Agenda Item 13  National Reporting

France

Action Requested
• Take note
• Comment

Submitted by  France

NOTE:
DELEGATES ARE KINDLY REMINDED TO BRING THEIR OWN COPIES OF DOCUMENTS TO THE MEETING
2012 ASCOBANS Annual National Reports

This format for the ASCOBANS Annual National Reports was endorsed by the 6th Meeting of the Parties in 2009. Reports are due to be submitted to the Secretariat by 31 March of each year.

Parties are requested to use this report to provide NEW information on measures taken or actions towards meeting the objectives of the Conservation and Management Plan and the Resolutions of the Meeting of the Parties.

The 7th Meeting of the Parties in 2012 agreed to move to online reporting with immediate effect. In order to benefit fully from the opportunities for synergies among CMS Family treaties afforded by this tool, Parties decided that a revised national report format be developed by a small working group assisted by the Secretariat for consideration by the Advisory Committee in preparation for the 8th Meeting of the Parties. While retaining the questions related only to ASCOBANS, it should align more closely to the format used in CMS, AEWA and EUROBATS.

General Information

Name of Party
› France

Report submitted by

<table>
<thead>
<tr>
<th>Name</th>
<th>Hassani Sami</th>
</tr>
</thead>
<tbody>
<tr>
<td>Function</td>
<td>Delegate</td>
</tr>
<tr>
<td>Organization</td>
<td>LEMM Oceanopolis</td>
</tr>
<tr>
<td>Address</td>
<td>Port de Plaisance du Moulin Blanc, 29200 Brest, France</td>
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<td>Telephone/Fax</td>
<td>+ 33 298 344 052 / + 33 298 344 069</td>
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<tr>
<td>Email</td>
<td><a href="mailto:sami.hassani@oceanopolis.com">sami.hassani@oceanopolis.com</a></td>
</tr>
</tbody>
</table>

Changes

Changes in Coordinating Authority or appointed Member of the Advisory Committee
› None

List of National Institutions

List of national authorities, organizations, research centres and rescue centres active in the field of study and conservation of cetaceans, including contact details
› Observatoire PELAGIS, UMS 3462 Université de La Rochelle-CNRS, La Rochelle PELAGIS/ULR
  olivier.vancanneyt@univ-lr.fr ; crmm@univ-lr.fr
› Centre de la Mer Côte Basque/ Muséum National d'Histoire Naturelle MNHN/CMCB
  contact@ermma.fr ; ikercastege@yahoo.fr
› Groupe d’Etude des Cétacés du Cotentin et des mammifères marins de la mer de la Manche, Cherbourg
  GECC
  gecc@wanadoo.fr
› Groupe d’Etude de la Faune Marine Atlantique, Cap-Breton GEFMA
  alexandre.dewez@free.fr
› Groupe Mammalogique Normand, Caen GMN
  groupemammalogiquenormand@orange.fr
› Institut Français pour l’Exploitation de la Mer, Brest Ifremer
  yvon.morizur@ifremer.fr
› Laboratoire d’Etude des Mammifères Marins, Océanopolis, Brest LEMM sami.hassani@oceanopolis.com
› Littoral, Environnement et Sociétés, UMR 7266 Université de La Rochelle- CNRS, La Rochelle LIENSS/ULR
  vincent.ridoux@univ-lr.fr
› Observatoire pour la Conservation et l’Etude des Animaux et Milieux Marins OCEAMM oceamm@orange.fr
Habitat Conservation and Management

Fisheries Interactions
Direct Interaction with Fisheries

1.1 Investigations of methods to reduce bycatch
› A programme named INPECMAM has been funded and agreed between the fishermen, the Iroise sea MPA, University of Brest, the National Natural History Museum and Oceanopolis to work on the by-catch of marine mammals (cetaceans and seals) and the depredation in set net fishery in the Iroise sea. The programme was in course in 2012 and is scheduled to finish at the end of 2013.

The observer programs (Filmancet) dedicated to set nets in the Channel was achieved http://archimer.ifremer.fr/doc/00035/14666/ and the national program OBSMER dedicated to all the observations at sea has taken in its objectives to include observations of the English channel set net fisheries. The results are now included in the national report for regulation 812/2004.

For set net and pelagic trawl fisheries, observers for the EC regulation (no 812/2004) are deployed for vessels greater than 15 meters and through pilot studies for vessels less than 15 m. However it was not possible to put observers on boats less than 8m for security reason.

