

**NEGOTIATING INFLUENCE:
THE EXPERIENCE OF THREE LOCAL NGOS IN MARINE RESERVE CO-
MANAGEMENT IN SOUTHERN BELIZE**

by

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Abstract

Co-management has become an important tool in the management of Belize's natural resources, including the world's second largest barrier reef. There are many systems for co-management. Delegated co-management, where local NGOs serve as the decision making authority and community representative, is the most popular form for marine reserves in Belize. The use of co-management offers a way to engage a diverse range of stakeholders in the decision making process. However, the success of marine reserve co-management is affected by a range of local, national and international factors. Through personal observations as a Peace Corps Volunteer working in southern Belize, interviews with key individuals involved in marine co-management and review of related literature, I explore how political and economic issues at the local, national and international level have influenced marine reserve co-management. Three Belizean non-governmental organizations have signed co-management agreements with the Department of Fisheries for the management of marine reserves in southern Belize. My research indicates that there are a number of factors which influence co-management in this situation. These include: the ability of local NGOs to effectively engage and represent local communities, the influence of partisan national politics, unaccountable power by government ministers, a growing national financial crisis, and increasing investment by international conservation and tourism development interests; all of which affect co-management of marine reserves. The success that local non-governmental organizations have had implementing co-management is linked to their ability to balance these diverse pressures.

Preface

When I first learned that I was on my way to Belize as a Peace Corps Volunteer I pictured myself working with a small rural community on a forestry project. My only expectation about living so close to the world's second largest barrier reef was that I might find time away from my village to get SCUBA certified. As it turns out, I was spending my free time visiting those villages. One of my main jobs as a volunteer for the Toledo Association for Sustainable Tourism and Empowerment (TASTE), a small Belizean NGO co-managing the Sapodilla Cayes Marine Reserve (SCMR), turned out to be surveying coral reefs.

While working for TASTE, I began to learn more about the coral reef as well as the complexities and realities of marine conservation in Belize today. TASTE struggled to find footing, and funding, in a region crowded with community conservation organizations. I often marveled at both the potential and constraints of trying to involve communities in the bureaucracy of Belizean protected areas management. The more that I worked with TASTE and in southern Belize, the more confused I became. It seemed like marine reserve co-management was working. I was watching as NGOs implemented new projects, provided jobs for local people and seemed to improve management at their marine reserves. But it was frustrating, especially after a day trying to get the Fisheries Department to sign off on the management plan that we had worked so hard on.

I had a hard time understanding what co-management was meant to do and then understanding why it wasn't working. To me co-management meant sharing, collaborating and learning together. It meant more than just money. It meant give and take, and offered the possibility to include diverse stakeholders and ensure conservation as well as community benefits. These issues haunted me and the fellow volunteers I joined often for beers at the local bar. After a day struggling to secure funds and incorporate often demanding community members into the process of resource protection in the hopes of one day improving their lives, we

often questioned if our actions were having any real effect. We watched local people complain about the government and struggle to pay their bills. Our work was frustrating and we quickly learned life (and co-management) in Belize is a delicate balancing act.

This paper is my attempt to explore and evaluate that balance in hopes of finding a way for co-management to contribute something valuable to marine reserve management. In an unexpected and wonderful way the islands and people working to protect that one piece of the Belizean reef became my home and my family. My Peace Corps assignment was not at all what I imagined, it was better. I hope that this work can make co-management better too.

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List of Acronyms

BAS-	Belize Audubon Society
BTB-	Belize Tourism Board
BTIA-	Belize Tourism Industry Association
CBO-	Community Based Organization
CZMAI-	Coastal Zone Management Authority and Institute
FON-	Friends of Nature
GEF-	Global Environment Facility
GOB-	Government of Belize
GSMR-	Gladden Spit Marine Reserve
HCMR-	Hol Chan Marine Reserve
MBRS-	Mesoamerican Barrier Reef System
MMMT-	Maya Mountain Marine Transect
MOU-	Memorandum of Understanding
MPA-	Marine Protected Area
NGO-	Non-Governmental Organization
NPASP-	National Protected Areas Strategy Plan
PHMR-	Port Honduras Marine Reserve
PUP-	Peoples United Party
SCMR-	Sapodilla Cayes Marine Reserve
TASTE-	Toledo Association for Sustainable Tourism and Empowerment
TIDE-	Toledo Institute for Development and Environment
TNC-	The Nature Conservancy
UDP-	United Democratic Party
UNESCO-	United Nations Environmental Social Cultural Organization
USAID-	United States Agency for International Development
WWF-	World Wildlife Fund

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Introduction

Over the past few years the traditional view of protected areas based on human exclusion has changed as managers have realized the importance of involving community groups in management activities. The call for greater user participation have led many countries to involve local people in resource management (Borrini-Feyerabend, Pimbert, Farvar, Kothari, & Renard, 2004). These initiatives have been given a wide range of names but are commonly referred to as co-management (Berkes, George, & Preston, 1991). Although there is debate over the definition of co-management, most researchers agree that co-management is “the sharing of power and responsibility between government and local stakeholders” (Berkes, George, & Preston, 1991). The development of co-management acknowledged that local people needed to be involved in the decision making process.

There is no one way for co-management to occur; in fact most co-management involves sharing decision making power between various players. Co-management contrasts with top down management where the state, which traditionally has ownership over protected areas, maintains all decision making power. The idea behind co-management is that the organization with power looks to develop:

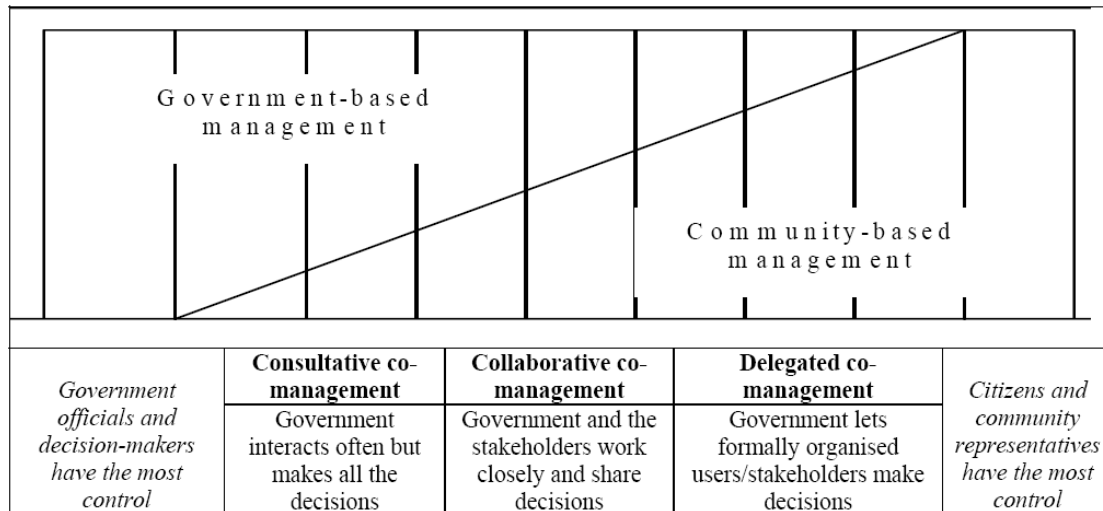
a partnership with other relevant stakeholders (primarily including local residents and resource users) which specifies and guarantees their respective functions, rights and responsibilities with regard to the protected area (Borrini-Feyerabend, 1996, p. 3)

The relationship between government and local stakeholders often develops over a period of time and can be seen as continuum from simple information sharing to complete delegated control. This implies that each co-management arrangement is unique and reflects the complexity of relationships between local users and government authorities (Pomeroy & Berkes, 1997).

Co-management exists across a spectrum from government based to community based and there are three general types of co-management agreements 1) Consultative, 2) Collaborative and 3) Delegated (McConney, Pomeroy, & Mahon, 2004). Consultative management gives

government the most control while delegated management gives community members or groups the most control. (See Figure 1.) The power sharing agreements developed in co-management arrangements are not static, it is a process requiring flexibility and adaptive management by the co-management partners (Borrini-Feyerabend, Pimbert, Farvar, Kothari, & Renard, 2004).

Figure 1: Continuum of Co-management Arrangements



Source: Modified from (McConney, Pomeroy, & Mahon, 2004)

In the small Central American country of Belize, co-management has emerged as the dominant paradigm for protected areas management. The adoption and practice of co-management as a mechanism for improving protected areas management has been supported by the Belizean government. The Belizean use of co-management has included the development of a wide range of non-governmental organizations (NGOs) and community based organizations (CBOs) as key players in the conservation of Belize's diverse resources. There are many different types of co-management practiced in Belize, and each system has its own strengths and weaknesses. With an extensive protected areas system, including terrestrial and marine protected areas, and limited governmental resources; co-management can offer more effective administration of parks, along with national and local benefits (Meerman & Wilson, 2005). In

this way co-management operates under the rubric of sustainable development or the creation of sociologically, ecologically and economically resilient systems (Folke et al., 2002).

The difference between decentralization, devolution and co-management can be confusing. Most view decentralization as the transfer of power to local government and devolution as the transfer of power to user groups (Meinzen-Dick & Knox, 1999). In the case of Belizean marine resource management, and throughout this paper, I use co-management to refer to the devolution and sharing of power between government and a local non-governmental organization who serve as a representative of the local community. The popularity of this approach has been influenced by concerns that centralized management of these resources can lead to overexploitation (Pomeroy, 1999).

The growing recognition of the need for greater community involvement in natural resource management has encouraged the adoption of new methods, such as co-management, which give local people greater control over how resources are managed (Borrini-Feyerabend, Pimbert, Farvar, Kothari, & Renard, 2004). The incorporation of community members in the decision making process is often highly complicated. Much of this complication springs from the difficulties of clearly defining community. Local communities have traditionally been viewed as small spatial areas with shared social structure and values, this definition has been challenged by the growing realization of the diverse factors and complexities of community groups (Agrawal & Gibson, 1999). Stakeholder is another term used to describe the various organizations, social groups and individuals who possess a direct, significant and specific stake in the protected area (Borrini-Feyerabend, 1996). Although co-management was designed to include communities and stakeholders in the decision making process the complexities of defining these terms makes the co-managers job of representing and involving local interests much more difficult. In the Belizean context and throughout this paper I will use community to refer to the wider range of local interests. Stakeholders refers to more specific groups and individuals (such as tour guides, fishermen, local conservationists) who have personal economic or management interests in

marine resources. The complexity of defining communities and stakeholders only further complicates local NGOs and Belizean government incorporation of diverse interests.

Exploring Marine Co-management and National Forces in Southern Belize

Belize is home to the second largest barrier reef in the world and the longest stretch of reef in the Western Hemisphere. In the 1980's there was growing awareness across the globe that many of the world's fisheries resources were threatened, and interest by decision makers in the promotion of more sustainable use of these resources (Pomeroy, 1999). The need to conserve and protect the valuable resources of the Belize Barrier Reef prompted the Government of Belize to create a series of fourteen marine protected areas. In 1996, UNESCO declared the entire reef a World Heritage Site, giving seven protected areas World Heritage Designation.

The application of co-management to marine reserves is a rather new phenomenon in Belize. Generally in the Caribbean region collaborative co-management is the most popular form of co-management for marine protected areas (MPAs) (McConney, Pomeroy, & Mahon, 2004). The collaborative model gives co-management partners an equal role in the decision making process (McConney, Pomeroy, & Mahon, 2004). Belize is one of the few places in the Caribbean that has adopted the delegated form of co-management as the primary model for marine resources. In this form of co-management, the government has devolved the majority of decision making power to local groups (McConney, Pomeroy, & Mahon, 2004). Delegated co-management should provide local community members or groups the authority to make decisions and enforce laws within a reserve. In Belizean MPA co-management the government has favored using local Belizean non-governmental organizations as representatives of local stakeholder and community interests. In this form of co-management the government shares power with local Belizean NGOs who bear the responsibility of representing community interest.

There are three non-governmental organizations working with the Fisheries Department for the co-management of marine reserves in the southern portion of the Belize. These

organizations, and their relationship with the Fisheries Department, have developed over the past seven years and emerged as pivotal examples of how government, local NGOs and communities can work together to manage marine resources. These three local NGOs are currently exploring new methods of marine reserve management, and have formulated strategies and implemented management activities that to serve the environment and local communities. However, these NGOs face numerous local, national, and international challenges. Co-management is dependent upon a working agreement between diverse parties. These groups must agree upon and work towards some common goal for the management of resources within a protected area, thereby balancing sometimes divergent interests.

In this paper I will evaluate how the three local NGOs negotiate the complex local, national and international forces affecting marine reserve co-management in Southern Belize. The successes and failures of these local co-management partners offer insights into how co-management is approached and practiced at a local level to balance conservation and development demands. It is also important to understand the various national factors, such as power, financial resources and partisan politics that affect co-management. These forces have greatly influenced the way in which co-management is carried out. In addition, marine reserve management is influenced by a variety of international factors, particularly global conservation NGOs and large-scale tourism development. The ability of co-managers to move forward will require careful consideration of these diverse local, national and international influences.

History, Politics and Development

The geography and colonial history of Belize have had an important influence on how the country has developed. The colonial system has greatly shaped the political and economic realities of Belize today (Shoman, 1994). In turn, the management of Belize's diverse ecosystems is directly related to the political and economic factors at work in Belize. It is important to understand how these political and economic forces emerged in order to better understand their effects on co-management.

Geography

The small Central American nation of Belize is bordered by Quintana Roo, Mexico to the north; Peten, Guatemala to the west and south; and the Caribbean Sea to the East. (See Figure 1.) Known as the British Honduras until 1973, Belize achieved its independence from Britain on September 21st, 1981. The second smallest Central American country, Belize has a land area of 8,867 square miles (Bolland, 1986). Belize has been classified into nine major terrestrial ecosystems including: water, wetlands, coastal savanna (marine salt marsh), mangrove and littoral forest, lowland savanna, lowland pine forest, submontane pine forest, lowland broadleaf forest and shrub lands, and submontane broadleaf forest; and two major land use categories urban and agricultural (Meerman & Sabido, 2001). The second largest barrier reef in the world, the Belize Barrier Reef Complex extends 260km from north to south starting at Belize's border with Mexico and extending to the border with Guatemala (National Biodiversity Committee, 1998). This complex contains over 1,060 mangrove and sand cayes, all reef types, and sea grass beds (National Biodiversity Committee, 1998). The reef and associated ecosystems are home to a wide range of species including 113 species of corals, and over 1300 associated plant, animal, bird, insect and fish species (National Biodiversity Committee, 1998).

Figure 2: Map of Belize



Source: (Perry-Castañeda Library Map Collection, 2003)

Belize is divided into six administrative districts: the coastal districts of Corozal, Belize, Stann Creek and Toledo and the inland districts of Orange Walk and Cayo. It is the least densely populated country in the Americas with about 273,000 people, the capital of Belize is Belmopan, but the majority of the population lives in and around Belize City (Government of Belize, 2003b).

