



Participatory approaches for marine conservation (Príncipe island, São Tomé and Príncipe)

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Príncipe
Trust



RESERVA DA
biosfera
ilha do príncipe
SÃO TOMÉ & PRÍNCIPE

UNIVERSITY OF
EXETER





WORLDWIDE ISSUES

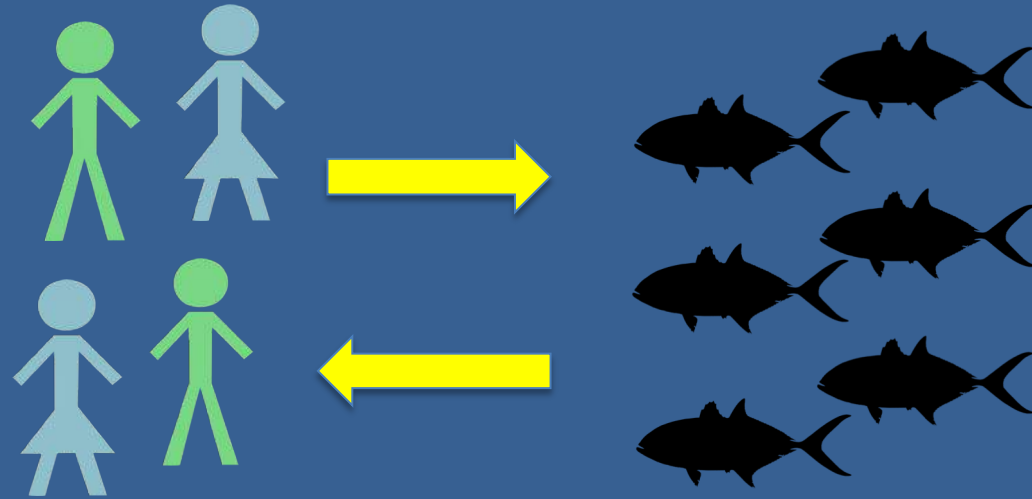
- Catch decline
- Ineffective centralized top-down approaches
- Lack of government resources



- Community **participation**
- Marine **spatial planning**
Co-management



OMALI VIDA NÓN (SEA, OUR LIFE)



Project aims to promote **better management** of marine resources through the **participation** of those who are mainly affected - **fishers and fish traders.**





STUDY AREA



- Around 8,000 ppl
- Area of 136 km²
- Declared a Biosphere Reserve in 2012

- Nationally, 62% below poverty line
- Reliance on subsistence farming and fisheries



IMPORTANCE OF SMALL SCALE FISHERIES IN PRINCIPLE

- **Income:** artisanal fishing is the main source of income for a large part of population



- **Food:** fish is an essential part of local diet.



KEY SPECIES IMPACTED

Sharks & Rays



Some anecdotal evidence of international trade (although less common nowadays)

Sea turtles



Home to 5 of the 7 species of sea turtles

One of the last remaining aggregations of hawksbill sea turtles in West Africa

National and regional laws forbid take and consumption of sea turtles



KEY SPECIES IMPACTED

Seabirds



© Nuno Barros

Brown booby
Sula leucogaster



© Nuno Barros

White-tailed tropicbird
Phaethon lepturus

Cetaceans



© anaritapatricio

15 different Cetacean species occur in the STP waters



OMALI VIDA NÓN: PROJECT PHASES

July 2016-March 2019

A. Social-ecological assessment

B. Community proposals and implement
livelihood interventions

C. Develop skills for **management of natural
resources** and conflict resolution



LANDING SURVEYS



Data collection done twice a week:

- Fishing effort
- Total catch
- Individual weights and measures (for indicator species)



SOCIAL SURVEYS

Questionnaires in Feb-Mar 2017



6 coastal fishing communities and
5 randomly selected non-coastal
rural communities

Questions about
sociodemographics, economics,
use and management of natural
resources

