



# CONVENTION ON MIGRATORY SPECIES

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Agenda Item 7.1

## USING THE IUCN RED LIST CATEGORIES IN ASSESSING LISTING PROPOSALS TO APPENDIX I AND II OF THE CONVENTION

### Summary

COP10 requested the Scientific Council to continue work already undertaken to develop a set of criteria to assist the Scientific Council and the Conference of Parties in assessing proposals for the listing of taxa to, and the delisting of taxa from, the appendices of the Convention. This paper represents the results of a review of the utility of the IUCN Red List Categories and Criteria, for this purpose.

It is recommended that the IUCN Red List Categories and Criteria be used as a support tool in assessing the conservation status of migratory species subject of proposals for listing on Appendix I and II. The IUCN criteria are also recommended for use when considering removal of species from the Appendices. However, other considerations relevant to listing and removal of species that do not strictly relate to conservation status, would seem to be most appropriately assessed on a case-by-case basis by the Scientific Council, using the best available information.

**USING THE IUCN RED LIST CATEGORIES IN ASSESSING LISTING  
PROPOSALS TO APPENDIX I AND II OF THE CONVENTION**

*(Prepared by the Secretariat)*

The draft report attached to this note has been prepared by Mr. Barry Baker, COP-appointed Scientific Councillor for Bycatch and Mr. Zeb Hogan, COP-appointed Scientific Councillor for Fish, as a contribution to the fulfillment of the mandate from ScC17 and COP10 to develop a set of criteria to assist the Scientific Council and the Conference of Parties in assessing proposals for the listing of taxa to, and the delisting of taxa from, the appendices of the Convention.

**Action requested:**

The Scientific Council is invited to:

- (a) Review the paper attached to this note and provide comments and guidance towards its further development and finalization, with a view to its submission to COP11 for consideration.
- (b) Consider the need for any further criteria for the listing of species on the appendices of the Convention.

## USING THE IUCN RED LIST CATEGORIES IN ASSESSING LISTING PROPOSALS TO APPENDIX I AND II OF THE CONVENTION

*(Prepared by Barry Baker, COP Appointed Scientific Councillor for Bycatch & Zeb Hogan, COP Appointed Scientific Councillor for Fish)*

### Introduction

1. At COP9 the criteria for listing Appendix II species were the subject of a discussion when the basis for inclusion of several species on Appendix II was questioned. The concern was based on a proposal to list a species that was considered common and not threatened, and which therefore did not appear to require international cooperation to benefit its conservation. It was suggested that the criteria for listing under Appendix II were unclear and ambiguous, and should be reviewed by the Scientific Council to ensure consistency with the situation under other conventions.
2. ScC16, in discussing the Appendix II listing criteria, noted that the Convention text mentioned both 'unfavourable conservation status' and 'benefiting from international cooperation'. A species therefore need not have an unfavourable conservation status to be listed. The Council also recalled ScC11/Doc.6/Rev.2 (Baker et al. 2002) comparing the IUCN Red List Categories and Criteria (IUCN 2008) and the CMS appendices. This paper had recommended that the IUCN Red List Categories be used as a decision support tool in assessing the conservation status of listing proposals of migratory species to Appendix I and II. The Scientific Council at ScC11 had approved the recommendations of the paper for transmission to the Seventh Meeting of the Conference of the Parties. However, this did not occur and the report of COP7 contains no record of the recommendations being discussed or endorsed by the Conference of Parties.
3. ScC16 requested that ScC11/Doc.6/Rev.2 be revised for consideration at the 17th Meeting of the Council. A resulting paper, UNEP/CMS/Conf.10.37, expanded upon the earlier work, principally by updating references to the IUCN Red List Criteria and proposing the adoption of a two-stage approach when considering nominations. The process outlined focussed firstly on the conservation status of a species, and then considered the conservation benefit that could be achieved by a listing on either of the CMS Appendices. ScC17 believed there was considerable merit in adopting a two-stage process, but felt greater consideration could be given, in particular, to further developing the criteria for the second stage of this process. With this in mind, COP10 requested the Scientific Council to continue the work already undertaken in accordance with the following Terms of Reference:

*Develop a set of criteria to assist the Scientific Council and the Conference of Parties in assessing proposals for the listing of taxa to, and the delisting of taxa from, the appendices of the Convention. The proposed criteria should be developed in sufficient time for review by the Scientific Council at SC18, and subsequent consideration by COP11.*

4. This paper represents the results of that review, and has been developed by a Working Group initially established for this purpose at Sc16, and subsequently expanded at ScC17.