The population is ethnically diverse and includes Meztizo (48%), Creole (25%), Maya (11%) and Garifuna (6%), in addition to smaller groups of German Mennonites, East Indians, Chinese and a growing population of American and British expatriates (Peedle, 1999).

History

Belize was once a part of the expansive Maya empire which included parts of present day Mexico, Guatemala, Belize, Honduras and El Salvador. It is possible that during the high point of the Maya civilization Belize may have been home to almost one-million Mayan people (Shoman, 1994). After the Maya “collapse” in the early part of the tenth century, scattered settlements of Maya remained throughout the region. The first Europeans to set foot in Belize were the Spaniards in the early part of the 16th century (Bolland, 1986). By the late 16th century British pirates entered the region, engaged in the logwood trade, and began bringing slaves to assist with the logging operations. Over the next hundred years British and Spanish settlers were often in conflict over territorial control. On September 10th, 1798 these confrontations came to head at the battle of St. George’s Caye, where the British defeated the Spanish (Shoman, 1994). This defeat gave way to a tacit understanding between the two parties allowing British presence and use of natural resources in what was considered Spanish territory. In 1859, the British and then independent nation of Guatemala signed the Anglo-Guatemalan treaty giving the British control of the area that is present day Belize, in exchange for the construction of a road between Guatemala City and the Atlantic Coast (Shoman, 1994). In 1871, British Honduras officially became a Crown Colony (Shoman, 1994). As the colony developed it was gradually accorded more autonomy becoming self governing in 1964, British Honduras became officially known as Belize in 1973 and finally achieved independence in 1981 (Shoman, 1994).

Political Administration

The Belize Constitution outlines the political structure of the country. Belize is a Parliamentary Democracy based on the Westminster System, with the Queen of England as the official head of state. The queen is represented by the Belizean Governor General, who has official responsibility (mainly ceremonial) for the appointment of the Prime Minister, Cabinet and Senate. There are two branches of the government: the Executive and the Legislative. The Executive Branch consists of the Prime Minister and Cabinet Ministers, while the Legislative Branch includes the House of Representatives and the Senate (Government of Belize, 2000a).

The Executive Branch has the vast majority of the power in the Belizean government. The Prime Minister is appointed by the Governor General after the general elections as the leader of the party with the most representatives in the House (Government of Belize, 2000a). The Prime Minister is required to call elections every five years although they can be called earlier (Government of Belize, 2000a). The Governor General then appoints Ministers of Cabinet on advice from the Prime Minister. Members of the Cabinet must come from either the House of Representatives or the Senate (Government of Belize, 2000a). These members are the basic policy making arm of the government. Cabinet members are responsible for “every part of the Government’s administration” (Government of Belize, 2003c). Each Minister is assigned a portfolio which encompasses his or her responsibilities. According to the Government of Belize (GOB) website Ministers:

...must all defend the policy of the Government in both of the Houses. They may disagree inside the cabinet but once a decision is made all are obliged to defend that policy and it is never known that any one of them did not agree with this or that policy (Government of Belize, 2003c, ¶ 4).

This idea of a united front is referred to as “collective responsibility” and if a minister is unwilling to commit to collective responsibility he or she is expected to resign his or her position (Shoman, 1987). The Westminster governmental model which Belize has adopted gives the executive branch almost complete control over the decision making process (McAllister, 2004;

Shoman, 1987). Typically the cabinet members are chosen from ranking members of the ruling party and the composition of the cabinet and/or portfolios of Ministers can change at any time. It is the cabinet that decides policy which is passed into law by the Legislative branch. (A list of current Ministries is provided in Appendix A.)

The Legislative Branch is composed of an elected House of Representatives and an appointed Senate. Currently, the House has 29 members representing constituencies based on population: Orange Walk, Cayo, and Corozal with four; Stann Creek and Toledo with two; and Belize with thirteen- 10 within Belize City (Barry, 1995). House members are responsible for the passing of all laws. The other portion of the Legislative Branch is the Senate which consists of twelve members appointed by the Governor General on the advice of various political and civil society leaders. The Senate is responsible for the ratification of all bills. Although “in theory, the Cabinet is responsible to the National Assembly and through the National Assembly to the people who may call it to account at the next General Elections,” for the most part the Legislative Branch serves as a pool of candidates for the more influential cabinet positions (Government of Belize, 2003c, ¶ 6).

Belize’s history as a crown colony has had a large affect on its political development. Unlike the majority of its neighbors, Belize has been free of the violent political strife that has characterized Central America. Throughout its colonial history British Honduras applied a type of rudimentary democracy. During the early years, the loggers of British Honduras were governed by a system of Public Meeting (Bolland, 1986). The middle part of the twentieth century saw a rise in political participation with the unions and women entering the political arena, laying the ground work for the formation of new political parties (Shoman, 1987). In 1954 these struggles were rewarded with universal adult suffrage (Bolland, 1986). A new constitution was introduced in 1961 in preparation for self government, which was awarded in 1964 (Bolland, 1986). This constitution formed a Legislative Assembly and signaled the beginning of party

politics in the country (Shoman, 1987). From the 1960's until independence in 1981, freedom from colonial rule was the driving political rallying cry.

The first legislative elections in 1961 were dominated by George Price and the People's United Party (PUP), who won all of the seats (Shoman, 1987). The People's United Party had grown from the nationalist and union movements that dominated politics in the early part of the twentieth century (Shoman, 1987). The PUP, with the support of the unions, was a major anti-colonial force. During the 1960's a number different political groups arose in opposition to the People's United Party. In 1973, after a number of splits and name changes these opposition political groups formed the United Democratic Party (UDP) which became the major opposition party to the PUP (Shoman, 1987). While the constitution does not explicitly mandate a two party system, the British supported creation of a two party political system based on the British model, which is what exists in Belize today (Shoman, 1987).

The British declared their intent for the independence of British Honduras in 1961 (Shoman, 1994). However it was the Guatemalan Issue and its associated security concerns, not British opposition, that was the major impediment to Belizean independence (Shoman, 1994). The British claim to the area of present day Belize has been challenged by the Guatemalans since the British entered the area. When Guatemala rewrote its constitution in 1945 it included the land that is now Belize as a part of its national territory. This brought new life to concerns over territorial integrity which grew into the Guatemala Issue. In 1948 Guatemala threatened to invade British Honduras. This threat was answered by the placement of British troops along the western border to defend the boundaries and land of British Honduras (Shoman, 1994). Negotiations between Britain-British Honduras and Guatemala began in 1962 and were broken off and restarted multiple times during the 1960's and 1970's (Shoman, 1994). This was accompanied by continual threats of Guatemalan invasion, followed by British reinforcements along the border (Shoman, 1994). Belize took its case to the United Nations in 1975 and in 1980 a resolution was passed with important US support calling for Belize's secure independence. In

1980 after the negotiations dictated by the UN resolution between Guatemala and Britain broke down, Britain reluctantly agreed to guarantee security after independence. This removed all obstacles to Belize's independence and on September 21st, 1981 Belize became an independent nation. A few weeks later Belize became a recognized member of the United Nations and the Organization of American States (Shoman, 1994).

It was the lead up to Belizean Independence which cemented the dominance of the PUP and UDP as the major political parties. During the 1979 election the UDP toned down some of its anti-colonial rhetoric, began stressing economic issues, and came close to overthrowing the longstanding dominance of George Price and the PUP (Shoman, 1987). When the first elections of a newly independent Belize were called in 1983 the UDP developed an opposition strategy which focused on the need for foreign investment and private-sector solutions (Barry, 1995). This coupled with desire for change from George Price's PUP dominance, led to a UDP victory in that election (Shoman, 1987). During much of the 1980's the UDP was more pro-US and anti-communist than the PUP (Barry, 1995). However, this characterization has largely dissipated in recent years as both parties have adopted similar economic and political strategies. Up until the elections in 2003, control of the government had alternated between PUP and UDP. In the 2003 elections, the PUP government led by the Hon. Said Musa was re-elected. The next national elections will likely not be called again until 2008.

The importance of politics in Belize can not be overstated. Politics pervades everything in Belizean life. The two-party system which depends upon a powerful cabinet has effectively limited public involvement in policy formulation and decision making (Shoman, 1987). In addition, Belizean politics is volatile and there is intense animosity between the parties (Personal Observation). These conflicts over political dominance increasingly impact the country and natural resource management. The consequences of political decisions are felt in all sectors, including marine conservation.

Economy and Development

As a member of the British Commonwealth, the economy and society of Belize were heavily influenced by colonial politics and ideology. Until the middle part of the twentieth century British Honduras was largely dependent on the extraction of timber resources including logwood and later mahogany and chicle (used as a base for gums). Logging was conducted by groups of slaves or hired workers who traveled far to the interior of the country along suitable rivers and streams. Harvested logs were then floated down the rivers to Belize City where they would be shipped to their destination, mainly Europe. The colonial focus on the logging economy saw little need for diversified local economic development or infrastructure, such as roads and local markets. The colonial powers used the logging work schedule, policy, and low population density to discourage other types of development. Throughout this paper I will use the term development in the traditional economic sense to indicate economic growth through the provision of jobs and accumulation of wealth.

The uncertainty of the British land claim and lucrative timber economy pushed export oriented agricultural development to the background for much of the colonial period (Shoman, 1994). It wasn't until 1950's when timber exports started to decline that agriculture started to become an important economic earner. This shift in colonial policy from extraction to production was driven by British policy and the dwindling economic viability of the forestry sector (Camille, 1994). Initial agricultural development was in sugar. When the British granted Belize preferential access to sugar markets and quotas, the British company Tate and Lyle quickly became involved in the sugar industry (Barnett, 1995). Most of the investment in sugar was focused on the northern part of the country, and in 1959 sugar replaced timber as the major export earner (Bolland, 1986). In addition to sugar, bananas and citrus were promoted by the British and developed into major exports. The growing agricultural sector required more infrastructural development including roads linking major towns. Today the triad of sugar, bananas and citrus continues to make up about 60% of total export earnings, with fisheries and a small processing

sector making growing contributions to the economy. (Government of Belize, 2003a). All three of the major exports are characterized by high price volatility and were initially protected through trade agreements between Britain, the US or the European Community (Medina, 1998). Recently, price protections have evaporated leaving Belize in a perilous position in the international market. Because of its small size and higher labor costs Belize is poorly equipped to compete with larger agricultural economies in Latin America.

In addition to the terrestrial resources, the coastal region of Belize has been extensively utilized for centuries, and its economic contribution is estimated at about US \$150 million annually (Coastal Zone Management Authority and Institute, 2001b). Some of Belize's most important economic activities including: tourism, fishing and aquaculture occur in the coastal zone. Fisheries exports including finfish, conch and lobster contribute about US \$10 million per year to the economy (Coastal Zone Management Authority and Institute, 2001b). In recent years there has been a growing trend to expand aquaculture, specifically shrimp farming. Including aquaculture, the combined earnings from the fisheries sector was almost US \$50 million in 2003 (Belize Central Bank, 2004).

Over the past fifteen years Belize's economic policy has incorporated rapidly growing tourism. Belize was at the forefront of the 1990's burgeoning global ecotourism market. In 1995 Belize was the focus of an Audubon Society documentary which made an example of Belize's eco friendly approach to tourism development (Wood & Bell, 1995). Tourism and its associated service industry, accounted for an estimated 23% of GDP and was the largest contributor to economic growth in 2004 (World Travel and Tourism Council, 2004). Much of that tourism is marine based and focused at the Northern Cayes. In fact the barrier reef was the original draw for tourists, with Belize gaining a reputation in the 1970's as a dive destination. Belize continues to aggressively promote itself as an ecological and cultural wonderland with reef, jungle and Mayan ruins to satisfy every taste (Belize Tourism Board, 2005a). In addition to the eco-tourism market,

cruise tourism has become an important economic outlet in recent years (Launchpad Consulting & Russell, 2005).

Current Political and Economic Outlook

Belize continues to feel the effects of its colonial history (Shoman, 1994). The Westminster parliamentary system adopted by Belize and many other former British colonies, has limited political discussion and polarized party politics. Many island states, with their small size and population, have limited potential for industrial development and are dependent on single commodities, foreign aid, remittances, and export markets (Gössling, 2003). The consequences of the political and economic realities in Belize today continue to influence everything from community relations to national conservation policy.

The political reality of small nations like Belize was not taken into consideration when the legal and political systems were established. Shoman notes, "...it was a forgone conclusion that it [the constitution] would follow the pattern established by Britain" (Shoman, 1987, p. 52). The failure to consider the unique aspects of Belizean culture created a political system that is rife for corruption and abuse. George Price and the PUP's dominance created a political system that focuses on nationalism and leadership, often detracting from a debate over social, economic and resource development and management issues (Shoman, 1987). Consequently, few differences in policy exist between the two parties today. In small societies, politics often becomes personal and partisan loyalty important (Benedict, 1967). In a political system that typically operates behind closed doors (e.g. cabinet meetings) there is little opportunity for public input or discussion. This tends to impact every decision and action carried out in the country.

Although party loyalty runs deep, today there are growing similarities in policy and governing styles between the PUP and UDP. One of the major critiques of the Westminster style of government in Belize has been its failure to effectively incorporate majority need (Shoman, 1994). Both parties participate in what Shoman labeled as "clientilism" which he described as

“rewarding supporters with contracts, jobs, land and other favours” (Shoman, 1994, p. 255).

Shoman goes on to say:

No matter what party is in power, the gap between the rich and poor widens, the economic and social systems are unchanged, corruption strives unabated and foreign influence increases. (Shoman, 1994, p. 255)

The People’s United Party governs Belize today and was victorious in both the 1998 and 2003 elections, securing Prime Minister Said Musa’s position. Musa is the first prime minister to serve a second term since George Price. He has had to deal with a number of major issues including: two significant hurricanes, declining exports and drop in tourism after September 11-all of which have led to a slowing of the economy (Government of Belize, 2003a). In addition to economic troubles, Musa has been faced with party divisions within the PUP, including the 2004 resignation and later reintegration of seven of his own cabinet members, including the current Deputy Prime Minister (Ramos, 2004a). A growing number of scandals, cabinet reshuffles and budgetary problems have led to a feeling of uncertainty amongst many Belizeans (Personal Observation). The UDP opposition led by Hon. Dean Barrow has attempted to exploit these problems, and at the recent municipal elections the UDP was the overwhelming winner securing 64 of 67 available positions (Channel 5 Belize, 2006). This recent development will likely contribute to tensions as both the PUP and UDP struggle to find firm footing for their political parties and the nation.