1.2 Implementation of methods to reduce bycatch
› Modification of practices in pelagic trawling (headline at 5 m depth)

1.3 Other relevant information
Other relevant information, including bycatch information from opportunistic sources
› Since 2012 January 1st, a French ministerial regulation requires fishermen to report marine mammals by catch with the objective of contributing to scientific knowledge. The aims of this regulation don’t produce by catch estimates but should involve fishermen through scientific program on knowledge of the species: composition of catches, spatial and temporal distribution, etc.. End of 2012, a pilot program with four fishing ports (Atlantic and English Channel coast) began to assess the possibility of land by-caught animals for biological samples (diet, genetic, age, reproductive status, contaminant,…). These program is coordinated by PELAGIS/ULR (CRMM) Estimates of by-catch in set net and pelagic trawl fisheries

1.4 Report under EC Regulation 812/2004
Please provide the link to your country's report under EC Regulation 812/2004.
› None

Reduction of Disturbance

2.1 Anthropogenic Noise
Please reference and briefly summarise any studies undertaken
› IFREMER continues to apply mitigation measures on his seismic surveys, based on the classical international recommendations. The use of a PAM system is now being considered when high-power seismic sources are to be deployed. The order of a complete passive monitoring system is planned for early 2013.

Study projects are being launched in France (about the monitoring and control of the anthropogenic noise in the sea) in the framework of the DCSMM (Directive Cadre Stratégie pour le Milieu Marin). Most noticeably, a synthesis report (Bilan des activités anthropiques génératrices de bruit sous-marin et de leur récente évolution en France Métropolitaine) has been produced by SHOM (the French Hydrography Service). However at this stage these works do not address directly the impact on the cetacean populations.
2.2 Ship Strike Incidents

Please list all known incidents and provide information separately for each:

<table>
<thead>
<tr>
<th>Incident</th>
<th>Date</th>
<th>Species</th>
<th>Type of Injury</th>
<th>Fatal Injury (Yes/No)</th>
<th>Type of Vessel (length, tonnage, speed)</th>
<th>Location (coordinates)</th>
<th>More Information (name, email)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Incident 1</td>
<td>09/07/2012</td>
<td>Sperm Whale</td>
<td>Ship strike</td>
<td>Yes</td>
<td>unknown</td>
<td>Arcachon</td>
<td>PELAGIS/ULR</td>
</tr>
<tr>
<td>Incident 2</td>
<td>18/07/2012</td>
<td>Fin whale</td>
<td>Ship strike</td>
<td>Yes</td>
<td>unknown</td>
<td>Plouhinec</td>
<td>PELAGIS/ULR</td>
</tr>
<tr>
<td>Incident 3</td>
<td>02/06/2012</td>
<td>Minke whale</td>
<td>Ship strike</td>
<td>Yes</td>
<td>Containers ship</td>
<td>Marseille</td>
<td>PELAGIS/ULR</td>
</tr>
</tbody>
</table>

2.3 Major Incidents

Major Incidents Affecting Significant Numbers of Cetaceans (two or more animals):

<table>
<thead>
<tr>
<th>Incident 1</th>
<th>Date</th>
<th>Location</th>
<th>Type of Incident</th>
<th>Further Information</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Incident 2</td>
<td>Winter 2012</td>
<td>Atlantic and Channel coast</td>
<td>Multiple strandings of common dolphin and other small cetaceans</td>
<td>Between January and March, 450 carcasses of small cetaceans (67% of common dolphin) are recorded on the Atlantic coast. Two major peaks appeared in late January and early March, with respectively 80 and 120 strandings during periods less than 10 days, cause of death appears to be the most often by catch.</td>
<td></td>
</tr>
</tbody>
</table>

2.4 Pollution and Hazardous Substances

Please report on main types of pollution and hazardous substances (including source, location and observed effects on cetaceans). Please provide information on any new measures taken to reduce pollution likely to have an impact.