## Overview of the IUCN Red List System

5. In the absence of specific quantitative criteria for listing CMS species, the IUCN Red List of Threatened Species is a key reference on population status and trends of the world's fauna. Application of the 'Guidelines for using the IUCN Categories and Criteria' is recommended as providing guidance to evaluate species proposals submitted by CMS Parties. This paper proposes aligning the IUCN threat categories and the requirements for Appendix I and Appendix II established by the Convention, for the purposes of providing guidance to Scientific Councillor's during their assessment of nominations.
6. The IUCN Red List System is a hierarchical classification system developed to assess and highlight species of animals and plants under higher extinction risk. First conceived in 1964 and originally used by the IUCN's Species Survival Commission (SSC), the IUCN Red List System has set a global standard for species listing and conservation assessment efforts. For 50 years SSC has been evaluating the conservation status of species and subspecies on a global scale – highlighting those threatened with extinction and promoting their conservation.
7. The system was developed to focus attention on conservation measures designed to protect species at risk. Over time, IUCN has recognised that a more objective and scientific system for determining threat status, as well as a more accurate system for use at the national and regional level were needed. The IUCN Red List Categories were reviewed in the early 1990s through extensive consultation and testing involving more than 800 SSC members, and the wider scientific community. This resulted in a more precise and quantitative approach that was adopted by IUCN in 1994 (IUCN 1994).
8. Since their adoption in 1994, the Categories have become widely recognised internationally, and they are now used in a range of publications and listings produced by IUCN, as well as by numerous governmental and non-governmental organisations. Such broad and extensive use has meant the criteria are regularly reviewed to ensure their applicability to a wide range of organisms, especially long-lived species, and species under intensive management.
9. The SSC completed an extensive review of the categories and criteria used to list species on the IUCN Red List in 2000. The review produced a clearer, more open and easy-to-use system. With particular attention paid to marine species, harvested species, and population fluctuations, the review refined the effectiveness of the Red List Categories and Criteria as indicators of extinction risk. Extensive consultation and testing in the development of the system, together with its subsequent wide adoption by many government, intergovernmental and non-government organisations, strongly suggest that it is now robust across most organisms.
10. Guidelines for using the IUCN Categories and Criteria were last revised in February 2014 (IUCN 2014). It should be noted that for several years, the IUCN has not reviewed or revised the criteria themselves, but rather has refined the guidance around how to use them.

## Description of the listing categories

11. IUCN (2014) recognises the following categories of threat:

**Extinct (EX)** – A taxon is Extinct when there is no reasonable doubt that the last individual has died.

**Extinct in the Wild (EW)** – A taxon is Extinct in the Wild when it is known only to survive in cultivation, in captivity or as a naturalised population (or populations) well outside the past range.

**Critically Endangered (CR)** – A taxon is Critically Endangered when the best available evidence indicates that it meets any of the criteria A to E for Critically Endangered (IUCN 2011, Table 2.1), and it is therefore considered to be facing an extremely high risk of extinction in the wild.

**Endangered (EN)** – A taxon is Endangered when the best available evidence indicates that it meets any of the criteria A to E for Endangered (IUCN 2011, Table 2.1), and it is therefore considered to be facing a very high risk of extinction in the wild.

**Vulnerable (VU)** – A taxon is Vulnerable when the best available evidence indicates that it meets any of the criteria A to E for Vulnerable (IUCN 2011, Table 2.1), and it is therefore considered to be facing a high risk of extinction in the wild.

**Near Threatened (NT)** – A taxon is Near Threatened when it has been evaluated against the criteria but does not qualify for Critically Endangered, Endangered or Vulnerable now, but is close to qualifying for or is likely to qualify for a threatened category in the near future.

**Least Concern (LC)** – A taxon is Least Concern when it has been evaluated against the criteria and does not qualify for Critically Endangered, Endangered, Vulnerable or Near Threatened. Widespread and abundant taxa are included in this category.

**Data Deficient (DD)** – A taxon is Data Deficient when there is inadequate information to make a direct, or indirect, assessment of its risk of extinction based on its distribution and/or population status. A taxon in this category may be well studied, and its biology well known, but appropriate data on abundance and/or distribution are lacking. Data Deficient is therefore not a category of threat.