Like the current political situation the Belizean economy is in flux and highly vulnerable. Services contributed nearly 60% of GDP in 2002, while agriculture (specifically citrus, bananas and sugar) contributed 60% of export revenue (Government of Belize, 2003a). The Belizean economy is dominated by a few agricultural commodities which are increasingly vulnerable to price fluctuations and international market pressure. With declining access to preferential markets, almost all Caribbean nations, including Belize, face difficult financial choices (Medina, 1998). In response to similar challenges, many island countries have turned to tourism

development as a means to generate both employment and revenue, and to safeguard important cultural and natural resources (Gössling, 2003). Although tourism offers an answer to some financial problems, September 11th illustrated its vulnerability as well. Currently, Belize is exploring ways to secure new revenue strategies, including tourism, based on its abundant natural resources.

The confluence of economic and political forces affects all levels of Belizean society. The impact of these factors on marine resource management will be explored in the following sections. Effective co-management of natural resources depends on strong relationships between government and local communities, and requires close cooperation between numerous government agencies. This support can be difficult when government is focused on other issues. Despite its value to the country, the marine ecosystem is currently threatened by over fishing, uncontrolled tourism, infrastructure development, and pollution, making it difficult to manage.

Site Description Southern Belize

Southern Belize, defined as the southern half of the Stann Creek District and the entire Toledo District, currently confronts rapid development. The population of Southern Belize includes Mopan and Kekchi Maya living in small villages in the forested interior. A mix of Creole, Garifuna and East Indian dominate the coastal region especially the coastal town of Punta Gorda, the district town of Toledo. Placencia, located at the tip of the Placencia peninsula in southern Stann Creek, is a rapidly growing tourist destination. The Toledo District is often called the “forgotten district”, and is the poorest and least developed district in the country. Until 2003, the road connecting Punta Gorda to the rest of the country was not paved and prone to flooding. The lack of easy access has played a major role in the slow development of southern Belize. Lack of significant economic development, low population density and rich natural resources have recently brought international attention to this area, and development strategies are being debated.

In Southern Belize the majority of the ethnically diverse rural population relies upon traditional livelihoods such as agriculture or fisheries (Belize Forest Department & United Nations Food and Agriculture Organization, 2004). The Maya population living in the forested Maya Mountains depends upon milpa agriculture (i.e., shifting cultivation). In the 1990's the GOB was active in promoting logging in this highly forested region, however that plan was thwarted by the 2001 hurricane (DeVries et al., 2003). The past few years have seen the growth of shrimp farming, which has become a major economic earner and has provided jobs. However, it is ecotourism that has been the most heavily touted development opportunity (Blackstone Corporation, 1998; Woods, Perry, & Steagall, 1994). Southern Belize boasts a triad of marine, terrestrial and cultural attractions. There has been some success promoting guesthouses in interior villages and a few ecotourism lodges have been built in recent years. However, despite the attention, few visitors stay long in Punta Gorda and most pass through on the way to or from

Guatemala. While tourism development has remained stagnant in Toledo, development in Placencia has doubled in the past ten years (Personal Communication,,, L. Herrera, 2005).

Poverty in the Toledo district is the highest in the nation with close to 60% of the population living below the poverty line (Belize Forest Department & United Nations Food and Agriculture Organization, 2004). The high incidence of poverty has made southern Belize the focus of many GOB development initiatives in the past five years, including two intensive development projects with financing from international lenders. Despite impressive investments and substantial efforts, most local residents have seen little improvements in their daily lives (DeVries et al., 2003).

Southern Belize is home to the majority of Belize's protected areas. The abundant natural resources of Southern Belize are due in part to high annual rainfall, low population density, high species diversity and the wide range of different ecosystems. The relatively healthy ecosystems support threatened and endangered species such as jaguar, manatee and whale sharks. The high ecological diversity has brought this region to the attention of international donors and conservation organizations that, working with local NGOs, have highlighted the need for resource conservation and protection.

The cultural dynamics of Southern Belize can impact on the effectiveness of any conservation or development action. The southern portion of Belize is the focus of Guatemala's continuing claim which remains unresolved (Shoman, 1994). Questions of sovereignty continue to haunt the region, especially the Sapodilla Cayes which make up the southern portion of the Belize Barrier Reef. The proximity to Guatemala and Honduras has also encouraged migration, and a lack of infrastructure has led to the development of informal trade networks between Belize and Guatemala. The high density of poor landless Maya in the interior has led to a local and national debate over land reform and indigenous rights (Belize Forest Department & United Nations Food and Agriculture Organization, 2004).

All of these factors have affected the development of southern Belize. One of the responses to these problems has been the establishment of a network of aid workers, development professionals, civil society and non-governmental organizations. The prevalence of these organizations has created an interesting dynamic in the region. Most people consider themselves stakeholders in a wide range of different projects from marine conservation to land rights. On any given day in Punta Gorda numerous people attend meetings and trainings in association with the activities of one local NGO or another. It is often lamented that there are more acronyms than residents in Punta Gorda. The proliferation of organizations has also created a situation where local groups compete with one another for funding, participants and recognition (DeVries et al., 2003).

Southern Belize also makes up an important part of the Gulf of Honduras. The gulf covers about 10,000 km² and extends from Sittee River in Belize, south east to Punta Sal in Honduras. The area includes diverse coastal and marine ecosystem types and is home to a wide range of species. In addition to its natural resources, the region contains a variety of protected areas and almost half a million people, with 12.4 million living in the adjacent watersheds (ABT Associates & Woods Hole Group, 2003). A variety of international and local NGOs strive for more sustainable use of the coastal and marine resources of the Gulf of Honduras. Although this paper will focus on the marine protected areas in Belize, it is important to remember that all of these areas lie in an important transnational area, influenced by the political, economic and development decisions made by the governments and people of Belize, Guatemala and Honduras.

Within the Belizean waters of the Gulf of Honduras are four marine protected areas: Gladden Split Marine Reserve, Laughing Bird Caye National Park, Port Honduras Marine Reserve and Sapodilla Cayes Marine Reserve. All four of these parks are co-managed with the GOB and a local non-governmental organization; Friends of Nature (FON) for Gladden Split and Laughing Bird Caye, Toledo Institute for Development and Environment (TIDE) for Port Honduras, and Toledo Association for Sustainable Tourism and Empowerment (TASTE) for

Sapodilla Cayes. Each organization has had specific successes and difficulties. I will focus on co-management of marine reserves between local NGOs and the Fisheries Department and explore how these NGOs are affected by local, national and international political and economic forces.

Objectives and Methodology

This research strives to evaluate how co-management of marine reserves in Southern Belize is affected by local, national, and international forces. The use of co-management by both NGOs and the government has had significant impact on the management of marine resources. In the southern part of the country local NGOs have taken responsibility for most on the ground management. I will examine how co-management is being carried out by the three NGOs working with the Belize Fisheries Department in the southern section of the country and explore how this management is influenced by local, national, and international forces. Co-management requires negotiation between communities, and occurs within the political and economic realities of developing nations (Pomeroy & Berkes, 1997). In order for co-management and conservation to function it is important to understand how these diverse issues interact.

From September 2003 to August 2005 I served as a Peace Corps Volunteer in Punta Gorda, Belize. I worked for the Toledo Association for Sustainable Tourism and Empowerment (TASTE). At TASTE I was involved in a wide range of duties including working with local communities and stakeholders, grant writing, project management, biological research and monitoring, and education and outreach. This work allowed me to engage in participant observation and explore a broad range of issues as they related to marine protected areas and their co-management in Southern Belize. I also personally observed how different organizations interact with communities and stakeholders and go about management of their respective areas. My position within the organization allowed me to develop relationships with a diverse range of people involved in Belizean MPA management. It is important to acknowledge that as a young white woman living in a foreign environment my experiences and observations are biased. I do feel that for the most part I was accepted by the community, but my status was unusual as most Belizean women would not take on some of the roles that I did.

From June to August 2005, I conducted one-on-one interviews with a wide range of people involved in MPA management and related fields. These interviews were semi-structured, covering key topics and questions as they related to the goals of this research including MPA management, co-management practice, government policy, community, tourism and economics. (The list of interview questions/topics is included in Appendix B.) Interviewees were selected based on my assessment of their knowledge and involvement in MPA co-management, government policy and resource conservation. Some of these interviewees are people that I worked with and interacted with on a day-to-day basis, others I interacted with less frequently on a more formal basis and some I met only at the time of the interview. Table 1 provides a list of interviewees, their positions, and my level of interaction with them.

Table 1: List of Interviewees

Name	Affiliation	Contact Level		
		Regular	Formal	Interview
Jack Nightingale	Toledo Association for Sustainable Tourism and Empowerment (TASTE)	✓	✓	✓
Lindsay Garbutt	Friends of Nature (FON)	✓	✓	✓
Wil Maheia	Toledo Institute for Development and Environment (TIDE)	✓	✓	✓
James Azueta	Belize Fisheries Department		✓	✓
Victor Jacobs	Rio Grande Fishermen's Cooperative	✓	✓	✓
Glenford Eiley	Village Chairman Placencia	✓	✓	✓
Carlos Galvez	Mayor Punta Gorda		✓	✓
Janet Gibson	World Conservation Society Belize/Coastal Zone Management Authority and Institute (CZMAI)			✓
Melanie McField	World Wildlife Fund Belize	✓	✓	✓
Alex Nolberto	Belize Fisheries Department (PG)	✓	✓	✓
Godsman Ellis	Belize Association of Conservation NGOs (BACONGO)		✓	✓
Phillip Morgan	University of Belize			✓
Vincent Palacio	University of Belize/Belize Tourism Board (BTB)			✓
Imani Fairweather-Morrison	Oak Foundation/Coastal Zone Management Authority and Institute (CZMAI)		✓	✓
Will Jones	Freelance writer formerly with Friends of Nature			✓
Leandra Cho-Ricketts	University of Belize /Coastal Zone Management Authority and Institute (CZMAI)			✓
Karl Castillo	EarthWatch Institute		✓	✓
Valdemar Andrade	Protected Areas Conservation Trust (PACT) /National Protected Areas Strategy Plan (NPASP)			✓
Osmany Salas	Forest Department/National Protected Areas Strategy Plan (NPASP)		✓	✓

I conducted a literature review to better understand how community, stakeholder, manager and government perspectives relate to the wider picture of Marine Protected Areas management in Belize and the region. I have attempted to evaluate all of the current and proposed Belizean legislation and policy governing MPA management and the factors which affect it. I also reviewed reports and evaluations both by community and national level organizations, the Belizean government, international donors and conservation groups. This review provided background for the local situation and how local management decisions are affected by national and international projects and plans.

The Practice of MPA Co-management in Southern Belize

Belize has developed a comprehensive system of marine protected areas. As this system has grown the country has incorporated co-management as a mechanism for improved management. In the southern part of Belize three local NGOs have signed co-management agreements with the Department of Fisheries for the co-management of marine reserves. The efforts of these three Belizean NGOs offer insight into the strengths and weaknesses non-governmental co-management partners. The experiences of these groups illustrate how NGOs have been able to incorporate local people in management and some of the advantages of co-management.

Belize's extensive protected areas system includes 36% of the country's terrestrial territory (Meerman & Wilson, 2005). In Belize, protected areas can be declared under a number of different legal instruments including: the National Parks System Act, the Forest Act, the Fisheries Act, and the Ancient Monuments and Antiquities Act. These multiple laws give responsibility for management of different protected areas to different government agencies. The Forest Department of the Ministry of Natural Resources, Local Government and the Environment has statutory responsibility for protected areas established under the National Parks System Act and the Forest Act. These include the following categories of aquatic and terrestrial protected areas: national parks, wildlife sanctuaries, natural monuments, nature reserves, and forest reserves. The class of protected area indicates the level of protection. For example, nature reserves are exclusively for biodiversity protection and research, while marine reserves incorporate multiple uses, including extraction, tourism, research and biodiversity protection (Meerman & Wilson, 2005). Under the Fisheries Act, the Fisheries Department within the Ministry of Agriculture and Fisheries is legally responsible for marine reserves. The Department of Archaeology, which is a part of the Ministry of Foreign Affairs, Foreign Trade and Tourism, NEMO and Information has jurisdiction over archaeological reserves. Despite the extensive

system the designation of protected areas is not secure, as the relevant minister has the discretion to de-reserve portions or entire reserves (Government of Belize, 2000c). Although, there have been no cases of entire reserves being de-reserved, areas under protection have changed and licenses for extractive activities have been granted in areas where these types of activities should not occur (Ravndal, 2002).

The division of responsibility amongst different government agencies creates ambiguity and has led to overlapping authority (Meerman & Wilson, 2005). In the coastal zone this can mean that the Forest Department, Fisheries Department and Department of Environment have jurisdiction over different resources in the same protected area. The Coastal Zone Management Authority and Institute (CZMAI) was created to improve interagency cooperation, and thereby, management of coastal resources. The initial activities of CZMAI were supported with funding from international donors, however that funding expired in 2004 and the current status of the organization is uncertain. In recognition of the complexities of protected areas management a National Protected Areas Strategy and Plan has recently been drafted. The strategy written by an interdisciplinary taskforces includes policy recommendations which should clarify relationships and jurisdiction.

In addition to national legislation, Belize is signatory to a number of international and regional treaties to protect natural resources. Some of the international environmental treaties deal with issues including: Biodiversity, Climate Change, Desertification, Endangered Species, Hazardous Waste, Law of the Sea, Ozone Layer Protection, Ship Pollution, and Wetlands (Central Intelligence Agency, 2005). Regional treaties include the *Central American Convention on Biological Diversity Protection*, the protection of *Priority Protected Areas of Central America* and the *Alliance for Sustainable Development*. The preservation of biodiversity is also the focus of regional and international initiatives including the Mesoamerican Biological Corridor (MBC) and the Mesoamerican Barrier Reef System (MBRS), both sponsored by the Global Environment

Facility (GEF). Although both are concerned with biodiversity conservation, the MBRS is of specific relevance marine conservation.

