



UNIVERSITÀ
DEGLI STUDI
DI PADOVA



Dipartimento di
Biomedicina Comparata
e Alimentazione



2nd Meeting of the Joint Bycatch Working Group of ASCOBANS and ACCOBAMS

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Fishery interaction with cetaceans: insight from 38 years of stranding monitoring (1986-2023) along the Italian coastline

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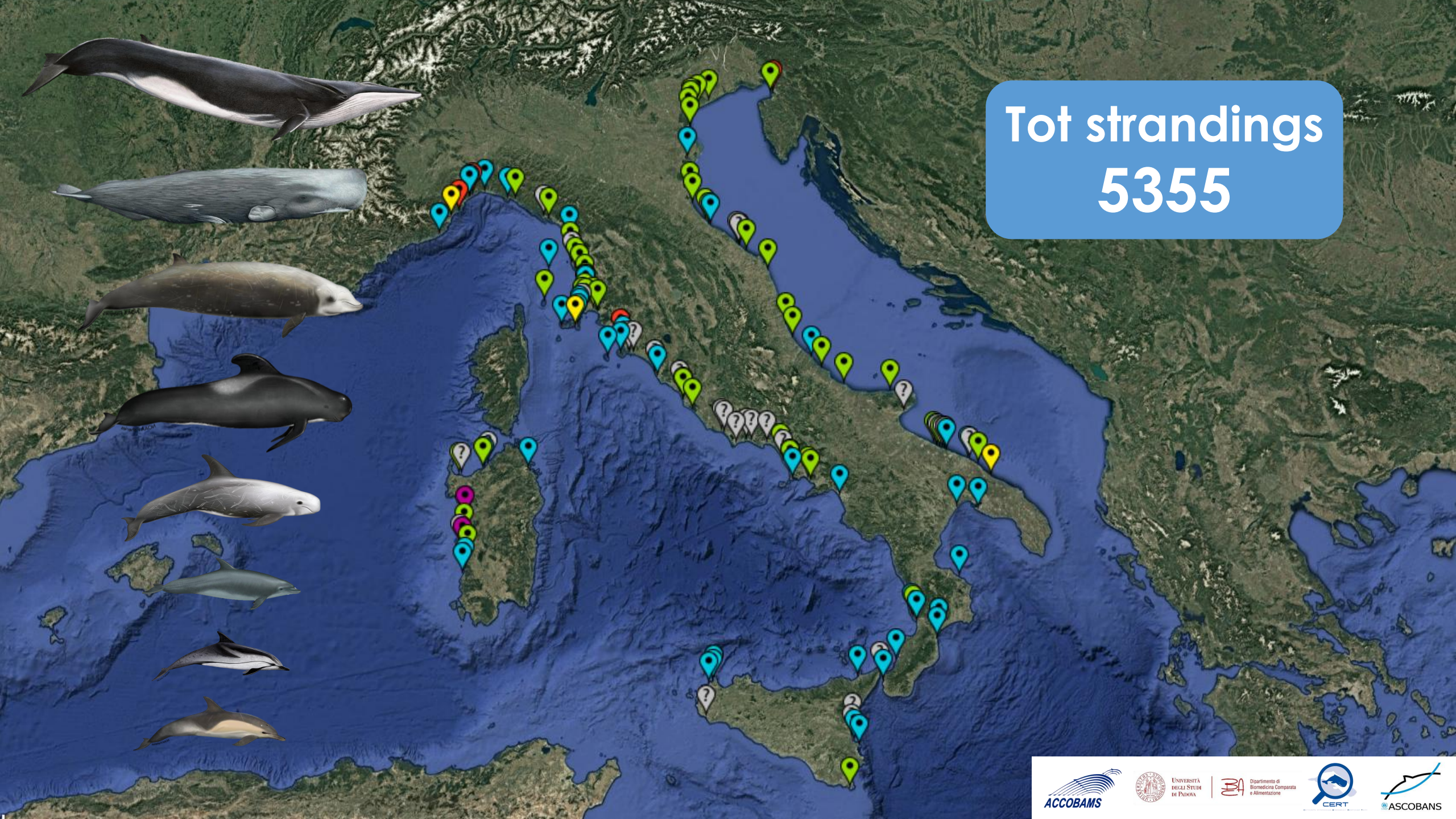


A white outline of a whale or cetacean is centered on a black background. The outline is simple and captures the general shape of the animal, including its head, dorsal fin, and tail. The text "STRANDED CETACEAN" is written in white, bold, uppercase letters across the middle of the whale's body.

