

2023 REPORT ON THE CONSERVATION STATUS OF CETACEANS AND RELEVANT ACTIVITIES IN EASTERN MEDITERRANEAN

Introduction: The aim of this report is to give a global vision of what occurred in the Region, regarding cetacean conservation, since the previous report, and what is important to address for the next period/in a near future. So the regional representative will synthetize the main studies (species, topics) led in the region, concerning research, monitoring and conservation, also the main "hot" topics or threats that need to be addressed and what is awaited from the Scientific Committee (and ACCOBAMS) for the next triennium (2023-2026) as recommendations.

Countries of Eastern Mediterranean region:

Cyprus, Egypt, Greece, Lebanon, Syria, Türkiye (Mediterranean coast)

Overview of activities in the Region since the previous report (2021-2023)

Cyprus

The Department of Fisheries and Marine Research (DFMR), the national authority in Cyprus for the protection and preservation of the marine environment and biodiversity, has developed and maintains the THETIS database system for reporting cetacean sightings and strandings. All new sighting and stranding data of cetaceans, are incorporated in this database.

Following the cetacean visual and acoustic survey in the EEZ of Cyprus, organised in 2016 & 2017, DFMR is planning the next survey that will be conducted in the EEZ of Cyprus by 2029.

Egypt

Greece

- a. Stranding data are available through the "National Marine Mammal Stranding Databank" where data are provided through daily alerts by the port police or locals to the School of Veterinary Medicine, Faculty of Health Sciences of Aristotle University of Thessaloniki and the Hellenic Marine Research Centre. Also, there are stranding data and tissue bank available through the "ARION-Cetacean Rescue and Rehabilitation Rescue Centre" (since late 1870), the "Pelagos Cetacean Research Institute" (since late 1870s) and the "Hellenic Society for the Protection of Monk Seal *Monachus monachus* -Mom" (since 1980s). Up to date, identified stranded marine mammals in Greece are: *Balaenoptera physalus, Balaenoptera acutorostrata, Physester macrocephalus, Phocoena phocoena, Stenella coeruleoalba, Tursiops truncatus, Delphinus delphis, Grampus griseus, Ziphius cavirostris, Steno brendanensis, Megaptera novaeangliae, Pseudorca crassidens, and Monachus monachus*. The country is conducting studies through independent research about the morbidity and mortality of marine mammals' population, tissue specimen's collection, dynamic population mapping, impact of marine debris in marine mammals and genetic verification.
- b. The "National Action Plan" for the management and coordination of conservation action plans for two cetacean species": the harbour porpoise (*Phocoena phocoena*) and the bottlenose dolphin (*Tursiops truncatus*) that has been funded on 2019-2021 by LIFE IPs 4 NATURE Project (code LIFE16 IPE/GR/000002) of the Ministry of Environment and Energy and has been accomplished by the "ARION-Cetacean Rescue and Rehabilitation Research Centre".

c. The technical report provides multilevel of critical actions to be organized and or implemented until 2026 in Greece, taking into account the ACCOBAMS recommendations and they will be funded mainly, by National Funds, the "Green Fund" or relevant European Community's Funds.

The harbour porpoise species is a rare and endangered species of the Northeast Aegean. Specifically, the species Phocoena phocoena relicta is a migratory or a subspecies with a spread in northeastern Greece; the southwestern extent of distribution is the North Evoikos Gulf and the southeastern extent is the western area of Kos island. P. phocoena has been observed or stranded dead or alive in the Strymonikos Gulf and Thracian Sea (Halkidiki peninsula, Kavala, Thassos island, Alexandroupolis and, Evros). The species is listed in Annex II and IV of the Directive 92/43 / EEC. Based on the 4th National Report under Article 17 of the Habitats Directive 92/43/EEC for the period 2013-2018, the conservation status of this species is rated as unfavourable - bad (U2) with decreasing (-) trend. The population of the species Phocoena phocoena in Black Sea has been estimated to be approximately 500 individuals, while it is believed that in the Northern Aegean there is a small isolated sub-population (Phocoena phocoena relicta ssp) with an estimated population of <100 individuals (Cucknell et al., 2016). The species Phocoena phocoena is classified as Endangered in the Red Book of Endangered Animals of Greece (Legakis and Marangou, 2009). The population of the Black Sea (which is considered to include the sub-population of the Aegean Sea) has been characterized as "Endangered" (Birkun & Frantzis, 2008), although it has been proposed to be considered as "critically endangered" due to its numerical rarity and extremely restricted distribution. The species has also been categorized in CITES Appendix II. The common feature of all this species is its small population sizes and its restricted distribution. Several populations have declined and, in some cases, even vanished as a result of pressures and threats associated with human exploitation. These are qualitative and quantitative habitat degradation, habitat loss or fragmentation by the presence of barriers, irreversible modifications in physicochemical, hydrological and geomorphological characteristics of marine ecosystems, overfishing, diseases and competition and / or hybridization with non-native harbor porpoise species. The above mentioned, in combination with changes caused by natural causes and in the light of climate change may be intensified in frequency and / or duration. Consequently, they require conservation and protection measures for the species.

