species from Appendix I.	ScC14 Results of review received, and list of species approved ScC15 De-listing proposals submitted to COP9	2.1
2.1.3	Submit a prioritised programme of Concerted Action recovery projects for Appendix I species to each meeting of the COP for funding, which meets priorities identified in scientific reviews or Action Plans. Where necessary, assistance should be provided, particularly to developing countries to prepare project proposals. Such proposals will only be considered if submitted for consideration at the previous inter-sessional meeting of the ScC.	ScC13 Prioritised list of proposals submitted to COP8 ScC14 Project proposals received for review ScC15 Prioritised list of proposals submitted to COP9 ScC16 Project proposals received for review ScC17 Prioritised list of proposals submitted to COP10	2.2, 2.3, 2.4
2.1.4	Continue to support Concerted Actions for Appendix I species, even if these are covered by an Agreement, through joint work plans with the relevant Agreement secretariats.	ScC13 Rec. to COP8 for cooperation mechanism ScC14 Work plans for cooperation between ScC and Agreement Secretariats determined ScC16 Achievements reviewed	2.2, 2.3, 2.4
2.2	Ensure the best possible conservation measures for migratory species with an unfavourable conservation status (Appendix II species (Art. IV))		
2.2.1	Support Contracting Parties (particularly developing countries) to prepare and submit standard proposals for listing of species that are on the <i>ScC Appendix II Candidate List</i> , using CMS-IMS, GROMS and IUCN Red Lists as information resources.	ScC17 Listing proposals reviewed and submitted to COP10 for >50% of species on List	2.1
2.2.2	Review Appendix II to identify any candidate species and group species for de-listing. Formulate a proposal to the COP to remove these species from Appendix II.	ScC14 Results of review received and list of species approved ScC15 De-listing proposals submitted to COP9	2.1
2.2.3	On the basis of the reviews conducted in 1.2.1 and an analysis of gaps from the <i>CMS Appendix II Agreements and MOUs Table</i> , submit prioritised recommendations to meetings of the COP for new Cooperative Actions to be developed through CMS. For reasons of efficiency, Cooperative Actions should usually encompass large terrestrial and marine regions (both within and beyond the limits of national jurisdiction) and multiple species, and may include multi-taxa Agreements. Where appropriate, the Scientific Council should recommend appropriate partnership arrangements for such Cooperative Actions.	ScC15 Rec. submitted to COP9 considered and approved ScC17 Rec. submitted to COP10 considered and approved	2.5

2.2.4	Provide the scientific leadership to the development of priority new CMS Agreements and Cooperative Actions identified in the <i>CMS Appendix II Agreements and MOUs Table</i> , through appointment of focal Councillors, inception workshops, project funding proposals etc.	ScC15 Programme of inception activities agreed for list to be approved at COP9 ScC16 Progress reviewed ScC17 Programme of inception activities agreed for list to be approved at COP10	2.5
2.3	Ensure the best possible conservation measures are taken to control, remove and mitigate the major threats to migratory species, including habitat loss		
2.3.1	On the basis of 1.3.1 – 1.3.7, and using examples of best practice, prepare (or make available existing) guidelines to control or mitigate the impacts from major threats to migratory species, for dissemination to Contracting Parties.	ScC15 Guidelines on climate change, hunting, by-catch and barriers to migration submitted to COP9 ScC17 Guidelines on habitat loss and pollution/disease/alien species submitted to COP10	2.6
2.3.2	Through the implementation of Concerted Actions, promote the protection of sites identified under 1.3.7, and their management and restoration to favour their recovery.	ScC15 Rec. submitted to COP9 identifying unprotected sites ScC17 Rec. submitted to COP10 identifying unprotected sites	2.3, 2.4, 2.7
2.3.3	Through the implementation of Agreements, Cooperative Actions, and synergy/partnerships with other Conventions (particularly CBD, Ramsar and the Convention to Combat Desertification), ensure that programmes are developed to restore, sustainably manage and where appropriate link the sites and habitats for migratory species identified in 1.3.8, using the principles of ecosystem management.	ScC15 Adequacy of measures determined in reviews under Activity 1.2.5 Rec. submitted to COP9 identifying priorities for daughter Agreements and synergy with other conventions	2.5, 2.7
2.3.4	Review the existing international guidance on environmental impact assessment, identify gaps in relation to migratory species interests and if necessary develop further guidance relating to migratory species issues for consideration and possible adoption by COP8 (Res.7.2).	ScC13 Results of review considered and Rec. submitted to COP8 ScC17 Progress reviewed	2.6, 2.8
2.3.5	Develop guidance and formalise a mechanism for rapid CMS action and advocacy in response to emergency and non-compliance situations (eg pollution incidents, epidemics, detrimental taking of endangered species), using experience from previous arrangements (eg Monk Seal).	ScC13 Mechanism identified and proposed to COP8 ScC17 Progress reviewed	2.6
2.3.6	Recommend to the COP or to the Standing Committee, as appropriate, concerted measures to be taken by Parties in respect of by-catch of seabirds, marine turtles and cetaceans listed in Appendices I and II (Res.6.2, and see Rec. 7.2).	ScC15 Concerted measures proposed to COP9 based on review in Activity 1.3.3 ScC16 Progress reviewed	2.6
2.3.7	Consider the role CMS may play in addressing oil pollution and migratory species by reviewing existing plans and provisions to address oil pollution; and similarly, reviewing existing relevant programmes for training and information exchange (see Res.7.3).	ScC17 Mechanism identified and proposed to COP10	2.6
2.3.8	Review the issue of the use of tracking devices with endangered migratory species including the Guidelines already developed by the Scientific Council, and review further issues that may arise concerning such techniques at every second inter-sessional meeting.	ScC14 Guidelines approved/circulated ScC17 New issues reviewed	1.6
2.3.9	Support implementation of the recommendations from 1.3.5 on obstacles to migration by preparing guidelines for remedial measures, and by gathering and disseminating the results of case studies.	ScC15 Guidelines submitted to COP9	2.6
2.3.10	Assess existing and potential threats from wind turbines in relation to migratory mammals and birds, including their habitats and food sources, to develop specific guidelines for the establishment of such plants and to report to COP8 (see Res.7.5).	ScC13 Threats assessed and guidelines submitted to COP8 ScC16 Guidelines reviewed	1.4, 2.6

CMS STRATEGIC PLAN OBJECTIVE 3

TO BROADEN AWARENESS AND ENHANCE ENGAGEMENT IN THE CONSERVATION OF MIGRATORY SPECIES AMONGST KEY ACTORS

			Strategic Plan Target
No.	Scientific Council Action	Indicators, Milestones	
3.1	Disseminate information on migratory species so as to enhance their conservation, through improved decision-making and greater public awareness		
3.1.1	Advise the CMS Secretariat on the (scientific / technical) contents of an Information Pack to be provided to all Contracting Parties and Scientific Councillors, particularly concerning actions required for Appendix I species.	ScC14 Advice completed	3.1, 3.2, 3.6
3.1.2	Identify flagship species that CMS could use to raise public/ government awareness and capacity (eg satellite tracking of turtles and by-catch).	ScC14 Flagship species identified ScC16 Progress reviewed	3.1, 3.2, 3.6
3.1.3	Review and suggest materials for addition to the CMS web site.	ScC14 Advice completed ScC16 Progress reviewed	3.1, 3.2, 3.4, 3.5

CMS STRATEGIC PLAN OBJECTIVE 4

TO REINFORCE CMS's OVERARCHING AND UNIFYING ROLE IN THE CONSERVATION AND MANAGEMENT OF MIGRATORY SPECIES

			Strategic Plan Target
No.	Scientific Council Action	Indicators, Milestones	
4.1	Ensure maximum efficiency through synergy and close cooperation with daughter Agreements, other MEAs and other appropriate bodies		
4.1.1	Maintain close cooperation with scientific focal points and committees of daughter Agreements, regional initiatives (particularly in the marine environment), and the Scientific bodies of UNEP and other conventions (particularly with regard to synergistic actions and cross cutting issues (Research, monitoring, capacity building, addressing threats, recovery actions for Appendix I species etc.)). This will be achieved through cross-representation on appropriate bodies, periodic meeting of Chairs, cross-reporting and joint activities.	ScC14 Focal points and mechanisms for cooperation agreed ScC15 Progress reviewed and Rec. submitted to COP9 ScC17 Progress Reviewed and Rec. submitted to COP10	4.2, 4.4
4.1.2	Review existing scientific links between the CMS and other bodies undertaking work on threats to migratory species (eg. CBD, Ramsar Convention, Climate Change Convention, Convention to Combat Desertification). Formulate proposals for improving and strengthening such links where necessary with the objective of ensuring that the CMS has access to the most up to date scientific information available to assist and inform its deliberations; report conclusions and make recommendations to the meeting of the COP.	ScC14 Review of existing links received, and options for improvement formulated ScC15 Rec. submitted to COP9	1.8. 4.3

CMS Scientific Council 13, Nairobi, Kenya
Friday 18th November 2005

Lesser White-fronted Goose (*Anser erythropus*): recommendation from the Scientific Council on unresolved issues

As noted in paper ScC.13/ Doc.9, produced for the Scientific Council, a workshop was held in Lammi, Finland, in April 2005 at which participants with a deep interest and involvement in the conservation of the Lesser Whitefront agreed to request the opinion of the Council on a number of issues, which have for some time seriously divided conservationists interested in a better future for this species.

In addition to the Council paper, also needing to be taken into account are the numerous representations that have been received by the CMS Secretariat from interested bodies and individuals as well as an independent review obtained by the CMS Secretariat from a professional population geneticist. (A list of these is given in Annex 1.)

At the 13th Meeting of the Scientific Council, consideration of this issue began with an introduction to the background by the CMS Secretariat. The Technical Officer of the African-Eurasian Waterbird Agreement then gave more detail of the history of efforts to conserve the species, including the introduction into the wild of birds of captive-bred origin. Further comments were then made by Scientific Councillors, some from the Range States directly involved, others not. In order for the Scientific Council to make progress and attempt to comment meaningfully on the key issues, the Chairman of the Scientific Council requested that the Appointed Councillor for Birds should make a review, concentrating in particular on drawing out the views of Councillors from Range States other than those involved in the intense discussions which have been going on surrounding this bird. Sweden was one of the Range States in the latter category.

The Councillor for Birds spoke to several Councillors, and was approached by others. A small working group assisted with identifying the key issues and determining the possible position of the Scientific Council.

It should be stated from the outset that some difficult and complex issues are involved in the conservation of the species. In some cases, a clear and undisputed scientific answer to a particular question does not appear possible, at least currently. Where such is the case, it has seemed appropriate to take a cautious approach, however always bearing in mind that the passage of time is an important consideration in the conservation of this particular species.

There is no doubt of the genuine intentions of the individuals on all sides of the argument. Indeed, it is the deeply held concern for the conservation of the species that has made for much of the controversy in the case. Nor is the scientific and professional integrity of those involved doubted. However, opinions of those involved do differ, and the Scientific Council is being asked to make decisions among them: this we do in good faith.

Our first conclusion is that it is desirable to have a wide genetic diversity among wild Lesser Whitefronts. We have read the arguments, and taken into consideration the known wintering ranges of the populations, and there appears to be no undisputed answer at present to the question of whether the Fennoscandian population (as represented by the birds breeding in Norway) is genetically distinct from the nearest breeding birds to the east, in northern Russia. Given the uncertainty, we take the cautious approach that there might be a potentially valuable genetic distinction, and that we should not deliberately interfere with it (for instance, by boosting the Fennoscandian population with wild birds from elsewhere), unless or until such interference may become inevitable.

Our second conclusion is that given the small size of the wild Fennoscandian population, if possible, a captive breeding population of birds from this source should be established and maintained as a priority. We recognise that there are risks involved in taking eggs and/or young birds from the wild population, but that careful use of a known surplus (that is, those birds that would have died or been killed in their first winter) may be a practical conservation option.

We consider that every effort should be made to conserve the Fennoscandian birds down their traditional migration routes into south-eastern Europe and the Caspian/Central Asian region. We recognise that this is a major challenge. We endorse the current LIFE project that aims to safeguard the birds and their habitats along the western route. It is our opinion that all appropriate efforts should also be made to conserve the wild populations of the species in its other flyways.

We also consider that doubts do remain about the genetic make-up of the existing free-flying birds, originally introduced into the wild in Fennoscandia, and which winter in the Netherlands. It does seem to us that not all, but a large part, of the scientific community will never be completely satisfied concerning the level of genetic contamination from the Greater White-fronted Goose *Anser albifrons* and other species, which many will regard as impossible to eliminate. Despite genuine efforts to improve the genetic purity of existing captive flocks, we consider that these flocks are not to be regarded as potential sources for release to the wild.

Given the possibility that the above mentioned free-flying birds, or their descendants, may pose a risk to the genetic make-up of the wild Fennoscandian population, the Scientific Council is of the opinion that these birds should be caught or otherwise removed from the wild. We do not say this lightly, nor underestimate the practical and other difficulties involved. We recommend that a feasibility study be undertaken as a matter of urgency.

We believe that there is nothing against establishing a group in captivity of purebred Lesser Whitefronts from the wild, western Russian stock, and it may well prove valuable to have such a group in the future. However, we do not believe that it is appropriate to release such birds to the wild now or in the immediate future.

For the present, we do not support the introduction of Lesser Whitefronts into flyways where they do not occur naturally. We have borne in mind the powerful argument concerning the improved safety of birds in these flyways, as well as practical considerations, such as current proposals that could quickly be put into effect. However, we consider that modifying the natural behaviour of Lesser Whitefronts in this respect, as well as unknown ecological effects in the chosen new flyways, and other such considerations, make this technique inappropriate until such time as it may become essential, particularly when major disruption or destruction occurs of key components of the natural flyways. We do not believe that to be the case at present.

We give due weight to arguments about the continuing decline of the very small Fennoscandian population, and to the estimates of how long it may continue to be viable, but we are not persuaded that such a fact alone is enough to justify radical action.

We consider that it would be appropriate to re-examine the issues once more in five years.

The conclusions set out above were approved by consensus at the Scientific Council meeting, on Friday 18th November 2005. The Chairman of the Scientific Council undertook to transmit them to those who had raised the matter with the Council.