869 people interviewed
• including **155 fish traders** e **200
fishers**



MAPPING FISHING AREAS

GPS trackers



Legenda / Legend

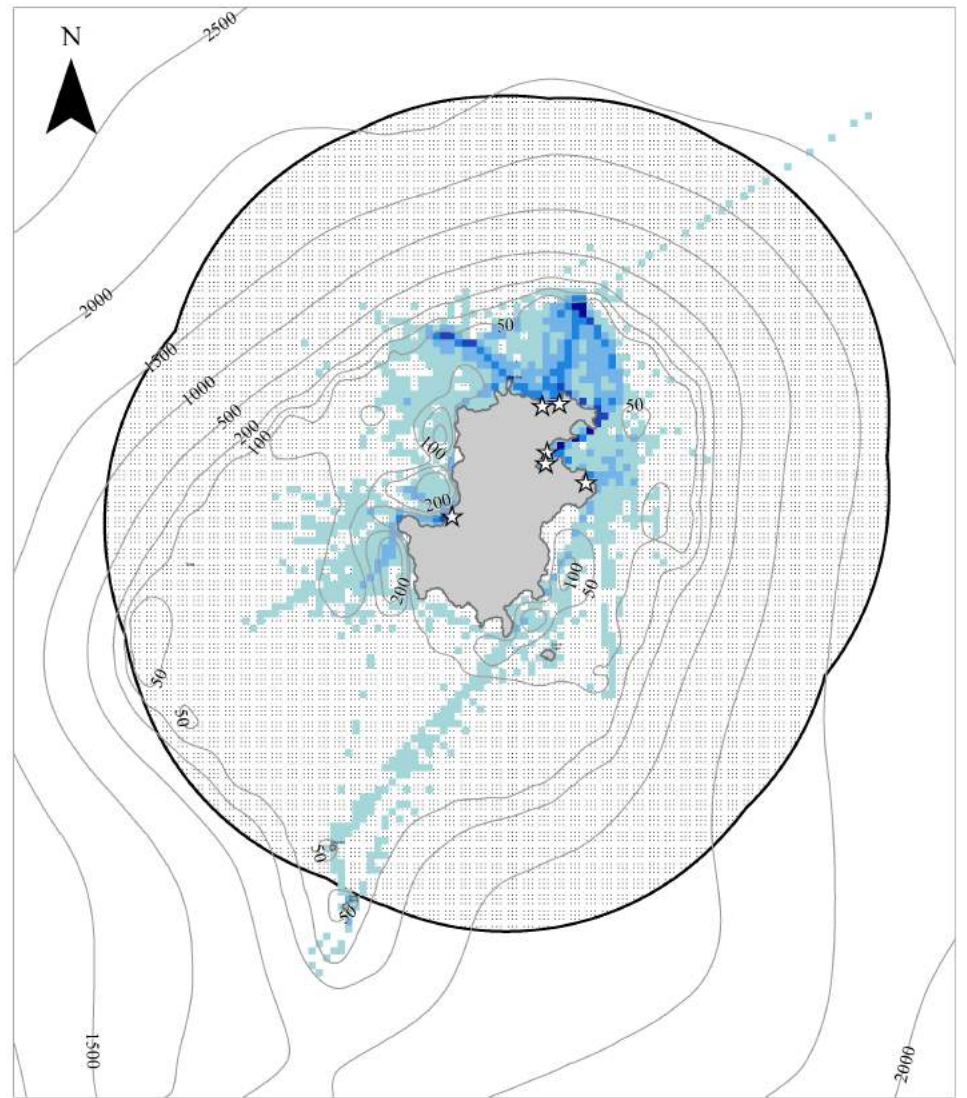
- ☆ Comunidades do projeto
Target communities
- Profundidade
Bathymetry
- ▨ Área de pesca artesanal
Artisanal fishing areas