Chemical pollution was evaluated in five species of small cetaceans that frequent the NW Iberian Peninsula waters: the common dolphin, the harbour porpoise, the bottlenose dolphin, the striped dolphins and the long-finned pilot whale. To this aim, 14 trace elements (Ag, As, Cd, Co, Cu, Cr, Fe, Hg, Mn, Ni, Pb, Se, V, Zn), 32 congeners of polychlorinated biphenyl ethers (PCBs) and 9 congeners of polybrominated diphenyl ethers (PBDEs) were analysed in samples of the main storage tissues for these pollutants (i.e. liver, kidney and blubber) collected from stranded and/or by-caught animals along the NW Iberian Peninsula coast between 2004 and 2008. Fieldwork was conducted by members of the Spanish (Coordinaadora para o estudio dos mamíferos mariños, CEMMA) and Portuguese (Sociedade Portuguesa de Vida Salvagem, SPVS) stranding networks and was part of the PhD project of P. Méndez Fernandez. This project was a collaboration between the university of La Rochelle, the University of Minho, in Braga Portugal, the marine laboratory of Scotland and the Spanish Oceanographic Institute (IEO) from Vigo, Spain.

2.5 Other Forms of Disturbance

Please provide any other relevant information, e.g. relating to recreational activities affecting cetaceans.

None
Marine Protected Areas
Marine Protected Areas for Small Cetaceans

3.1 Relevant Information

Please provide any relevant information on measures taken to identify, implement and manage protected areas for cetaceans, including MPAs designated under the Habitats Directive and MPAs planned or established within the framework of OSPAR or HELCOM.

Between October 2008 and February 2010, 95 marine Natura 2000 sites have been designated by France. Among all existing Natura 2000 sites in the ASCOBANS area, Bottlenose dolphin is listed in 39 and Harbour porpoise in 37, both on the Channel and Atlantic coast.

The Management Plan of the Marine Protected Area in Iroise Sea (West Brittany) is applicable to the Natura 2000 sites of the Molène archipelago and Ouessant.

Creation on a new MPA « Estuaires picards / mer d’Opale (English Channel-North Sea)» in December 2012.

3.2 GIS Data

Please indicate where GIS data of the boundaries (and zoning, if applicable) can be obtained (contact email / website).

Ministère de l’Écologie, du Développement durable des transports et du Logement Mer
Grande Arche
Tour Pascal A et B
92055 La Défense CEDEX
Natura 2000 network :
charlotte.de-pins@developpement-durable.gouv.fr
Téléphone
tél : + 33 (01) 40 81 21 22

Agence des aires marines protégées
Président : Jérôme Bignon, député de la Somme
Directeur : Olivier LAROUSSINIE
Adresse du siège et contact :
Agence des aires marines protégées
16 quai de la Douane
29229 Brest Cedex 2
standard : +33 (0)2 98 33 87 67
télécopie : +33 (0)2 98 33 87 77
Surveys and Research

4.1 Abundance, Distribution, Population Structure

Overview of Research on Abundance, Distribution and Population Structure

› Monitoring of the coastal group of bottlenose dolphins (Oceanopolis Brest in Iroise Sea), photo-identification, home range, population structure (new protocol with the Iroise MPA).

Photo identification of bottlenose dolphins of the Bay of Mont Saint Michel and Cotentin (GECC, GMN, Al Lark) Boat surveys on cetaceans in the southern Bay of Biscay (GEFMA); relationship between cetacean populations and climate change (MNHN in the framework of a regional programme on the marine environment).

Data collection of opportunistic sightings (PELAGIS/ULR, GECC, GEFMA, Oceanopolis Brest).

Systematic vessel survey of cetaceans in relation to oceanographic, planktonic and pelagic fish spatial patterns in the Bay of Biscay

- RELGAS Program, Ifremer, PELAGIS/ULR: spring survey carried out yearly in May on the continental shelf of the Bay of Biscay (pelagic fish, plankton, physical parameters and top predators are recorded simultaneously);
- BTS Program, Ifremer, PELAGIS/ULR: winter survey carried out yearly in January across the English Channel: (pelagic fish, plankton, physical parameters and top predators are recorded simultaneously);
- EVHOE Program, Ifremer, PELAGIS/ULR: autumn demersal fish survey carried out yearly in October-November across the Bay of Biscay (top predators recorded on transit between trawl hauls);
- RELACUS Program Centro Oceanográfico de Vigo (Instituto Español de Oceanografía, IEO), in co-operation with PELAGIS/ULR: spring survey carried out yearly in April over the continental shelf from southern Bay of Biscay to Galicia (pelagic fish, plankton, physical parameters and top predators are recorded simultaneously).