ATTACHMENT

List of representations that have been received by the CMS Secretariat (1-13):

1. Comments from Dr. Johan H. Mooij on the Scientific Council paper ScC.13/ Doc.9.
2. Comments from Prof. Dr. Juha Merila, Petteri Tolvanen, and Dr. Minna Ruokonen on the Scientific Council paper ScC.13/ Doc.9.
3. Comments from Morten Ekker, Dr. Ingar J. Oien, and Tomas Aarvak on the Scientific Council paper ScC.13/ Doc.9.
4. Information on the conservation genetics of the Lesser White-fronted Goose by Dr. Minna Ruokonen and Anna-Carin Andersson.
5. Ruokonen, M., L. Kvist, H. Tegelstrom & J. Lumme (2000). Goose hybrids, captive breeding and restocking of the Fennoscandian populations of the Lesser White-fronted Goose (*Anser erythropus*). *Conservation Genetics* 1: 277-283.

6. Ruokonen, M., L. Kvist, T. Aarvak, J. Markkola, V. Morozov, I. J. Oien, E. Syroechkovsky Jr., P. Tolvanen & J. Lumme (2004). Population genetic structure and conservation of the Lesser White-fronted Goose (*Anser erythropus*). *Conservation Genetics* 5: 501-512.
7. Ruokonen, M., A-C. Andersson & H. Tegelstrom (manuscript). Using historical captive populations in conservation of currently threatened species. The case of the Lesser White-fronted Goose.
8. Report 2001/2002: Analyses of the captive populations of the Lesser White-fronted Goose, by Dr. Marina V. Kholodova.
9. Review on the genetics of the Fennoscandian population of the Lesser White-fronted Goose, by Dr. Johan H. Mooij in cooperation with Prof. Dr. Allan Baker and Prof. Dr. Michael Wink.
10. A new migration route for the Lesser White-fronted Goose, presentation by Dr. Johan H. Mooij at the workshop in Lammi, Finland, April 2005.
11. Protection of genetic biodiversity – conservation and management units with special reference to the Lesser White-fronted Goose, presentation by Prof. Dr. Juha Merila at the workshop in Lammi, Finland, April 2005.
12. Recommendations for a reintroduction program of Lesser White-fronted Geese *Anser erythropus*: A genetic perspective, information by Prof. Dr. Michael Wink.
13. Comments on the genetic issues related to the new Action Plan for the Lesser White-fronted Goose, independent review by Dr. Robert C. Lacy.

REPORT OF THE WORKING GROUP ON BIRDS

The Working Group met in three sessions on one day, and was attended by some 30 Scientific Councillors and observers. The meeting was chaired by the Appointed Councillor for Birds, and followed the format provided in advance by the Secretariat: this was felt to be a useful tool, and is reflected in the headings below.

Proposed amendments to the Appendices

For Appendix I, the Working Group considered seven proposals, which had been duly submitted by the governments of Argentina, Kenya, Spain and the UK. Each species was discussed individually. It was decided to support the addition of the following species (in systematic order): Henderson Petrel (*Pterodroma atrata*), Balearic Shearwater (*Puffinus mauretanicus*), Madagascar Squacco Heron (*Ardeola idae*), Red Knot (*Calidris canutus rufa*), Basra Reed Warbler (*Acrocephalus griseldis*) and Spotted Ground Thrush (*Zoothera guttata*). The conservation status of another species, Maccoa Duck (*Oxyura maccoa*) appeared unclear, and a subgroup was formed to elucidate this, made up of delegates from Kenya, the AEWAs Secretariat, and Wetlands International, together with the Appointed Councillor. Using the latest available data, the subgroup determined that the species was on the borderline of Vulnerable status. It was therefore decided not to proceed with the proposal to list on Appendix I. It was noted that the species is the subject of a forthcoming action plan under the auspices of AEWAs, which should ensure that appropriate conservation attention is focused on it. The Council may wish to review the situation at its next meeting.

For Appendix II, the Working Group considered nine proposals, which had been duly submitted by the governments of Kenya and Paraguay, and all were supported. They are:

Rock Pratincole (*Glareola nuchalis*), African Skimmer (*Rynchops flavirostris*),
Strange-tailed Tyrant (*Alectrurus risora*), Cock-tailed Tyrant (*Alectrurus tricolor*),
Chestnut Seedeater (*Sporophila cinnamomea*), Grey-and-chestnut Seedeater (*Sporophila hypochroma*),
Marsh Seedeater (*Sporophila palustris*), White-collared Seedeater (*Sporophila zelichi*)
and Saffron-cowled Blackbird (*Agelaius flavus*).

New Project Proposals

The Working Group examined twelve proposals. Four of these were carried over from the twelfth meeting of the Scientific Council; four others had been provided to the Secretariat and were included in ScC.13.Doc.5; a single written proposal had been submitted separately; and three proposals were made for the first time at the Working Group meeting. The Working Group had been asked to prioritise proposals, and after discussion, came to the following conclusions. The first priority should go to the species outstanding from the last meeting of the Council, and listed in its report (Annex 9). These are projects relating to the following species: *Brotogeris pyrrhopterus*, *Acrocephalus paludicola*, and *Larus audouinii* (for that portion of the project still remaining incomplete). From the same list, *Larus atlanticus* was still given priority, but it was felt that a higher priority should go to two projects in ScC.13 Doc.5, one on *Chloephaga rubidiceps* and one on *Calidris canutus rufa*. Councillors gave a high priority to the separately submitted project on Appendix I species in Macedonia, and to two submitted on the day – one on the Middle European population of *Otis tarda* and one on monitoring of waterbirds. The other projects submitted were of a gratifyingly high standard, but were allocated a lower priority at this time.

Potential new agreements

It was decided to propose to the Conference of the Parties that two Agreements should be developed, one on Grassland Birds in South America, and one on the three Andean flamingo species (*Phoenicopterus andinus*, *Ph. chilensis* and *Ph. jamesi*). A subgroup made up of Councillors from the Range States met to draft appropriate Recommendation text.

Proposals for new Concerted Action species

Councillors agreed to propose that *Puffinus mauretanicus* and *Calidris canutus rufa* be added to the list of species for Concerted Action.

Review of existing Concerted/Cooperative Actions

The Working Group received updates on twelve Concerted Action species; two of these had been previously submitted in writing, and ten were presented at the meeting. The following is a brief summary of these updates. In each case, more information may be obtained from the person named in brackets.

Siberian Crane *Grus leucogeranus* (Lyle Glowka, Secretariat): progress with the species continues to be pleasing, with all Range States of the species now involved. The Fifth Meeting of Range States took place in Moscow in April 2004, and resulted in the adoption of revised conservation plans for the western, central and eastern populations. A meeting in New Delhi in June 2005 endorsed the proposed Western/Central Asian site network for the species. The next meeting of the Range States is expected to be held at about the end of 2006.

Andean Flamingos *Phoenicopterus andinus* and *Ph. jamesi* (Roberto Schlatter): for some ten years, Argentina, Bolivia, Chile and Peru have been cooperating to study the distribution of these species in the *altiplano*. Among more recent initiatives has been a meeting in Salta, Argentina. We now have a clear idea of populations, their distribution and movements. The Focal Point was not aware of progress on the long-proposed MoU on the species. In discussions that followed, Councillors from Range States showed enthusiasm for an MoU, and were supported by comments from the Secretariat. An early breakthrough is a possibility.

Ruddy-headed Goose *Chloephaga rubidiceps* (Daniel Blanco): a written report had been received. From this report, the Focal Point drew attention to the known decline in the Fuegian population of the species between 1999 and 2003, with about one thousand birds involved. Only low numbers had been noted in surveys in July 2005. On the breeding grounds the problem of predation by grey foxes remained, and in winter hunting for sport and species-control was the main problem. Even where birds are legally protected, they may be killed when they flock with other, quarry, species. Attempts to regulate this hunting continue, including by the dissemination of information in the press. Contacts with private landowners and key government officials also continue. An MoU is still not signed; indeed, it remains at a first-draft stage. Argentina has written to the government of Chile on the subject, and an answer is awaited.

Great Bustard *Otis tarda* (Attila Bankovics): the Focal Point presented a picture of the latest situation in Hungary, where the population is slightly increasing overall (though some smaller sub-populations are decreasing). A 2005 census showed that the two main sites in Hungary held a total of some 888 birds between them, out of a national total of 1272. A significant LIFE project started in Hungary last year. The Focal Point also reported on the first Meeting of the Parties to the MoU on the species, which was held in Austria in September 2004. This was a successful meeting, with 11 of the 12 signatory states present. The Focal Point outlined the situation in each of these countries as reported to the meeting.

Slender-billed Curlew *Numenius tenuirostris* (Pierre Devillers): a written report from Dr Ken Smith, the Chair of the Slender-billed Curlew Working Group, had been produced as ScC.13/Doc.11. Among other matters of interest, it notes that a satellite transmitter, weighing only 12 grams, has been successfully carried by a Whimbrel *Numenius phaeopus* for several months and over long migration distances. This bodes well for tracking of the similar-sized Slender-billed Curlew if a suitable bird or birds can be found and caught.

Lesser Kestrel *Falco naumanni* (Pierre Devillers): active work on the species is progressing in Spain and elsewhere, but there is nothing of special moment to report at this meeting of the Council.

Aquatic Warbler *Acrocephalus paludicola* (John O'Sullivan): This has been a very active three-year period for the species. In April 2003, a Memorandum of Understanding was concluded, with an associated Action Plan, and came into immediate effect. As we go into COP8, the twelfth Range State (of fifteen) is expected to sign the Agreement. In April 2004, came the appointment of the BirdLife/CMS Aquatic Warbler Conservation Officer (AWCO), based in the offices of the BirdLife Partner in Minsk. The new officer has been very active, and with the support of the international Aquatic Warbler Conservation Team and the RSPB (BirdLife in the UK) has produced the first edition of a printed newsletter and launched a very useful website. The AWCO was also active,

with others, in securing a EU LIFE project that commits €5.4 million to the conservation of the species in Poland and Germany. Thanks are due to the UK government for funding work by the RSPB and BirdLife Partners in West Africa that attempts to identify the wintering grounds of this bird using innovative techniques involving stable isotopes. Results to date suggest that the birds use the Niger floodplain belt of the Sahelian zone (for more information, see CMS/Inf. 8.27). The First Meeting of the Parties to the Memorandum of Understanding on the Aquatic Warbler is planned for 2006.

White-headed Duck *Oxyura leucocephala* (John O'Sullivan): this Endangered species has declined very rapidly and by about 60% in the last ten years. It continues to be severely threatened by drainage of its habitat, pollution and, in some parts of its range, drought. The eradication of the UK population of the introduced *Oxyura jamaicensis* is needed in order to stop birds bred there from hybridising with the Spanish breeding population of *leucocephala*. In October 2005, the UK announced a £3.3m project to eradicate *jamaicensis*, which is expected to begin immediately. A status overview and recommendations for the Central Asian population was completed in 2003. A single species Action Plan was completed in 2005. The movements of the species are poorly known and conservation measures needed include survey of breeding and wintering grounds and migration sites, particularly winter surveys, and the protection of key sites. Measures are also needed to alleviate hunting pressure and to ban lead shot throughout its range. Drowning in fishing nets has also been identified as a problem.

Lesser White-fronted Goose *Anser erythropus* (John O'Sullivan): in attempts to conserve this species over many years, a crucial missing element in our knowledge has been where the main western population winters on leaving sites in Kazakhstan. Unfortunately, repeated attempts to catch the birds in Kazakhstan in order to attach satellite transmitters proved unsuccessful. However, in summer 2004, three birds were caught on their breeding grounds in the northern Urals of Russia and fitted with transmitters. Very remarkably, one of these birds was then successfully tracked for over a year, as it migrated south, wintered, and returned north in 2005 to the very area where it had bred the year before. Much useful information was added to our understanding, particularly as the bird was tracked through Kazakhstan, Azerbaijan, Armenia, Iran, Turkey and finally Iraq, where it spent December to March, before beginning its journey north once more. It is not surprising that, moving so much, over such vast areas, these geese are subject to great pressure from legal hunting (when they are mistaken for legitimate quarry), as well as indiscriminate hunting and poaching. This is seen as the greatest threat to the survival of the species. A EU LIFE project (2005) aims to identify the most important breeding areas in Lapland and secure them, and to track migrating geese to discover any hitherto unknown foraging/staging points, as well as restoring staging points in Estonia and safe foraging areas in Hungary. A single species Action Plan for the species is currently being elaborated by BirdLife International. Comment from the Scientific Council is needed on particular aspects of the conservation of this species: details are given in ScC.13/Doc.9.

Ferruginous Duck *Aythya nyroca* (Otars Opermanis): a final version of the single species action plan was prepared (covering the global range of the species) based on an international review of the species. Both papers were drafted by BirdLife International with financial support from CMS and AEW. Within the European Union, this a priority species; it is important to ensure that new EU member states propose sites holding populations as Natura 2000 sites. The overall decline of European population (over 30% during 1990-2000) could warrant an upgrading the species from the Near Threatened category, but it appears at present that this will not be done in IUCN's 2005 revision. Western and central Asia seems to have significant populations, if not the majority of the global population, but trends are poorly known there. In spring 2005, BirdLife International attempted to clarify status of non-European populations through the Threatened Bird Forum in the Internet, where potential data holders were asked to share information. The responses, from a very wide geographical area, showed that in general the species' habitats are of poor quality and populations are declining. Some respondents were concerned that the Asian population could be over-estimated because estimations are based on irregular counts in different countries, years and periods, or extrapolations based on poor data. There is a need for funds to organise additional information collection campaigns or site surveys in Asia. Hundreds of wintering birds were found in Syria (February 2004) and the first proven breeding record has been made in Cyprus (one pair).

Humboldt Penguin *Spheniscus humboldti* (Acero Villanes): in 2004, as part of a project that is still going on, the status of the species along the Peruvian coast was evaluated. It has become clear that illegal hunting and habitat destruction both represent serious threats to the species. At present, the only area offering a relatively high level of protection is the reserve at Paracas, Peru. The species has been the subject of a targeted public awareness campaign in the years 2003-5.

A PowerPoint presentation by Mr Simba Chan of BirdLife International updated Councillors on three species

added to the list of Concerted Action Species at COP7, *Platalea minor*, *Eurynorhynchus pygmeus*, and *Sterna bernsteini*. All three were the subject of Action Plans now in preparation, for which project funding had been allocated by CMS, and which are expected to be completed by the end of 2006. This activity might well have the additional benefits of leading to the conservation management of the habitats of other species in Eastern Asia, and of spreading the word about the value of CMS in the region. In the discussion that followed the presentation, the possibility of a Memorandum of Understanding for one or more of these species was suggested as worthy of exploration.

The Focal Point councillors for the following Concerted Action species were not present at the Working Group and thus unfortunately no updates were presented: Houbara Bustard *Chlamydotis undulata*; White-winged Flufftail *Sarothrura ayresi*; Blue Swallow *Hirundo atrocaerulea*.

