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INTRO

The main objective is the improvement of the conservation status of the **bottlenose dolphin** (*Tursiops truncatus*), that is listed in the Annex II of Habitat directive, being the coastal species amongst Mediterranean cetaceans most exposed to threats due to human activity and resource exploitation. The goal fulfils also the Italian National Priorities, in particular the SAP 1.C as indicated by the Italian Ministero dell'Ambiente e della Tutela del Territorio e del Mare.



The threats for Bottlenose dolphin are listed in Simmonds M., Nunny L. 2002. Cetacean habitat loss and degradation in the Mediterranean Sea, (report to the ACCOBAMS Secretariat, Monaco, February 2002, Section 7, 23 p.): the project specifically addresses the following threat: "**boat traffic, including leisure craft that can lead to collisions and noise pollution**". In the same report the areas with high level of tourism activity and fishing are pointed out as the areas where effective **conservation actions** are needed.

Most of the threats (collisions, entanglement in fishnets, and disturbance of feeding or breeding activity) are related to the lack of knowledge of the presence and movement of individuals in the area where the anthropic activities are carried on.

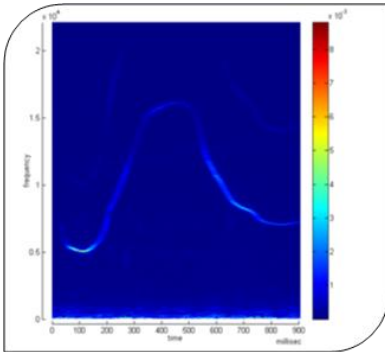
We propose the implementation of a interference avoidance system capable to **detected and track the dolphins**, to identify the threats and to prevent collisions and other risks by diffusing presence warning messages in real time to all categories involved (tourists, professional and recreational fishermen, MPA management). The protocol of conduct for reducing risks for the species will be developed and agreed by involved stakeholders in cooperation with the local Coast Guard branch. Upon reception of the warning messages the ships and boats present in the area will be invited to



follow the protocol of conduct and the Coast Guard will supervise its application.

This approach will ensure the species protection improvement, the **sustainable coexistence of dolphins and anthropic activities** and will promote responsible usage of the sea.

The system will provide also to the national authorities the information required to update rules and "**Special Area of Conservation**" (Council Directive 92/43/EEC) boundaries necessary to improve preservation measures of the species.



The area selected for system demonstration can be considered as "Case Study" because there is a resident population of bottlenose dolphins which is an important fraction of the **northwestern Mediterranean population**, and most of the anthropic activities mentioned above are present in the area.

The project will demonstrate the effectiveness of the proposed tool for reducing threats and improving preservation, as well as the possibility of easily reproducing and conducting it in other Mediterranean areas.

OBJECTIVES:

The project aims to accomplish the following specific objectives:

- **Objective 1)** to prevent the decline of the number of individuals by reducing threats and continuously tracking the habitat use by dolphins and their abundance.
- **Objective 2)** to minimize risks by promptly acting whenever the presence of dolphins is detected close to an anthropic activity in progress, 24 hours – year round.
- **Objective 3)** to provide a whole set of information about the presence and behaviour of the species in the area as well as of the concurrent anthropic activities. This is required to acquire the assessed overview of the presence of the animals in the area, necessary to improve the present conservation regulations and, therefore, to reduce the threats.
- **Objective 4)** to deliver guidelines, best practices and advices for improving MPA regulations and for redefining the MPA boundaries.
- **Objective 5)** to demonstrate the effectiveness of the tool and the threat mitigation measure to convince the local and national authorities to adopt the system in other MPA in the EU.
- **Objective 6)** to create an effective and long lasting collection of public data on dolphins presence, habits and interferences with anthropic activities, covering several years of observations, to provide the people directly involved in bottlenose dolphin conservation, as the Marine Protected Area (MPA) personnel and to researchers, with a set of data as large and updated as possible.