**Not Evaluated (NE)** – A taxon is Not Evaluated when it has not yet been evaluated against the criteria.

12. Listing to one of the above categories requires that a taxon be assessed against five quantitative criteria – meeting any one of these criteria qualifies a taxon for listing at that level of threat. The five criteria are described in detail in IUCN (2011), and are:
- A. Reduction in population size;
  - B. Restricted geographic range in the form of either in extent of occurrence or the area of occupancy;
  - C. Small population size and decline;
  - D. Very small or restricted population; and
  - E. Quantitative analysis showing a high probability of extinction.

13. The criteria can be applied at any taxonomic unit at or below the species level. They can also be applied at various geographic scales. The IUCN Red List Categories are intended to be an easily and widely understood system for classifying species at high risk of global extinction. The general aim of the system is to provide an explicit, objective framework for the classification of the broadest range of taxa according to their extinction risk.

### **The implications for CMS**

14. The Convention provides for the listing of species on both Appendix I and Appendix II, providing a clear indication that both lists were intended to lead to different conservation action by Parties. Appendix I emphasises the need for habitat conservation, removal of barriers to migration and management of threats (Article III paragraph 4) by a Party or Parties, whereas Appendix II puts the emphasis on international cooperation and the conclusion of agreements. Conservation benefit is not explicitly listed in the Convention text as a criterion for Appendix I listing. However, the fact that not all endangered migratory species are listed on Appendix I implies that Parties are, at least implicitly, making judgements about conservation benefit when they make proposals to list or uplist species. On that basis, and to provide clarity in the listing process, there is probably benefit in seeking explicit information on the anticipated conservation benefits of listing for all proposals – whether for Appendix I or Appendix II.

### *Criteria for Appendix I*

15. CMS requirements for listing species or populations to Appendix I are set out in paragraphs 1 and 2 of Article III:

*‘Appendix I shall list migratory species which are endangered. A migratory species may be listed in Appendix I provided that reliable evidence, including the best scientific evidence available, indicates that the species is endangered.’*

16. Article I paragraph 1 e) includes the following definition of ‘*endangered*’ for the purposes of the Convention:

*‘Endangered’ in relation to a particular migratory species means that the migratory species is in danger of extinction throughout all or a significant portion of its range.*

17. The Convention appears to have struggled to come to grips in interpreting this definition since its inception. In 1997 Resolution 5.3 was approved by COP5, following a recommendation from both the ScC and StC, which interpreted the term ‘*endangered*’ in Article I, paragraph 1 e), of the Convention, as meaning:

*..... ‘facing a very high risk of extinction in the wild in the near future’.*

Resolution 5.3 further stated that the Convention:

*‘Shall be guided, in assessing the endangered status for the purposes of listing in Appendix I, by the findings of the 40th Meeting of the IUCN Council or by an independent assessment by the Scientific Council based on the best available data.’*

18. The definition in Resolution 5.3 aligns very closely with the definition of Endangered used in the Guidelines for using the IUCN Categories and Criteria (IUCN 2014). Combining this with the acceptance by ScC11 of the value of using IUCN criteria for the purposes of the CMS Appendices, it would therefore be reasonable to assume that this principle had wide acceptance within the Convention, certainly, at least, for listings on Appendix I.
19. It is considered that the IUCN categories and criteria are sufficiently developed and widely understood as to recommend them for use in assessing the appropriateness of listing a taxon on CMS Appendix I. It is suggested a taxon assessed as ‘Extinct in the Wild’, ‘Critically Endangered’, or ‘Endangered’ using the IUCN Red List criteria, and which is nominated for inclusion on Appendix I, should be considered for listing on Appendix I.
20. For the avoidance of doubt, the scale of the red list assessment should match the scale of the listing proposal. Thus for a global listing, the red list assessment used should be a global assessment. However, if a split listing is contemplated, regional assessments may be worth considering.
21. In many cases, independent Red List assessments are carried out and updated regularly by other organisations. These assessments, when done by groups who are recognised by the IUCN as experts in the area, could be used as additional information by the Scientific Council when considering a nomination.
22. The IUCN listing categories recognise situations where a taxon may be assessed as ‘Data Deficient’ or ‘Not Assessed’ (see paragraph 11). Where an applicable Red List Assessment for a taxon or taxa is not available at the time a listing proposal is under consideration, a decision to list on Appendix I can still be made after a quantitative assessment has been undertaken by the Scientific Council, based on the best available data.
23. If the approach proposed in Paragraph 19 is adopted by CMS, it follows that a taxon that does not meet the IUCN criteria for EW, CR, or EN should not be considered, in principle, as a suitable candidate for Appendix I.