A discussion was held on proposed changes to the list of Focal Points for Concerted Action species. Spain offered to take on the role for *Oxyura leucocephala*, and Councillors accepted with thanks. With regard to the three Asian species added at COP7, it was decided to await the appointment of a replacement Councillor for Asiatic Fauna before suggesting names.

The Working Group received four updates on Cooperative Action species, all presented at the meeting. An earlier presentation by Barry Baker on the considerable activity being undertaken by the ACAP for albatrosses and petrels was noted. There was little new to report on Corncrake *Crex crex* or Quail *Coturnix coturnix*. Roberto Schlatter reported that there had been no Cooperative Action for the Black-necked Swan *Cygnus melanocorypha* in the Neotropic region. A total population assessment is still lacking, in particular for Argentina. In Chile, the former situation of an increase in population has been stopped owing to the destruction of the species' main breeding site in the Carlos Anwandter Nature Sanctuary, near Valdivia. This was caused by contamination of water and vegetation by pulp mill effluent. A breeding population of 500 pairs has been lost, and the status of the species in Chile remains Vulnerable. In the absence of a Focal Point, no report was made on African Penguin *Spheniscus demersus*.

Rapid Reviews of Concerted Action Species

The Working Group examined the Birds section of the draft document. Several Councillors noted the potential value of the document, but pointed out that new data were available in many cases. It was agreed to seek effective ways to ensure the updating of the document.

REPORT OF THE WORKING GROUP ON TERRESTRIAL MAMMALS

Discussion and evaluation of relevant proposals for amendment of appendices

Appendix I

Gorilla gorilla: (proposal I/1)

The Mountain Gorilla, *Gorilla gorilla beringei*, is listed in CMS Appendix I. The proposal is for extension of that listing to the entire genus, included under *Gorilla gorilla* in the CMS taxonomic reference, Wilson and Reeder, 1993. The working group recommends endorsement of the proposal.

Cervus elaphus bactrianus, the Bukhara Deer: (proposal I/3)

The Bukhara Deer is one of the priority target species of the proposed Central Asian and Caucasian mammals Concerted Action. The working group recommends endorsement of the proposal.

Appendix II

Miniopterus schreibersii (African populations), Schreiber's bent-winged Bat: (proposal II/ 1 (a,b)
Otomops martiensseni (African populations), the Large-eared Free-tailed Bat or Giant Mastiff Bat;
 (proposal II/2 (a,b)
Eidolon helvum (African populations), the Straw-coloured fruit bat; (proposal II/ 3 (a,b)

The three species are considered for a Cooperative Action on African bats. The working group recommends endorsement of the proposal.

Cervus elaphus bactrianus (proposal II/6)

The Bukhara Deer component of the proposed Concerted Action on Central Asian and Caucasian Mammals may involve conclusion of an Agreement. In that light, double listing is useful. The working group recommends endorsement of the proposal.

New project proposals

Central Asian and Caucasian mammals

It is a proposal of funding of the initial phase of the proposed new Concerted Action on Central Asian and Caucasian mammals. The proposal, its content and level of funding were approved by ScC12. The working group recommends confirmation of that endorsement, as priority 1 for Terrestrial Mammals and with the level of funding indicated (100.000 \$, of which 25.000 \$ contributed by collaborating institutions).

Sahelo-Saharan Antelopes

It is a proposal of continued support for the Sahelo-Saharan Antelopes Concerted Action. The proposal, its content and level of funding were approved by ScC12. The working group recommends confirmation of that endorsement, as priority 2 for Terrestrial Mammals and with the level of funding indicated (25.000 \$). The Working Group has noted and endorsed a proposal by the Scientific Councillor for Morocco and Algeria to devote additional funds to a guided development of the reintroduction strategy in Range States of the SSA Concerted Action that have already been operative in the field for a substantial amount of time. It was suggested that these funds maybe available within existing contributions of partners of the SSA Concerted Action. If not, it was agreed that they should be provided by CMS.

Conservation and monitoring measures for Bukhara Deer

It is a proposal to fund activities in favour of the Bukhara Deer, one of the species covered by the proposed new Concerted Action on Central Asian and Caucasian mammals. The Working Group supports the principle of the proposal, but recommends delaying discussion of detailed content and level of funding until more information is

available on operational plans, involvement of Range States and integration within the proposed Concerted Action.

Bilan des espèces migratrices de chauves-souris en Côte d'Ivoire

It is proposed to conduct a review of the status of bats in Ivory Coast as a preliminary to further action. The Working Group supports the proposal, as priority 3 for Terrestrial Mammals and with the level of funding more compatible with the exploratory nature of the project, i.e. 10.000 \$. The Working Group recommends that Côte d'Ivoire takes the lead in implementation of the project, but extends its scope to other African States. It also recommends that preparations for a regional workshop, destined for raising awareness within governments, be included in the work.

Proposals for new Concerted/Cooperative action species

The Working Group proposes that the COP be asked to take the resolutions and recommendations necessary to formally establish a new Concerted Action for Central Asian and Caucasian mammals, and a new Cooperative Action for African Bats.

The proposed Concerted Action on Central Asian and Caucasian mammals is briefly described and situated within the broader concept of the arid land strategy of the Convention, in Annex 1 of this report. Its initiation requires the placement or confirmation on the Concerted Action species list of *Camelus bactrianus*, *Bos gruniens*, *Uncia uncia*, and, subject to the decision of the COP on inclusion in Appendix I, *Cervus elaphus bactrianus*. A Cooperative Action should be associated with the Concerted Action, to cover the target species presently on Appendix II. Species to be included in the Cooperative Action list for that purpose are *Equus hemionus* (s.l), *Gazella subgutturosa*, *Procapra gutturosa* and *Saïga tatarica tatarica*. As part of the first phase of the Concerted Action, proposals will be developed to include other target species in Appendix I or Appendix II and on the corresponding Concerted Action and Cooperative Action species lists.

The proposed African Bats Cooperative Action necessitates the placement on the Cooperative Action species list of *Miniopterus schreibersii* (African populations), *Otomops martiensseni* (African populations) and *Eidolon helvum* (African populations), subject to the decision of the COP regarding their inclusion in Appendix II.

The Working Group recommends the extension of the Sahelo-Saharan Antelopes Concerted Action to other species of migratory large mammals occurring within the range, in particular the Saharan Cheetah. This will require the preparation of new proposals for inclusion in Appendix I or Appendix II.

The extension of the Gorilla Concerted Action to *Gorilla gorilla* necessitates the replacement of *Gorilla gorilla beringei* by *Gorilla gorilla* on the Concerted Action species list, subject to acceptance by the COP of the change in Appendix I listing.

All other species presently on the Concerted Action list should be confirmed.

Review of existing Concerted/Cooperative actions

The Working Group reviewed existing Concerted and Cooperative Actions on Terrestrial Mammals, following the presentation of document Conf. 8.10.

The Working Group noted the good progress of the **Sahelo-Saharan Antelopes** Concerted Action. It indicated the desirability of extending it to other species within the Range, and the need for additional support.

The Group reviewed the encouraging results obtained on **Saïga Antelope**, and reiterated the importance of the species as a whole as one of the key elements of the Central Asian and Caucasian mammals proposed Concerted Action. The Group recalled the need to insure that activities in favour of the species be well integrated within the overall strategy of the Action.

The Working Group observed that actions in favour of the **Mongolian Gazelle** were planned within the Central Asian and Caucasian mammals proposed Concerted Action and noted that they would thus from the onset be totally integrated.

The Working Group discussed the present status of the **African Elephant** Cooperative Action. It noted the excellent progress of the West African component of the Action. It also noted that developments appeared possible in the Central African component of the Action. It encouraged the Focal Point Councillor to pursue his efforts in that respect and to choose the best available mechanisms for implementation of the Cooperative Action in Central Africa.

The Working Group noted and supported the current developments of the **Gorilla** Concerted Action.

The Working Group reviewed the status of the **Huemul** or **Southern Andean Deer**. There are assessment studies and surveys being carried out to follow up populations shared by Chile and Argentina. Some pairs have been translocated within Chile to a new habitat where the species was distributed in the past. Information and research is increasing, but no Concerted Action has been developed recently. Councillors and researchers from both countries are developing new projects hopefully under the umbrella of CMS.

Rapid reviews of Concerted Actions species

The Working Group did not find the report substantially improved from its previous submission at ScC 12. It thus reiterates its criticism and considers that the Rapid Review, although it constitutes an interesting concept, fails in its implementation to meet the needs of the Convention.

ATTACHMENT

CONCERTED ACTION ON CENTRAL ASIAN AND CAUCASIAN MAMMALS

Introduction

Arid lands and CMS

The development of the Sahelo-Saharan Antelopes Concerted Action has shown that the arid lands are a privileged domain of activity for CMS. The Convention has, over the years, acquired a considerable experience in addressing the highly specific requirements of their environment and their fauna. Moreover, it has held a unique position in that field, as most other organisations and funding agencies prefer to focus on biomes of higher biological diversity, such as tropical forests. The arid zones, though their species richness is comparatively low, harbour a number of highly emblematic, remarkably adapted species. Particularly remarkable is their array of large mammals, for the most part forced by the very nature of the resources they exploit to undertake migrations, often of a complex and atypical nature. The conservation and restoration of this unique fauna can be a major endeavour of the Convention.

The Arid lands of Eurasia and North Africa

Eurasia and North Africa are traversed by the largest and most complex continuous belt of arid lands on earth. It comprises an entirely interconnected ensemble of hot deserts, cold deserts, semi-deserts and sub-deserts steppes. Meaningful outer geographical limits can be drawn by including all lands with a phytomass of less than 50 tons per hectare (Walter and Breckle, 1999). Thus defined, the zone engulfs isolated islands of temperate, usually montane or sub-montane, non desert biomes. These are either entirely surrounded by deserts or are enclaved between them and the seas of southern temperate Eurasia and sub-tropical Western Asia. They should be included within the area of concern, as their mammalian fauna is either related to that of the surrounding arid land, or has been strongly influenced by the progression of the deserts and the resulting fragmentation and isolation of the enclaves.

A number of taxonomic groups have their main centre of occurrence in the old world arid lands and their associated enclaves, others are represented within the area by highly specialised species. Their representative species are however not often distributed over the entire belt of arid lands. This belt can be divided into three major sub-zones with contrasting climates and histories. **Zone I** includes the Sahara, the Sahel and Mediterranean enclaves of the Maghreb. **Zone II** includes the cold deserts and semi-deserts of Eurasia with Mediterranean, warm temperate and mountain enclaves of Anatolia and the Caucasus. **Zone III** covers the hot deserts of the Arabian

Peninsula and western Asia, with Mediterranean enclaves of the Levant and sub Sudanian enclaves of the southwestern Arabian Peninsula. The zonal occurrence of the most representative desert belt species is flagged below:

- Camels
 - *Camelus bactrianus (ferus)*, Bactrian camel, II
- Bovids
 - *Camelus bactrianus (ferus)*, Bactrian camel, II
 - *Gazella arabica*, Arabian gazelle, Ext., III
 - *Gazella bennettii*, Indian gazelle, III
 - *Gazella cuvieri*, Cuvier's gazelle, I
 - *Gazella dama*, Dama's gazelle, I
 - *Gazella dorcas*, I and III
 - *Gazella gazella*, Mountain gazelle, III
 - *Gazella leptoceros*, Rhim gazelle, I
 - *Gazella rufifrons*, Red-fronted gazelle, I
 - *Gazella rufina*, Red gazelle, Ext., I
 - *Gazella saudya*, Saudi gazelle, Ext., III
 - *Gazella soemmerringii*, Soemmerring's gazelle, I
 - *Gazella spekei*, Speke's gazelle, I
 - *Gazella subgutturosa*, Goitered gazelle, II and III
 - *Procapra gutturosa*, Mongolian gazelle, II
 - *Procapra picticaudata*, Tibetan gazelle, II, India, China
 - *Procapra przewalskii*, Przewalski gazelle, II, North China, non m, CR
 - *Pantholops hodgsoni*, Chiru or Tibetan Antelope, II
 - *Saïga tatarica*, Saïga antelope, II
 - *Capra caucasica*, West caucasian tur, II
 - *Capra falconeri*, Markhor, II
 - *Capra nubiana*, Nubian Ibex, I and II
 - *Hemitragus jayakari*, Arabian Tahr, III, UAE, Oman, EN
 - *Ammotragus laervia*, Barbary sheep, I
 - *Pseudois nayaur*: Bharal or Blue sheep, II
 - *Nemorhaedus goral*: Goral, II
 - *Bos grunniens (mutus)*, Yak, II
 - *Bos primigenius*, Aurochs, I, Ext.
 - *Oryx dammah*, Scimitar horned oryx, I, Ext.
 - *Oryx leucoryx*, Arabian oryx, II
 - *Addax nasomaculatus*, Addax, I
 - *Alcelaphus buselaphus*, Hartebeest, Extinct in zone I
- Equids
 - *Equus africanus*, African wild ass, I
 - *Equus przewalskii*, Przewalski horse, II, Ext., Reintroduced Mongolia
 - *Equus hemionus*, Khulan, II, Mongolia and China
 - *Equus kiang*, Kiang, II, India, China and Nepal
 - *Equus onager*, Onager, II and III, Iran, Turkmenistan and India
- Elephants
 - *Loxodonta cyclotis*, North African elephant, I, Extinct
- Cervids
 - *Cervus bactrianus*, Bukhara Deer, II
 - *Dama mesopotamica*, Mesopotamian Fallow deer, Ext. except Iran, III
- Carnivores (cheetahs, leopards, hyena, Gyr lion)
 - *Uncia uncia*, Snow leopard, II
 - *Panthera tigris virgata*, Caspian tiger, II
 - *Panthera pardus panthera*, I,
 - *Panthera pardus tulliana*, CR, II
 - *Panthera pardus jarvisi* (Ext.? Sinai), nimr, III
 - *Panthera leo leo*, Atlas lion, Ext., I
 - *Panthera leo persica*, Asian lion, II

- *Hyaena hyaena*, I,II and III
- *Acinonyx jubatus venaticus*, II, Iran, Egypt?, India Ext., raddei, Ext? Turkestan
- *Acinonyx jubatus soemmeringii*, I, Sudan, Nigeria, Somalia
- *Acinonyx jubatus hecki*, North-West Africa (Algeria)
- *Canis lupus campestris* (incl. desertorum, cubanensis), Steppe wolf, chanco, Mongolian wolf, II and III
- *Canis lupus arabs*, Arabian wolf, III
- *Canis lupus lupaster*, Egyptian wolf, I (Egypt, Lybia)

The three zones are sufficiently contrasted in terms of faunal affinities, ecological conditions and characteristics of human occupation to warrant separate though interconnected regional programmes. Zone I is already the object of a major effort of CMS. The present action is centred on Sahelo-Saharan Antelopes. It would probably be desirable to expand in the near future its species coverage to include the entire zonal mammalian fauna as outlined above. The principle of a second project, concerning Zone II, was proposed and endorsed by the Scientific Council at its 11th and 12th meetings. It is further outlined below. A project covering Zone III should be envisaged.