The bottlenose dolphin is a rare and endangered species of the Northeast and Central Aegean. Specifically, the species *Tursiops truncatus* is a migratory species with a spread in most Mediterranean seas. *T. truncatus* has been observed or stranded all over Greece. The species is listed in Annex II of the Directive 92/43/EEC. In addition, the species *T. truncatus* is characterized as a Vulnerable in the Red Book of Endangered Animals of Greece (Legakis and Marangou, 2009) and in the National Red List of Endangered Animals in the Mediterranean, Mediterranean level (Bearzi et al., 2012). The species has also been categorized in CITES Appendix II.

The goal of this Action Plan is to improve the conservation status of the two species in Greece through the improvement of their populations, the improvement of their viability in their marine habitats, and the improvement of the conditions in order to co-exist with human activities. The implementation of the above goal will be carried out through a number of management actions for the populations and habitats of the two cetaceans aiming at: (a) gaining knowledge regarding the ecology, the pressures and threats for the harbour porpoises and bottlenose dolphins in Greece, (b) the improvement and strengthening the legal framework for the two species, c) the management and maintenance of the populations and their habitats of the two species, (d) enhancing awareness, information and capacity building regarding the species' conservation and protection and 6) international cooperation for the protection of two cetaceans.

The strategy proposed to address the recovery goal and objectives creates a structure consisting of forty-five (45) for the harbour porpoise and of fifty-two (52) for the bottlenose dolphin conservation measures/actions. The success of design and implementation of the Action Plan is dependent on the actions of many different stakeholders and requires their commitment and cooperation towards the direction of the two cetacean species conservation and protection.

d. On 2022, the common Ministerial Decree (Official Gazette no.4744/B/2022) of the "Ministry of Environment and Energy- General Directorate of Environmental Policy -Directorate of Natural Environment and Biodiversity Management" and the "Ministry of Agriculture and Food" is signed by the Hellenic Parliament with regulations

for the permit and operation of Wildlife Rescue and Rehabilitation Centres and Sanctuaries in Greece. Before this, there was not any Wildlife Rescue Centre that operated under a legal permit in Greece.