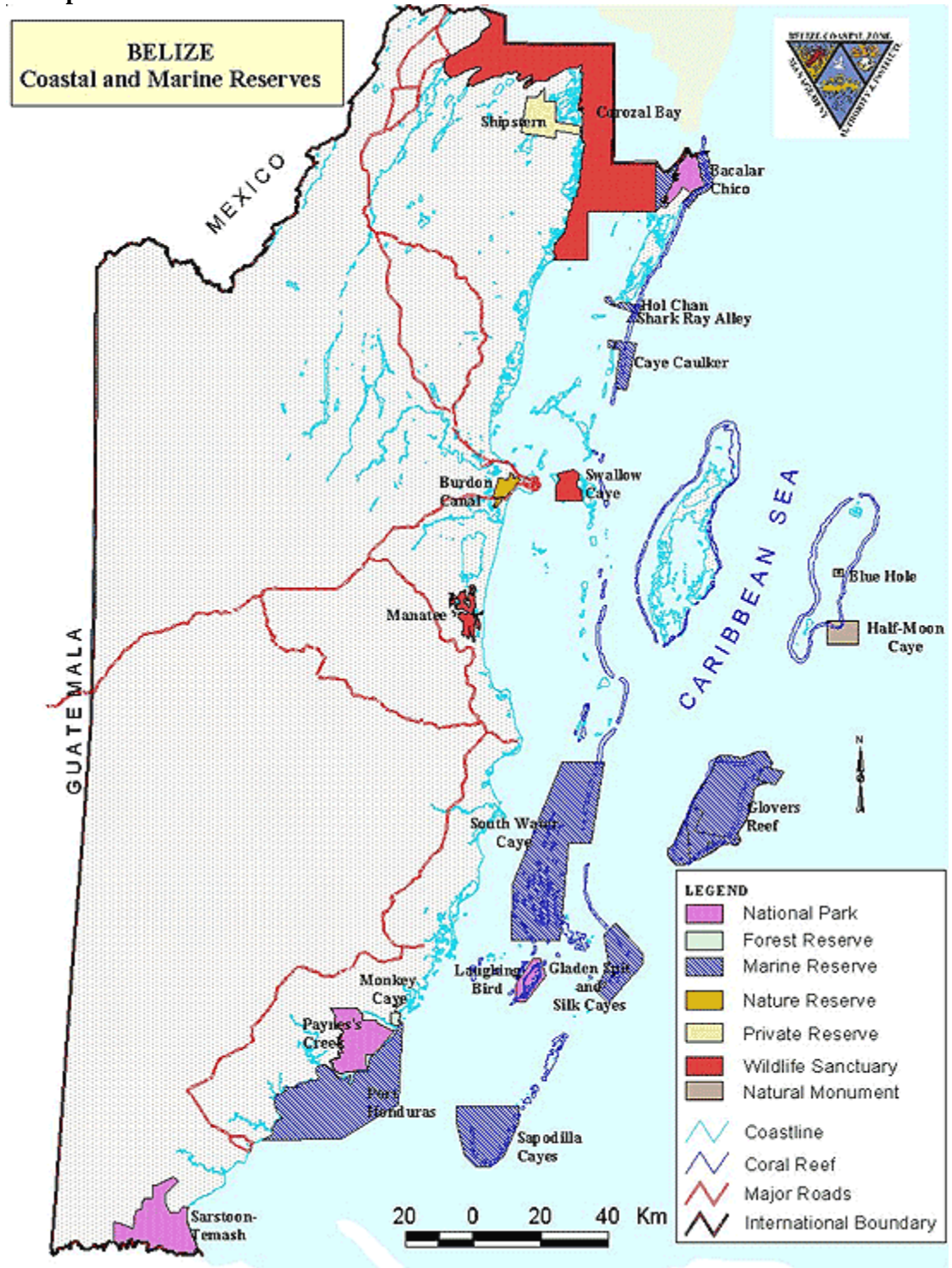
The MBRS project consists of a fifteen-year plan begun in 2001, which aims to protect the vulnerable and unique barrier reef system that stretches from Mexico to Honduras (Mesoamerican Barrier Reef Systems Project, 2004). The objectives of this project are to:

a) strengthen Marine Protected Areas; b) develop and implement a standardized data management system of ecosystem monitoring and facilitate the dissemination of its outputs throughout the region; c) promote measures which will serve to reduce non-sustainable patterns of economic exploitation of MBRS, focusing initially on the fisheries and tourism sectors; d) increase local and national capacity for environmental management through education, information sharing and training; and e) facilitate the strengthening and coordinating of national policies, regulations, and institutional arrangements for marine ecosystem conservation and sustainable use. (Mesoamerican Barrier Reef Systems Project, 2004, ¶ 2)

This project has targeted many protected areas along the reef system for specific improvements, hosted training sessions, systematized data collection, and worked with the governments of Mexico, Belize, Guatemala and Honduras to improve coral reef ecosystem protection. The project has been influential in providing resources and guidance for protected areas management throughout the region.

The need to conserve and protect the Barrier Reef prompted the Government of Belize to declare fourteen Marine Protected Areas (MPAs): eight marine reserves declared under the Fisheries Act and six declared under the National Parks System Act (See Figure 2.) (It is worth noting that two reserves were declared under more than one legislative act.) In 1996, UNESCO declared the entire reef a World Heritage Site and seven marine protected areas were given World Heritage Designation. Although Belize has declared almost 40% of its land area as protected, Pinelo found that only 25% of the 71 protected areas were actively being managed; the preponderance of “paper parks” is not uncommon in developing nations (Pinelo, 2000). Co-management offers a way for government to improve management of these parks by involving local community members (Pomeroy & Berkes, 1997).

Figure 3: Map of Coastal and Marine Protected Areas



Source: (Coastal Zone Management Authority and Institute, 2001a)

In Belize there are a wide range of co-management arrangements. The basic types of co-management practiced in Belize involve the Government of Belize (GOB) and one of the following groups: 1) Non-Governmental Organizations (NGOs), 2) Community Based Organizations (CBOs), or 3) private organizations. In the MPA sector all of the co-management agreements are between the GOB and local NGOs, with the NGOs representing local communities. The organizations involved with co-management in the marine sector include: the Belize Audubon Society (BAS), the Toledo Institute for Development and Environment (TIDE), FAMRAC, the Toledo Association for Sustainable Tourism and Empowerment (TASTE), GreenReef and Friends of Nature (FON) (Coastal Zone Management Authority and Institute, 2001a). These organizations all have signed co-management agreements of some kind with the GOB and are responsible for activities at specific MPA's.

Although co-management of protected areas has been in existence almost since the conception of protected areas in Belize, co-managers face serious constraints. First there is no formal national co-management framework. The Environmental Protection Act states that the government may

“...consult with any other Government department or agency, non-governmental organization, or any person interested in the quality of the environment or the control or abatement of environmental pollution...” (Government of Belize, 2000b).

It is under this legislation that co-management has been implemented. The absence of defining legislation has led to a variety of different methods for the implementation of co-management in Belize. In the marine sector all of the NGOs involved in co-management have signed Memorandums of Understanding (MOU) with the government specifying their roles and responsibilities. However, MOU's are unique to organizations and protected areas. The recently completed National Protected Areas Policy and Systems Plan (NPASP) should clarify some of these issues (Meerman & Wilson, 2005). Other constraints to co-management in Belize are similar to those throughout the Caribbean region including: problems with organizational

capacity of both government and co-management partners, the lack of resources (i.e. money, equipment, human resources), and lack of adequate local community participation (Govan, 2003; McConney, Pomeroy, & Mahon, 2004). These constraints have challenged all parties involved in co-management and have required much give and take between co-management partners.

Organizations in Southern Belize

Three marine protected areas are co-managed with the Belize Fisheries Department. The Fisheries Department has signed Memorandums of Understanding (MOU) with Friends of Nature (FON) for Gladden Split Marine Reserve, with the Toledo Institute for Development and Environment (TIDE) for Port Honduras Marine Reserve, and with the Toledo Association for Sustainable Tourism and Empowerment (TASTE) for Sapodilla Cayes Marine Reserve; all of these Belizean NGOs serve as representatives of local community interests. A fourth MPA in this zone, Laughing Bird Caye National Park, is managed between the Forest Department and FON. (I will focus primarily on reserves managed between NGOs and the Fisheries Department.) These three Belizean organizations have similar goals and objectives: promoting local development, conservation and sustainability. However, each goes about meeting these goals in a different way, and has had distinct successes and difficulties.

Friends of Nature

Friends of Nature (FON) is based out of Placencia Village located at the end of the Placencia peninsula in the Stann Creek District. FON is responsible for the co-management of Laughing Bird Caye National Park and Gladden Spit Marine Reserve. Friends of Nature began when a group of local tour guides, fishermen, and business owners came together to protect Laughing Bird Caye from proposed tourism development in 1991 (Pomeroy & Goetze, 2003). Through the informal efforts of this group, which called itself Friends of Laughing Bird Caye, the cayes were declared a protected area in 1992 (Pomeroy & Goetze, 2003). In 1996, Friends of

Laughing Bird Caye registered as an NGO and the marine area around Laughing Bird Caye was declared a National Park (Pomeroy & Goetze, 2003). During the late 1990's Placencia was experiencing a tourism boom, with special tourist interest in the marine resources, specifically whale sharks. This led Friends of Laughing Bird Caye to lobby for the creation of Gladden Spit Marine Reserve to protect the areas most frequently visited by the whale sharks. In 2000 Gladden Spit was declared a marine reserve. That same year Friends of Laughing Bird Caye signed a co-management agreement with the Department of Forestry for the management of Laughing Bird Caye National Park. In 2002, Friends of Laughing Bird Caye merged with another Placencia based conservation organization changing their name to Friends of Nature. Also in 2002, FON signed a co-management agreement with the Fisheries Department for Gladden Spit Marine Reserve (Pomeroy & Goetze, 2003). Of the three NGOs examined in this study Friends of Nature is the best example of a community-based conservation NGO, although today FON employs a staff of 15 and is responsible for the management of the two MPAs. With delegated management authority FON is empowered by the government to enforce reserve rules and regulations. They have been very successful at raising funds for conservation purposes and had an operating budget of US\$ 750,000 in 2005 (Personal Communication, L. Garbutt, 2005).

The Gladden Spit Marine Reserve is located at the end of the central and most contiguous portion of the barrier reef. At Gladden Spit the reef makes a 90 degree turn towards the coast (Pomeroy & Goetze, 2003). The marine reserve protects both the reef and nearby sand and mangrove cays. This area is a well known spawning aggregation site. Between December and June over 25 different species of fish congregate at Gladden Spit to reproduce, normally around the full moon (Pomeroy & Goetze, 2003). During April to May whale sharks (*Rhincodon typus*) frequent the area and are known to feed on freshly released fish spawn (Heyman, Graham, Kjerfve, & Johannes, 2001). Gladden Spit is one of the few locations in the world that has geographically and temporally predictable whale shark aggregations (Pomeroy & Goetze, 2003).

The whale sharks have become a major tourist attraction and FON has worked closely with local tour guides and fishermen to ensure protection of these animals and the resources they depend on.

Toledo Institute for Development and Environment

The Toledo Institute for Development and Environment (TIDE) is the major conservation organization in Toledo, working less than 100 miles from FON. TIDE is responsible for a wide range of different protected areas including Port Honduras Marine Reserve, Payne's Creek National Park and a number of private lands, including a debt for nature swap parcel. In the early 1990's The Nature Conservancy (TNC) expressed interest in southern Belize. Working closely with the Belize Center for Environmental Studies (BCES), TNC promoted the Maya Mountain Marine Transect (MMMT) to protect a stretch of land from the Maya Mountains to the Barrier Reef (DeVries et al., 2003). The MMMT would preserve a wide range of different ecosystems from rainforest to coral reef. When TNC's funding for BCES expired in 1996 key proponents, including TIDE's present day executive director, kept promoting and garnering support for the idea within the community for the next year and a half. In 1997, again with backing from The Nature Conservancy, the Toledo Institute for Development and Environment. According to TIDE's website the organization was formed as:

“a grassroots initiative in response to the negative environmental effects from activities such as manatee poaching, illegal fishing, illegal logging, destructive farming methods, and other types of unsustainable development” (Toledo Institute for Development and Environment, 2003, ¶ 1)

TIDE has grown rapidly over the past few years from an organization focused on the protection of manatees to an important organization active in a wide range of conservation and development initiatives. Originally staffed by volunteers, TIDE now is the largest private employer in Punta Gorda with more than twenty employees, and has attracted international attention for its conservation and community development work.

The creation of the Port Honduras Marine Reserve was the early focus of the Toledo Institute for Development and Environment. After three years of lobbying, the Port Honduras Marine Reserve (PHMR) was declared in 2000. In 2001 TIDE signed the first co-management agreement with the Department of Fisheries for the delegated management of the PHMR. TIDE worked with local communities to draft a management plan for the PHMR, and has developed extensive ties with local communities. The reserve protects the Port Honduras coastal embayment and extends from the mouth of the Rio Grande to the mouth of the Monkey River and includes almost 140 mangrove cayes (Heyman & Kjerfve, 1999). While the reserve primarily protects mangrove ecosystem it includes distant cayes that are home to coral reef. PHMR protects important lobster and finfish fisheries as well as key habitat for the endangered West Indian Manatee.

Toledo Association for Sustainable Tourism and Empowerment

The Toledo Association for Sustainable Tourism and Empowerment (TASTE) is responsible for co-management of the Sapodilla Cayes Marine Reserve (SCMR). TASTE is a growing NGO that has struggled to establish itself and is often overshadowed by other more powerful local organizations. The history of TASTE is intimately connected to TIDE and the Maya Mountain Marine Transect. The Sapodilla Cayes were seen by TNC as a key component of the MMMT. At the time, the Sapodilla Cayes Marine Reserve, which had been declared in 1996, was operating as a paper park with no real management. Unexpectedly TIDE did not step forward to manage the SCMR, focusing instead on the creation of the PHMR. In 1999 the Belize Tourism Industry Association (BTIA) of Punta Gorda submitted a proposal for co-management of the reserve. When the members of the BTIA stepped forward to request management some people in the area (especially key figures associated with TIDE) expressed concerns that members of BTIA were not prepared for the responsibilities of marine reserve management (DeVries et al., 2003). In what was considered an attempt to change the balance of

power within the organization a large number of TIDE supporters joined BTIA (DeVries et al., 2003). The original BTIA members decided to form the Toledo Association for Sustainable Tourism and Empowerment to maintain control. TASTE pursued and was eventually granted co-management of the reserve in 2001. Unlike FON and TIDE, TASTE is engaged in collaborative management with the understanding that they will take on delegated co-management in the future. This arrangement means that the Fisheries Department retains day-to-day management authority and TASTE has struggled to identify its role (Personal Communication, J. Nightingale, 2005). TASTE has primarily been responsible for community outreach and is well known throughout Belize for its environmental education program. Despite some successes, TASTE has struggled to secure funding and is constantly renegotiating its position in the world of Belizean MPA management.

The Sapodilla Cayes Marine Reserve protects the southernmost region of the Belize Barrier Reef. At this southern end the reef forms a J-shaped hook, which makes up the SCMR. The reserve includes a number of sand cayes as well as extensive reef formations. The reserve was declared in 1996, the same year that it was named a World Heritage Site. However, there was no onsite staff until 2000. The reserve is home to a number of important species and contains important nesting beach for the endangered hawksbill turtle. The SCMR has been extensively used by fishermen; it contains an important conch nursery and several spawning aggregation sites. Historically, it is an important tourist destination for people from Guatemala. (The SCMR has been a major topic for the Belize-Guatemala negotiations.) Of the marine protected areas included in this study, the Sapodilla Cayes is the least studied and has had a complex and frustrating management history.