SAMM Program: Two 4-months systematic aerial surveys of cetaceans and other megafauna (mainly seabirds) have been conducted by PELAGIS/ULR and AAMP from November 2011 to August 2012 to identify priority areas for the designation of future Natura 2000 sites in the French EEZ. The survey protocol follows a systematic zig-zag line transect pattern across 4 bathymetric strata: coastal, shelf, slope and oceanic. The survey area encompassed the French EEZ extended to the South of Bay of Biscay (Spanish EEZ) and the British Channel. Overall, 100 000 km of transect have been sampled. In the ASCOBANS area, a total of 922 and 1235 sightings of cetaceans were collected during the winter and the summer survey, respectively. Concurrently, sightings of seabirds, turtles and elasmobranches have been recorded, providing an original overview of the annual distribution of the megafauna species.

In order to improve knowledge of harbor porpoise populations, we have started a pilot project to create a passive acoustic monitoring scheme along the French coasts. In the MARSAC project, 4 acoustic devices have been deployed since the beginning of 2013 and will be maintained during at least one year in front of Arcachon basin with the collaboration of local fishermen. They are involved to help the scientists to choose the better mooring sites, to give the logistical support to deploy and retrieve the acoustic device and to avoid loss of devices.

Ferry observer surveys between Roscoff and Cork, Portsmouth and Santander (Orca/ Oceanopolis Brest), using a standardized protocol.


The ecological niche of five sympatric species of small cetaceans that frequent the waters of the NW Iberian Peninsula was studied in order to determine if there is an habitat and resource partitioning or in opposition a competition among these species in the area (Méndez-Fernandez et al., 2013). This fact is important to determine the main threats at which species will be exposed and therefore have to be taken into account in the future conservational plans that will be carrying out in the area. To this aim, ecological tracers (i.e. stable isotopes of carbon and nitrogen and cadmium concentrations) were analysed in a multi-tracer approach. This study is part of the P. Méndez Fernandez PhD project (presented above)Population structure of common dolphins in the eastern North Atlantic is investigated using a genome-scan approach (RADtag sequencing) (A. Viricel post-doctoral project, PELAGIS/ULR).

Prey preferences among the community of 9 species of deep-diving odontocetes from the Bay of Biscay were investigated from stranded material showing (Spitz et al. 2011. Deep Sea Research I; PELAGIS/ULR). The study described diets from stomach content analysis and showed resource partitioning within the assemblage. With more than 14,000 identified cephalopods from 39 species, the present study highlighted also the poorly known deep-sea cephalopod community off the Bay of Biscay using top cetaceans as biological samplers. An ECOPATH model of the Bay of Biscay was aimed to model the energy fluxes within the food web of this highly pressured ecosystem. A model comprising 30 living and two non-living compartments was successfully constructed with data from the Bay of Biscay continental shelf. Ecological network analysis provided evidence that bottom-up processes play a significant role in the population dynamics of upper-trophic levels, including cetaceans (Lassalle et al. 2011, Progress in Oceanography).

Monitoring of the coastal group of bottlenose dolphins (Oceanopolis Brest in Iroise Sea), photo-identification, home range, population structure (a new protocol is under work with the Iroise MPA).
4.2 Technological Developments

New Technological Developments
› Trials of a passive acoustic monitoring in the archipelago of Molène on the resident group of bottlenose dolphins (Iroise Sea MPA/ENSIETA/Oceanopolis). The goal is to implement a permanent acoustic monitoring in addition to line transects and photo-identification.

4.3 Other Relevant Research
› None
Use of Bycatches and Strandings

Post-Mortem Research Schemes

5.1 Contact Details

Contact details of research institutions and focal point

› French stranding network is nationally coordinated by PELAGIS/ULR under an agreement with the Ministry in charge of the Environment. Local voluntary observers, generally under local supervision by various institutions or NGOs (Oceanopolis, GEFMA, GECC, GMN, OCEAM, CMNS, Picardie Nature, ONCFS...), have been trained to process stranded cetaceans under a common standardized protocol. An annual synthesis of all strandings reported in France is produced by PELAGIS/ULR. Statistics of stranding for the coasts of France in the ASCOBANS region in 2012 indicate more than 1011 cetaceans reported. Stranding data provides information on death causes, demographic structure (age and reproductive status), diet (stomach content), trophic levels (stable isotopes) and subpopulation structure or movement pattern (genetic, stable isotopes, heavy metals and contaminants).