The Concerted Action on Central Asian and Caucasian Mammals

Potential target species

Scientific name	English name	IUCN Red List 2004	CMS listing
Carnivora: Felidae			
<i>Acinonyx jubatus venaticus</i>	Asiatic cheetah	CR	
<i>Panthera pardus saxicolor</i>	North Persian leopard	EN	
<i>Panthera pardus tulliana</i>	Anatolian leopard	CR	
<i>Panthera tigris virgata</i>	Caspian tiger	EX (most probably extinct)	
<i>Uncia uncia</i>	Snow leopard	EN	App.I
Perissodactyla: Equidae			
<i>Equus caballus przewalskii</i>	Przewalski's horse	EW (reintroduced)	
<i>Equus hemionus</i>	Mongolian kulan	VU for each of two subspecies	App.II as <i>Equus hemionus</i> s.l.
<i>Equus kiang</i>	Kiang	DD for each of two subspecies (one subspecies not listed)	App.II as <i>Equus hemionus</i> s.l.
<i>Equus onager</i>	Onager	CR for each of two subspecies	App.II as <i>Equus hemionus</i> s.l.
Artiodactyla: Camelidae			
<i>Camelus bactrianus</i>	Bactrian camel	CR	App.I
Artiodactyla: Cervidae			
<i>Cervus albirostris</i>	White-lipped deer	VU	
<i>Cervus elaphus affinis</i>	Shou	DD	
<i>Cervus elaphus bactrianus</i>	Bukhara deer	VU	
<i>Cervus elaphus wallichii</i>	Tibetan red deer	DD	
<i>Cervus elaphus yarkandensis</i>	Yarkand deer	EN	
Artiodactyla: Bovidae			
<i>Bos grunniens</i>	Yak	VU	App.I
<i>Capra caucasica</i>	West Caucasian tur	EN	
<i>Capra cylindricornis</i>	East Caucasian tur	VU	
<i>Capra falconeri</i>	Markhor	EN	
<i>Capra hircus aegagrus</i>	Western wild goat	VU	
<i>Capra hircus turkmenica</i>	Turkmenian wild goat	VU	
<i>Capra nubiana</i>	Nubian ibex	EN	
<i>Capra sibirica</i>			
<i>Gazella subgutturosa</i>	Goitered gazelle	NT	App.II
<i>Naemorhedus goral</i>	Goral	LR/nt	
<i>Ovis ammon</i>	Argali	VU (some subspecies EN or CR)	

Scientific name	English name	IUCN Red List 2004	CMS listing
<i>Ovis aries gmelini</i>	Armenian mouflon	VU	
<i>Ovis aries isphaganica</i>	Esfahan mouflon	VU	
<i>Ovis aries laristanica</i>	Laristan mouflon	VU	
<i>Ovis vignei</i>	Urial	Species not listed as a single entity, but VU or EN for each subspecies	
<i>Pantholops hodgsoni</i>	Chiru, Tibetan gazelle	EN	
<i>Procapra gutturosa</i>	Mongolian gazelle	not listed	App.II
<i>Procapra picticaudata</i>	Tibetan gazelle	not listed	
<i>Procapra przewalskii</i>	Przewalski's gazelle	CR	
<i>Pseudois nayaur</i>	Bharal, Blue sheep	not listed	
<i>Saiga tatarica</i>	Saiga antelope	CR	App.II (only <i>S.t.tatarica</i>)

Species already included in Appendix I can be formally listed for Concerted Action. Species included in Appendix II will be listed for an associated Cooperative Action. The formulation of the action will be conceived so as to take into account the other species from the onset and to formally include them in appendices as part of the implementation of the action.

Geographical scope

Parties and non-Parties on the territory of which the action will be conducted are China, Mongolia, Russia, Nepal, India, Pakistan, Afghanistan, Iran, Kazakhstan, Turkmenistan, Uzbekistan, Tajikistan, Kirghizstan, Azerbaijan, Georgia, Armenia, Turkey.

Existing projects

The Concerted Action will take full account of all existing CMS projects, in particular those concerning *Saiga tatarica tatarica* and *Cervus elaphus bactrianus*, and insure synergies, compatibility and complementarity. It will of course also build on existing efforts by other agencies and endeavour to provide maximum support for them.

Activities within the Concerted Action and tentative timetable

Activities planned for the coming triennium include, following the general model of the Sahelo-Saharan Antelopes Concerted Action:

1. Drafting of detailed status reports for all species, drawing on the most current available information (2 years).
2. Drafting of a CMS format Action Plan, with double entry, by species and by country (2 years), including habitat conservation and restoration measures, protected area establishment and management, integrated management of irrigation interaction, action against illegal taking.
3. Preparation of formal proposals for addition of species to Appendix I and Appendix II (2.5 years).

Provisional list for Appendix I listing includes:

Pantholops hodgsoni, Chiru or Tibetan Antelope, EN
Capra falconeri, Markhor, EN
Capra nubiana, Nubian Ibex, EN
Capra caucasica, West Caucasian tur, EN
Capra cylindricornis, East Caucasian tur, VU
Equus caballus przewalskii, Przewalski horse, EX, Reintroduced Mongolia
Cervus elaphus bactrianus, Bukhara Deer, VU
Panthera pardus tulliana, Anatolian Leopard, CR
Panthera pardus saxicolor, North Persian Leopard, EN
Acinonyx jubatus venaticus, Asiatic Cheetah CR

Provisional list for Appendix II listing includes:

Procapra picticaudata, Tibetan gazelle

Procapra przewalskii, Przewalski gazelle, CR

Pseudois nayaur, Bharal or Blue sheep

Nemorhaedus goral: Goral LR/nt

Ovis ammon, Argali, VU

Provisional list for upgrading to Appendix I includes:

Saiga tatarica, Saiga antelope CR

Equus (hemionus) onager, Onager CR

or

Equus hemionus s.l.

(incl *Equus (hemionus) hemionus*, Kulan CR, VU, *Equus (hemionus) kiang*, Kiang DD)

4. Preparatory Range States meeting : Mongolia, summer 2006

Range States discussion on draft Action Plan: spring 2008

REPORT OF THE TAXONOMIC WORKING GROUP ON AQUATIC MAMMALS AND LARGE FISHES, WILLIAM PERRIN, CHAIR

1. *Discussion and evaluation of relevant proposals of amendment of appendices*

1.1 Proposal I-2 & II-4: Mediterranean population of short-beaked dolphin *Delphinus delphis* in Appendices I and II

1. The Group supported the proposal, in consonance with the IUCN classification of Endangered (based on evidence of a precipitous decline over the last 35-45 years). While not recommending rejection, Norway expressed concern that the IUCN classification may not be justified. It was noted that the results of research leading to the IUCN classification action are available in the published literature. Listing on Appendix II was also supported.

1.2 Proposals I-11 & II-16: Basking shark *Cetorhinus maximus* in Appendices I and II

2. We discussed this proposal at some length. Norway noted opposition. The near-consensus was that while strong support exists for listing of the NH populations on Appendix I, this is not so for the SH, where the species is taken only as bycatch and no population studies have been carried out. Some members favoured a precautionary approach in the absence of population data for the SH and supported listing of the entire species. Others believed that this would be overly precautionary. In the absence of a consensus, we referred the Appendix I proposal back to the full Council for discussion. It was agreed that, in any case, there is a strong need for stock identity research in the SH. The proposal for Appendix II listing was supported by the Group.

3. Norway noted parenthetically that a plenary discussion of the use of the precautionary principle in CMS listings would be useful.

1.3 Proposal I-12: Atlantic sturgeon *Acipenser sturio* in Appendix I

4. The Group recognized the extremely depleted status of this species, including its extirpation from some former range states, and strongly supported the proposal.

1.4 Proposal II-5: Mediterranean populations of striped dolphin *Stenella coeruleoalba*

5. This proposed listing was supported. It was noted that the species is already in an annex of ACCOBAMS. In consideration of this and conservation threats, Appendix II listing is appropriate.

2. *New project proposals*

6. The Group considered the new proposals and those approved at the last ScC meeting but not funded. The six proposals are all of high quality, and the Group found it very difficult to rank them. The rankings are given below, with comments on importance and relevance in parentheses:

#1: Regional workshop on giant catfish (*Pangasianodon gigas*) to develop and implement a species conservation plan jointly with IUCN (given highest priority because of the critically endangered status of the small remaining population);

#2: Regional workshops to build capacity to assess and conserve cetaceans in South Pacific (in support of a memorandum of understanding in development, addresses bycatch);

#3: Review of migration in sharks (to address rapidly growing conservation threats and identify species for potential listing by CMS);

#4: Two regional workshops in 2006 and 2008 in Bangladesh to analyse data collected in CMS-supported surveys in Bay of Bengal and develop recommendations for research and management (culmination of continuing CMS research program in India, Bangladesh, Myanmar and Sri Lanka);

#5: Workshop in Bangkok to build capacity in SE Asia and S Asia to cope with critical problems of cetacean bycatch in fisheries (bycatch recognized as primary regional and global threat to small cetaceans);

#6: Regional symposium and planning workshop to assess status of small cetaceans and threats in western Indian Ocean (status of cetaceans in region very poorly known, but bycatch threats exist).

7. It was agreed that there is a need for wider dissemination and availability of reports of projects supported by CMS. One suggestion is to post full PDF versions of all reports on the CMS website.

8. Members of the Group emphasized the critical value of CMS-supported research initiatives to the conservation of large marine animals due to the logistical difficulties of studying them and defining their conservation needs.

3. *Potential new agreements/relevant resolutions*

3.1 Dugong (Rec. 8.15)

9. The recommendation was supported. It was noted that under the proposed criteria for Cooperative-action species, the dugong should perhaps be removed from the list, as global agreement (MOU) is sought under the terms of the recommendation.

3.2 Migratory sharks (Rec. 8.16)

10. The recommendation is designed to address generic problems of conservation of listed shark species (present and future). After lengthy discussion, a consensus was reached to support it in principle.

3.3 Cetaceans in the Pacific (Rec. 8.19)

11. This recommendation is in support of efforts to develop an MOU for cetaceans in the South Pacific and as such was strongly supported by the Group. It was noted that efforts will be made to harmonize the MOU with the Strategic Plan. Australia and New Zealand expressed their appreciation for the significant and very effective assistance of Lyle Glowka of the Secretariat in making progress on the MOU.

3.4 Sturgeons

12. Germany asked for the Group's advice on future courses of action for addressing the very urgent problem of conservation of Eurasian sturgeon species. Measures and programs adopted by CITES do not seem to be having an adequate impact on continuing unsustainable exploitation, and the status of several species is alarming and worsening. Germany believes that CMS may offer avenues not open to CITES. The Council is asked for its advice on three options presently under consideration: 1) an MOU under CMS, 2) an Action Plan under CMS, with all relevant stakeholders (in the region and abroad) included, and 3) a public awareness campaign mounted by CMS and aimed at both the public in the range states and consumers in the more developed nations. In response, it was noted that the three options are not necessarily mutually exclusive; in fact, an Action Plan is better carried out under the umbrella of an MOU. Members of the Group expressed uncertainty about the value that might be added by CMS involvement and suggested that this be elaborated by Germany. It was recommended that this be part of a review (similar to that carried out for raptors and reported to this meeting) and that the question of interactions and potential overlaps with a number of other initiatives in the region also be addressed. With this review in hand, the Group could better advise Germany on how to proceed with a possible MOU or other initiative. It was also pointed out that potential for an MOU could be explored with the assistance of the Secretariat without prior review by the Council. Germany tentatively agreed to produce a review and possibly a resolution or recommendation for establishment of an MOU or Action Plan for the next Council meeting.

3.5 Whale shark

13. The Whale Shark was listed in CMS Appendix II and for Cooperative Action in 1999. The Philippines later announced that it intended to seek a regional Memorandum of Understanding for the species. In mid-2003,

the Philippines approached the Secretariat to determine the process to be followed to develop a Whale Shark MoU and advance the Cooperative Action. In 2004 a small informal contact group, composed initially of the CMS Secretariat, the CMS Appointed Councillor for Marine Mammals and Large Fishes, the Philippines Scientific Councillor and Focal Point, the Chair of the IUCN Shark Specialist Group, a representative from both the Marine Conservation Society of Seychelles and from ECOCEAN discussed the elements of a possible MoU and action plan that could be circulated to Range States in the Indian Ocean and Southeast Asia regions. The group was expanded later in the year to include a governmental representative from Seychelles (an interested non-Party to CMS at the time) and the CMS Focal Point from Australia. In late 2004, the CMS Secretariat and IUCN Shark Specialist Group co-hosted a dialogue on Whale Shark at the IUCN World Conservation Congress in Bangkok to solicit comments on the desirability of an MoU and action plan. In May 2005, the International Whale Shark Conference took place in Perth, Western Australia, with the objectives of (a) advancing local, regional and international efforts for the conservation of the Whale Sharks and (b) facilitating regional and international collaboration in research on whale sharks. Meanwhile, a proposal for a draft recommendation on migratory sharks (UNEP/CMS/Rec. 8.16) has been circulated for consideration by the Conference of the Parties in the context of the development of an Agreement covering migratory sharks generically. Potential conflict with a stand-alone MoU for the whale shark has yet to be clarified. The Philippines wished to thank Australia for its assistance in the efforts to develop a MoU.

4. *Other relevant resolutions*

4.1 Adverse human induced impact on cetaceans

14. While there was widespread support amongst members of the Group for the intentions of the draft resolution, a number of concerns were expressed about both the content and the wording. It was suggested that the impacts of climate change were an important human-induced potentially adverse impact on cetaceans that had been omitted from the draft resolution. Concern was also expressed that there were some grammatical inaccuracies and that the wording of the resolution required clarification, particularly with regard to the operative paragraphs. Unfortunately, no representative of the EC was in attendance to discuss possible amendments to the wording of the resolution.

15. Members agreed that whilst the TWG could support the draft resolution in principle, there was an urgent need to seek clarification from the sponsors on several issues and to amend the text of the resolution, to ensure that it corresponded more closely to the priorities established in the CMS Strategic Plan 2006-2011. The working group also considered that it was important to retain the Scientific Council's central role in the identification of threats to cetaceans and the development of mitigation strategies. The Group recommended that there should be further consultation with the sponsors of the draft resolution to address these concerns.