Número barcos

Number of boats

- 1 - 7
- 7 - 23
- 22 - 45
- 45 - 83
- 83 - 162

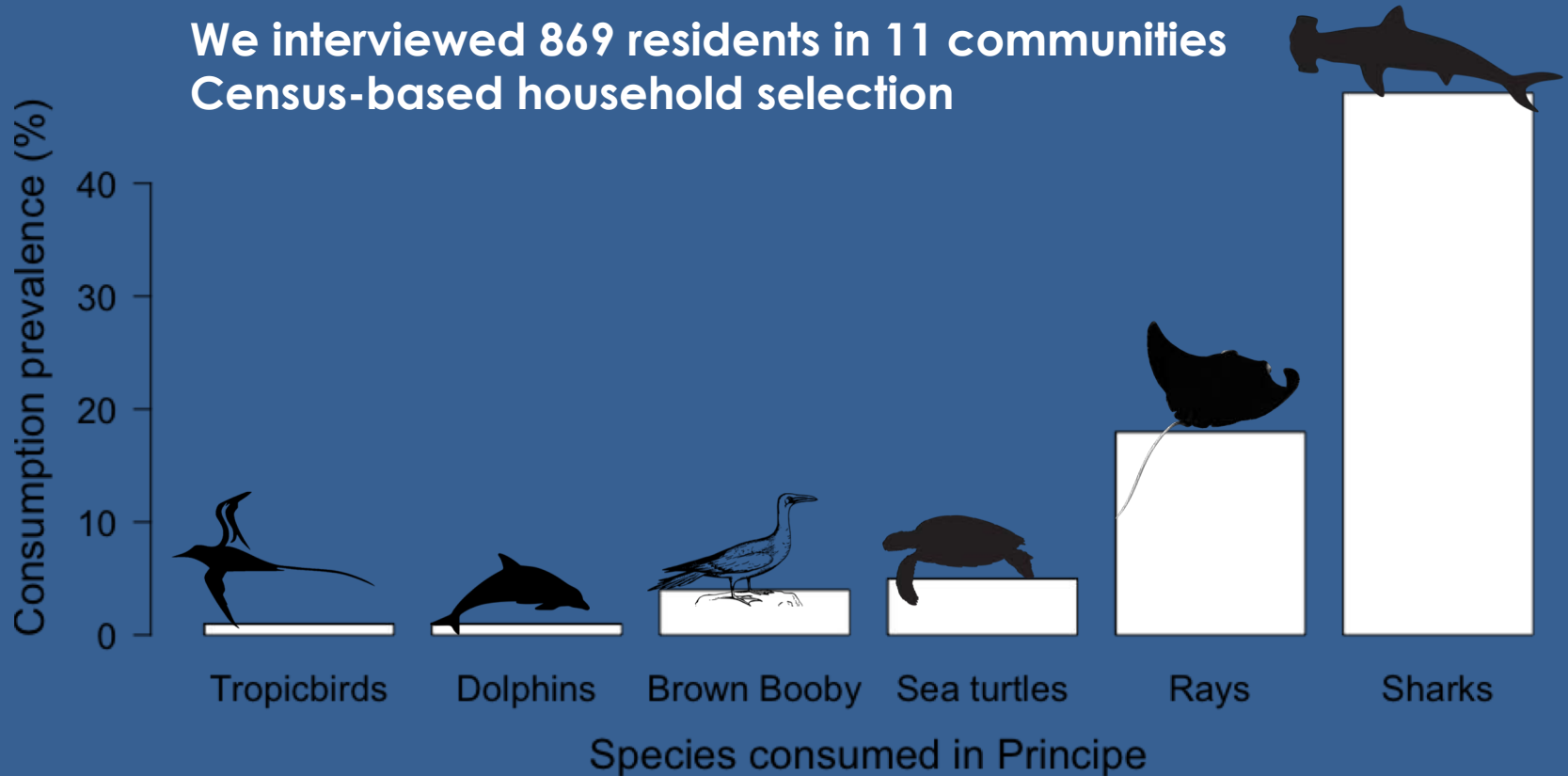
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KEY FINDINGS