Each of the three organizations has been active in developing co-management systems for the reserves for which they are responsible. Although FON, TIDE and TASTE have developed in very different ways, all have established strategies to engage community and governmental partners. These three NGOs have different approaches and have had varying degrees of success;

however they all operate in a fairly similar manner. They are all locally based non-governmental organizations who have signed agreements with the Belize Fisheries Department for the management of a marine reserve. While TASTE does not currently have delegated control over the Sapodilla Cayes Marine Reserve it is moving in that direction, which puts all of these NGOs along a similar path and makes their efforts easily comparable. The following section details how these organizations have pursued their efforts and outlines some of their achievements and challenges.

Strengths and Weaknesses of Co-management in Practice in Southern Belize

The adoption of co-management in southern Belize has been a success for the reserves involved (Personal Communication, J. Azueta, 2005). The local NGOs involved in co-management are all active and have garnered important community support for their initiatives (Personal Communication, W. Maheia, 2005; Personal Communication, J. Azueta, 2005). While these endorsements are encouraging, there are both strengths and weaknesses to co-management as currently practiced by the NGOs in the region. Some of the more pressing issues include: community involvement in management decisions; effective communication between government, NGOs and local people; enforcement and education; research and monitoring; organizational capacity; and issues of local power. In order for co-management to be successful in the long run; government, NGOs and communities will likely need to continuously evaluate and re-design relationships. FON, TIDE and TASTE have dealt with these issues in different ways and their experiences offer insight into co-management strategies.

Community Involvement and Communication

The “community” plays a central role in Belizean NGOs conception of what they do and how they do it. The mission statements of all three organizations emphasize sustainable use of marine resources with local participation and development as major goals. Often the ways in

which communities influence decision making differs from organizational rhetoric. The reality of running a conservation organization requires complex administrative procedures which can separate local communities from real decision making power. These problems are only further complicated by the inherent complexities of defining community and identifying key stakeholders.

The most formal way that communities and stakeholders are involved with decision making in the three organizations is through a board. All three organizations boast a board of community members which includes various stakeholder representatives from the tourism industry, local fishermen, conservation interests, local governmental representatives, and community members. However as noted at FON

The dominant understanding of 'community participation' seems to involve appointing a representative from the community, regardless of whether that individual in fact represents the many interests of that community, or indeed, communicates the activities of the managing NGO to its members. (Pomeroy & Goetze, 2003, p. 53)

This type of approach is similar across all three NGOs analyzed here. In southern Belize, one executive director commented, "Community involvement is dependent on the co-manager" (Personal Communication, J. Nightingale, 2005). This can have inherent problems as communities are not homogeneous and NGO dominance over the selection of representatives and involvement of local stakeholders has direct effect on participation in the decision making process.

The NGOs boards are deliberately chosen by the NGOs themselves to include a wide range of different stakeholder interests. For example, the FON board is comprised of the village chairs from each of the five communities in which they work, as well as representatives from the Placencia Fishermen's Cooperative, the local Belize Tourism Industry Association, the highest institution of learning in the area, the Tour Guide Association and local churches (Pomeroy & Goetze, 2003). Choosing representatives from the leadership of other organizations often

increases participation by local elite, leaving more vulnerable groups with no voice, as the disadvantaged often are excluded from participation or leadership in such organizations.

When the FON board was formed there was a conscious effort to incorporate as many local people as possible and give them authority. This was important because as tourism expanded in Placencia expatriate influence grew. As FON's executive director lamented, effective involvement of local players is very difficult (Personal Communication, L. Garbutt, 2005). This is especially true when dealing with elected representatives who are prone to change, and may be uninterested in active participation in NGO agendas (Personal Communication, L. Garbutt, 2005). He indicated that "the two way flow of information is difficult when elected leaders are not effective at communicating to local people" (Personal Communication, L. Garbutt, 2005). The Executive Director also mentioned that lack of interest by local people led to questions about how participants should be chosen and who should be involved in the decision making process (Personal Communication, L. Garbutt, 2005).

Although the three NGOs boards function in slightly different ways, for the most part the boards are simply used as sounding boards for management decisions rather than engaging in the decision making process. Boards meet quarterly or annually and have little input in day-to-day management decisions, which are made by onsite managers or the executive director. TIDE's board is responsible for oversight of the organization's activities. A number of local people have indicated that in the few areas where the board is empowered to make decisions, such as hiring, the board most often acts as an arm of the executive director (Personal Observation). TASTE has made some effort to incorporate stakeholders in management decision making. TASTE has created what it calls a management team that is responsible for assisting with day-to-day issues and reserve decisions. This type of approach requires close contact between team members and reserve managers and has faced serious problems securing active participation in meetings and the decision making process (Personal Communication, J. Nightingale, 2005).

In addition to the boards, by law each MPA in Belize is required to have a local advisory committee. This committee is comprised of local stakeholders appointed by the Minister (normally leaders of key organizations such as the tour guide association or fisherman's cooperative). The advisory committee is charged with making policy decisions for each marine reserve. The advisory committees meet occasionally and have no real effect on management decisions. In fact, most of the members of these committees (and one could argue the boards as well) have little understanding of the role that they play in reserve management (Personal Communication, J. Nightingale, 2005). Almost every advisory committee meeting that I attended at TASTE involved a long discussion about the need for the committee to further develop how they would be involved with policy formation. These discussions rarely went far and when I left after two years, the advisory committee was still struggling to understand how it fit into the management and decision making structure of the SCMR (Personal Observation).

The lack of active management decision making by local NGO boards and advisory committees leaves the majority of community participation in MPA decision making to less powerful, more informal mechanisms such as meetings and newsletters. This has left many community members without a clear understanding of the activities of the local organizations. Clear communication between government, NGO partners and the community is important and effective informal communication can be difficult to achieve. As McConney, Pomeroy & Mahon (2004, p. 21) indicate "excessive informality reduces the legitimacy of the systems and structures of management". The lack of comprehensive and agreed upon systems for the distribution of information encourages rumor and speculation. Informal communication leaves community members unsure about their role in management and amplifies problems of community participation in the decision making process.

All three organizations have had difficulties developing effective methods for participation and communication. The most popular form of community outreach has been community consultations, an approach developed with international influence. All NGOs use

this method as a way of garnering public support for projects. There are a number of problems with consultations as a means for communication. As mentioned earlier, the prevalence of “community” organizations in southern Belize has often led to indifference amongst community members. Most community meetings are well attended only if there is a pressing concern or issue on the table; otherwise many would-be participants have more important uses for their time (Personal Communication, J. Nightingale, 2005). Reliance on consultations limits participation to those who have the time, interest and ability to attend meetings and NGOs typically dominate the agenda (Pomeroy & Goetze, 2003). In addition, community consultations are expensive and often attract the same people who have already formulated an opinion of the NGO and are more interested in argument than actual discussion (Personal Communication, W. Jones, 2006).

Although the mission statements of all three NGOs speak to the involvement of local people there are limited avenues for local participation in decision making. Boards, advisory committees and public consultations frequently only involve a select number of local people who are often local elites. This makes NGOs less inclined to spend time and energy seeking public comment on activities (Personal Communication, W. Jones, 2006). In addition, when the public is involved they rarely see a clear outcome from their inputs (Personal Communication, V. Jacobs, 2005). Maintaining active and diverse participation in management is a major constraint to effective community involvement and an area all NGOs need to improve upon.

Education, Enforcement and Alternative Livelihoods

Localized MPA management has improved enforcement and education at co-managed parks, despite communications problems. Although community members are limited in the ways that they can formally participate in management decision making, these organizations are located near the reserves they manage. This close proximity gives local NGOs a better opportunity to interact with community members and greater understanding of what is happening within the local community. These organizations are involved in day-to-day management

activities and have greater awareness about how reserves may be impacted by local conditions than government officials in Belize City. All three NGOs have explicitly incorporated major resource users through formal and informal mechanisms: such as education, employment, and alternative livelihoods.

NGOs have developed programs to enhance management through community education and outreach. TASTE has developed a program that gives primary and secondary school students in the Toledo district exposure to coral reef ecology and the opportunity to snorkel on the reef. This program has been embraced by local teachers and students as an effective way to showcase the beauty of the coral reef and highlight how individual actions affect the ecosystem. TASTE has recently expanded the program to adults, including fishermen in both Guatemala and Honduras (Personal Communication, J. Nightingale, 2005). TASTE's education program has been hailed as a success and has been copied by NGOs throughout the country (Personal Communication, J. Nightingale, 2005). These types of education programs help inform the public about NGO activities and raise awareness about the role local people play in the protection and management of reserves. One goal of these programs is that better educated citizens will engage in management and policy decisions (Personal Communication, J. Nightingale, 2005).

The direct employment of local people as NGO staff (i.e. rangers, etc.) is another way NGOs have sought more effective management. Local familiarity with resources can help management, as fishers possess knowledge about the state of the fishery, as well as common practices. All three NGOs have made special efforts to employ local people in key positions. In some cases historic resource users, like gill net fishermen, have become actively involved in enforcement of fisheries laws through employment as rangers. Both TIDE and TASTE are employing local fishermen as "community rangers", drawing on their knowledge and frequent presence in the area to improve enforcement capabilities.

Co-managers have also worked diligently for local economic development. One of the greatest successes of the NGOs has been the development of alternative livelihoods among some

resource users. Throughout this paper and in Belize more generally, alternative livelihood programs are viewed as a mechanism to provide fishermen (or other resource users) with alternatives to extractive activities. While these types of programs may not completely eliminate dependence on resource extraction, the goal is to reduce dependence on scarce resources. This includes direct employment as rangers or staff, as well as the development of alternatives to resource extraction, such as tourism. There is an understanding amongst all managers that marine reserves should not exclude local people, but offer local benefits.

Tourism has been one of the most popular forms of alternative livelihood generation. FON, TIDE and TASTE, have all provided tour guide and dive guide training as a means to generate alternate employment for local people in the tourism industry. TIDE has trained over 15 fly fishing guides, some of whom work through TIDE Tours, TIDE's "in house" tourism branch; as well as independently or through local resorts. Although these men still fish during tourism's low season, tour guiding and fly fishing jobs pay significantly more than one day fishing and have reduced pressure on fisheries resources. As one fisherman noted, *"If I stop commercial fishing, they will have more product to show the tourists, and that will be a benefit to me, and to the area, and the country"* (quoted in Fernandes & Toledo Institute for Development and Environment, 2005, p. 44). FON has been intimately involved in the development of procedures for whale shark tourism developing a whale shark tourism course for all guides, instituting interaction guidelines and mechanisms for the regulation of fishing at spawning aggregation sites.

These programs have had mixed success. Placencia, with its growing tourism sector, has much more demand for tourism based services. Punta Gorda, on the other hand, has had difficulty attracting sufficient tourists to employ the number of trained guides. The Toledo District boasts a growing number of guides, although visitor levels have remained fairly constant for the past ten years (Personal Communication, L. Herrera, 2005). In addition, there have been

complaints about who NGOs are training. Some argue that these jobs should go only to stakeholders who have been displaced by the creation of the reserves. Others have a broader view of who should participate. Although training is valuable, the most disadvantaged often lack the financial resources necessary to purchase equipment like boats and gear required to be competitive in the tourism industry. Belsky (1999) showed in her study of a coastal community in central Belize, that there are many factors affecting community-based tourism initiatives including economic status and politics, that may prohibit the truly poor from benefiting from tourism. In recognition of the financial difficulties in acquiring equipment, TIDE and TASTE have helped to secure funding for the purchase of kayaks and snorkel equipment that guides may use.

The PHMR provides an example of the value of involving local people through education, employment and training. At first, local fishers opposed the banning of gill nets within the reserve. TIDE has implemented a number of programs targeting gill net fishermen and successfully garnered community support for the ban, including some fishermen who now actively work with TIDE staff to report and prosecute offenders (Fernandes & Toledo Institute for Development and Environment, 2005). The general acceptance of the ban on gill nets has come about after a conscientious effort on the part of TIDE to educate, and provide financial incentives such as scholarships and employment for those who had depended upon gill nets for their livelihoods (Fernandes & Toledo Institute for Development and Environment, 2005). These programs of education, enforcement and alternative livelihoods have had some successes, and most resource users now understand the importance of MPAs and support their use for fisheries management and conservation purposes (Personal Communication, L. Garbutt, 2005). In many cases, this has translated into community support for MPAs in anticipation of economic development through tourism. Although local people may not be unified in their opinions about the respective organizations, there is an underlying sense that reserves are serving both

conservation and local development interests as local people see the possibility for livelihoods outside fishing.

Research and Monitoring

Effective management of marine resources is dependent on clear information about the status of the resources, which requires some science. All marine reserves in the country are supposed to be staffed with a manager, biologist and at least two rangers. However, turnover is high in these positions, which leads to insufficient knowledge, training and experience for consistent and effective monitoring and research. When NGOs are involved in management there tends to be higher staff retention which can lead to better monitoring (McField, 2000). Some see the success of the PHMR and GSMR as linked specifically to the continuity of their staff (Personal Communication, J. Gibson, 2005). In addition, the MBRS project and other international programs have sponsored training for reserve staff in a wide range of topics, including coral monitoring, socio-economic monitoring, and management effectiveness. These trainings have been an excellent resource for co-managers, expanding staff skills to effectively monitor important ecosystems and species.

The active involvement and close monitoring of employees by local NGOs in co-managed parks has also increased scientific knowledge. NGOs such as FON and TIDE, who have delegated authority, are able to hire, monitor and if need be, fire employees. The scientific staff at these reserves receive higher salaries attracting more qualified and motivated applicants. For example the biologists at both GSMR and PHMR have bachelor's degrees, while the biologist at SCMR only has an associate's degree. The staff at the Sapodilla Cayes Marine Reserve is hired by the Fisheries Department and although they work closely with TASTE, TASTE does not supervise them.

In addition, the greater financial resources available at co-managed parks can contribute to better science. All three NGOs have secured outside funding to carry out research programs

within their reserves above those required by Fisheries, including the development of monitoring and research plans, some of which incorporate local knowledge (Personal Communication, J. Nightingale, 2005; W. Maheia, 2005; L. Garbutt, 2005). Outside donors such as MBRS and the Coastal Zone Management Authority and Institute have also worked closely with co-managers to ensure that proper protocols and techniques are used in monitoring. FON has worked closely with researchers to expand knowledge about whale sharks, and in 2004 TIDE completed a one year baseline study of water quality in the PHMR. Although managers need to take further steps to integrate this research and monitoring into the decision making process, these developments illustrate a growing ability and interest to use science to improve management practices.

Organizational Capacity

Organizational capacity is a key component of successful co-management in southern Belize. Organizational capacity refers to the NGOs ability to manage resources, and includes community relations, financing, organizational structure, institutional knowledge and experience. The Fisheries Department has been serious about entering into co-management agreements only with organizations that have proven capacity for management (Personal Communication, J. Azueta, 2005). The Fisheries Department has regarded both TIDE and FON as strong, capable organizations, and well prepared for delegated management (Personal Communication, J. Azueta, 2005). The Fisheries Department has given these two organizations considerable latitude in their decision making and management, illustrating their confidence in the organizational capacity. TASTE continues to struggle in this area, a fact reflected in its lack of delegated management authority.