- e. Greece is working during the last decade, for first time in the Mediterranean, and taking into account the recent conservation measures/actions of the proposed "National Action Plan" to guarantee through legal framework and regulate under protocols the marine mammals' strandings, rescue, rehabilitation, and reintroduction, as well as necropsies and tissue sampling. A "National Marine Wildlife Stranding and Sighting Databank (marine mammals, sea turtles and sharks)" is being digitally designed and will be available by the Natural Environment & Climate Change Agency (NECCA- https://necca.gov.gr/en/home/) in Greece. National tissue bank of marine mammals has been established at the approved Laboratories of the School of Veterinary Medicine of Aristotle University of Thessaloniki (AUTH) and at the Laboratories of the Dept. of Ichthyology and Aquatic Environment, School of Agricultural Science of University of Thessaly.
- f. On 2023, the common Ministerial Decree on Monitoring Strandings of Marine Wildlife Species in Greek territorial waters of the Ministries of Environment and Energy (<u>https://ypen.gov.gr</u>), Agriculture and Food (<u>http://www.minagric.gr/index.php/en/</u>), Marine Affairs and Insular Policy (<u>https://www.ynanp.gr/en/</u>) and Finances (<u>https://www.minfin.gr/web/guest/nomiko-plaisio1</u>) is already discussed and corrected by open consultations of the Hellenic Scientific Community of NATURE2000, related scientists, NGOs and the stakeholders and at present is going to be signed by the Hellenic Parliament. This Ministerial Decree, among others, is going to become the legal framework for the evaluation, the management and protection of the processes of the information and data, gathered by specialists (veterinarians and other scientists) following scientific international protocols on rescue, necropsies, sampling, and properly processing samples from the stranded marine wildlife.
- g. Organizations for marine mammals' expertise
 - SCHOOL OF VETERINARY MEDICINE-FACULTY OF HEALTH SCIENCES, ARISTOTLE UNIVERSITY OF THESSALONIKI (AUTH), St. Voutyra 11 Street, 54627 Thessaloniki, GREECE. Contact: Prof. KOMNENOU Anastasia, DVM, PhD. Email: natakomn@vet.auth.gr; natakomn@gmail.com; info@vet.auth.gr . Website: www.vet.auth.gr
 - 2. HELLENIC CENTRE FOR MARINE RESEARCH, INSTITUTE OF MARINE BIOLOGICAL RESOURCES AND INLAND WATERS, Former US Base at Gournes, P.C. 71500, Heraklion, Crete, Greece Contact: Dr GIANNOULAKI Marianna, Research Director. Email: marianna@hcmr.gr.
 - MARINE MAMMAL BIOMONITORING UNIT, LABORATORY OF HYDROBIOLOGY AND ICHTHYOLOGY, DEPT. OF ICHTHYOLOGY AND AQUATIC ENVIRONMENT, SCHOOL OF AGRICULTURAL SCIENCES, UNIVERSITY OF THESSALY, Fytokou str., 38446, Volos, Hellas, Contact: Prof GKAFAS Georgios. Email: gkafas@googlemail.com.
 - NATIONAL AGRICULTURAL RESEARCH FOUNDATION (N.AG.RE.F) FISHERIES RESEARCH INSTITUTE (FRI) OF KAVALA, GREECE, Nea Peramos, 640 07, Kavala, GREECE. Contact: Dr. KOUTRAKIS Emmanuil Email: koutrman@otenet.gr, fri@otenet.gr.
 - ARION-CETACEAN RESCUE & REHABILITATION RESEARCH CENTER, Limenas Moudanion, Chalkidiki/ M. Botsari 119, 544-53 Thessaloniki. Contact: Prof. KOMNENOU Anastasia, Dr. DROUGAS Aimilia, Email: natakomn@gmail.com; adrougas@gmail.com, adrouga@prv.ypeka.gr; arion@arion.org.gr. Website: www.arion.org.gr.
 - 6. PELAGOS CETACEAN RESEARCH INSTITUTE, Terpsichoris 21, 16671 Vouliagmeni, GREECE, Contact: Dr. FRANTZIS Alexandros, Email: afrantzis@otenet.gr, Website: www.pelagosinstitute.gr
 - 7. ARCHIPELAGOS INSTITUTE FOR MARINE CONSERVATION, Pythagorio 83103, Samos. Contact: MHLIOU Anastasia Email: info@archipelago.gr
 - 8. iSEA-ENVIRONMENTAL ORGANISATION FOR THE PRESERVATION OF THE AQUATIC ECOSYSTEMS, Kritis 12, Thessaloniki, Greece, Contact: GIOVOS Ioannis Email: Info@isea.com.gr, Website: www.isea.com.gr

Lebanon

- A report on the establishment of a **National Stranding Network** in Lebanon was created in 2022. This report aims to assess the current capabilities and preparing a model for an operational network for a stranding network and monitoring plan in Lebanon that could be led by CNRS and to provide recommendations for the existing Action Plan for the conservation of cetaceans in Lebanon coastline taking also in consideration the Eastern Mediterranean as network potential. Although Lebanon has been working on stranded cetaceans in the previous years, however, more systematic approach was essential to ensure continuous monitoring effort with the participation of wider range of institutions and people. To effectively implement these actions, that is, to establish a functional stranding network, the report aimed to create a set of practical guidelines for Lebanon.
- The NCMS, CNRS-L will be undertaking field surveys during May 2023 to contribute to the implementation of the National Integrated Monitoring and Evaluation Program (IMAP) for Biodiversity in Lebanon under the framework of the EcAp MEDIII project. Hence, field surveys covering North, Centre and South of Lebanon will be undertaken to fullfil the Common Indicator CI3 species distributional range of marine mammals and CI4 population abundance of selected species under the Ecological objective 1 (EO1: Biodiversity).