Observatoire PELAGIS/ULR, Université de La Rochelle,
La Rochelle PELAGIS/ULR /ULR willy.dabin@univ-lr.fr

5.2 Methodology

Methodology used (reference, e.g. publication, protocol)
› Standardized protocol derived from ECS necropsy workshop 2005
(Jauniaux, T. Beans, C; and Dabin W. 2005. Stranding, Necropsy and sampling: Collection data, sampling level end techniques)

5.3 Samples

Collection of samples (type, preservation method)
› Biodemographics samples : gonads (formalin) and teeth (frozen)
Diet and feeding ecology: stomach contains (frozen) and blubber fatty acids and stable isotope (frozen)
Genetics: skin and kidney (frozen and alcohol)
Toxicologic: heavy metal and POP’s analysis on muscle, liver and kidney (frozen with specific packaging)
Parasitology (alcohol)
Histopathology (formalin)
Bacteriology and virology (frozen)

5.4 Database

Database (number of data sets by species, years covered, software used, online access)
› National stranding data base (1972-2012) contains 14950 records of cetacean strandings in the ASCOBANS area.

5.5 Additional Information

Additional information (e.g. website addresses, intellectual property rights, possibility of a central database)
› http://crmm.univ-lr.fr/ with interactive stranding maps

Activities and Results

5.6 Necropsies

Number of necropsies carried out in the reporting period

<table>
<thead>
<tr>
<th>Year</th>
<th>Number</th>
<th>Recorded cause of death</th>
</tr>
</thead>
<tbody>
<tr>
<td>2012</td>
<td>ASCOBANS Annual National Reports [ASCOBANS Party: France]</td>
<td></td>
</tr>
</tbody>
</table>
### 5.7 Other Relevant Information

Please provide any other relevant information on post-mortem / stranding schemes

- Recent developments were aimed at improving the monitoring value of stranding data by constructing a framework for the interpretation of stranding data sets (Peltier et al. 2012 Ecological Indicators; PELAGIS/ULR) and proposing several spatial indicators. By using the drift model MOTHY (Modèle Océanique de Transport d’HYdrocarbures) initially developed by MétéoFrance it was possible to model the drift of cetacean carcasses. Model runs were conducted every 10 days over the period 1990-2009 resulting in maps of stranding probability averaged by months, seasons or the whole year; in addition, prediction of stranding under the null hypothesis were produced (here, H0 means that cetaceans and mortality are uniformly distributed in space and time). Finally, real stranding data sets of harbor porpoise and common dolphin gathered from stranding schemes of Belgium, France, the Netherlands, Germany, Denmark and the United-Kingdom were used to back calculate their origin with MOTHY. Comparisons between the null hypothesis and stranding observation reveal anomalies that are the difference between expected and observed stranding data sets (Peltier at al, 2013, PlosONE, PELAGIS/ULR). Recent work aimed predicting the origin of common dolphin observed strandings along British and French coasts and correcting them by maps of stranding probability, in order to construct distribution of dead dolphins inferred from strandings. These maps represented the number of dead dolphins at sea, irrespective of drift conditions and according to changes in abundance and/or mortality rate (Peltier et al., in review, Ecological Indicators, PELAGIS/ULR). Current work funded by Fond de Dotation pour la Biodiversité aims improving these indicators for highlighting interactions between small cetaceans and fisheries. Expected results will map mortality origin of small cetaceans with bycatch evidences and will provide estimations of bycaught animals irrespective of drift conditions.
A new legislation on marine mammals was released in July 2011 clarifying the disturbance and the harassment. There is also an article on the necessity to declare any by-catch to help the research. There are also provisions for the protection of the habitat of the species.
Public Awareness and Education

7.1 Public Awareness and Education

Please report on any public awareness and education activities to implement or promote the Agreement to the general public and to fishermen.

- Public conferences (Oceanopolis-Brest and PELAGIS/ULR)
- National stranding network: training for volunteers and national meeting (PELAGIS/ULR)
- Observer training in the frame of fishing observation scheme, council regulation 812/04 (PELAGIS/ULR)
- Regional stranding network: training for volunteers and annual meeting (LEMM/Océanopolis)
- Educational workshops on cetaceans implemented for schools by the Education Department/ Oceanopolis
- Movie on cetaceans and ferries survey produced by Brittany Ferries and Oceanopolis broadcasted onboard the ferries+ conference on board
Possible difficulties encountered in implementing the Agreement

Difficulties in Implementing the Agreement

Please provide any relevant information

› None