To a large extent an organization's capacity can be linked to the executive director who of sets the organization's agenda and keeps watch over all activities. The role of the executive director is especially important in Belizean society where personal relationships are critical. Both TIDE and FON have powerful, locally born leaders. These men are key figures in their

communities and represent the organization's goal for local empowerment. The charisma and commitment of these men has allowed their organizations to quickly move forward with initiatives.

The role of the executive director is also important for community relations. TASTE has existed from the beginning as an outsider, with its contentious formation and the inclusion of "non-native Belizeans" in key roles. These factors have made it difficult for the organization to find local footing and develop effective relationships with donor agencies. TASTE's complicated organizational structure also makes it difficult for stakeholders to understand who is really making decisions. Many attribute TASTE's making slow progress to the fact its lack of an effective local leader (Personal Communication, L. Garbutt, 2005).

The MBRS, along with other international organizations, has sought to build capacity among co-management agencies by holding trainings. These trainings have addressed co-management, board responsibilities, accounting and other management issues and are believed to have been beneficial; most local NGO staff are now considered well trained and informed about their roles and responsibilities (Personal Communication, J. Gibson, 2005). This is not necessarily the case of local community members and stakeholders who, as noted earlier, are often unclear of their roles in management decision making (Personal Communication, V. Jacobs, 2005).

The value of local directors is notable in their ability to attract investment. Finances are an important aspect of marine reserve conservation and one of the key reasons for implementation of co-management. All of the local NGOs involved in co-management have been able to attract funds to their respective reserves, some with greater success than others. The executive directors of both FON and TIDE have been very successful at wooing international donors, have received funding from private individuals as well as donor agencies, and boast annual budgets of over US\$ 500,000 (Personal Communication, L. Garbutt, 2005; Personal Communication, W. Maheia). TASTE has not been as successful, but has secured project grants and continues to expand its

funding base. The reputation and charisma of the executive directors has been a major reason for TIDE and FON's financial success with international donor organizations (Fernandes & Toledo Institute for Development and Environment, 2005).

Local Power and Politics

The devolution of power from Belize City to locally based NGOs has allowed them to become powerful political forces both in local and national contexts. NGO's may not have direct power over policy on a national level, but they have developed a great deal of power within their communities and the conservation world. They have also become an economic resource for local community members. This can be very beneficial to local communities. However, it also can cause friction between community members and NGOs, as well as between the different NGOs themselves.

Both FON and TIDE are large organizations which employ a substantial number of local people. This not only provides jobs but much needed money as well. TIDE has been involved in community activities sponsoring local festivals, sporting events, supporting schools and other fundraising events (Personal Communication, W. Maheia, 2005). These activities make a huge impression on local people. Many Toledo residents are grateful for TIDE's programs which have provided training and jobs (Fernandes & Toledo Institute for Development and Environment, 2005).

There is an undercurrent of competition and conflict between the three NGOs. This can be a sensitive issue, as FON, TIDE and TASTE operate in close contact with one another within a very small country. This competition affects how each of the organizations goes about its daily activities. As one local conservationist noted, much of Toledo has been divided into small "fiefdoms" (DeVries et al., 2003). Local areas are heavily influenced by NGO activities, and there is a considerable overlap between organizations. Both TIDE and TASTE serve virtually the same communities, and where their territory stops, FON's begins. This can create conflict and

drastically affect how agendas are carried out. Many times TASTE has had difficulty working with some of the more northern communities due to growing expectations based on TIDE's strategies (Personal Communication, J. Nightingale, 2005). In addition, there is increasing community fatigue as community members are constantly attending meetings and consultations (Personal Communication, L. Garbutt, 2005). Most NGOs relying upon an overlapping core of key stakeholders and participants who often feel overburdened, while those who have not been invited to participate feel excluded. There is growing recognition by the NGOs themselves that greater collaboration and cooperation between organizations is needed (Personal Communication, W. Maheia, 2005). But, this would mean sharing power and authority, which is not readily given.

The executive directors of FON, TIDE and TASTE, with their extensive international donor connections and backing from the government and local communities, have taken charge of their organizations and helped to set the conservation agenda for Belize. They have lobbied for the creation of parks, become vocal participants in policy discussions, and contributed to the structure of local development. This gives some people in southern Belize a strong voice in the national context.

Over the years community members have watched local NGOs grow into strong bureaucratic organizations much like the Belizean government. The NGOs role as a representative of local communities and their limited accountability make many uneasy (DeVries et al., 2003). Community members are often as alienated from the decision making processes of local NGOs as the government. As one executive director noted, the role of the NGO and executive director have become similar to that of a politician (Personal Communication, L. Garbutt, 2005). Just as there are complaints about corruption in government, it is not uncommon to hear local people complaining about how much money NGOs make and how they spend it. I attended a number of meetings while working with TASTE where local fishermen spoke adamantly about how TASTE was making millions of dollars and not spending anything on the reserve (Personal Observation). In addition, there are concerns that NGOs play favorites, giving

certain people or communities advantages while overlooking others. Many community members have pointed out that it seems like certain families are given preference for trainings and employment opportunities (Personal Observation). The three NGOs have been forced to navigate and negotiate complex relationships and their growing power can strain community and governmental relations, and create new problems for co-managers.

The general perception amongst Belizean community members and government officials is that co-management is the preferred mechanism for management and co-managers are for the most part doing good work. For example, the village chairman of Placencia indicated that co-management allows marine reserves to incorporate the diverse needs of government and the local people and said “Co-management is the only way to go” (Personal Communication, G. Eiley, 2005). The government acknowledges that these NGOs have greater knowledge about local issues than they do, and that one of their major strengths is the ability to raise awareness about management issues through education and community involvement (Personal Communication, J. Azueta, 2005). A study by McField (2000) found that those MPAs managed by NGOs were significantly more effective than those managed by the government alone, although at that time none of the MPAs studied were under co-management with the Fisheries Department. McField supported the development of more co-managed marine protected areas as a solution not only to funding issues but also for more effective management (McField, 2000). This does not mean that there are not problems and controversies surrounding these organizations or their management strategies. However, these complaints are tempered by the realization that before these organizations became involved, the marine resources of the region were not being effectively managed.

As co-managers continue to work at local levels to improve management there are many areas where they have seen success. Local NGOs have succeeded in educating local people about the role of marine reserves and have provided alternative livelihoods. These NGOs are expanding the use of sound science in management decision making. NGOs have also given

many local people an important voice in the national debate over marine conservation. Despite these successes, local NGOs still need to better incorporate local people in the decision making process and improve accountability. In the next section I explore how these NGOs are influenced by broader national and international economic and political forces.

MPA Management in the National Context

Some of the broad goals behind protected area co-management include: greater community participation, local empowerment, better management, and economic development (Borrini-Feyerabend, 1996). As indicated above, many of the local NGOs in southern Belize incorporate these goals into marine reserve management plans and efforts. However, there are areas over which local co-managers have little influence. These include issues of power and control, financial resources, and national politics. In this section I evaluate how these factors affect co-management of marine reserves.

The battle for power and management control is one of the biggest constraints to effective management. This struggle takes place at a number of levels and includes the local community members, Belizean NGOs, different government agencies, and international funders. Belize's increasing financial constraints have contributed to this power struggle. The government lacks money for effective management leaving local NGOs to bear much of the fundraising responsibility. There is also a lack of effective policy for regulating some of the main threats to marine conservation. This "missing" policy is not due to lack of concern, but arises due to a lack of political will to tackle controversial issues (Personal Communication, I. Fairweather-Morrison, 2005). Even in cases where sufficient policy exists, there is often weak enforcement and poor interagency support.

The issues of power, financial resources, and national political forces have affected the ability of co-managers to make effective conservation and MPA management decisions. There have been a number of high profile cases which have highlighted the influence of these factors on co-management in southern Belize and across the nation. Recent deals with Carnival Cruise Line and other international developers have highlighted the need for greater transparency and guidelines to balance the needed investment with national strategies for conservation and development. In addition the current status of the Coastal Zone Management Authority and

Institute highlights the potential of cross-sectoral cooperation and the limitations of these initiatives without proper financial and governmental support. These examples further illustrate the need to incorporate local, national and international factors when approaching co-management of marine resources.

Power and Control

Marine ecosystems make important contributions to the Belizean economy through both tourism and fisheries. The protection of fish stocks and healthy coral reefs is critical to the success of these industries. This has led to the declaration of marine reserves across the country. Many of these marine reserves were based on Hol Chan, the first designated marine reserve in Belize. Understanding how Hol Chan was planned and managed offers insight into relationships between the Fisheries Department and co-managers at other reserves. The co-management experience today has been largely shaped by the experiences at Hol Chan and many of the strategies implemented there have been transferred to later reserves. The centralized power arrangement first tested at Hol Chan have been playing out in southern reserves and FON, TIDE and TASTE have had to negotiate and challenge their roles within that system.

The History of MPA Power and Control

The first marine reserve in Belize, created by the Fisheries Department in 1987, was Hol Chan Marine Reserve (HCMR) located off San Pedro, Ambergris Caye. The reserve was declared after local fishermen, tour guides, and conservationists expressed concern about dwindling fish stocks, increasing tourism development, and general degradation to the marine ecosystem (Carter, Gibson, Carr III, & Azueta, 1994). The planning process for Hol Chan was supported by the Wildlife Conservation Society and in comparison to later reserves, was extensive involving community consultations, as well as biological studies of the area. What emerged from the planning process was a management plan that balanced community interests

and biological needs. In addition, once the reserve was declared, grants from WWF and USAID provided for the first three years of management operation.

Hol Chan is located close to the tourist town of San Pedro and the reserve is the most visited MPA in the country, with over 85,000 visitors in 2004 (Belize Tourism Board, 2005c). The reserve is managed directly by the Fisheries Department, but management funding is secured through entrance fees deposited into an independent trust fund. High visitation has allowed the reserve to become financially self-sufficient (Young & Bilgre, 2002). HCMR's proximity to San Pedro not only facilitates tourism but also allows easy access for patrol and monitoring. The local community has been involved from the beginning with planning and enforcement. San Pedro also has received substantial economic benefits from the tourism industry.

The experience of Hol Chan has had a major effect on how marine reserves are designed and implemented in Belize. Both the Senior Fisheries Officer and Marine Protected Areas Coordinator at the Fisheries Department come from San Pedro and were involved with the formation and management of Hol Chan. Their experience and expertise have been important for the entire structure of MPA management.

After the success of Hol Chan new marine reserves were declared in mid-1990. However, the planning process for these parks was not as comprehensive as for Hol Chan. At Hol Chan biological as well as sociological influences were taken into account before the reserve was created. The majority of later parks were declared without the careful consideration of local community interests, making enforcement and community support more difficult to achieve. While many of these parks seek to protect important ecosystems, most did not incorporate extensive biological data and lacked comprehensive management plans. The Sapodilla Cayes is a good example of an MPA which lacked appropriate planning. Declared in 1996, on-site staff was not hired until 2000 and despite continued efforts the park still lacks a functioning legal management plan that incorporates social and biological data.

While Belize had developed a formal system of marine reserves, at the end of the 1990's most lacked effective management. Faced with similar management problems across an extensive protected area system the Forest Department immediately embraced co-management. The Forest Department has been actively engaged in various forms of co-management for the past thirty years, first informally with BAS and now formally with a wide range of different organizations. These types of arrangements were adopted for a variety of reasons including a lack of training, funding and capacity for effective management (Personal Communication, L. Garbutt, 2005). In contrast the Fisheries Department was much slower to develop co-management agreements for its marine reserves.

Unlike the Forest Department which lacked trained staff, the Fisheries Department possessed a well trained and educated staff capable and willing to do marine reserve management (Personal Communication, J. Azueta, 2005). It was not until the signing of the MOU with TIDE in 2001 that co-management became an official policy for marine reserves managed by the Fisheries Department. Some informants indicated that the hesitance to adopt co-management by the Fisheries Department was due to the history of marine reserve management at Hol Chan, and a lack of interest on the part of the Department to give up management power in other reserves (Personal Communication, J. Gibson, 2005). The circumstances at Hol Chan; community support, close proximity to a important population and tourism center, skilled staff and financial security allowed effective management of the reserve by the Fisheries Department with its own resources and skills. It is not surprising that the majority of co-management agreements signed in recent years have involved reserves located in the Southern part of the country, further from Fisheries' centralized base in Belize City. In co-management agreements, the Fisheries Department has wanted to be much more in control of the decision making process than the Forest Department. This approach has frequently caused tensions between government and co-management partners (Personal Communication, L. Garbutt, 2005). It is also important to note that even though Forestry and Fisheries have approached co-management in very different ways,

there is considerable overlap in jurisdiction, with Forestry having authority over a number of National Parks protecting marine areas, such as Laughing Bird National Park and Blue Hole National Park. The relationship and responsibilities of NGOs, like FON and TIDE which manage parks in cooperation with the Forest Department, is much different than that between NGOs and the Fisheries Department. In most cases, the Forest Department has surrendered control of decisions to the co-management partner, unlike Fisheries which has tried to assert authority over co-managers.

The example set by HCMR has had both positive and negative effects on co-management of marine reserves in Belize. Hol Chan illustrated that MPA management can benefit conservation and the local economy. It also provided a training ground for MPA managers. The success of Hol Chan prompted Belize to create an extensive system of reserves to protect the Belize Barrier Reef. Thus, the experiences gained at Hol Chan shaped marine reserve management through out the country. While there have been a number of benefits to using Hol Chan as a model for later reserves, many of the factors contributing to the success of Hol Chan are unique and not necessarily transferable to other locations. Hol Chan's community driven planning, high visitation, easy access, financial independence and sound biological foundation; are not found at most other reserves. In addition Hol Chan is not a co-managed park: all decision making comes from a centralized authority. Hol Chan served as a model for other reserves, but its unique situation contributed to the Fisheries Department recognition of co-management as an alternative means of reserve administration in a diverse MPA system.

Effects on Southern Co-management

The Fisheries Department's adoption of delegated co-management provides insight into its view of what co-management is and can bring to the table. Co-management offers the possibility for better resource management through the incorporation of resource users into the decision making process (Borrini-Feyerabend, Pimbert, Farvar, Kothari, & Renard, 2004).

Although there is great support for co-management in southern Belize, community involvement was not the only reason for the government's interest in it. The Fisheries Department had training and capacity, a fact they had proven at Hol Chan, but lacked funds to effectively manage a large protected areas system (Personal Communication, J. Azueta, 2005). With this in mind, Fisheries was interested in partnering with local organizations which not only had proven community ties, but also a demonstrated record of fundraising. In addition, delegated authority most closely followed the power structures developed at HCMR.