Syria

Türkiye (Mediterranean coast)

- Giant Guardians of The Deep Seas II "Visual surveys combined with passive acoustic monitoring between Marmaris and Anamur". Designed around the need to fill the vast data gaps in the Eastern Mediterranean and decrease the disparity between research levels in the Eastern and Western basins. The expedition spans a huge area (~22,000 sqkm) between Marmaris and Anamur in the Eastern Mediterranean Sea. Contact: DMAD
 Marine Mammals Research Association
- Project of Cetacean Diversity in the Finike Seamounts Special Environment Protected Area. In May and September 2021, two scientific expeditions were organized in Finike (Anaximander) Seamounts Special Environmental Protectedion Area (SEPA), within the scope of protection and monitoring activities for Cetacea diversity by T.R. Ministry of Environment, Urbanization and Climate Change, General Directorate for Protection of Natural Assets. Contact: Faculty of Aquatic Sciences, Istanbul University, Türkiye
- Conservation of Top Predators through Monitoring and Capacity Building in the Gökçeada Island (North Aegean Sea). The aim of the project is to establish the very first seasonal monitoring project around the Gökçeada Island for top predators, such as; sharks, teleosts and cetaceans. MAPCON, Türkiye
- From Local Ecological Knowledge to Drone-based Monitoring Surveys: Addressing the Importance of Marine Top Predators_Aegean Sea. The aim of the project to conduct visual and aerial surveys, supported with Local Ecological Knowledge to gain a clearer understanding of marine top predators around Gökçeada Island waters. Contact: MAPCON, Türkiye
- From a management perspective: According to the amendment made in the Animals Protection Law no. 5199, the establishment of dolphin parks (opening new ones) and replacements for the dead individuals are prohibited (Animals Protection Law No: 5199-2004 amendment 9/7/2021). Closure of existing dolphinarias within 10 years after law entry into force.

Major issue(s) or main threats or "hot" topics that have emerged during the said period for the Region

Cyprus

- a) Atypical mass strandings of cetaceans have occurred in Cyprus since the previous reporting period. With the latest one, occurring in February 2023, with the mass strandings and deaths of *Ziphius cavirostris* along the north-western coastline of Cyprus. The possible causes of the atypical events (especially the latest one) are being investigated.
- **b)** Extensive underwater activities in the eastern Mediterranean region, and within the EEZ of Cyprus that may have a possible impact on cetaceans in the region. These activities include, but are not limited to military exercises, sonar testing, hydrocarbon exploration and exploitation activities.
- c) Lack trained personnel, or permanent stranding network, to handle possible future mass strandings.
- **d)** Lack of infrastructure and knowledge on the island to hold and treat injured cetaceans found stranded or at sea.
- e) Lacking baseline information on the characteristics of the underwater noise profile (both from anthropogenic as well as from natural sources).
- f) Lack of officially trained and certified MMO and PAM personnel in Cyprus.

Egypt

Greece

- a) The common feature of all cetacean's species in Greece is their population sizes and their distribution. Several populations have declined and, in some cases, even vanished as a result of pressures and threats associated with human exploitation. These are qualitative and quantitative habitat degradation, habitat loss or fragmentation by the presence of barriers, irreversible modifications in physicochemical, hydrological and geomorphological characteristics of marine ecosystems, overfishing, diseases and competition and / or hybridization with non-native cetacean species. The above mentioned, in combination with changes caused by natural causes and in the light of climate change may be intensified in frequency and / or duration. Consequently, conservation and protection measures are required for the cetacean species in Greece.
- **b)** Ship collisions through main vessel's and cargo's routes are common and often fatal to megafauna species (fin whales, sperm whales, etc)
- c) The oil and hydrocarbon exploitation through seismic exercises along the Hellenic Trench possibly causes gas embolism to Cuvier's beaked whales and or other megafauna marine species washing them to shores.
- d) The sonars used in Navy alliances' exercises or at navy battles cause gas embolism and death to Cuvier's beaked whales that are mass stranded at nearby shores.

Lebanon

There are difficulties in implementing the Agreement for the following reasons:

- Lack of highly qualified personnel
- Lack of equipment for the stranding network
- Lack of adequate funding
- Difficulties in convincing public opinion of the interest of the agreement and conservation of cetaceans
- Episodically tense security situation not making it possible to carry out research and awareness-raising missions on a continuous basis.

