
Introduction

Welcome to this the supplement to the fourteenth volume of the *Journal of Cetacean Research and Management*.

This supplement to the Journal contains the Report of the Scientific Committee from its Annual Meeting held from 11-23 June 2012 in Panama City, Panama. The meeting was attended by some 155 participants (including over 45 invited participants); 27 member nations were represented. It also contains the reports of seven intersessional meetings:

- (1) the Report of the Technical Advisory Group (TAG) Meeting on Short and Medium Term Objectives and Plans for the IWC-POWER Cruises held in September 2011 in Tokyo, Japan;
- (2) the Report of the Second 'First Intersessional Workshop' for the *Implementation Review* of Western North Pacific Common Minke Whales held in December 2011 in Tokyo, Japan;
- (3) the Report of the AWMP Workshop Focusing on the PCFG Gray Whale *Implementation Review* held in March 2012 in La Jolla, California, USA;
- (4) the Report of the 2012 Intersessional IA Workshop on Estimating Abundance of Antarctic Minke Whales held in May 2012 in Bergen, Norway;
- (5) the Report of the Workshop on Interactions between Marine Renewable Projects and Cetaceans Worldwide held in Panama City, Panama in June 2012;
- (6) the Report of the Second Workshop on Welfare Issues Associated with the Entanglement of Large Whales, with a Focus on Entanglement Response held in October 2011 in Provincetown, Massachusetts, USA; and
- (7) the Report of the Workshop on the Assessment of Southern Right Whales held in September 2011 in Buenos Aires, Argentina.

Several topics were discussed in Panama. One major change is the decision made by the Commission to meet Biennially rather than Annually from now on, which means there will be no Commission meeting in 2013. The Scientific Committee will continue to meet annually.

A brief summary of the work of the Scientific Committee in Panama is given below. Full details of the large amount of work undertaken can be found in the report of the Scientific Committee and its many sub-groups in this supplement.

The Committee continued its work on matters related to the Revised Management Procedure (RMP). The RMP was developed to establish a conservative way to evaluate anthropogenic removals in the light of potential future commercial catches (there is a moratorium on commercial catching of whales in force). The objectives for commercial catches were established by the Commission with the highest priority being to ensure that no catches would be allowed if there was a possibility that the populations subject to exploitation were below 10% of the level at which maximum sustainable yield might be obtained (i.e. 54% of the unexploited population size). There is a focus on fully taking into account scientific uncertainty when providing advice. The major work in 2012 was on the continuing *Implementation Review* for western North Pacific common minke whales which is anticipated to be completed in 2013. The primary issues related to stock structure, abundance and bycatches in fishing gear.

'Aboriginal subsistence whaling' is regulated by the IWC in several parts of the world. Fully tested, conservative long-term approaches to provide advice on Bering-Chukchi-Beaufort Seas (B-C-B) stock of bowhead whales and eastern North Pacific gray whales have been developed and agreed (these are known as *Strike Limit Algorithms* or *SLAs*). In 2012, the Committee completed the regular *Implementation Review* for B-C-B bowhead whales and agreed that the *Bowhead SLA* continues to be the most appropriate way for the Committee to provide management advice. In 2012, work was virtually completed on an *SLA* for a possible future hunt of gray whales by the Makah Tribe off Washington State, USA. For a number of reasons, primarily related to stock structure, although an interim (around 10 years) approach to providing advice on safe catch limits for the hunts off Greenland has been developed, final long-term *SLAs* are still under development. Completing this work is a high priority for the Scientific Committee and work continued on this topic in 2012.

The Committee as usual provided advice on whether proposed strike limits for subsistence hunts by subsistence whaling countries were sustainable.

The issues of bycatches of whales in fishing gear and collisions with ships are important at a number of levels including animal welfare and may have conservation implications for certain populations. The Scientific Committee has been working on this issue for several years. In 2012, discussions focussed on the report of the second IWC workshop on Welfare Issues Associated with the Entanglement of Large Whales. The Workshop focussed on entanglement response and capacity building but several topics from the workshop were also relevant to estimating risk, including the mechanisms by which large whales become entangled. The Committee endorsed the establishment of an IWC expert panel to advise member nations on issues related to large whale entanglement and a potential database of entanglement events. The Committee also endorsed continued work on the IWC's ship strikes database.