#### *Criteria for Appendix II*

24. CMS requirements for listing species or populations on Appendix II are set out in paragraphs 1 and 2 of Article IV, and state three ‘tests’ that need to be considered for a listing nomination to be successful:
 

*‘Appendix II shall list migratory species which have an unfavourable conservation status (Test 1) and which require international agreements for their conservation and management (Test 2), as well as those which have a conservation status which would significantly benefit from the international cooperation (Test 3) that could be achieved by an international agreement’.*
25. When assessing the conservation status of a taxon (Test 1) it seems reasonable to conclude that any species considered to be threatened with extinction has an unfavourable conservation status, whereas those that are not under threat of extinction have a favourable conservation status. Applying such a definition, any taxon assessed as ‘Extinct in the Wild’, ‘Critically Endangered’, ‘Endangered’, ‘Vulnerable’ or ‘Near

Threatened’ using the IUCN Red List criteria could be considered to have ‘*an unfavourable conservation status*’ and therefore meet Test 1. Only inclusion of the ‘Near Threatened’ category would appear to be slightly contentious, but given that the IUCN defines NT as ‘*close to qualifying for, or is likely to qualify for, a threatened category in the near future*’, such a categorisation would reasonably indicate a conservation status that is not optimal. As with Appendix I listings, the scale of the red list assessment should match the scale of the proposed listing (see paragraph 20). It may also be helpful to provide interpretation of the concept of ‘near future’; a decade seems to be the sort of timeframe over which predictions can realistically be made.

26. It should be noted that to be eligible for listing on Appendix II, a taxon must have an unfavourable conservation status **and** require international agreements for their conservation and management. Therefore, even if a taxon meets the criteria for those IUCN categories, Scientific Councillors will still be required to assess whether the taxon requires an international agreement for their conservation and management (Test 2).
27. The IUCN categories and criteria do not necessarily provide guidance on whether a taxon ‘*would significantly benefit from the international cooperation that could be achieved by an international agreement*’. Such a judgement requires the application of criteria other than those developed for assessing conservation status, and will vary depending on a range of factors that are taxon-specific. Such an assessment is probably best decided on a case by case basis. Some principles that might be applied are whether:
- existing legislation in the Range States is sufficient, or if further protection is needed;
  - the majority of the population of the species concerned is migratory or sedentary;
  - the factors that have led to an unfavourable conservation status are anthropogenic or natural;
  - existing bilateral or multilateral measures/agreements need to be boosted or amended; and
  - all range states already protect the species or have management recovery plans in place;
  - listing on a CMS Appendix would support (or complicate/confuse) discussions in other multilateral fora.

Other suggestions from the Scientific Council would be welcome.

28. It is suggested that nomination for Appendix II should be seen as a three stage process. The first stage should be based on conservation status as determined by the IUCN Red List criteria, with migratory taxon with a status of EW, CR, EN, VU or NT being eligible for consideration for listing on Appendix II. Proponents nominating any taxon for inclusion on Appendix II, regardless of its Red List Status, should then be required to clearly indicate how the nomination and subsequent development of international cooperation will benefit the taxon, and their intention with respect to concluding an international agreement. Some conservation benefits could be that an agreement would a) help prevent the species becoming eligible for listing Appendix I in the near future and/or b) an agreement would aid the recovery of a species and/or its risk of extinction (as defined by Red List categories) would reduce. It would be expected that a proponent would provide more detail in the nomination. Ideally, this will include the proponent taking on the role of Focal Point for the nominated taxon.