Syria

Türkiye (Mediterranean coast)

Continuous oil and gas related activities (seismic surveys, drilling) in the region have been observed with no concrete mitigation and legislation in place (e.g., obligation to hire an MMO during their activities) at a national level in order

to assure the monitoring and conservation of cetaceans. It is critically important to develop noise monitoring and increase the capacity of relevant organizations and people in terms of measuring underwater noise. It is also important to assess the noise impact on aquatic organisms, including marine mammals, by low frequency sonars used during military training and activities.

Recommendations / suggestions for Improvement of the conservation:

Cyprus

- a) Capacity building for the establishment of a stranding network and proper infrastructure to handle injured individuals.
- b) Scientific research in the fields of population and cetacean and environmental acoustic monitoring.

Egypt

Greece

a) In discussions, held during the 1st Scientific Meeting of ACCOBAMS in Tunis, on October 2002, it was agreed "the Establishment of a Task Force for Special Mortality and Stranding Events in order:

- 1. to provide precise indication on the type of scientific support, both preventive and as follow up, in case of special events;
- 2. to prepare the relevant scientific protocols to be included in the guidelines for the stranding network concerning the rescue of live-stranded cetaceans to consider the issue of capacity building and to ensure linkages with WG7 (capacity building) for the needs for the ACCOBAMS Action plan implementation".

A number of views on possible regulatory structures, policy formulation for protective measures, improvement of scientific knowledge and establishment of special protocols on the rescue, rehabilitation or sampling of stranded live or dead cetaceans, which would be widely accepted by the partners, were discussed by few members of the working group assigned. The majority of the views expressed have shown that there is limitation of safe conclusions for this objective and a mandatory need for further scientific discussion.

In light of this fact, we would like to propose "a two day **workshop** which will be strictly dedicated to the planning of the "Emergency Task Force for Special Mortality and Stranding Events" by providing strong recommendations for the scientific rescue and rehabilitation protocols on stranded alive (wounded, ill, orphan, entangled) or dead cetaceans, necropsies and sampling techniques, as well as research with particular emphasis on endangered and vulnerable taxa, raising awareness and offer management and research actions most likely to protect cetaceans, at least in Mediterranean Black Sea waters".

The workshop could be organized by the ACCOBAMS Scientific Committee members assigned for this task and invited scientists, who have a reputable scientific experience on rescue and rehabilitation of live cetacean standings, as well as on necropsy, sampling and cetacean pathology. The workshop should be funded by ACCOBAMS and related International and National bodies. The location of the ETF Plan workshop could be welcomed in the School of Veterinary Medicine, Faculty of Health Sciences, of Aristoteles University of Thessaloniki, Greece as representative of the ACCOBAMS East Mediterranean Region.

b) Scientific research, and capacity building, are seen as priorities since there are still scarce and not systematic cetacean population research in Greece. Conducting awareness and educational campaigns targeting teachers, school students, and the general public are urgently needed. In addition, educating fishermen and related stakeholders (sailing and speedboat skippers, fish farmers, tour organizers, etc) are mandatory. Encouraging the fishermen to report about the lost and abandoned fishing gear will make compensatory incentives more reliable.

c) Into the new proposed era, the Anthropocene one, wildlife populations and species are forced to near-extinction due to the significant human impact. Populations of marine mammals in the eastern Mediterranean Sea have been affected by a series of threats, such as fisheries, shipping, pollution to name a few. Some populations recover rapidly (e.g. the monk seal), where others do not (e.g. the common dolphin, the harbour porpoise, the bottlenose dolphin), whose populations still remain unclear.

One of the major impacts on populations is inbreeding, where despite a potential relatively large census size, a possible small population effective size (crucial for species survival) could lead to loss of fitness. It is important to understand their potential for survival, which can be influenced by genomic diversity.