STRANDED CETACEAN

SCENE DO NOT CROSS CRIME SCENE DO NOT CROSS CRIME SCENE DO NOT

Tot strandings
5355



Tot strandings
5355



Different approaches within the years

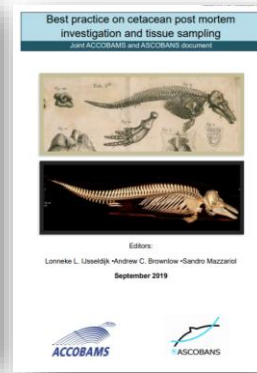
1986 - 2014

External examination



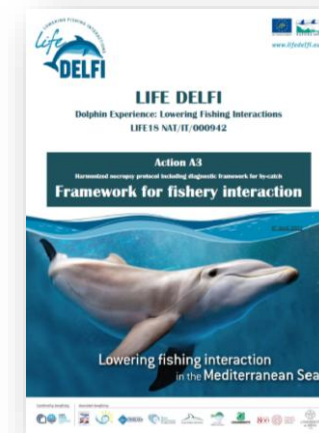
2015 - 2019

Standardized protocol



2020 - 2023

LIFE DELFI framework



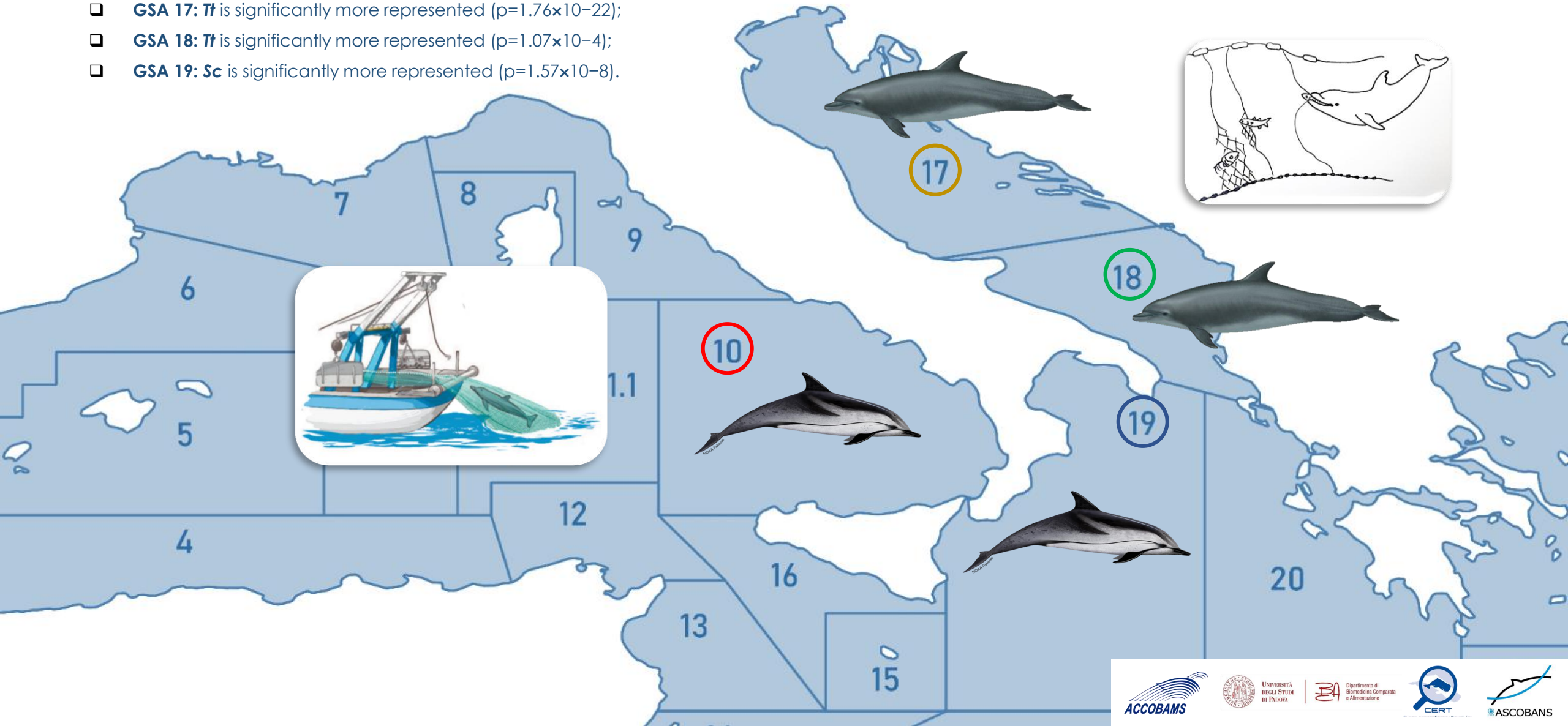


12.9% of stranded cetaceans present evidence of fishery interaction

Every year we found 18.15 stranded cetaceans with evidence of fishery interaction

Significant statistical differences between the two species in specific GSAs

- ❑ **GSA 10:** *Sc* is significantly more represented ($p=1.33\times 10^{-5}$);
- ❑ **GSA 17:** *Tf* is significantly more represented ($p=1.76\times 10^{-22}$);
- ❑ **GSA 18:** *Tf* is significantly more represented ($p=1.07\times 10^{-4}$);
- ❑ **GSA 19:** *Sc* is significantly more represented ($p=1.57\times 10^{-8}$).





1986-2023



2015-2023

Statistic analysis



- ❑ **Male adult Tt:** significantly more involved in fishery interaction vs Sc;



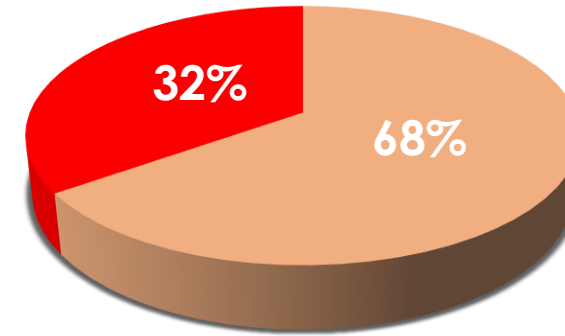
- ❑ **Tt more interaction with larynx entanglement, ingestion, entanglement;**



- ❑ **GSA 17:** setnet/gillnet issue for Tt;



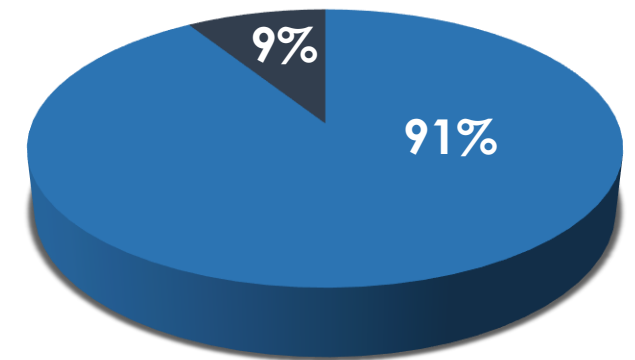
- ❑ **Drifting net more reported in Pm;**



Cases with determined COD

■ Natural ■ Anthropic

Cases with anthropic COD



■ Fishery interaction

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Reccomendations

Science Recommendations

- Adoption of **standardized forensic procedures to identify causes of death and contributing factors** maintaining an **evidence-based approach**.
- Ensure **periodic training** to update **regional stranding network** and post-mortem procedures.
- Use **centralized databases** for data exchange, enabling accessible information for management and policy-making purposes.
- **Enforce the monitoring of region-specific risks to local fishing practices**, such as bottlenose dolphin and set net in the Adriatic Sea.

Recommenations

Management Recommendations

- Ensure a **standardized digital reporting method** for **effective data sharing**.
- **Implement monitoring and report systems to identify and address hotspots risks**, guided by **modeling** studies.

Recommendations

Policy Recommendations

- **Empower** functional, fully funded **stranding networks** in every country, coordinated at the **ACCOBAMS-ASCOBANS** level to standardize and harmonize data collection for conservation purposes.
- Establish **common procedures and national protocols** with the support of **reference laboratories** with fully trained veterinarians performing necropsies.
- **Enforce regional cooperation** for rigorous monitoring and joint policy enforcement: **post-mortem conservation**.



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