

# The Caribbean Coastal Co-management and Coral Regeneration Programme

## 4Cs BARBADOS PROJECT

### COLLECTING INFORMATION ABOUT CORALS TRAINING MODULE

Ways of Encouraging Community Participation in Resource Management

<i>Implemented by</i>	
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# **COLLECTING INFORMATION ABOUT CORALS:**

## **Ways of Encouraging Community Participation in Resource Management**



*Photo Courtesy of Susan Mahon*

This Training Module has been prepared for those who wish to engage local resource users in activities relating to the surveying and mapping of corals.

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# **Introduction**

## ***Importance of Community Involvement***

The process of locating specific species of corals on an extensive reef area by one or two scientists is both a time and labour intensive undertaking. Therefore, surveying of large reef areas with a limited budget and personnel often proves overwhelming, and in many cases impossible. Involvement of resource users is a beneficial process to aid in projects of this nature.

Community involvement has proven to be an effective tool in project management and implementation in the Caribbean. Resource users often possess a wealth of knowledge and experience about their resource and involving them in the early stage of the project can reduce both research time and labour costs. Another advantage of partnering with resource users is that there is greater likelihood for cooperation when they are involved in the formulation process, thus giving a better sense of ownership, which encourages sustainable use and stewardship of the resource.

## ***Identifying Stakeholders***

At the beginning of the project, it is important to identify the stakeholders who interact with the resource in question. One method is to find a key informant such as a Fisheries Officer or a Coastal Zone Manager who is knowledgeable about the resource's users. Usually the members of the community who possess a good knowledge of the reef system are:

- Commercial and recreational divers
- Fishermen, especially spearfishermen
- Scientific research and management agencies (e.g. Coastal Zone Units, Fisheries Unit, Universities)
- Avid recreational beach users
- Recreational boat and yacht owners
- Residents of the area

Although it is usually assumed that the local scientific and management agencies possess the most knowledge of the coral reef assemblage, there are many laypersons that have been using the reef for many years who can provide valuable knowledge of the current and historic coral distribution. Examples of this would be persons who have spearfished on a segment of reef for decades, and might use large elkhorn coral colonies as in-the-water markers, or even persons who would have collected coral for the curios trade (they may have collected specific species of corals which are now rare). These persons are usually able to describe the historic range of many species of corals and report on their decline or growth.

## **Guidelines for Encouraging Reciprocal Learning While Collecting Information about Corals**

Many coastal managers believe that resource users are not interested in learning about the ecology and the importance of coral reefs. Some managers may be intimidated by the wealth of local knowledge that the resource users possess. However, stakeholders are usually very interested in learning about the significance of the resources they use. Workshops or more informal sessions are good meeting points to facilitate the exchange of information between managers and stakeholders.

### ***Engage Stakeholders***

**Engage stakeholders in meetings or activities where they feel comfortable with sharing their ideas and experiences.**

The “Caring for our Coasts and our Future” two-day workshop held in Barbados in June/July 2005 is an example of one such meeting. The workshop brought local dive operators together with other members of the academic and local community in a forum that would facilitate the exchange of knowledge, voicing of current issues, and the design of a way forward that would lead to more sustainable dive practices and environmental stewardship. Presentations on the biology and ecology of coral reefs were made by members of the scientific community, which were greeted with great interest by the dive operators. The wealth of local knowledge that was shared by the dive operators amongst themselves and with the workshop organisers was also very valuable. Many dive operators were able to illustrate the decline in the health of coral reefs they have dived on over the years. They were also able to give details on the locations of the staghorn and elkhorn coral still alive around the island. This was important, as the workshop organisers were involved in identifying the location of these rapidly declining species.

### ***Identify Common Goals Together with Stakeholders***

**Use a participatory approach so that stakeholders -- even those who are not articulate, those who are shy, or cannot read or write well -- are able to contribute their inputs towards some common goals.**

The participatory approach that was used in the “Caring for our Coasts and our Future” workshop held in Barbados is the same as that used in all of the participatory meetings in the 4Cs projects in Barbados and the Grenadines. This approach requires participants to first formulate their ideas individually, and then combine their ideas with those of other people. A certain discipline is imposed by the methodology in which groups of participants are issued with small scraps of paper (preferably re-used, for environmental reasons) – and the participants are instructed to write one idea only on each scrap of paper, write BIG, and write only 2-5 words on each scrap. Groups may appoint a “scribe” if desired and this

allows those who have good ideas, but cannot read, speak or write well, to contribute as well as those who are very literate and articulate. The scraps of paper are collected by a facilitator, or the participants themselves, and then grouped into sets of ideas on a piece of newsprint that is stuck upon a wall (Photo below). This allows the instantaneous identification of commonalities and differences, and promotes interaction and discussion amongst participants.



*Photo Courtesy of Susan Mahon*



### ***Encourage and Accept Invitations from Stakeholders***

**Encourage and accept invitations from stakeholders who wish to show you aspects relating to your field of interest.**

Dive operators and other stakeholders will probably be willing to take you out on their boats and show you the locations of corals so that they can be documented. Many of the corals documented with the assistance of stakeholders during the 4Cs programme were located in areas where scientists had believed the corals to be completely gone!!!! (see Appendix I).

### ***Establish Networks for Information Sharing***

**Networks for sharing** information amongst the resource users like dive operators and the resource managers – for example the University of the West Indies, Coastal Zone Management Unit, and Barbados Marine Trust [NGO] -- **are valuable**, to the continued collection and updating of data on Acroporid locations. Dive operators can automatically look for the elkhorn and staghorn corals during their work dives, and assist the resource managers in documenting the locations.

Divers can also report on any natural or human damage to these corals, as well as the coral colonies' health.

### ***Encourage Resource Users to Employ Participatory Techniques***

**Resource users who are accustomed to using participatory techniques during your interactions with them are more likely to use these techniques to engage others.** This approach can be instrumental in reminding others about the importance of the corals (and coral reefs as a whole) and promote awareness in the dive industry.

### ***Update Resource Users on Progress***

Resource managers should update the stakeholders on the progress of their projects. Information sessions can be held during and at the end of a project in order to update the stakeholders on the project, and to discuss with them how this information can be used in the future. A communication network (set up via email) is the simplest and quickest way to update both organisers and dive operators once the project is in full swing, and even after the project finishes. There will always be a need to hear from the dive operators if they find new coral colonies, since corals are always settling and growing in new areas, as well as being impacted by man and nature.



## APPENDIX I:

### *Map of Known Acropora Colonies on the West and South Coasts of Barbados*

**31<sup>ST</sup> JANUARY 2005**



Site #	Site Name	Latitude (Degrees)	Longitude (Degrees)
1	Maycocks	n/a	n/a
2	Bellairs	N 13° 11' 28.3"	W 59° 38' 32.1"
3	Paynes Bay 1	N 13° 10.297'	W 59° 38.315'
4	Paynes Bay 2	N 13° 10.287'	W 59° 38.358'
5	Paynes Bay 3	N 13° 10.178'	W 59° 38.322'
6	Long Shoal	N 13° 07' 17.3"	W 59° 38' 35.2"
7	Accra	N 13° 04' 17.0"	W 59° 35' 25.2"
8	Bougainvillea	N 13° 03.761	W 59° 33.394