5. *Proposals for new Concerted Action species*

16. There were no proposals.

6. *Review of existing Concerted/Cooperative Action species*

6.1 Concerted Action species

6.1.1 *Mediterranean monk seal*

17. Spain presented an update of status and conservation progress. Progress has been positive. Population estimates presented for the Black Sea, eastern Mediterranean, western Mediterranean and Atlantic total 441-495. The third meeting of the Action Plan Working Group produced a final draft of the Action Plan and the "Dakhla Declaration" calling for international assistance in funding the Action Plan and support for Morocco's initiative to produce a marine protected area for monk seal conservation and to initiate a management plan for a future national park in the area. The final Action Plan addresses the shortcomings identified in earlier versions, addressing issues of demography and habitat protection. Other items of progress reported included three births in Madeira, expansion of research on Madeira, improved reserve surveillance, exploration of coastal habitat in southern Morocco, 28 births in the Cabo Blanco colony in 2004 and 27 so far this year, cataloguing of 105 seals in Morocco and Mauritania, funding by Spain and a Spanish NGO of projects in Mauritania and Morocco, and

financial and technical support to Mauritanian local and national authorities to build capacity. One negative note was that human coastal development is increasing rapidly in Morocco and Mauritania, which will increase pressure on present and potential future monk seal habitat. Spain will take the initiative in development of a self-supporting MOU to help implement the Action Plan. The Group recommended endorsement of the Action Plan and the concept of an MOU.

6.1.2 *Franciscana dolphin*

18. The project funded by CMS on abundance, habitat and behaviour has been completed. The final technical report has been received by the Secretariat.

6.1.3 *Marine otter*

19. A survey is being carried out in Peru supported by CMS funds. A report on field activities has been received by the Secretariat.

6.1.4 *Southern river otter*

20. Loss of habitat continues. Nothing to report on concerted action.

6.2 Cooperative Action species

6.2.1 *South American dolphins*

21. Schlatter reported that studies are being carried out by students in southern Chile on *Cephalorhynchus eutropia* and *Lagenorhynchus australis*. Results are not yet available.

6.2.2 *Whale shark*

22. Since an MOU is being pursued, the species should be removed from the list of species for Cooperative Action. Progress toward an MOU is described above (item 3.5).

7. ***Rapid review of Concerted Action species***

23. The Group reviewed a draft of the Review at its last meeting and noted a number of deficiencies, which were not remedied in the present draft. Time did not allow a detailed review this year. The Review has been placed on the CMS website and the members of the Group were encouraged to review it and send comments to the Secretariat.

8. ***Other***

24. WDCS introduced a proposal for an enhanced partnership between CMS and WDCS. As outlined in CMS/ScC.13/Inf.10, under a formal Partnership Agreement with CMS, WDCS intended to develop a Joint Work Programme to harmonize WDCS activities with the CMS Strategic Plan 2006-2011, in order to maximise the effectiveness of WDCS, CMS and its Agreements and MoUs. To make this effective WDCS has proposed the creation of a standing WDCS Working Group in Support of CMS Cetacean Research Priorities (WGCP) to prioritise projects to be submitted to CMS as a contribution to the CMS Strategic Plan 2006-2011. The WGCP would also seek to increase the flow of information into formal CMS processes through the CMS Appointed Scientific Councillor for Aquatic Mammals and Large Fishes.

25. WDCS sought the CMS Scientific Council's acknowledgment of the Partnership Agreement between WDCS and CMS that will enable WDCS to share its scientific information resource with CMS, endorsement of the proposal to convene a standing WDCS Working Group in Support of CMS Cetacean Research Priorities (WGCP) to develop and agree on WGCP contributions to the Joint Work Programme that will support of the cetacean related priorities within the CMS Strategic Plan 2006-2011; and agreement to review the progress of the WDCS/CMS collaboration at its 2006 and 2007 meetings. The Group recommended these actions be taken by the Council.

REPORT OF THE TAXONOMIC WORKING GROUP ON MARINE TURTLES

1. Discussion and evaluation of proposals for amendments of CMS Appendices (Conf.8.16)

No new proposals to amendment for turtles.

2. New project proposals

2.1 New project proposals (ScC.13/Doc.5)

Two new proposals were received for review.

Recommended action	Project description and group observations
Recommended for resubmission	Leatherback turtles in SW Atlantic: genetic composition, ecological and environmental assessment (proposed by Uruguay)
	The Appointed Councillor had previously examined this proposal and made written suggestions to the proponent for improving the project and from the project to be resubmitted for consideration at the next ScC.
Recommended for resubmission	Baseline mapping of nesting beaches and feeding grounds, and assess the nature and extent of exploitation and threats to marine turtles of the Atlantic Coast of Africa. (Proposed by CI, WWF et al.)
	<ul style="list-style-type: none"> • This is a large and ambitious project that on first reading has the potential to provide a great deal of useful information. • The CMS Secretariat advised that with new support for the West African Marine Turtle MoU, a new secretariat is being established in Senegal. • It was noted that this project did not acknowledge existing projects in place within the countries. • The WWF delegate gave assurance that this project targets one of the Actions identified within the MoU; the regional groups proposing this project will support the new Secretariat; and the initial components of the project would commence in countries with workable turtle populations.
	The group recommends that this project should be redeveloped with more detail on the specific actions planned so that their relevance, achievability and costs are transparent. The project should also make clear how in-country partners will be engaged in the project.

It is recommended that both these proposals be returned to the proponents for reworking and resubmission.

2.2 Proposals carried over from ScC12 (ScC.13/Inf.1/Annex 9)

Three turtle projects had been approved in principle for support previously at ScC12. The status of these projects was examined.

-	Movement of Atlantic leatherback turtles
	CMS: This project has already funded and is in progress. No further action required.
Supported	Evaluation of status of turtles in Sierra Leone
	CMS: This project failed to commence after it was initiated. Chair: Recommended that this project be revitalised through the new Secretariat for the West Africa MoU but remaining under the project management of the CMS secretariat.
-	Tracking of loggerhead turtles from Cape Verde
	CMS: This study has now been resourced by another donor. No further action required.

Therefore, it is recommended that the existing project, “Evaluation of the status of turtles in Sierra Leone”, approved in principal at ScC12 be continued. This project has the potential for being used to catalyse on the ground activity in the West Africa region via the new MoU Secretariat.

The group wishes to have access to the results of previously funded and completed projects. It urges that all reports of completed projects be passed through a peer review process and published, at least, in pdf format, through the CMS website.

3. *Potential new Agreements / relevant resolutions*

3.1 Marine turtles (Rec.8.17)

The Group supported this Recommendation that encourages parties and signatory states to participate actively making the present agreements and decision of CMS effective and encourages the involvement of new signatory states in these agreements..

4. *Other relevant Resolutions*

None to consider.

5. *Proposals for new Concerted Action species*

None to report.

6. *Review of existing Concerted/Cooperative Action*

None to report.

7. *Rapid review of Concerted Action Species: Turtles (Document prepared by WCMC)*

Although the document for turtles is available on the CMS website, it has been available for only a very short period. This is a lengthy document and for many delegates there had been insufficient time available for detailed examination of its contents. Councillors are urged to read this document and report back to secretariat.

The members who have read the detail of the document are very dissatisfied with its contents. The general synopsis table and the species synopses tables do not reflect accurately the reality of actual available information for the species or for actions occurring within the countries. There has been a continuing failure to access the significant body of peer-reviewed literature for the species and a corresponding over emphasis on non-peer reviewed material. The document in its current form is considered to be in appropriate for use by CMS.

8. *Marine Turtle MoUs*

8.1 IOSEA Marine Turtle MoU

CMS and the Secretariat of the IOSEA Marine Turtle MoU are to be complemented for the effective implementation and growth in effectiveness of actions under this MoU.

8.2 West Africa Marine Turtle MoU

Delegates from the West African region have expressed concern regarding the failure of the CMS Secretariat to provide continuity of activities within this region and the relevant MoU following the appointment of Dr Hykle to his role with the IOSEA in Bangkok several years ago. However, the group welcome the news that the WA Marine Turtle MoU is being revitalised following new funding to support the establishment of a secretariat in Senegal. At the same time though, the relevant focal point councillors and Appointed Councillor for marine turtles in the West Africa region are concerned that they have not been kept informed in a timely manner regarding these recent developments with the planned secretariat for the MoU.

8.3 Collaboration with SPREP regarding a proposed Pacific Islands Marine Turtle MoU

The CMS Secretariat is to be congratulated in its success in engaging the South Pacific Island Nations in dialogue towards developing an agreement for international cooperation in marine turtle conservation that will enhance existing regional conservation efforts. Again, the relevant focal point councillors and Appointed Councillor for marine turtles in the region should be kept informed in a timely manner regarding developments.

9. Small grants programme

The group was unanimous in its view that there has been a critical role for the small grants in providing catalytic actions that have been very beneficial to the function of CMS. This critical role can continue into the future. The small grants program should not be halted.

REPORT OF THE WORKING GROUP ON BY-CATCH

By-catch as a major threat to marine migratory species has been considered by CMS ScC and is the subject of previous resolutions 6.2 and 7.2. An ad-hoc informal working group met to discuss the continuing threat of by-catch to CMS-listed species, and in particular to consider Resolution 8.14 and its application in relation to the work of the Scientific Council and the implementation of the Convention and its daughter agreements.

The working group agreed that the problem of by-catch extends throughout all ocean basins and affects many species listed under CMS – including cetaceans, seabirds, marine turtles and sharks. To date, research and implementation of by-catch mitigation has largely been conducted on a fishery-by-fishery basis, with advice given on a species-by-species basis rather than a “whole-of-fishery” perspective.

Further, although there is significant conservation and by-catch mitigation action occurring at the national, fishery or species-specific level, links between these actions at the international level are often weak, leading to weakening of international effort. To date, despite many projects and activities within CMS agreements and other organizations/instruments, there is insufficient overall progress from these efforts. By-catch remains a critical threat to many migratory species.

The group agreed that there is a need for a global assessment of the migratory taxa affected, and a need to stimulate the development and promulgation of solutions which are effective for all taxonomic groups, rather than one at a time as currently occurs. The need for CMS to recognize the issue of fish by-catch was also noted.

In considering developments in global efforts to mitigate by-catch since the ScC last discussed the issue, the following were reported on:

- Birdlife International has published a review of Regional Fisheries Management Organisations (RFMO) performance on by-catch mitigation for seabirds. The report has stimulated debate and action within RFMOs and increased momentum for action on seabird by-catch.
- A consortium of organizations including the Malaysian Marine Research Foundation, WWF, Birdlife and CI convened a workshop in Kota Kinabalu, Malaysia in September 2005 to discuss the need for multi-species mitigation strategies within fisheries. The workshop brought together fishers; species specialists on cetaceans, seabirds, sharks and marine turtles; and policy experts. The workshop outputs included exploration of a mathematical model for determining how to apply multi-species by-catch mitigation solutions within a fishery. In addition, the workshop discussed the need to stimulate action at the international level, including identifying instruments with a mandate to move forward with a multi-species approach.

The Working Group agreed that CMS has the mandate to provide by-catch mitigation perspectives for all CMS listed species which are affected by by-catch, however the group noted strongly the need to identify opportunities for CMS engagement in by-catch mitigation which are minimal in cost and which exploit the unique niche of CMS as the expert body on migratory species, rather than attempting to duplicate the efforts of other instruments/organizations, or take too broad a mandate on the issue.

In considering proposed Resolution 8.14, the working group supported this proposed recommendation but felt it could be improved to ensure it capitalizes on the specific opportunities and strengths of CMS as an instrument.

Specifically, the working group feels the resolution could be improved by adding:

- **appointment of a specialist by-catch councillor to the Scientific Council;**
- **an initial action for an appointed councillor to be development of a taskforce to look at the impact of, and solutions to, by-catch on CMS listed species (i.e. through development of a workplan and a strategic research agenda).**

The idea behind the taskforce was to bring together a range of experts and parties to ensure that the issue of by-catch is addressed by CMS in the best possible context for the convention and its daughter agreements, focusing on where CMS can add value to the efforts of other organizations and instruments.

Working Group

Barry Baker (Chair)
Mike Donoghue
Amanda Nickson
Roberto Schlatter
Mark Simmonds
Colin Limpus
Margi Prideaux
Nicola Hodgins
Ian McLean

SUSTAINABLE USE

REPORT OF WORKING GROUP ON RESOLUTION 8.1

BACKGROUND

A working group, comprising Councillors for three Parties and four observers met on 18 November to discuss Resolution 8.1 (Draft Resolution on Sustainable Use, prepared by the Secretariat), and to comment on its scientific aspects.

REPORT

It was acknowledged that because the group met at 9 a.m., before the arrival of the hotel buses, the membership was restricted. Nevertheless, a broad ranging debate took place, in which a range of views was expressed.

Councillors of the Parties generally expressed the view that the CMS Convention had been drafted to provide protection for endangered and threatened migratory species, and that the draft Resolution 8.1 was in conflict with some areas of the Convention.

Some observers felt that many species listed on CMS Appendices are already in use and that the application of the Addis Ababa Principles and Guidelines (AAPG) should be helpful in such a situation for Appendix II or unlisted migratory species. In this regard, it was noted that the Scientific Council has not yet developed a definition of indigenous subsistence use.

Other members of the group expressed concerns about the possible allocation of funds foreshadowed in the Resolution and the potential conflict between CMS and AAPG on the spatial scale of management.

The group *agreed* that there is a difficulty in reconciling the Resolution with Article 3 (v) of the Convention.

As a result of these concerns, the group concluded that it could not recommend Scientific Council support for Resolution 8.1 in its current form.