The first organization to be given delegated co-management for a marine reserve is the Toledo Institute for Development and Environment (TIDE) which serves as an excellent example of the qualities the Department of Fisheries was looking for in co-management partners. It had fairly good community relations, a proven commitment to conservation and management and perhaps most importantly, a well known backer (TNC) who could provide funding support. The agreement that the Fisheries Department signed with TIDE is evidence of their confidence not only in TIDE's ability to manage the area, but also to secure funding for that management. The situation was similar for Friends of Nature. TASTE however presents a much different picture, as it had no experience, history or funding to support its interest in management.

The Department of Fisheries has explained its rationale for how co-management agreements have been designed as "taking capacity into account" (Personal Communication, J. Azueta, 2005). The idea of "taking capacity into account" implies that the Fisheries Department considers the history and capability of each organization before signing an agreement. This included looking at the NGO's community base, funding availability, history and management experience. Using capacity as a measure has meant that every organization entering into co-management with the Department of Fisheries has a unique agreement which takes into consideration its attributes and unique circumstances.

When evaluating the agreements between Fisheries and FON, TIDE and TASTE, it is clear that the confidence the Department had in each organization varied. TIDE was initially

given full delegated authority for PHMR. This confidence was similar for FON at Gladden Spit. TASTE, on the other hand, was initially only given collaborative authority with the Department of Fisheries taking the lead for management. Collaborative management meant that TASTE would take the lead in community outreach programs, while Fisheries would retain control over day-to-day reserve operations. This authority has since changed, with TASTE now assuming the lead role; however, TASTE still does not have day-to-day management control. The precedents set by TIDE and FON have influenced how NGOs and the Fisheries Department interact.

The perception by the Fisheries Department that they had management skills but not the financial resources affected how co-management evolved. Co-management agreements initiated for finances can limit community involvement. In this type of co-management the emphasis is more on the capacity of the co-management organization to bring funding, rather than the community, to the table. This puts co-managers in an awkward position in terms of power relations. This fact has been born out in southern Belize as local NGOs have proven their ability to secure funds, but often face difficulties keeping the community involved.

In the agreements with TIDE and FON, the Fisheries Department plays little role. TIDE only receives authority from Fisheries; they are completely funded through non-governmental sources. FON receives a few salaries from the Department, but for the most part is autonomous. TASTE on the other hand is dependent upon the Fisheries Department for staffing and equipment. This gives them little control over on the ground management, including the hiring and direction of staff. This lack of control over day-to-day activities partially explains why the management at Sapodilla Cayes is the weakest of the three parks considered in this study (Personal Communication, M. McField, 2005). Although TASTE is located near the reserve and has been building its resources, TASTE does not pay the reserve staff. This means it has limited authority to dictate when and how management activities are carried out. It is important to note however, that the SCMR is still considered better managed than reserves run entirely by the Fisheries Department (Personal Communication, J. Nightingale, 2005).

Problems inherent in the delegated co-management approach are evident in the statements by members of the Department and Belizean NGO community. The Fisheries Department often views co-managers as unaware of their role and the authority of the government (Personal Communication, J. Azueta, 2005). Delegated authority gives the NGO control over almost every aspect of management. It is the delegated manager's responsibility to implement specified management plans which are written and passed into law as guidelines for decision making. In the case of TIDE and FON, the Fisheries Department is rarely involved in the decision making process. For these organizations, the Department is involved in situations where Fisheries law has been violated. The Department authorizes fisheries officers and prosecutes offenders. These local NGOs are therefore acting on behalf of the Department in day-to-day management activities. Not only are they responsible for these activities, but TIDE actually funds all of them through grants, donations and other means. In this situation there is little reason or interest on behalf of the NGO to consult the Department. There is some feeling of resentment by Department staff that while delegated co-management has been financially beneficial, it has resulted in an unwanted loss of authority (Personal Communication, J. Azueta, 2005). According to those involved in delegated co-management, this led to reluctance on the part of the Department to engage in true dialogue about administrative activities, leaving the two partners operating with little communication.

Collaborative managers, such as TASTE, face the same communication problems as delegated managers, but for a different reason. TASTE has been responsible for outreach activities, including environmental education, alternative livelihood projects and infrastructure development. The organization has been largely denied authority over staff, day-to-day activities and enforcement. This creates a situation where TASTE has the desire, but not the authority, to direct activities at the reserve. TASTE is in a very difficult position. It is heavily dependent on the government, but the government has limited faith in their capacity mostly due to TASTE's limited ability to attract funds. The Fisheries Department's lack of confidence in TASTE's

management can also be attributed to its relatively weak executive director and smaller staff, as many in the Department view TASTE as lacking the capacity for management (Personal Communication, J. Azueta, 2005). Although TASTE may have more ties in the community and be more aware of what is going on locally and at the reserve, decisions and authority come from the Fisheries Department in Belize City. This leaves the organization with little say in how monies are spent, who is hired, or how things are done at the reserve. TASTE is in nearly constant contact with both on-site staff and the Department, but often decisions are made without TASTE's knowledge or consent. This type of co-management has not been as effective as it could be due to a lack of clear communication and/or power sharing between the partners.

The precedent and history of Hol Chan has affected marine reserve development and management throughout Belize. From the start HCMR was run independently by the Fisheries Department. This system centralized power and made the shared power of co-management arrangements difficult. This has placed the Fisheries Department and local NGOs at odds. As one observer remarked, "NGOs are contemptuous and pay lip service to working with the GOB" (Personal Communication, W. Jones, 2005). This type of attitude has made both NGOs and the government wary of each other and encouraged them to cling to whatever power they have. For organizations like TASTE who lack delegated authority, it has been difficult to negotiate an alternative path. As a consequence, delegated authority has emerged as the only way for co-managers to exert real control. This struggle over power will continue as long as there is a lack of clarity as to how power is shared.

Financial Resources

The country of Belize currently confronts financial crisis. As the government and the country face mounting debt, tough decisions will have to be made about allocation of financial resources. Since 1998 the proportion of debt to GDP has risen from 41% to 93%, putting Belize in the same category as other highly indebted Caribbean countries (Sahay, 2005). Debt has risen

despite economic growth, and is largely explained by poor spending choices and the ease of borrowing (The Economist, 2004). As external debt mounts conservation interests receive less financial support than they need, and there is increasing pressure to look elsewhere for funding. Lack of money for the Fisheries Department forced them to turn to co-managers for financial contributions. This has increased the power of both local non-governmental organizations and international donors. A lack of secure finances is one of the major constraints to effective reserve management for both government and co-managers alike.

Fisheries Department Finances

The government's financial crisis has had a profound effect on the Fisheries Department. Although the budget for the Department has grown in recent years it is still woefully inadequate for managing 8 marine reserves and enforcing Fisheries laws throughout the country. During the 2002/2003 fiscal year 88% of the fisheries budget went to salaries and a small fraction went to other overhead, leaving less than 10% of the budget for all other activities including enforcement, fuel and research (Government of Belize, 2003d). This changed in 2004/2005 with more than 32% of the budget going to the operational expenses necessary for management (Government of Belize, 2005). Even though the budget increased by over 66% in that two year period, shortages of staff, fuel and equipment plague every reserve in the system (Government of Belize, 2003d, 2005). In response, the Department has started to depend upon co-managers and outside agencies for funding. The Fisheries Department relied upon a grant of almost US\$ 50,000 for a crucial conch monitoring project (Personal Communication, P. Morgan, 2005). As the needs for effective MPA management and financial pressures grow, there is concern about how reserves will be financed and resources protected.

The growing recognition of financial problems was addressed in 2003 when the Coastal Zone Management Authority and Institute (CZMAI) outlined ways to create more sustainable financing for MPA management. The report proposed fee collection and grant support as major

financing mechanisms (Coastal Zone Management Authority and Institute, 2003a). The CZMAI strategy estimates that the cost of effective management of the MPA system at over US\$ 2,500,000 yearly (Coastal Zone Management Authority and Institute, 2003a). The total budget for the Fisheries Department in 2004-05 was less than US\$ 250,000 for all activities (the Forest Department currently does not have any funds for MPA management) and financing for MPA management was a fraction of what is needed (Government of Belize, 2005).

Generated after broad stakeholder consultations, the CZMAI report emphasizes the importance of instituting effective financing measures for MPA management as quickly as possible (Coastal Zone Management Authority and Institute, 2003a). This urgency is due in part to the fact that the CZMAI project funding was to close in 2004, and recognition of the need for broad based, cross-sectoral funding links to maintain the integrity of the MPA system (Coastal Zone Management Authority and Institute, 2003a).

The need to finance MPA management has led the Fisheries Department to implement some of the recommendations of the CZMAI report. Late in 2004 the Department instituted a uniform entry fee for all marine reserves in the protected areas system. Daily entrance fees were set at US\$ 10 per non-Belizean visitor for all parks managed by the Fisheries Department. Implementation of the fee system has been marked by controversy with no published policy explaining how monies collected through this system will be distributed. The current understanding is that fees will be deposited into a MPA trust fund as per the CZMAI recommendation (Personal Communication, J. Nightingale, 2005). However, it is currently unclear who will be responsible for the management of this account. The money in the fund will be used for reserve management, with most of the fees collected remaining for on site management. A small percentage of the money raised will be withheld for reserves with low visitation and Fisheries Department overhead. The idea is that reserves which generate excess money will be able to support others. However, even though the fees are now being collected the logistics of the system remain unclear.

The collection of visitor fees worked very well at Hol Chan and serves as a model for this new system (Personal Communication, J. Azueta, 2005). However, as mentioned above, Hol Chan is in a unique situation. Hol Chan receives a large number of foreign visitors and all monies are deposited into a trust fund which is managed by a separate board of trustees. In the new system it is unclear who will make decisions about how the MPA funds will be distributed. Reserves like PHMR that receive very few visitors (less than 700 a year) will likely never be sustainable solely from entrance fees, and may gain from the surplus funds in this arrangement. Managers of more heavily visited reserves have expressed fear that funds management solely by the government could lead to confusion and misconduct (Personal Communication, J. Nightingale, 2005). The return of visitor fees for management could benefit all reserves, but the ambiguity of the system makes it unclear who will control the money and how it will come back to reserves for management.

In southern Belize response to the new fee system has varied. Because FON had been collecting fees in collaboration with the Forest Department prior to the implementation of this program, they have been involved in early discussions about how the accounting system for the new fee system should be set up (Personal Communication, J. Azueta, 2005). In addition, at Gladden Spit FON collects fees from whale shark tourists. On the other hand, TIDE who receives nothing from the Fisheries Department has made it clear that they do not intend to return the money they collect to the Department, but keep it for management (Personal Communication, W. Maheia, 2005). This move illustrates TIDE's view of the Department's financial management, and their position of power in relation to the Fisheries Department.

Currently TASTE and the SCMR are in a potentially perilous position with regards to the new fee system. Due to its status as a collaborative, rather than delegated manager, TASTE is not in a strong bargaining position. There are also historic problems with fee collection at the SCMR. While fee collection began in November of 2004 for all other reserves, collection was not passed over to SCMR staff until January 2005. This was due to an agreement that gave the Belize

Tourism Board (BTB) the right to collect fees at the SCMR. In fact the SCMR and HCMR were the only marine reserves collecting fees prior to November 2004. Until January 2005, money was collected by a BTB representative and all funds were used by BTB for their own purposes, with little returned for reserve management (Personal Communication, J. Nightingale, 2005). The SCMR is in a unique position because it receives heavy visitation from Guatemalans and Hondurans who have historically used the cayes as a vacation spot. The fact that fees have long been collected at the SCMR has made the transition to the new system much smoother than at other reserves. However, past enforcement of the fee system at the SCMR was characterized by impropriety with fees being waived in exchange for bribes and ineffective accounting, and community members have voiced concerns about how the new rules are being enforced (Personal Communication, V. Jacobs, 2005). TASTE has also expressed concerns about how fees will be put back into the reserve, with the Executive Director viewing fees as the primary means of financial sustainability (Personal Communication, J. Nightingale, 2005).

The lack of consistent funding for the Fisheries Department has limited its ability to effectively manage the Marine Protected Areas system. This has led the Fisheries Department to search for methods beyond the government budget to fund activities. The implementation of the fee system could provide more stable and sustainable financing for the system. However, the lack of transparency and collaboration between the Department and NGOs engaged in co-management, has lead to conflict over how the new fee collection system has been implemented and how funds are allocated.

Project Funding

As the Fisheries Department explores ways to remain fiscally solvent, funding is one of the major benefits to signing co-management agreements. The CZMAI (2003a) report indicated that 78% of investment costs, i.e. infrastructure and equipment, will be provided through co-

management partners in 2004. This highlights the benefits and ability of Belizean NGOs to raise funds for management projects.

In many cases, donor organizations have prohibitions against giving money directly to government agencies. The use of co-management partners allows monies to be given for park management through local NGOs, not government. In addition, the co-manager's community relationships are often attractive to donor agencies looking to show that their money is going to community based initiatives. Large funding agencies, including The Nature Conservancy, Conservation International, and World Wildlife Fund, have given extensively to the three local organizations working on MPA management in Southern Belize. There have also been projects by foreign government and intergovernmental organizations such as the World Bank, United Nations Development Program (UNDP), United Nations Education, Social and Cultural Organization (UNESCO) and US Agency for International Development (USAID). These international organizations all have interest in projects with direct community, economic and conservation effects.

A good example of the types of grant programs that have been available for co-managers is the Community Management for Protected Areas Conservation (COMPACT) project implemented by UNDP. The project's stated purpose was:

To promote and finance sustainable livelihood approaches and other community level interventions so as to reduce threats to the Belize Barrier Reef Reserve System - World Heritage Site (BBRRS-WHS) (Naturalight Productions Ltd., 2006, ¶ 1)

This was accomplished through grants to organizations up to US\$ 50,000 for the implementation of a wide range of community projects that would improve biodiversity conservation. Both Friends of Nature and TASTE received grants through this project. FON used the funds to train local people as SCUBA dive masters and to create an artificial dive site near Laughing Bird Caye. TASTE used the funding to develop its outreach and education program and gave almost 600

local students the opportunity to learn about and experience the SCMR. All in all, the COMPACT project awarded close to half a million dollars for projects directed at BBRRS-WHS.

Typically, large donor organizations such as UNDP or USAID have made funds available to co-managers through programs with targeted goals and objectives. While these types of “project based” initiatives have been beneficial to management, they have not always served local organizations in the best possible way. Project based funding offers one time funding for an initiative, be it environmental education or monitoring. Although donor institutions often emphasize sustainability, these types of projects are always temporally limited. This leaves local groups either to abandon the effort at the end of the project period, or attempt to secure further funding to continue the project. Project funding can also ignore key financial needs of small local organizations, such as administrative costs and overhead. Communication between international donors and local NGOs is often focused more on what donors can offer than what local NGOs need, and there is often a lack of constructive dialogue between donors and NGOs as to their real needs and desires (Personal Communication, I. Fairweather-Morrison, 2005)

International funders are often hesitant to provide funds outside of major project initiatives. Some of these initiatives, such as the MBRS project are locally based with a solid understanding of the needs of the region. However, the agendas of donors are not set by local people or grant recipients. It has often been the case that money becomes available for specific projects or perceived threats. These types of projects may or may not be what is really needed for improved management. In recent years education, alternative livelihoods, management effectiveness and capacity building have been major interests of donor agencies. Although valuable, these initiatives often do not address what co-managers have identified as constraints to effective resource conservation.