We interviewed 869 residents in 11 communities
Census-based household selection



**Consumption of species of conservation concern
during 12 months before our study**

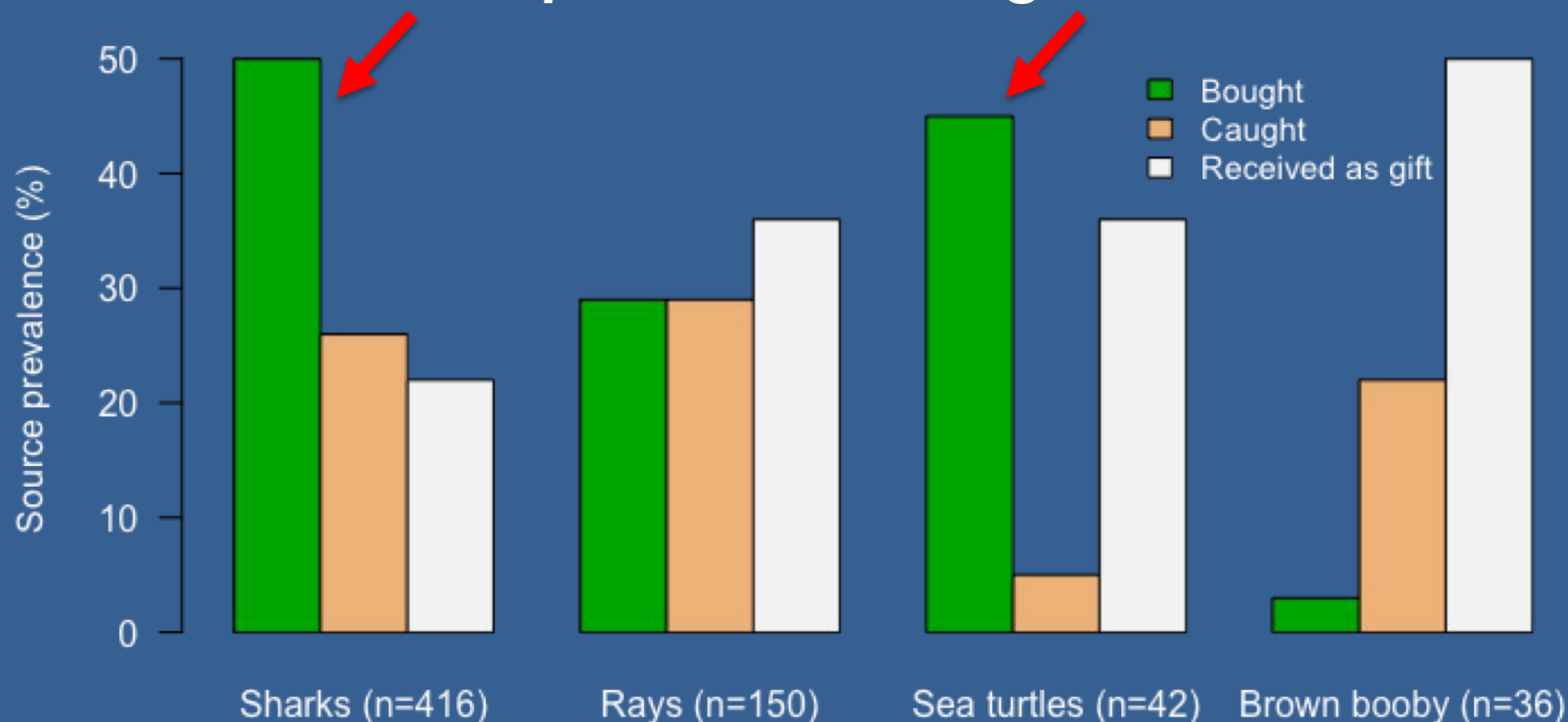


KEY FINDINGS

Consumption in coastal vs other rural communities?

- Higher in coastal communities ($p < 0.02$), except for dolphins and tropicbirds (rarely consumed anyway)

Source of wildlife products among local consumers?





**PRO
TETUGA**
ILHA DO PRÍNCIPE
PROJETO DE CONSERVAÇÃO DAS
TARTARUGAS MARINHAS

TURTLE CONSERVATION

1. **Protection** and monitoring
2. Education and **AWARENESS**
3. Scientific **RESEARCH**

PROTECTION AND MONITORING

2017/2018 season

2050 records

3 nesting species

36 beaches monitored

9 turtles killed by fishers /8 turtles died with plastic in stomach and intestine

617 tourists - Museum

Collect Data

Understand

Share

Monitor

Protect

A group of children, likely students, are gathered around a table, looking at and handling educational materials. They are wearing white t-shirts with the 'Príncipe Trust' logo, which features a stylized bird or leaf design. The materials they are looking at include colorful brochures or booklets with illustrations of a landscape and a house. The background is a solid blue color.

EDUCATION AND AWARENESS

10 schools of 1st cycle

2035 students

300 calendars of the campaign delivered

Awareness Activities with all the **communities**
and **stakeholders**

SCIENTIFIC RESEARCH

Solve real
**CONSERVATION
CHALLENGES**
through open access
to technology.

8 cameras tagged
"pit-stop" tested
on **5 turtles**
videos and photos
captured in the waters
around the island

<http://blog.arribada.org/>

ARRIBADA
initiative

 **Príncipe
Trust**



MULTIDIMENSIONAL MARINE CONSERVATION



Food security
Wellbeing
Participation
Economics

Governance
Collaboration
Conflict resolution





Get in touch!

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