AVIAN FLU

Migratory Species and Highly pathogenic avian influenza

1. AWARE that migratory species are victims and vectors of a range of contagious (e.g. viral, bacterial and fungal) diseases (see Annex I), and some of these diseases may be transmitted to resident species, domestic stock and humans. Some diseases have the potential to reduce biodiversity, especially in the case of threatened species;
2. AWARE of the emerging issue of outbreaks of Highly Pathogenic Avian Influenza (HPAI) (subtype H5N1), which have had major impacts on livelihoods linked to the keeping of domesticated birds (mainly poultry) and on nature conservation values (including mortality of waterbirds on at least four internationally important (Ramsar) sites) in Eurasia, and CONSCIOUS of the increasing number of countries in which HPAI has recently been detected following its westward spread through Eurasia;
3. VERY CONSCIOUS that, if the current subtype of HPAI either genetically reassorts or adaptively mutates into a form transmissible between humans, this could have the global health, social and economic consequences of a human influenza pandemic;
4. MINDFUL, however, that the limited number of currently known cases of human infection with the current strain of HPAI is restricted to certain parts of Asia and have been through contact with, or possibly by consumption of, infected poultry and none through contact with wild birds, and RECOGNIZING that public attitudes and support for wetland and species (particularly waterbirds) conservation and sustainable use, could be negatively affected by concerns as to the possible role of waterbirds in the spread of HPAI (subtype H5N1);
5. GREATLY CONCERNED, however, that in most countries there is a significant lack of information and, in some cases, public misinformation, on important issues related to the spread of HPAI, the risks it may pose, and how to anticipate and respond to outbreaks of HPAI, and NOTING in particular the difficulties that developing countries face in assessing and responding to the threat of HPAI, especially given the significance in many of these countries of both domesticated and wild birds as the basis of rural livelihoods;
6. FURTHER CONCERNED that ill-informed responses may have unfortunate and possibly disastrous long-term consequences for conservation, especially for some of the species which are globally threatened, and already have small or localised populations and particularly those species listed in Appendix 1 of the Convention and in Column A, Category 1 of Table 1 of the Action Plan of the Agreement on the Conservation of African Eurasian Migratory Waterbirds;
7. NOTING that HPAI is considered to have been spread between countries by a number of different known vectors, including through the movement of avian livestock, cage birds and bird by products, legal and illegal trade in birds, equipment associated with these respective industries, and movement of people, and NOTING that the migration of waterbirds has been suspected to be a vector as well, although direct evidence is lacking and AWARE that the relative significance of these different modes of spread has varied and evidence of causal links in many cases is weak or lacking;
8. GREATLY WELCOMING the involvement in this issue of the Food and Agriculture Organisation (FAO), the World Health Organisation (WHO), and the World Organisation for Animal Health (OIE), notably through the publication in May 2005 of a *Global Strategy for the Progressive Control of Highly Pathogenic Avian Influenza* and its implementation, *inter alia*, through regional Technical Cooperation Programmes on Emergency Assistance for Early Detection and Prevention of Avian Influenza;
9. AWARE of the Convention's leading participation in various coordinating mechanisms, including the Scientific Task Force on Avian Influenza convened in late August 2005 by the Convention, which comprises representatives and observers from nine international organisations, namely CMS, AEWA, Ramsar Convention, FAO, WHO, Wetlands International, BirdLife International, International Council for

Game and Wildlife Conservation (CIC) and Wildlife Conservation Society (WCS), RECOGNISING the role of the IUCN Veterinary Specialist Group and ALSO NOTING Resolution 3.18 on Avian Influenza of the Agreement on the Conservation of African-Eurasian Migratory Waterbirds and Resolution IX.25 of the Ramsar Convention on managing wetlands and waterbirds in response to highly pathogenic avian influenza;

10. RECALLING that the Global Flyways Conference (Edinburgh 2004) called, in particular, for urgent action to assess disease risk, and establish monitoring programmes in relation to migratory waterbird movements, the trade of wild birds, and implications for human health;
11. ACKNOWLEDGING the opportunities for information exchange provided by the Special Round-table on the spread of HPAI held on 19 November 2005 at Nairobi, Kenya, during the 8th Conference of the Parties of the Convention on Migratory Species, and encouraged by the participation of all African and other CMS Scientific Councillors;
12. RECOGNIZING that exploration of possible scenarios of the current HPAI spread, including identification of areas of higher relative risk and development of possible policy responses to outbreaks will benefit from analysis of extensive and long-term data sets relating to bird movements, waterbird counts, trade and movements of people, but NOTING the urgency to access and analyze such data, networks, and other information, AND to fill outstanding gaps in the scientific understanding of these factors;
13. RECALLING ALSO that, although outbreaks of H5N1 in Hong Kong in 1997, in Japan in 2004, of H7N9 in Italy in 1999, and of H7N7 in The Netherlands, Belgium and Germany in 2003 were all successfully stamped out using rigorous control and biosecurity measures, HPAI now appears to be endemic in some parts of Asia, highlighting the practical difficulties of control in countries with limited veterinary capacity;
14. ALSO RECOGNIZING the potential risk of transmission of HPAI between captive birds and other animals at wetland centres and zoological gardens and wild waterbirds visiting these sites, being mindful both of animal welfare requirements and the important role such sites play in wetland communication, education and public awareness; and
15. RECOGNIZING ongoing national actions and plans for monitoring habitats and bird populations for HPAI; and ALSO NOTING that although development of surveillance schemes and contingency planning will need to be determined nationally, there are significant benefits from international cooperation;
16. AWARE of the outcomes of the recent WHO/FAO/World Bank meeting in Geneva of 7-9 November 2005 on 'Avian Influenza and human pandemic influenza' which identified the significant gap of knowledge concerning the role that wild birds play in the spread of HPAI, NOTING the need to strengthen research and monitoring related to waterbird migration and trade in waterbirds, as well as disease processes in wild bird populations, especially research identified by the Scientific Task Force on Avian Influenza (see Annex II);
17. RECOGNISING the need for rapid and continued sharing of information given the potential significance of this information in terms of bird conservation and population dynamics, so as to enable or improve risk assessments and be better prepared to improve conservation of waterbirds and future management of avian disease outbreaks;
18. AWARE of the decision of the Agreement on the Conservation of African-Eurasian Migratory Waterbirds (Resolution 3.6) to request the support of the CMS and other stakeholders to establish long-term funding regimes in order to develop long-term monitoring of waterbird populations *inter alia* via the International Waterbird Census and its derived outputs, and further to Ramsar Resolution VIII.38, as a means of informing a wide range of national and international conservation policies including risk assessment for HPAI;

THE CONFERENCE OF THE PARTIES

19. CALLS for fully integrated approaches, at both national and international levels, to address HPAI and other animal borne diseases by bringing ornithological, wildlife, and wetland management expertise together with

those traditionally responsible for public health and zoonosis, including veterinary, agricultural, virological, epidemiological, and medical expertise;

Wild bird information (knowledge needs)

20. In response to the emerging issue of HPAI H5N1, CALLS upon Contracting Parties, non-contracting parties, international and national organisations to support research and collect migratory species data and for better use and rapid analysis of existing data sets across different flyways to determine precise migratory routes, fluxes and population dynamics of species, and for their dissemination;
21. Given the potential significance of HPAI for conservation of migratory species, URGES Contracting Parties, non-contracting parties and international organisations to support capacity building worldwide related to research and monitoring related to disease processes, rapid development of surveillance programmes for HPAI in populations of wild birds, and in cooperation with FAO, OIE and other competent authorities in domestic and captive birds and of monitoring of the movements of wild birds, so as to be better prepared for the future management of avian disease outbreaks;

Specific Instructions

22. SUPPORTS the conclusions of WHO, FAO and OIE that attempts to eliminate HPAI in wild bird populations through lethal responses such as culling are not feasible and may exacerbate the problem by causing further dispersion of infected birds;
23. EMPHASISES that destruction or substantive modification of wetland and other habitats with the objective of reducing contact between domesticated and wild birds does not amount to wise use as urged by Article 3.1 of the Ramsar Convention and Articles 1 and 8 of the Convention on Biological Diversity, and may exacerbate the problem by causing further dispersion of infected birds;
24. SUGGESTS that African Contracting Parties and non-contracting parties coordinate their responses to the threats posed by the spread of HPAI through the New Partnership for Africa's Development;
25. URGES that hunting communities, in the framework of existing hunting activities, contribute to monitoring the spread of HPAI and co-operate actively with national authorities in the event that measures, *inter alia*, special temporary hunting regulations are considered or put into force;

Strategy advice

26. NOTES the essential requirement for adequate farming and aquaculture standards, and the need for competent authorities to develop strategies that limit the risk of disease transmission between wild and domestic animals (through enhanced biosecurity measures) and humans;
27. UNDERLINES the importance of developing and implementing national contingency or action plans related to the potential risk of disease transmission, and the need for national preparedness to instances of detection of HPAI in birds, notably in wetland-dependent species;
28. REQUESTS Contracting Parties and urges non-contracting parties to develop and implement programmes of education and public awareness on HPAI, especially aimed at actually or potentially affected stakeholders, in particular those engaged in outdoor activities and the poultry industry;

Funding Needs

29. URGES the Contracting Parties for support to establish the following:
 - a well-structured long-term global monitoring and surveillance of migratory birds to assess current and new disease risks, and
 - prioritization for filling of gaps through provision of support to establish programmes to study migratory patterns of targeted species at flyway level (including bird-ringing/banding, colour-marking, satellite tracking and isotope study);

30. REQUESTS the Executive Secretary to explore possibilities for establishing partnerships so as to support the development of long-term funding for monitoring schemes, including the International Waterbird Census and its derived outputs, that are relevant to the Convention's interests;
31. REQUESTS the Executive Secretary working with the Scientific Council and in cooperation with the Scientific Taskforce on Avian Influenza to approach urgently FAO, OIE and WHO in response to their call for further research into fully understanding the role of wild birds in spreading HPAI; and seek the necessary resources to perform this work;

CMS Engagement

32. REQUESTS the Executive Secretary working with the Scientific Council [and its Working Group on Migratory Species as Vectors of Diseases] to assist, with relevant international agencies and the Scientific Task Force on Avian Influenza, in sharing information, including practical advice that will assist countries to respond to this serious and rapidly developing situation, and to report back on progress on research and other relevant information to each Scientific Council meeting, to the Standing Committee and to COP9. This information should also be published on a regular basis on the CMS and partner websites for wider availability;
33. REQUESTS the Executive Secretary to ensure continued leadership of the Convention in the Scientific Task Force on Avian Influenza, through appropriate representatives of the Scientific Council and the Secretariat, and URGES the Scientific Council, with and through the Scientific Task Force on Avian Influenza, to provide relevant input on practical measures to reduce the risk of disease transmission between wild, captive and domesticated birds, to those agencies developing contingency and wetland management plans related to HPAI.

Annex I: Indicative List of Contagious Diseases of Migratory Species

Birds	Avian Influenza, West Nile virus (208 species)
Mammals	West Nile virus (29 species), Simian foamy virus, Simian immunodeficiency syndrome, Monkeypox (Primates), Hantavirus Pulmonar syndrome (rodents), Henipavirus (Hendra, Nipah, etc.), Severe Acute Respiratory Syndrome, Rabies (bats), Histoplasmosis.
Reptiles	West Nile virus (2 species)

Annex II: Key research needs related to the spread of Highly Pathogenic Avian Influenza in relation to migratory birds and their habitats

1. Identification and mapping of the precise nature of migration routes, including stop over sites, flux and timing for key migratory waterbirds so as to expand and/or refine existing ecological monitoring of these populations.
2. Clarification of virus behaviour and survival in the aquatic habitats which are waterbird breeding, staging and non-breeding (wintering) areas.
3. Clarification of viral incubation periods, the infectious period in birds and the symptoms affecting individual wild birds, including implications for migratory movements, as well as determining survival rates of birds and persistence of viruses in birds.
4. Establishment of informed assessments of the possibility of transmission between populations of wild birds and domestic flocks, including by non-waterbird species found near poultry-keeping areas.

5. Surveillance of the prevalence of HPAI in wild bird populations.
6. Development of combined risk assessments based on the known epidemiological behaviour of the virus, risks of transmission, routes and timing of migratory species, as well as known poultry husbandry techniques.
7. Research on methods for improvement of farming standards and the development of strategies to limit the risk of any disease transmission between wild and domesticated birds.

LIST OF PARTICIPANTS/LISTE DES PARTICIPANTS/LISTA DE PARTICIPANTES

Chairman/President/Presidencia

UNITED KINGDOM

Dr. Colin A. Galbraith - Chair

Chairman - CMS Scientific Council
Head of Advisory Services
Scottish Natural Heritage
2/5 Anderson Place
Edinburgh EH6 5NP
United Kingdom
Tel: (+44 131) 446 2404
Fax: (+44 131) 446 2491/2405
Email: colin.galbraith@snh.gov.uk

Vice-Chairman/Vicepresident/Vice- Presidente

NIGERIA

Mr. John H. Mshelbwala - Vice Chair
Assistant Director, Wildlife Management
Federal Ministry of Environment
Plot 293/294 off Solomon
Lar Way, Utako District, PMB 268
Abuja
Nigeria
Tel: (+234 9) 523 404/(+234 9) 803 328
7039
Fax: (+234 9) 523 4041
Email: fmenv@hyperia.com
johnmshelbwala2@yahoo.com

Members/Membres/Miembros

ALBANIA

Dr. Taulant Bino
Ornithologist
Museum of Natural Sciences
Rruga. E. Kavajes 134
Tirana
Albania
Tel: (+355 4) 229 028
Fax: (+355 4) 229 028
Email: taobino@icc-al.org

ARGENTINA

Mr. Daniel E. Blanco
South American Programme Leader
Wetlands International South America Programme
Wetlands International
25 de Mayo 758 10^a I
C1002 ABO Buenos Aires
Argentina
Tel: (+54 11) 4312 0932
Fax: (+54 11) 4312 0932
Email: deblanco@wamani.apc.org

AUSTRALIA

Mr. Barry Baker
Australian Antarctic Division
Environment Australia
Channel Highway
Kingston Tasmania 7050
Australia
Tel: (+61 3) 6232 3407
Fax: (+61 3) 6232 3288
Email: barry.baker@aad.gov.au

BELGIUM

Dr. Roseline C. Beudels-Jamar
Chef de Travaux
Section Biologie de la Conservation
Institut Royal des Sciences Naturelles de
Belgique
29, rue Vautier
1000 Bruxelles
Belgium
Tel: (+32 2) 627 4354
Fax: (+32 2) 649 4825
Email: roseline.beudels@naturalsciences.be

BOLIVIA

Sr. Omar Emilio Rocha Olivio
Director Ejecutivo
Centro de Estudios en Biología Teórica y
Aplicada - BIOTA
Av. Aranjuez, Condominio Los Sauces
de Aranjuez, Casa No.
La Paz
Bolivia
Tel: (+591 2) 274 0592
Fax: (+591 2) 247 0592
Email: orocha@entelnet.bo

BULGARIA

Dr. Teodora Ivanova
National Museum of Natural History
I, blvd. Tzar Osvoboditel
Sofia 1000
Bulgaria
Tel: (+359 88) 896 2361
Fax: (+359 2) 988 2894
Email: tea@nmnh.bas.bg

