

Project Update: April 2023

Monitoring the seahorse population in the Formoso River Estuary, Pernambuco, Brazil

We have been monitoring the seahorse population in the Rio Formoso Estuary for the past 6 months (October-March). This part of the project was delayed due to the atypical weather circumstances in 2022, where heavy rains prevented us from conducting the sampling at the originally scheduled time. However, we were able to complete this stage effectively in the last 6 months.

During these 6 months, we monitored eight critical sites in the estuary. These locations were selected based on the collaborative mapping carried out with local fishermen in the previous stage of the project (project update from December 2021). We collected environmental data (e.g., salinity, water temperature, depth) and data on the 286 seahorses found in these 6 months (e.g., sex, size, reproductive stage, colour, behaviour, microhabitat used).

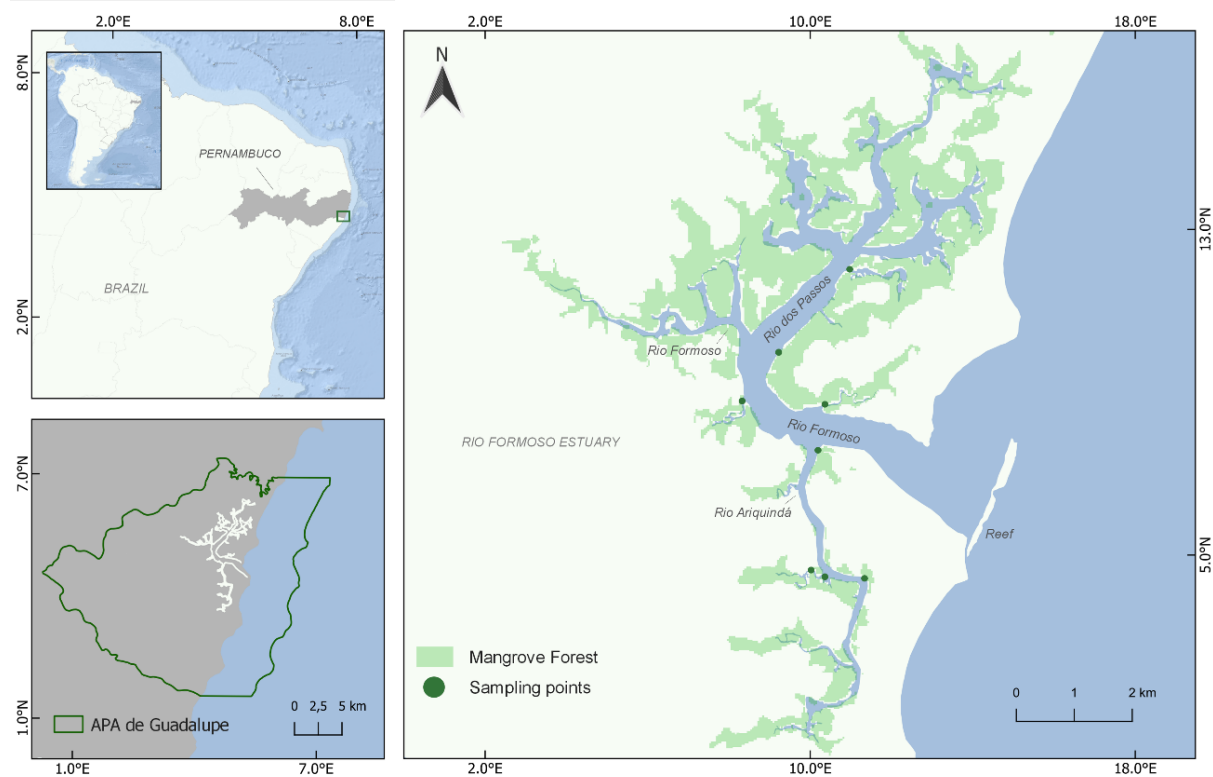


Figure 1. Map with the sampling points for seahorse population monitoring in Rio Formoso Estuary, Pernambuco, Brazil.

Educational materials and an awareness effort

We carried out a campaign to increase consciousness about seahorses in the Guadalupe Environmental Protection Area, as well as the proper behavior in relation to these animals. For this, we distribute educational material to tourists and local workers. This material is a conduct guide developed through participatory workshops with stakeholders in 2021 (e.g., fishermen, and boat drivers).

Next Steps

The project's next steps will be to analyse the gathered data in order to determine priority locations for seahorses in the estuary. These data will then be discussed in participatory workshops with stakeholders (such as fishermen, boat drivers, and

protected area managers) to make decisions for the conservation of seahorses in the estuary. Furthermore, we continue to promote the project's activities on social media and share educational material.







Figures 2, 3, 4, and 5. Seahorses (*Hippocampus reidi*) sampled during project field activities to monitor the seahorse population in the Rio Formoso Estuary, Pernambuco, Brazil.





Figures 6, 7, and 8. Project field activities to monitor the seahorse population in the Rio Formoso Estuary, Pernambuco, Brazil.



Figures 9 and 10. Awareness campaign with the distribution of educational material for tourists and local workers.