The Committee has been working for several years to agree abundance estimates for Antarctic minke whales for the final two sets of circumpolar (CP) international cruises undertaken by the IWC; CPII (1985/86-1990/91) and CPIII (1992/93-2003/04). In 2012, agreed estimates were obtained of 720,000 (95% CI 512,000; 1,012,000) for CPII and 515,000 (95% CI 361,000; 733,000) for CPIII (1992/93-2003/04). After correcting for boundary differences, the trend information showed that the biggest declines occurred in Areas I and II whereas the estimates in Areas IV showed no decline and in Area VI increased. These corrected estimates over the entire Antarctic show a more recent total abundance estimate of around 30% lower than the earlier estimates. Although not statistically significant, the Committee believes that the estimates probably represent a change and so is exploring possible causes for the decline in the estimates. The aim is to see if they represent a true decline in numbers rather than being a result of e.g. changes in ice extent or distribution.

The Committee also continued work on assessments of other Southern Hemisphere species including blue whales, humpback whales and right whales. At the circumpolar level, blue whales have been shown to be increasing at around 8% but the Committee is investigating whether it will be possible to provide population level assessments. An important component of this is the work being undertaken under the blue whale project of the Southern Ocean Research Partnership (SORP). Southern Hemisphere right whales have been recovering at about 6-7% at the circumpolar level and are now at about 20% of their unexploited population size although some populations remain very small and have no good trend information. Conservation Management Plans are being developed for southern right whales in the southwest Atlantic and Chile-Peru.

Understanding North Pacific gray whale stock structure is vital for determining the status of animals on the western and eastern feeding grounds and assessing human impacts including subsistence hunting and oil and gas operations. The Committee is undertaking a major review of information from telemetry, genetic and photo-identification studies.

The Committee examined a number of topics related to the environment and cetaceans. These included: progress on Phase II of the POLLUTION 2000+ research programme and the impacts of oil and dispersants on cetaceans. This year, the major focus was on Marine Renewable Energy Development (MRED) including wind farms, tidal-stream driven devices and wave energy converters. The demand for this type of energy is increasing around the world. The Committee endorsed general principles and a strategy to minimise environmental threats posed by these developments. The Scientific Committee can assist in implementing aspects of this including: (1) assisting with international, collaborative research to determine baseline basic information about cetaceans that might be affected; (2) evaluating possible population impact assessments, especially those using modelling approaches that account for cumulative impacts from all sorts of threats; (3) designing monitoring projects to assess potential impacts; and (4) helping to promote data-sharing.

The focus for discussions this year on whalewatching centred on the scientific aspects of the Commission's Five-Year Strategic Plan for Whalewatching and on the assessment of the impacts of whalewatching on cetaceans.

The Committee's main focus for small cetaceans was a review of ziphiids in the North Pacific Ocean and the northern Indian Ocean. Beaked whales are difficult animals to study and so there are major information gaps for several of the species. A well-known threat to beaked whales comes from military sonar and seismic surveys. The Committee strongly recommended that military exercises involving sonar and seismic surveys should avoid important beaked whale habitat and that other mitigation measures should be improved. It is also possible that beaked whales are especially vulnerable to marine debris and further investigation of this issue is required. Other important issues discussed included the critical conservation needs for the vaquita if extinction is to be avoided, and the grave situation for many populations of river dolphins. On a positive note the Committee was pleased to receive progress reports on the nine projects funded under the IWC's voluntary fund for small cetaceans.

The IWC has a new website, and also a new web address: <http://www.iwc.int>. The website will be used increasingly in the future to distribute documents and reports. Papers for the Journal are now submitted, reviewed and, if accepted, published online.

Greg Donovan

Editor

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Supplement Contents

This supplement to the Journal contains the Report of the Scientific Committee from its Annual Meeting held from 11-23 June 2012 in Panama City, Panama. It also contains: the Report of the Technical Advisory Group (TAG) Meeting on Short and Medium Term Objectives and Plans for the IWC-POWER Cruises held in September 2011 in Tokyo, Japan; the Report of the Second 'First Interessional Workshop' for the Implementation Review of Western North Pacific Common Minke Whales held in December 2011 in Tokyo, Japan; the Report of the AWMP Workshop Focusing on the PCFG Gray Whale Implementation Review held in March 2012 in La Jolla, California, USA; the Report of the 2012 Interessional IA Workshop on Estimating Abundance of Antarctic Minke Whales held in May 2012 in Bergen, Norway; the Report of the Workshop on Interactions between Marine Renewable Projects and Cetaceans Worldwide held in Panama City, Panama in June 2012; the Report of the Second Workshop on Welfare Issues Associated with the Entanglement of Large Whales, with a Focus on Entanglement Response held in October 2011 in Provincetown, Massachusetts, USA; and the Report of the Workshop on the Assessment of Southern Right Whales held in September 2011 in Buenos Aires, Argentina.

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