CHAD

Mr. Sadock Zeubobe Bourtchiakbe
Conseiller Scientifique CMS/ Etude et de la Recherche
Direction de Conservation de la Faune et des Aires
Protégées (DCFAP)
Ministère de l'Environnement
BP 905
N'djamena
Chad
Tel: (+235) 522 305/209 490
Fax: (+235) 524 412
Email: zeubosad@yahoo.fr

CONGO

M. Dieudonné Ankara
Conseiller Scientifique - Chef Division
Ministère de l'Economie Forestière et de
l'Environnement
BP 958
54 rue Bordeaux Oeunzé
2124 Brazzaville
Congo
Tel: (+242) 551 6750
Fax: (+242) 810 330/810 847
Email: graspcongo@yahoo.fr

CÔTE D'IVOIRE

Mr. Tano Sombo
Directeur de la Protection de la Nature
Ministère d'Etat Ministère de l'Environnement
BP 6648
Abidjan 06
Côte d'Ivoire
Tel: (+225 20) 225 366
Fax: (+225 20) 225 366
Email: sombotano@yahoo.fr

CROATIA

Dr. Jelena Kralji
Institute of Ornithology
Croatian Academy of Science and Arts
Gunduliceva 24
HR-10000 Zagreb
Croatia
Tel: (+ 385 1) 482 5401
Fax: (+385 1) 482 5392
Email: zzo@hazu.hr

CZECH REPUBLIC

Mr. Jiri Flousek
Deputy Director
Krkonose National Park
Vrchlabi-zámek
543 11 Vrchlabi
Czech Republic
Tel: (+420 499) 456 212
Fax: (+420 499) 422 095
Email: jflousek@krnap.cz

DEMOCRATIC REPUBLIC OF THE CONGO

M. Kabemba Donatien Muembo
Directeur Scientifique
l'Institut Congolais pour la Conservation de la
Nature ICCN
Ministère de l'Environnement
13 avenue des Cliniques
BP 868
Kinshasa 1
Democratic Republic of the Congo
Tel: (+243) 081 500 6840
Email: dmuembo2003@yahoo.fr

EUROPEAN UNION

Dr. Pierre Devillers
Head, Conservation Biology Section
29, rue Vautier
1000 Bruxelles
Belgium
Tel: (+32 2) 627 4354
Fax: (+32 2) 649 4825
Email: pierre.devillers@naturalsciences.be

FINLAND

Mr. Hannu Pöysä
Research Professor
Finnish Game and Fisheries Research
Institute
Yuopistokatu 6
80100 Joensuu
Finland
Tel: (+358 20) 575 1401
Fax: (+358 20) 575 1409
Email: hannu.poysa@rktl.fi

FRANCE

Mr. Olivier Dehorter
Ingénieur de Recherche
Muséum National d'Histoire Naturelle
CRBPO/MNHN
Casa postale 51, 55 rue Buffon
75005 Paris
France
Tel: (+33 1) 4079 3083
Fax: (+33 1) 4079 3835
Email: dehorter@mnhn.fr

GEORGIA

Mr. Zurab Gurielidze
Senior Technical Specialist
Georgia's Protected Areas Development
Center
9 Andjapazidze Str.
380079 Tbilissi
Georgia
Tel: (+995 32) 251 566
Fax: (+995 32) 251 349
Email: zgurielidze@gpadc.org.ge
zgurielidze@hotmail.l.com

GERMANY

Dr. Peter Boye
Scientific Adviser of the German Delegation
Federal Agency for Nature Conservation
Konstantinstrasse 110
53179 Bonn
Germany
Tel: (+49 228) 849 1113
Fax: (+49 228) 849 1119
Email: boyep@bfn.de

GHANA

Mr. Ernest L. Lamptey
International Conventions Manager
Wildlife Division of Forestry Commission
P.O. Box M239
Accra
Ghana
Tel: (+233 21) 662 360/664 654/666 129
Fax: (+233 21) 666 476
Email: ellamptey@yahoo.com
lamptey@wd.fcghana.com

GUINEA

Mr. Namory Keita
Directeur
Direction National de la Protection de la Nature
Ministere de l'Environnement
BP 761
Conakry
Guinea
Tel: (+224 11) 269 520
Fax: (+224 11) 415 923
Email: namory54@yahoo.fr

HUNGARY

Dr. Attila Bankovics
Head of Bird Collection
Hungarian Natural History Museum
Baross u. 13
H-1088 Budapest
Hungary
Tel: (+36 1) 210 1075 ext. 5044
Fax: (+36 1) 334 2785
Email: bankovic@zool.nhmus.hu

IRELAND

Mr. H. John Wilson
Conservation Scientist
Department of Environment, Heritage and Local
Government
National Parks Wildlife Service
7 Ely Place
Dublin 2
Ireland
Tel: (+353 1) 888 3294
Fax: (+353 1) 678 8123
Email: jwilson@duchas.ie

KENYA

Dr. Richard K. Bagine
Deputy Director
Biodiversity Research and Monitoring
Kenya Wildlife Service
Ministry of Tourism and Wildlife
P.O. Box 40241
Nairobi
Kenya
Tel: (+254 20) 600 820
Fax: (+254 20) 607 759
Email: rkbagine@kws.org
research@kws.org

LATVIA

Dr. Otars Opermanis
Researcher
Laboratory of Ornithology
Institute of Biology
Miera Str. 3
LV 2169 Salaspils
Latvia
Tel: (+371 9) 485 626
Fax: (+371 7) 503 601
Email: otars.opermanis@undp.org

MALI

Mr. Namory Traoré
Chef de la Section Promotion de la Faune
Direction Nationale de la Conservation de la
Nature
Ministère de l'Environnement
BP 275
Bamako
Mali
Tel: (+223) 222 5251
Fax: (+223) 223 3696
Email: ntraore2002@yahoo.fr

MONGOLIA

Dr. Lhagavasuren Badamjav
Head of Mammalian Ecology Laboratory
Institute of Biology
Mongolian Academy of Science
Ulaanbaatar-51
Mongolia
Tel: (+976 11) 453 583
Fax: (+976 11) 451 781
Email: ecolab@magicnet.mn

MOROCCO

Mr. Abdellah El Mastour
Chef du Service des Parcs et Réserves
Naturales
HAUT Commissariat aux Eaux et Forêts et à
la Lutte Contre la Désertification
3 rue Haroun Errachid
Agdat - Rabat
Morocco
Tel: (+212 37) 671 105/672 770
Fax: (+212 37) 672 770
Email: elmastourabdellah@yahoo.fr

NETHERLANDS

Prof. Dr. Wim J. Wolff
Professor of Marine Biology
Department of Marine Biology
Groningen University
Postbus 14
9750 AA Haren
Netherlands
Tel: (+31 50) 363 2260
Fax: (+31 50) 363 2261
Email: w.j.wolff@rug.nl

NIGER

M. Abdou Malam Issa
Chef Division Faune et Chasse
Direction de la faune. Pêche et pisciculture
Ministère Hydraulique, de l'Environnement et de la
Lutte Contre la Désertification
BP 721
Niamey
Niger
Tel: (+227) 734 069
Fax: (+227) 736 012
Email: malam_ia@yahoo.fr
ucnmedp@intnet.ne

NORWAY

Mr. Oystein Rune Storkersen
Senior Advisor
Directorate for Nature Management
Tungasletta 2
7485 Trondheim
Norway
Tel: (+47) 7358 0500
Fax: (+47) 7358 0501
Email: oystein.storkersen@dirnat.no

PAKISTAN

Mr. Umeed Khalid
Conservator (Wildlife)
National Council for Conservation of Wildlife (NCCW)
Ministry of Environment
Building No. 14-D
Second Floor, F-8 Markaz
Islamabad
Pakistan
Tel: (+92 51) 926 2270
Fax: (+92 51) 920 2211
Email: nccw@isb.paknet.com.pk/
umeed_khalid@hotmail.com
umeed-khalid@hotmail.com

PANAMA

Ing. Agr. Ibelice Anino Nieto
Convenios Internacionales
Autoridad Nacional del Ambiente (ANAM)
Albrook, Edificio 804
Apart.C-0844
Balboa-Ancon
Panama
Tel: (+507) 315 0869
Fax: (+507) 315 0869
Email: ianino@anam.gob.pa
janino_n@hotmail.com

PARAGUAY

Ms. Maria Cristina Morales Palarea
Species Program Coordinator
Asociación Guyra Paraguay
Cnel. Franco 381
c/Leandro Pricto
Asuncion
Paraguay
Tel: (+59 521) 227 777
Fax: (+59 521) 227 777
Email: cristinam@guyra.org.py

PERU

Sra. Rosario Acero Villanes
Directora de Conservación de Fauna
Silvestre
Instituto Nacional de Recursos Naturales
Calle Diecisiete N 355
Urbanización El Palomar San Isidro
San Isidro
Lima 27
Peru
Tel: (+51 1) 225 9809
Fax: (+51 1) 225 9809
Email: racero@inrena.gob.pe
jefatura@inrena.gob.pe

PHILIPPINES

Mr. Carlo C. Custodio
Chief, Ecosystems Management Specialist
Department of Environment and Natural
Resources
Protected Areas and Wildlife Bureau (PAWB)
Quezon Avenue
Diliman
Quezon City 1100
Philippines
Tel: (+63 2) 924 6031/34/35
Fax: (+63 2) 924 0109
Email: custodiocarlo@yahoo.com
wildlife@pawb.gov.ph

POLAND

Prof. Bronislaw Woloszyn
Institute of Animal Systematics and Evolution
Polish Academy of Sciences
ul. Slawkowska 17
31.016 Krakow
Poland
Tel: (+48 12) 422 6410
Fax: (+48 12) 422 6410
Email: woloszbr@isez.pan.krakow.pl

SEYCHELLES

Mr. Selby Remy
Director Conservation Section
Ministry of Environment and Natural
Resources
P.O. Box 445
Victoria, Mahe
Seychelles
Tel: (+248) 670 500
Fax: (+248) 610 648
Email: s.remie@env.gov.sc

SPAIN

Dr. Borja Heredia
Jefe de Area de Acciones de Conservacion
Direccion General de Para la Biodiversidad
Ministerio de Medio Ambiente
Gran Via de San Francisco 4
28005 Madrid
Spain
Tel: (+34 91) 596 4658
Fax: (+34 91) 596 4809
Email: bheredia@mma.es

SRI LANKA

Mr. Tharaka Prasad Gajadeera Arachchige
Deputy Director
Wildlife Health and Management Division
Department of Wildlife Conservation
No. 18 Gregory's Road
Colombo 07
Sri Lanka
Tel: (+94 1) 269 8557
Fax: (+94 1) 269 8556
Email: tharaka@dwlc.lk

SWEDEN

Dr. Torbjörn Ebenhard
Deputy Director
The Swedish Biodiversity Centre
P.O. Box 7007
SE-75007 Uppsala
Sweden
Tel: (+46 18) 672 268
Fax: (+46 18) 673 480
Email: torbjorn.ebenhard@cbm.slu.se

SWITZERLAND

Dr. Olivier Biber
Head International Biodiversity Matters Unit
Swiss Agency for the Environment, Forests and
Landscape (SAEFL)
3003 Berne
Switzerland
Tel: (+41 31) 323 0663
Fax: (+41 31) 323 8974
Email: olivier.biber@buwal.admin.ch

SYRIAN ARAB REPUBLIC

Dr. Akram Eissa Darwich
Director
Biodiversity and Protected Areas Management
Ministry of Local Administration and Environment
3773 Mazraha - Iman Mosque Square
Damascus
Syrian Arab Republic
Tel: (+963 11) 444 7608
Fax: (+963 11) 444 7608
Email: akramisa@scs-net.org

TAJIKSTAN

Dr. Kokul Khasanovich Kasirov
Director General
State Directorate of Protected Areas
Tajik National Park
Under the State Committee of Environment
Conservation and Forestry
P.O. Box 138
734025 Dushanbe
Tajikistan
Tel: (+992 372) 251 243
Fax: (+992 372) 252 421
Email: eldar@tajik.net

**THE FORMER YUGOSLAV REPUBLIC OF
MACEDONIA**

Prof. Dr. Branko Micevski
President
Bird Study and Protection Society
National Bonn Committee
Bul. ASNOM - 58, 2/4 Gazi Baba b.b.
1000 Skopje
The former Yugoslav Republic of Macedonia
Tel: (+389 2) 243 2071
Fax: (+389 2) 243 2071
Email: brankom@ukim.edu.mk

UKRAINE

Dr. Anatoliy Poluda
Senior Scientific Associate
Schmalhausen Institute of Zoology
Bogdana Kmelnitskogo Str. 15
01601 Kyiv 30
Ukraine
Tel: (+38 44) 235 0112
Fax: (+38 44) 235 012 12
Email: polud@izan.kiev.ua

URUGUAY

Msc. Adrian Azpiroz
Investigador Asociado
Centro Interdisciplinario para el Desarrollo
Buxareo 1311
11300 Montevideo
Uruguay
Tel: (+598 2) 622 7412
Email: abavg5@studentmail.umsl.edu

UZBEKISTAN

Ms. Irina Bekmirzayeva
Chief, Department of International
Cooperation and Programme
State Committee for Nature Protection
99 A. Temur Street
700084 Tashkent
Uzbekistan
Tel: (+998 71) 135 7921
Fax: (+998 71) 139 4195
Email: envconf@uzsci.net

**Scientific Councillors appointed by the Conference of the Parties/
Conseillers Scientifiques nominés par la Conference de Parties
Consejeros Científicos designados por la Conferencia de las Partes**

Dr. Colin Limpus
Queensland Turtle Research
P.O. Box 541
Capalaba Q 4157
Australia
Tel: (+61 7) 3227 7718
Fax: (+61 7) 3247 5966
Email: col.limpus@epa.qld.gov.au
climpus@dodo.com.au

Mr. John O'Sullivan
International Treaties Adviser
BirdLife International
RSPB, The Lodge
Sandy SG19 2DL
United Kingdom
Tel: (+44 1767) 683 211
Fax: (+44 1767) 680 551
Email: john.osullivan@rspb.org.uk

Mr. Roberto Schlatter
Director, Instituto de Zoología
Universidad Austral de Chile
Campus Isla Teja
Valdivia
Chile
Tel: (+56 63) 221 408
Fax: (+56 63) 221 315
Email: rschlatt@uach.cl

Dr. William Fergus Perrin
Senior Scientist
Southwest Fisheries Science Centre
8604 La Jolla Shores Dr.
92037 La Jolla CA
United States of America
Tel: (+1 858) 546 7096
Fax: (+1 858) 546 7003
Email: william.perrin@noaa.gov