- 1. At what level does the environmental pressure, such as that imposed by rapid environmental change and direct human effects, remain a threat to the survival of marine mammals in the eastern Mediterranean?
- 2. Create a data-base about all components of marine mammal's genomic disease vulnerability
- 3. Establish new insights and protocols on the existing stranded-network to map habitat diversity using novel methods, such is eDNA.
- 4. Identify possible "effectors" i.e. major human activities affecting health, biodiversity and ecosystem services, such as fisheries and tourism to set conservation priorities under the concept of ecosystem-based management approach for sustaining ecosystem resilience across spatial scales.

d. Continuation of the large-scale megafauna population monitoring in the Eastern Mediterranean and update the cetacean habitats or their mobility /migration to establish legal framework upon ship collisions.

e. Provide scientific discussion and establish rules for establishing marine mammal sanctuaries in the ACCOBAMS area.

Lebanon

Syria

Türkiye (Mediterranean coast)

As known, during their 5th Meeting (Tangiers, 2013), the ACCOBAMS Parties resolved that during naval exercises involving sonar or underwater explosions, all areas designated as 'Areas of Special Concern for Beaked Whales' in the Mediterranean Sea should be avoided completely within a 50 nautical mile buffer zone. In this regard, it may be recommended to put pressure on military forces and to question what they are doing about this issue.

Especially companies (countries) carrying out seismic activities in the region should be advised to work with MMOs and to conduct PAMs on board.

Conclusions

In Greece there are different sectors wich are involved scientifically or not, in cetacean research or in ecotouristic actions. The CITES Management Authority-Ministry of Environment and Energy provides the legal framework by issuing the research permits for tissue samples' monitoring. The School of Veterinary Medicine, AUTH, provides proffesional medical treatment, research on morbidity and mortality and laboratory analysis of samples gathered by stranded marine mammals as well as, wildlife rescue and rehabilitation training techniques. The Hellenic Center of Marine Researh gathers information on cetacean sightings and strandings, the National Agricultural Research Foundation studies cetacean-fisheries interactions, the University of Thessaly provides cetacean taxa verification and population monitoring, while the Faculty of Biology of University of Athens, Aegean, Patras and the Aristotle University of Thessaloniki supports ocassionaly work on fisheries-cetaceans interactions and population threats by graduate students. The research, rescue and data analysis for cetaceans is accomplished mainly by NGO work with minimum recent finacial coverage (on 2021 and 2022). ARION-Cetacean Rescue and Rehabilitation Center works along with the governmental sector, the universities, research centers since 1983 on stranded cetaceans, gathers samples, supports rescue and rehabilitation, monitors cetacean population and gathers information about their morbidity and mortality. Resues and necropsies are performed by the "ARION Cetacean Stranding Veterinary Network", where more than 150 trained veterinarians in wildlife rescue and necropsies, offer their service voluntalery for ARION's stranding alerts in coastal areas and in islands throughout Greece. PELAGOS-Cetacean Research Intitute is a scientific NGO involved in serious cetacean research, emphasising on sperm whale monitoring, mixed populations and Cuvier's beaked whale strandings relayed to LAFs, while WWF conducted during 2000 an orientation program on population surveing and fisheries interactions. There are also NGOs (Ionian Dolphin Research -TETHYS, iSEA in Ionion, Thermaikos and Thracean Sea fisheries, sharks and cetaceans monitoring and ARCHIPELAGOS Institute for Marine Conservation in East Aegean Sea (Samos, Ikaria, Fournoi and Lipsi islands) that are involved in whale watching and biodiversity conservation since 2002.

The Eastern Mediterranean regional countries fully support the implementation priorities adopted by ACCOBAMS and they are willing to offer their long term expertise (exemplified by the activities listed in the report) to turn cetacean conservation strategies into action. The priority actions for the immplementation of the Conservation Plan for the Eastern Mediterranean area are:

- 1. Response to strandings and mass emergency situations and marine mammal disease control.
- 2. Establishment of an "Emergency Task Force" consisted by international experts (veterinarians, biologists etc), for marine mammal morbidity and mortality and special events, affecting marine mammal populations or their critical habitats.
- 3. Creation of a basis for the establishment of a wider Stranding Network at a European or Regional level.
- 4. Support of a regional Cetacean Sightings, Strandings and Tissue Databank.
- 5. Scientific research as bases for conservation, capacity building, awarenes and education.
- 6. Orientation, training and management of whale watching activities and human interaction.
- 7. Financial support for systematic cetacean population research, habitat conservation and health monitoring.
- 8. Workshops organization on morbidity and mortality, necropsy, sampling and diagnostics of stranded cetaceans according to international protocols.