29. CMS Appendix II currently includes listings of taxonomic units above the species level, although nominations at the higher taxonomic level have not occurred for the last 15 years. Such listings, particularly where the taxonomic unit contains many species, have proven problematic for some jurisdictions as they have included a number of species that are common, face no apparent threat and, in some cases, are not migratory and therefore may not require international cooperation to benefit their conservation. Future nominations at a taxonomic level higher than the species level are therefore not recommended.
30. It should also be noted that under the articles of the Convention, species can be added to both Appendix I and II. Such a dual listing is appropriate in those circumstances where a species that is considered endangered and requires strict conservation measures (such as no directed take and habitat protection), could also benefit from international cooperative action. These instances are best determined by the Scientific Council on a case-by-case basis.

*Delisting of taxa from the appendices of the Convention*

31. Article XI, Amendment of the Appendices, also outlines the process for amending the Appendices to the Convention. In particular:
2. *Proposals for amendment may be made by any Party.*
  3. *The text of any proposed amendment and the reasons for it, based on the best scientific evidence available, shall be communicated to the Secretariat at least one hundred and fifty days before the meeting and shall promptly be communicated by the Secretariat to all Parties.*
32. As such, nominating a species for delisting should follow the same process as nominating a species for inclusion in the Appendices to the Convention.
33. However, Paragraph 3 of Article III provides additional considerations where a species no longer considered to be endangered can be removed from Appendix 1.
- 'A migratory species may be removed from Appendix I when the Conference of the Parties determines that:*
- a) *reliable evidence, including the best scientific evidence available, indicates that the species is no longer endangered; and*
  - b) *the species is not likely to become endangered again because of loss of protection due to its removal from Appendix I.'*

Therefore, there are two conditions that must be satisfied before a species or taxon can be removed from Appendix 1.

34. Determining if a taxon is unlikely to become endangered again because of loss of protection due to its removal from Appendix 1, and thus meeting the second condition described in Article III Para 3 a), would seem to be most appropriately assessed on a case-by-case basis, using the best available information.
35. However, it should be noted that in those instances where species proposed for delisting are also captured under the management regimes of other conventions, the Party submitting a nomination for delisting should consult those relevant conventions regarding the suitability of removing the protection provided by the CMS Appendices.

Such consultation will ensure that a complete assessment of the consequences of delisting a species from CMS have been considered within the context of the whole management of the species.

36. Article IV, which relates to Appendix II species, does not contain any reference to the removal of a species from the Appendix, and this subject was not considered further by the Working Group.

## **Recommendations**

37. It is recommended that the Conference of the Parties considers the suggestions in this paper and agrees to use the IUCN Red List Categories and Criteria as a decision support tool in assessing the conservation status of listing proposals of migratory species to Appendix I and II on the following basis:
- a) a taxon assessed as ‘Extinct in the Wild’, ‘Critically Endangered’, or ‘Endangered’ using the IUCN Red List criteria is eligible for consideration for listing on Appendix I, recognising that CMS Appendix I species are broadly defined as ‘endangered’;
  - b) a taxon assessed as ‘Extinct in the Wild’, ‘Critically Endangered’, ‘Endangered’, ‘Vulnerable’ or ‘Near Threatened’ using the IUCN Red List criteria is eligible for consideration for listing on Appendix II; recognising that such species can be broadly defined as having ‘an unfavourable conservation status’, and where it can be demonstrated that the taxon is likely to benefit from concluding an international agreement;
  - c) The conservation benefits of listing should be explicitly stated for both Appendix I and Appendix II listing proposals;
  - d) The scale of red list assessment should match the scale of the listing proposal as far as possible; and
  - e) Given that Article IV of the Convention does not require a taxon to have an unfavourable conservation status to be listed on Appendix II, species not at risk of extinction as determined by the IUCN Red List criteria may be listed on Appendix II if a proponent is able to clearly demonstrate all three of the following:
    - i. how the nomination will benefit the taxon; and
    - ii. their intention with respect to concluding an international agreement; and
    - iii. a willingness to adopt the role of Focal Point for the nominated taxon and lead the development of an international agreement.
38. With regard to removing a species from the Appendices, the Conference of Parties should consider the processes outlined in Article III and Article XI of the Convention when assessing the status of a migratory species in relation to it being considered for removal from Appendix I. Furthermore, for those species listed under other international management arrangements, the Party submitting a nomination for delisting should consult those relevant conventions regarding the suitability of removing the protection provided by the CMS Appendices.

39. It is recommended that, subsequent to Scientific Council 18, but before the deadline for COP11 resolutions, a resolution is drafted for consideration by the Conference of the Parties which incorporates the principles and processes outlined in this paper.

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