Timeline

2016
- Workshop to Advance the Science and Practice of Coral Restoration in the Caribbean

2017
- Formed CRC Steering Committee & Priorities
- Formed Working Groups
- Drafted Governance Document

2018
- Reef Futures

2019
- Adopted revised Governance Doc.
- Voted in new int'l Steering Committee
- Added Regional Groups

2020
- Leadership Meeting
- Priorities Review

2021

Reef Futures
Mission

- to foster collaboration and technology transfer among coral restoration scientists, practitioners, and managers, and
- to facilitate a community of practice that will advance methods to restore coral reefs to keep pace with rapidly changing environmental conditions
Steering Committee

NGOs
• Coral Restoration Foundation*
• The Nature Conservancy/RRN
• Corales de Paz
• RRAP / JCU

Agencies
• US National Oceanic & Atmospheric Administration*
• UN Environment Program
• US Geological Survey
• Hawaii Department of Aquatic Resources

Academic
• Boston University
• University of Haifa, Israel
• National Autonomous U. of Mexico

For Profit
Working Groups

- Field-based Propagation
- Land-based Propagation
- Larval Propagation
- Monitoring
- Genetics
- Management
Regional Groups

- Meso-America
- Latin America
- Eastern Tropical Pacific
- Australia

Ad-hoc Groups

- Engineering
- Cryopreservation
Considerations for maximizing the adaptive potential of restored coral populations in the western Atlantic

Iliana B. Baums1,10 | Andrew C. Baker2 | Sarah W. Davies3 | Andreá G. Grottoli4 | Carly D. Kenkel5 | Sheila A. Kitchen1 | Ilisa B. Kuffner6 | Todd C. LaJeunesse7 | Mikhail V. Matz8 | Margaret W. Miller8 | John E. Parkinson1,8,9 | Andrew A. Shantz1

Molecular tools for coral reef restoration: Beyond biomarker discovery

John Everett Parkinson1,2 | Andrew C. Baker3 | Iliana B. Baums4 | Sarah W. Davies5 | Andreá G. Grottoli4 | Sheila A. Kitchen1 | Mikhail V. Matz7 | Margaret W. Miller1 | Andrew A. Shantz3 | Carly D. Kenkel8
Monitoring Working Group
Larval-propagation WG

**Coral Species Fact Sheet**

*Diploria labyrinthiformis* (grooved brain coral, Linnaeus 1758)

**Reproductive Biology**

- **Reproductive mode:** Broadcast spawning
- **Sexual system:** Hermaphroditic
- **Reproductive events per year:** 6 to 7
- **Gamete bundle size (Ø, μm):** 2380 ± 279 (11)
- **Egg size (Ø, μm):** 377 ± 19 (51)
- **Eggs per gamete-bundle:** 88 ± 45 (34)
- **Eggs per ml of gamete-bundles:** n.a.
- **Eggs per ml of egg slick:** 16230
- **Sperm per gamete-bundle:** n.a.
- **Sperm per ml of bundles:** n.a.

*Errors are SD and numbers in brackets are sample sizes*
Land-based, Larval, Cryo Groups

Mary Hagedorn, Smithsonian Inst.

Chris Page, Mote

Keri O’Neill, FLAQ

Kristen Marhaver, CARMABI
2020-2025 Priorities

- **Increase restoration efficiency**, focusing on scale and cost-effectiveness of deployment
- **Scale-up larval-based coral restoration** efforts, emphasizing recruit health, growth, and survival
- Ensure restoration of threatened coral species proceeds within a **population-genetics management** context
- Support a **holistic approach** to coral reef ecosystem restoration
- Develop and assist the use of **standardized terms and metrics** for coral reef restoration
- Support coral reef restoration practitioners working in diverse **geographic locations**

*(Vardi et al. in review)*
Questions?
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