Plan Overview

A Data Management Plan created using DMPTool

DMP ID: https://doi.org/10.48321/D1J91D

Title: Dead or Alive

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Funder: Tetiaroa Society

Template: Tetiaroa Field Station

Project abstract:

The objective of this project is to identify and quantify the effect of live and dead corals on species diversity.

Start date: 03-19-2023

End date: 03-19-2025

Last modified: 01-18-2024

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Dead or Alive

Take boat out to experiment site (there are two). At each site there is a plot of 10 coral heads, 5 unhealthy (bleached) and 5 healthy (unbleached). These coral heads are zip-tied to PVC plates that can be secured to 10 concrete blocks that are placed at the bottom of the lagoon. The coral heads and corresponding placement blocks are numbered 1-10 at the first site and 11-20 at the second site. Place coral head into white cooler with clove solution for 1 minute to anesthetize any remaining specimens, then shake and dunk the coral head in the large bucket (full of saltwater) to dislodge anesthetized specimens. *Immediately check clove oil solution to see if any specimens are present in the white cooler. If so, immediately transfer to the large bucket (full of saltwater) using hands and/or net. Do this quickly to avoid harming organisms. Carefully visually inspect coral head to make sure all specimens are collected in the large bucket (full of saltwater). Dislodge and collect any remaining specimens. Transfer all organisms from the large saltwater bucket into separate small saltwater bucket (with numbered lid corresponding to the coral head sample) using a small net and by pouring the water from the large bucket through a small metal sieve, then using hands to pick up specimens and place in small bucket. Corresponding numbered lid is then put on small bucket, which is then placed in a cooler filled with cool water for later identification. Repeat steps #2-8 with remaining coral heads in ascending numerical order, keeping track of which coral heads are healthy (unbleached) and unhealthy (bleached). Transport cooler back to Gump Station by boat. Upon return from boat excursion, place all specimen buckets with lids removed on circulating water table and insert aerators as needed to keep water oxygenated. 11 Identify organisms to the species level using identification books (or Google) and count number of individuals of each species. Record and compile data in spreadsheet. Each column will be a coral specimen number and each row is a different species in the spreadsheet.

Data will be collected and shared via Zenodo.

No

Dead or Alive data is going to Zenodo.

- Yes
- Yes

We labeled each coral head corresponding to separate buckets in order to prevent cross contamination.

We would be able to track the long term effects of dead corals on colonization

We had challenges identifying species in the corals without proper ID tools. In order to overcome this, we needed professional input for advice, such as a professor or an expert.

We will apply a protocol and data excel sheet that will provide all the species encountered.

https://docs.google.com/spreadsheets/d/1rrPPXOZte0WiWuqPQdDwW8FZl-CNYVcG22mof3cJP3c/edit#gid=1286672704

We do not claim anything as our own property.

We will set guidelines and ethics statements for the protocol to ensure research is done with full transparency.
• No
n/a
Question not answered.
Question not answered.
Question not answered.
Data on species diversity from the live and dead corals is important to preserve in order to experiment again to get more correlation data.
Question not answered.