**Governmental Observers/Observateurs de Gouvernements/
Observadores Gubernamentales**

ALGERIA

M. Mohamed Seghir Noual
Directeur Protection Faune et Flore
Direction Générale de Forêts
Ministère de l'Agriculture et Développement Rural
Alger
Algeria
Tel: (+213 21) 915 320
Fax: (+213 21) 915 320
Email: noualms@hotmail.com

ARMENIA

Dr. Karen Jenderedjian
Head, Division of Animal Resource Management
Agency of Bioresources Management
Ministry of Nature Protection
375010 Yerevan
Armenia
Tel: (+374 10) 580 711
Fax: (+374 10) 527 952
Email: jender@arminco.com

BURKINA FASO

Mr. Adama Ouedraogo
Ministère de l'Environnement et du Cadre de Vie
BP 7044
Quagadougou
Burkina Faso
Tel: (+226) 5035 6971
Email: dgef@cenatrin.bf
parcsnationaux@liptinfor.bf

BURUNDI

Mr. Jean-Marie Bukuru
Ministère de l'Amenagement du Territoire, de
l'Environnement et du Tourisme
BP 241
Gitega
Bujumbura
Burundi
Tel: (+257) 971 958/827 205
Fax: (+257) 402 625
Email: jmbkr2000@yahoo.fr
igebu@cbinf.com

CHILE

Mr. Charif Tala
Encargado de Fauna Silvestre
Subdepartamento de Vida Silvestre
Servicio Agrícola y Ganadero
Ministerio Agricultura
Santiago
Chile
Tel: (+56 2) 345 1544
Fax: (+56 2) 345 1533
Email: charif.tala@sag.gob.cl

GAMBIA

Mr. Alagie Manjang
Senior Wildlife Conservation Officer
Department of Parks and Wildlife Management
Department of State for Forestry and Environment
Banjul
Gambia
Tel: (+220) 437 5888
Fax: (+220) 439 2179
Email: alagie33@hotmail.com

INDIA

Mr. Manpreet Vohra
Deputy High Commissioner
Permanent Mission of India to the United Nations
Environment Programme
P.O. Box 30074
Nairobi
Kenya
Tel: (+254 20) 222 566-57/225 104
Fax: (+254 20) 316 242/248 320
Email: dhcindia@kenyaweb.com

Mr. S.D.K. Menon
Focal Point
Permanent Mission of India to the United Nations
Environment Programme
P.O. Box 30074
Nairobi
Kenya
Tel: (+254 20) 222 566-57/225 104
Fax: (+254 20) 316 242/248 320
Email: indiafocalpoint@wananchi.com

LIBERIA

Mr. Anthony Jarbo Taplah, Sr.
Deputy Managing Director, Forest Conservation
Forestry Development Authority
P.O. Box 10-3010
1000 Monrovia 10
Liberia, West Africa
Tel: (+231 6) 511 043
Email: deljar2001@yahoo.com

NEW ZEALAND

Mr. Michael Donoghue
Senior International Relations Officer
International Relations Unit
Department of Conservation
P.O. Box 10420
Wellington
New Zealand
Tel: (+64) 2187 0310
Fax: (+64) 7866 8262
Email: mdonoghue@doc.govt.nz

PHILIPPINES

Mr. Pio III Tejada
Assistant Attache
Permanent Mission of the Philippines to the
UNEP/UN HABITAT
P.O. Box 47941
Nairobi
Kenya
Tel: (+254 20) 387 5404
Fax: (+254 20) 387 4233
Email: PH_3@hotmail.com

Ms. Bernarditas C. Muller
Minister and Charge d'Affaires
Permanent Mission of the Philippines to the
UNEP/UN HABITAT
P.O. Box 47941
Nairobi
Kenya
Tel: (+254 20) 387 5404
Fax: (+254 20) 387 5404

SAMOA

Mr. Pati Keresoma Liu
Assistant Chief Executive Officer
Division of Environment and Conservation
Ministry of Natural Resources, Environment
and Meteorology, P.O. Private Bag
Apia
Samoa
Tel: (+685) 30 100
Fax: (+685) 25 869
Email: pati.liu@mnre.gov.ws

SOUTH AFRICA

Ms. Paulina Modiba
Department of Environmental Affairs
Box 217
0700 Polokwane
South Africa
Tel: (+27 15) 295 9300/(+27 082) 422 6688
Fax: (+27 15) 295 8940
Email: ptmmodiba@finptb.norprov.gov.za

Mrs. Lizanne Nel
Manager: Biodiversity Management,
Environmental Affairs
Department of Environmental Affairs
Box 217
0700 Polokwane
South Africa
Tel: (+27 15) 295 9300
Fax: (+27 15) 295 5819
Email: nelej@finptb.norprov.gov.za

UNITED KINGDOM

Mr. Eric Blencowe
Deputy Head of Delegation and
Chair of CMS Standing Committee
Department for Environment, Food and
Rural Affairs (DEFRA)
United Kingdom
Email: eric.blencowe@defra.gsi.gov.uk

Mr. Andrew Williams
Department for Environment, Food and Rural Affairs
(DEFRA)
Zone 1/14, Temple Quay House
2 The Square
Bristol
United Kingdom
Tel: (+44 117) 372 8110
Fax: (+44 117) 372 8317
Email: andy.williams@defra.gsi.gov.uk

Mr. Nick P. Williams
Department for Environment, Food and Rural
Affairs (DEFRA)
Zone 1/13B, Temple Quay House
2 The Square
Bristol BS1 6EB
United Kingdom
Email: nick.williams@defra.gsi.gov.uk

Mr. Ian Francis Gilbert McLean
Joint Nature Conservation Committee
Monkstone House
City Road
Peterborough PE1 1JY
United Kingdom
Tel: (+44 017) 3386 6813
Fax: (+44 017) 3355 5948
Email: ian.mclean@incc.gov.uk

**Intergovernmental Organizations Observers/
Observateurs d'Organisations Intergouvernementales/
Observadores de Organizaciones Intergubernamentales**

**CONVENTION ON INTERNATIONAL TRADE IN
ENDANGERED SPECIES (CITES)**

Mr. David Morgan
Chief Scientific Support Unit
Convention on International Trade in Endangered
Species (CITES)
MIE, 11-13 Ch. Des Anemones
CH 1219 Chatelaine
Geneva
Switzerland
Tel: (+41 22) 917 8124
Fax: (+41 22) 797 3417
Email: david.morgan@unep.ch

UNITED NATIONS ENVIRONMENT PROGRAMME

Ms. Elizabeth Migongo-Bake
Environment Affairs Officer
Global Environment Outlook (GEO)
Division of Early Warning and Assessment (DEWA)
United Nations Environment Programme
P.O. Box 30552
00200 Nairobi
Kenya
Tel: (+254 20) 623 261
Fax: (+254 20) 623 944
Email: elizabeth.migongo-bake@unep.org

Mr. Munyaradzi Chenje
Global Environment Outlook (GEO)
Division of Early Warning and Assessment (DEWA)
United Nations Environment Programme
P.O. Box 30552
00200 Nairobi
Kenya

**UNEP WORLD CONSERVATION
MONITORING CENTRE**

Dr. Gerardo Fragoso
Head of Species Programme
UNEP World Conservation Monitoring Centre
219 Huntingdon Road
Cambridge CB3 0DL
United Kingdom
Tel: (+44 1223) 277 314
Fax: (+44 1223) 277 136
Email: gerardo.fragoso@unep-wcmc.org

Dr. Robert Pople
UNEP World Conservation Monitoring Centre
219 Huntingdon Road
Cambridge CB3 0DL
United Kingdom
Tel: (+44 1223) 277 314
Fax: (+44 1223) 277 136
Email: robert.pople@unep-wcmc.org

**Non-Governmental Organizations /
Observateurs d'Organisations Non-Gouvernementales/
Observadores de Organizaciones No Gubernamentales**

BIRDLIFE INTERNATIONAL (ASIA DIVISION)

Mr. Sing Yin Simba Chan
Senior Conservation Officer
Birdlife International (Asia Division)
2F Toyo-shinjuka Building 1-12-15
Tokyo
Japan
Tel: (+81 3) 3351 9981
Fax: (+81 3) 3351 9980
Email: simba@birdlife-asia.org

**COHORT FOR RESEARCH ON ENVIRONMENT,
URBAN MANAGEMENT AND HUMAN
SETTLEMENTS (CREUMHS)**

Mr. Nicky Nzioki
Cohort for Research on Environment, Urban
Management and Human Settlements (CREUMHS)
P.O. Box 48974
00100 Nairobi GPO
Kenya
Tel: (+254 20) 273 4186
Fax: (+254 20) 273 4956
Email: creumhs2002@yahoo.com
nmnzioki@uonbi.ac.ke

GERMAN HUNTING ASSOCIATION (DJV)

Prof. Dr. Heribert Kalchreuter
German Hunting Association (DJV)
D-79848 Bonndorf-Glashutte
Germany
Tel: (+49) 7653 9269
Email: wildlife.ewi@t-online.de

**INTERNATIONAL FUND FOR ANIMAL WELFARE
(IFAW)**

Dr. Rosalind Reeve
Legal and Political Adviser
International Fund for Animal Welfare (IFAW)
75 Attucks Lane
Hyannis MA 02601
United States of America
Tel: (+1 508) 744 2082
Fax: (+1 508) 744 2189
Email: roz@wananchi.com

THE WORLD CONSERVATION UNION (IUCN)

Dr. Jean-Christophe Vié
Deputy Coordinator, Species Programme
The World Conservation Union (IUCN)
28, rue Mauverney
1196 Gland
Switzerland
Tel: (+41 22) 999 0208
Fax: (+41 22) 999 0015
Email: jean-christophe.vie@iucn.org

Dr. Holly Dublin
Chair
Species Survival Commission
The World Conservation Union (IUCN)
Private Bag X7
7735 Cape Town
South Africa
Tel: (+27 21) 799 8764
Fax: (+27 21) 761 4687
Email: holly.dublin@iucn.org

Mrs. Rosemary N. Mboya
Administrative Assistant
The World Conservation Union (IUCN)
P.O. Box 68200
00200 Nairobi
Kenya
Tel: (+254 20) 890 605-12
Fax: (+254 20) 890 615
Email: rosemary.mboya@iucn.org

Mr. Laurent Ntahuga
Regional Technical Co-ordinator
Biodiversity and Species
The World Conservation Union (IUCN)
East Africa Regional Office
P.O. Box 68200
00200 Nairobi
Kenya
Tel: (+254 20) 890 605-12
Fax: (+254 20) 890 615
Email: laurent.ntahuga@iucn.org

WETLANDS INTERNATIONAL

Mr. Ward Hagemeyer
Head of Biodiversity and Ecological Networks
Wetlands International
P.O. Box 471
6700 AL Wageningen
Netherlands
Tel: (+31 317) 478 867
Fax: (+31 317) 478 850
Email: ward.hagemeyer@wetlands.org

Dr. Taej Mundkur
Coordinator
Wetlands International
Swarankit, Plot No. 6
Mahatma Housing Society
Pune City 411 038
India
Tel: (+91 20) 2528 3373
Fax: (+91 20) 2528 3372
Email: taejmundkur.wi@vsnl.net

**WHALE AND DOLPHIN CONSERVATION SOCIETY
(WDCS)**

Mr. Mark Simmonds
WDCS International Director of Science
Whale and Dolphin Conservation Society (WDCS)
Brookfield House
38 St. Paul Street
Chippenham SN15 14J
United Kingdom
Tel: (+44 1249) 449 515
Fax: (+44 1429) 449 501
Email: mark.simmonds@wdcs.org

Dr. Margi Prideaux
WDCS CMS Programme Leader
Whale and Dolphin Conservation Society (WDCS)
Business Centre
P.O. Box 720
Port Adelaide 5015
Australia
Tel: (+61 8) 8242 5842
Fax: (+61 8) 8242 1595
Email: margi@wdcs.org

Ms. Nicola Hodgins
WDCS International Projects Coordinator
Whale and Dolphin Conservation Society (WDCS)
Brookfield House
38 St. Paul Street
Chippenham SN15 14J
United Kingdom
Tel: (+44 1249) 449 500
Fax: (+44 1429) 449 501
Email: nicola.hodgins@wdcs.org

WWF- INTERNATIONAL

Ms. Amanda Nickson
Deputy Director, Global Species Programme
WWF- International
c/o WWF-Italy
Via Po 25/c
00198 Rome
Italy
Tel: (+39 06) 726 7724 (mobile)
Fax: (+39 06) 841 3866
Email: anickson@wwfspecies.org

Ms. Wendy Elliott
Flagship Species Programme Officer
WWF- International
c/o WWF-Italy
Via Po 25/c
00198 Rome
Italy
Tel: (+39 06) 8449 7355/(+39 320) 289 3763
(+254 0725) 116 975
Fax: (+39 06) 841 3866
Email: welliott@wwfspecies.org

CMS AGREEMENTS

UNEP/EUROBATS

Mr. Andreas Streit
Executive Secretary
EUROBATS Secretariat
Martin-Luther-King-Str. 8
53175 Bonn
Germany
Tel: (+49 228) 815 2420
Fax: (+49 228) 815 2445
Email: astreit@eurobats.org

Mr. Hutson Anthony
Expert (Eurobats)
Winkfield, Station Road
Plumpton Green
East Sussex BN7 3BU
United Kingdom
Tel: (+44 1273) 890 341
Fax: (+44 1273) 890 859
Email: hutsont@pavilion.co.uk

UNEP/AEWA SECRETARIAT

Mr. Sergey Dereliev
Technical Officer
AEWA Secretariat
Martin-Luther-King-Str. 8
53175 Bonn
Germany
Tel: (+49 228) 815 2415
Fax: (+49 228) 815 2450
Email: sdereliev@unep.de

UNEP/CMS SECRETARIAT

Mr. Robert Hepworth
Executive Secretary
CMS Secretariat
Martin-Luther-King-Str. 8
53175 Bonn
Germany
Tel: (+49 228) 815 2410
Fax: (+49 228) 815 2449
Email: rhepworth@cms.int

Dr. Francisco Rilla Manta
Information and Capacity-Building Officer
CMS Secretariat
Martin-Luther-King-Str. 8
53175 Bonn
Germany
Tel: (+49 228) 815 2460
Fax: (+49 228) 815 2449
Email: frilla@cms.int

Dr. Marco Barbieri
Scientific & Technical Officer
CMS Secretariat
Martin-Luther-King-Str. 8
53175 Bonn
Germany
Tel: (+49 228) 815 2424
Fax: (+49 228) 815 2449
Email: mbarbieri@cms.int