

Iconic Reefs Monitoring and Data Manager

Location: Key West - Florida Keys, FL Supervisor: Foundation Policy and Conservation Director

Program Overview

Mission: Iconic Reefs - In 2019, the National Oceanic and Atmospheric Administration (NOAA) launched *Mission: Iconic Reefs*, a bold initiative to restore seven coral reefs of the Florida Keys National Marine Sanctuary. This effort will restore nearly three million square feet of the Florida Reef Tract, about the size of 52 football fields, at seven key reef sites in the Florida Keys National Marine Sanctuary (NMS). It is one of the largest strategies ever proposed in the field of coral restoration. Iconic Reefs builds off of decades of pioneering restoration efforts proven successful in the Florida Keys involving growing and transplanting corals, setting the stage for this large-scale, multi-phased restoration effort. Additionally, Iconic Reefs aims to restore diversity and ecological function to the reefs by returning coral cover at target reef sites to a self-sustaining level.

With such a complex initiative, there is a critical need for a robust monitoring and data management approach. These monitoring efforts will be undertaken by resource management agencies, practitioners and a community based citizen science and stewardship program. Data management efforts will include tracking metrics and monitoring performance as outlined in the Iconic Reefs strategy; coordinating various monitoring methodologies; and monitoring to support adaptive management, with specific metrics to evaluate and track changes to the structure and functioning of the target reef ecosystem and ecosystem services. Ensuring that the data and information gathered can be analyzed and used to make timely resource management decisions will be critical to both the short and long term success of the project.

Position Overview

The Iconic Reefs Monitoring and Data Management Manager is a new position, designed to play a key role in supporting Mission: Iconic Reefs. Specifically, the Iconic Reefs Monitoring and Data Management Manager will serve as the technical lead between NOAA, restoration practitioners and partners, coordinating all data and information management and monitoring activities under Mission: Iconic Reefs within the Florida Keys. Monitoring data and activities will span the full Iconic Reefs initiative, with an emphasis on development of a detailed monitoring program, serving as chair of the Iconic Reefs Monitoring and Research Working Group, coordination of all monitoring efforts, field work associated with the implementation of the monitoring program, and analysis, archiving and presentation of monitoring data and findings, along with additional collaboration on site preparation, coral outplanting, and site maintenance activities. This position will require coordination with the Iconic Reefs Implementation Manager, Florida Keys NMS, and restoration partners. Monitoring tools and techniques include in-water surveys, passive sensors, photomosaics and photogrammetry. The Manager will develop a robust monitoring framework and data management systems and tools that will track, evaluate and showcase restoration progress while also being resilient and flexible as the program grows over the next 20 years.

Responsibilities

- Serve as technical lead to NOAA Florida Keys National Marine Sanctuary, the NOAA Restoration Center, coral reef restoration partners and practitioners for coordination and implementation of monitoring and data management activities in coordination with the Iconic Reefs Restoration Implementation Manager and the FKNMS Research Coordinator.
- Lead and direct the operations of the Iconic Reefs monitoring teams in the collection (and processing) of project-related monitoring data which includes photogrammetry, in-water fish and invertebrate surveys, and environmental data.
- Chair the Iconic Reefs Restoration Monitoring and Research Working Group.
- Manage and track all aspects of Mission: Iconic Reefs data and information management and monitoring program in the Florida Keys.
- Develop, implement, and maintain monitoring tools and data management systems, in close coordination with NOAA and external partners.



- Track and analyze progress to ensure goals and objectives are met and metrics of success and accountability are captured, managing completion of project deliverables and milestones.
- Manage simultaneous monitoring efforts from agency, practitioner, and community partners.
- Help de-conflict monitoring work associated with long term monitoring programs (FRRP DRM, CREMP, NCRMP, ESA-species specific monitoring) and use of these datasets to supplement monitoring data collected specifically for Iconic Reefs effort.
- Review efficacy and effectiveness of existing coral restoration techniques and novel techniques to scale up outplanting based on monitoring data and work with relevant partners, agencies and experts to identify and develop recommendations on adaptive management/changes in methodologies based on field data.
- Develop metrics and evaluate changes in the structure and functioning of restored ecosystems as a result of herbivore introductions
- Support FKNMS Permit Coordinator and Research Coordinator in review of annual report submissions from practitioners.
- Prepare annual and other periodic monitoring synthesis reports for resource managers.
- Create and collect content, reports, and visuals that can be used in communications materials to convey information about the Iconic Reefs progress.
- Communicate effectively to diverse audiences from highly technical to the general public, both written and oral communication.
- Participate in restoration monitoring and other field work (including SCUBA diving) as needed.
- Travel within the Keys and elsewhere will be required.

Qualifications

- Bachelor's degree, preferably in a marine science or ecosystem restoration discipline.
- 3-5 years of progressive professional responsibility in formal and/or informal education environments.
- Technical understanding of coral reef restoration, marine and coral reef ecology, monitoring and restoration techniques including expertise in coral identification and general knowledge of reef-associated algae invertebrates and fish.
- Experience in data management and synthesis of monitoring data, collation of scientific materials from a variety of sources and developing best-practice guides or consensus recommendations.
- Have working familiarity with development, management and analysis of complex spatial monitoring data. (Including use of metadata, geotagging, large spatially-referenced images)
- Experience conducting field work underwater, including the design, development and implementation of a comprehensive monitoring program and incorporation of photography and use of photomosaic techniques.
- Ability to become and maintain status as a NOAA Diver or a program that has American Academy of Underwater Sciences (AAUS) reciprocity.
- Knowledge and skill in small boat operations.
- Proficiency in the use of the Microsoft Office software suite (Word, Excel, PowerPoint), Google web-based office suite, ArcGIS Pro and ArcGIS Online, database program(s) (e.g., SQL), code-based statistical software (e.g., R) for data analyses, and photo analysis software (e.g, NSUs CPCE).
- Experience planning and managing project teams, including complex multi-partner projects.
- Experience organizing meetings, training, and events.
- Critical thinker with demonstrated problem-solving skills. Results driven.
- Meticulous attention to detail.
- Ability to perform under tight deadlines.
- Demonstrated initiative, ability to work both independently and with others. Demonstrated ability to coordinate among and between various organizations, programs, divisions, and/or offices.
- Demonstrated effective written and oral communication skills with experience in assimilating complex information into a concise issue paper or talking points using a variety of styles including scientific and plain language for multiple internal and external audiences.
- Flexible team member with a sense of humor and an ability to work quickly and prioritize multiple projects.



Why You Will Love Us

- Dedicated and passionate staff committed to marine and Great Lakes conservation, and a fun group who takes its work more seriously than we take ourselves.
- Generous leave policy.
- Health Benefits: medical, dental, and vision
- Foundation paid disability and life Insurance
- Retirement: 403(B) with 3% employer contribution after one year of service. No match required, 100% vested.

Compensation and Benefits

Salary Range: Commensurate with experience. The Foundation offers a competitive benefits package.

Start Date

Late April - May 2021

To Apply

Apply Here. Applications received prior to March 26, 2021 will be preferred.

The Foundation is an equal opportunity employer and actively works to insure fair and equal treatment of its employees.