TASTE is a prime example of the pitfalls of project based funding. For the past four years TASTE has relied almost entirely on project funding. Although TASTE has implemented a number of successful projects (including two COMPACT projects), they have struggled to meet

administrative costs. Without reliable funding to maintain administrative costs, TASTE has been less successful than other Belizean NGOs in the region (Personal Communication, J. Nightingale, 2005). This lack of effectiveness has been linked to a sort of circular logic used by donors and the Fisheries Department. The Fisheries Department's requirement for "capacity", as evidenced by a funding track record, is one reason for not giving delegated control to TASTE. But the lack of management control has been one of the main reasons given to the Executive Director of TASTE for the lack of donor interest in the organization (Personal Communication, J. Nightingale, 2005). Insufficient administrative monies can have large effects. Since so much of Belizean politics and decision making takes place on a one-on-one, face-to-face basis, a lack of administrative and travel funds has limited TASTE's ability to participate in key meetings and visibly demonstrate its commitment to management.

For the Fisheries Department co-management has proven to be a way to pass funding responsibility for reserve management to others. This may benefit the reserve system as a whole through stretching the limited funds, as well as the reserves in the southern region. The use of co-management has provided greater funding for management projects, putting co-managed parks in a better position than those managed solely by the Fisheries Department. Independent funding has also allowed managers to pursue community centered projects. However, much of the funding has been limited to specific projects and does not sustain consistent management. For FON, TIDE and TASTE, outside funding has helped them gain community and governmental support for co-management, but it has been insufficient for day-to-day management needs.

International Donor Agencies

Amongst the conservation community in southern Belize it is understood that international support is key to financing natural resource management (DeVries et al., 2003). However, international conservation organizations have their own agendas, which may or may not converge with the local organizations they fund. The dominance of international

organizations is evident in that they can overpower local organizations with both money and political power. Local NGOs in need of financing and support often quick overlook some of these issues and only later realizing how dominating these international organizations can be.

Both TIDE and FON relied on support from donor agencies to provide initial financial security and international credibility. Although most people in the region do not want to acknowledge the importance of these relationships, it seems clear that TIDE (and FON) would not have been successful without the support of international organizations (DeVries et al., 2003). TASTE has lacked consistent international support. The Executive Director of TASTE has made many efforts to secure funding, including pursuing non-traditional routes such as corporate sponsorship, but with little success. It is possible that TIDE and FON's charismatic and powerful local leaders have made them more attractive to international donors. Having an international organization to stand behind initiatives gives provides credibility and negotiating power in Belize and valuable global recognition.

TIDE's history with the Nature Conservancy (TNC) illustrates of how international donors can dominate local conservation efforts. TIDE and TNC have been linked since TIDE's formation in 1997 (DeVries et al., 2003). Many local people (and other local NGOs) have had a hard time distinguishing between the activities of the two organizations. TIDE has tried to actively characterize itself apart from TNC. However, even now, with TNC contributing only about 10% of TIDE's general budget, it is assumed within the conservation community that TNC has supported TIDE to the exclusion of other local groups (Personal Communication, W. Maheia, 2005; Personal Communication, J. Nightingale, 2005). These relationships can be damaging in the way that they blur the distinction between local and international interests.

International organizations are often quick to support so called community driven programs, neglecting to fully evaluate whether this type of intervention is appropriate or even warranted (Chapin, 2004). Ravndal (2002) analyzed a UNDP/GEF grant implemented to improve community co-managed parks in Belize. He observed that many of the local

organizations given money for park management were not capable of carrying out the activities of the grant (Ravndal, 2002). In addition to their lack of capacity, there were a number of unforeseen constraints that ultimately led to project failures (Ravndal, 2002). Many of the southern NGOs have more structure and administrative capacity than Community Based Organizations (CBOs) involved in the UNDP/GEF project (Ravndal, 2002). This is especially true of those NGOs involved in MPA management, as capacity was a major consideration when co-management agreements were designed. Although the greater capacity of local NGOs has provided security to donor agencies, community participation may not be as important to local NGOs as CBOs. This calls into question the extent to which support is actually going to communities as many international organizations intend.

Another outcome of dependence on international funding has been competition between local groups for donor attention and money. This has sometimes created animosity and battles over turf (DeVries et al., 2003). FON, TIDE and TASTE all work in close proximity, on similar projects, with limited resources. Although all three have slightly different needs and strategies, they all depend on outside sources for funds. This dependence can translate into conflict when multiple NGOs seek to work with a finite number of donor agencies. A clear example of this conflict is evident with TIDE and TASTE. Although working in the same town on similar issues, TIDE and TASTE do not collaborate with one another, for historical and other reasons. Both organizations profess no ill will towards the other, and the relationship has improved over the years. Yet they have little interest in coordinating programs or activities (DeVries et al., 2003). In the past two years there has been growing recognition of the need for greater collaboration and calls for FON, TIDE and TASTE to amalgamate. Concerns about how a merger might actually work has led to hesitancy on all sides.

Despite the importance of the relationship, many local conservationists are skeptical of connections between international interests and local conservation initiatives (Personal Communication, L. Garbutt, 2005). International interests change and funding follows these

priorities. What happens if coral reef conservation and coastal management decline in priority for international donors? The possibility that funding could decline is a concern for local conservation groups aware of their precarious position. Some groups seem to have little concern, feeling as though their commitment and missions will continue to attract funding from outside sources (Personal Communication, W. Maheia, 2005). Others resent the intrusion by international groups and their exploitation of local conservation interests (Personal Communication, L. Garbutt, 2005). Whatever happens in the future, it is clear that the role of international funders will continue to be both pivotal and controversial in marine conservation initiatives.

A lack of funds has forced the Fisheries Department as well as local NGOs to look elsewhere for money for MPA management. Co-management has provided the government of Belize and the Fisheries Department with a new way to fund marine reserve management. The reliance of most of marine reserves in southern Belize on outside funding sources has allowed them to be more effective in management than if they had relied on the government alone. However, the uncertainty of future funding makes these organizations vulnerable to the changing preferences of international funders. FON, TIDE and TASTE (and southern Belize in general) continue to look to tourism as a means for alternative financial support, following in the footsteps of Hol Chan. Tourism can help to provide funds. However the lack of financial security in the Fisheries Department will likely continue to have a powerful effect on how Belizean NGO co-managers and the government relate to one another.

National Politics

Belize has long been compared to Costa Rica, a stable, conservation minded democracy in the midst of Central American chaos. Although a secure democracy, Belizean politics is notoriously unpredictable. This political unrest was highlighted in April 2005 with a ten day strike by the teacher's union in protest of the 2005/2006 budget. The protest came to a head

when peaceful demonstrations in Belize City ended in looting. International controversy over the sale of the phone company, accusations of financial misappropriations, financial sector downgrades, and the threat of currency devaluation herald future challenges for Belize. The general population confronts increasing crime, rising cost of living, and growing unemployment (Central Intelligence Agency, 2005). These issues will likely impact how natural resources are managed in the future.

The instability of the current political and economic situation raises questions about the government's ability to make long term decisions for the protection of natural resources. The complexities of natural resource management, among other factors, are dependent on effective governance. The large number of government organizations involved in environmental regulation requires effective cooperation between agencies. It also requires sound laws and effective enforcement. The governmental system with its power vested in a hand picked cabinet gives a few individuals (and their friends) a great deal of power. Often politics results in making decisions that appease key constituencies or cronies in the short run, sometimes to the detriment of social or economic well-being. Co-managers (and indeed all organizations) must operate within this political context which influences their ability to actively plan and manage marine resources.

Agency Cooperation

A crucial factor in marine reserve management, and in resource management throughout Belize, is inter-agency cooperation. In Belize there are a wide range of agencies responsible for the management of different resources. Although I have focused on the Fisheries Department, all MPAs are affected by other governmental agencies and organizations. For MPA co-management this can include the Fisheries Department, the Forest Department, the Department of the Environment, the Coastal Zone Management Authority and Institute, the Belize Tourism Board, and a host of other governmental organizations. This list does not include national, regional and

local non-governmental organizations and interest groups. Effective management of resources requires cooperation between all of these groups, and this cooperation is slow in coming.

The Coastal Zone Management Institute and Authority (CZMAI) was created in recognition of the need for greater cooperation between governmental partners. The CZMAI was established to integrate coastal zone management with the mission to:

support the allocation, sustainable use and planned development of Belize's coastal resources through increased knowledge and the building of alliances for the benefit of all Belizeans and the global community (Coastal Zone Management Authority and Institute, 2004, ¶ 5)

The Coastal Zone Management Authority and Institute is divided into two parts: the Authority and the Institute. The Authority advises the minister; develops projects, guidelines and the Coastal Zone Management Plan; and oversees the Institute (Coastal Zone Management Authority and Institute, 2004). The Institute is responsible for scientific research and monitoring (Coastal Zone Management Authority and Institute, 2004). All of these roles as well as the administrative structure of the organization were laid out by the cabinet in the Coastal Zone Management Act.

The CZMAI's struggle to implement an integrated coastal zone management plan offers insight into the difficulties of interagency cooperation. The idea for the Coastal Zone Management Authority was first discussed soon after the creation of Hol Chan Marine Reserve. The organization was formed in recognition of the need for more comprehensive management of impacts on the Belize Barrier Reef (Carter, Gibson, Carr III, & Azueta, 1994). In 1993 UNDP/GEF provided funding for the organization and development of an inclusive management plan for the entire coastal zone. In 1998 the CZMAI was endorsed by the government with the passing of the Coastal Zone Management Act, which formalized the organization and specified its roles and responsibilities. Further funding was provided by UNDP/GEF in 1999 for implementation of the plan. In 2004 this funding expired and CZMAI is currently operating on a reduced budget.

One of the major motivations for the formation of the CZMAI was the creation of an agency to integrate the numerous government bodies responsible for the coastal region. The CZMAI was established under the Department of Fisheries, Agriculture and Cooperatives. Due to the complexities of authority in the coastal zone CZMAI is required to liaise with the Forest Department, Department of Environment and a number of other government agencies. The Coastal Zone Management Act also created the Coastal Zone Advisory Council which included the Fisheries Administrator, Chief Forest Officer, Chief Environmental Officer, Ports Commissioner, Commissioner of Lands, Director of the Office of Geology and Petroleum, Director of the Belize Tourism Board, Principal Public Health Officer, Physical Planner in the Ministry of Natural Resources, Housing and Planning Officer, Director of the University of Belize Marine Research Centre as well as two non-governmental representatives (Coastal Zone Management Authority and Institute, 2004). Therefore major players from many of the governmental organizations were present at meetings and involved in the formation of policies as they related to coastal zone management.

The establishment of the CZMAI could have been a way for different sectors to work together to discuss trends and develop policy. In fact, the Integrated Coastal Zone Management Strategy exists as a comprehensive document that both categorizes the coastal zone and provides guidelines for future activities. Even though this document has been prepared and there have been successful outcomes from the CZMAI project, its major goal, interagency cooperation, has had limited success. The plan has not been ratified by the government, and with the end of the funding cycle in 2004 the activities of the CZMAI have largely ceased. The basic failure of the CZMAI to serve as a mechanism for cross-sectoral cooperation illustrates the challenges faced in effective marine resource management.

The colonial history of logging which relied on use of Belize's many rivers and extensive coastline, has led to about 45% of the population living near the coast (Coastal Zone Management Authority and Institute, 2001a). The impacts of human activities are great, and it was the goal of

the CZMAI to coordinate between agencies and find ways to mitigate and regulate impacts for more sustainable use of coastal resources. The Integrated Coastal Zone Management Plan addresses: research and monitoring, marine protected areas monitoring, mangrove protection, fisheries, aquaculture, caye development, marine pollution, cruise ships, education, enforcement, alternative livelihoods and much more. The comprehensive nature of this plan required careful consultation with a wide range of government agencies, non-governmental organizations, local communities and businesses. One of the former directors of the CZMAI noted that the Advisory Council meetings were extremely beneficial as a means for bringing diverse groups together to discuss issues facing the coastal region and provided open dialogue about concerns and opportunities (Personal Communication, I. Fairweather-Morrison, 2005). In fact, it was frequently noted in reviews of the project that the formation of a strong Advisory Council was one of the major strengths of the project (Hildebrand, Putney, & Vega, 2005).

Even with the strength of the CZMAI Advisory Committee and government support, the CZMAI had difficulties. There was concern that the CZMAI was limited to advising and planning and therefore did not have authority to implement policy, making it difficult to secure commitments (Personal Communication, I. Fairweather-Morrison). In 2003 CZMAI held a National Coastal Symposium where draft policy documents were presented. These policies addressed issues relating to coastal impacts, including cruise tourism, integrated coastal management, caye development, aquaculture and more. The conference was attended by representatives from government agencies, as well as Belizean non-governmental organizations, business interests and scientists. This symposium was an opportunity for a wide range of interests to come together and address concerns and ideas for coastal issues. However, there has been little action toward implementing many of the guidelines and policies proposed.

CZMAI was created as an organization to bridge the many government agencies whose work affects the coastal region. However, the mandate given by government was insufficient for CZMAI to actually implement the plans it helped develop. The implementation of policy and

enforcement of laws was left to specific government agencies who were often more concerned with maintaining their own power (Personal Communication, I. Fairweather-Morrison, 2005). Concerns were also expressed by some that the CZMAI favored conservation and was anti-development (Personal Communication, I. Fairweather-Morrison, 2005). Some of these challenges were overcome as relationships developed and government officials were educated about the goals of the CZMAI (Personal Communication, I. Fairweather-Morrison, 2005). However, cross-sectoral cooperation has been slow, a problem only amplified by the end of CZMAI's funding in 2004.

Without a functioning agency that is able to analyze and synthesize the diverse issues facing the coastal zone and the lack of policy, complex coastal development issues will continue to haunt resource managers. Marine reserves across the country are currently attempting to balance tourism, development, fisheries management and ecosystem integrity. This is especially true in the southern part of the country where tourism is growing and impacts are starting to be felt.

Tourism Planning and Policy Problems

The complexities of the Belizean ministerial system and the absence of interagency cooperation can produce problems with the production and enforcement of policy. In many cases there is a marked lack of enforceable regulations and laws to guide decisions. Local NGOs engaged in co-management have limited ability to ensure government follows through with policies (Personal Communication, G. Ellis, 2005). In most cases this is not due to a lack of awareness or inability to write policy, but to the unwillingness of politicians to tackle contentious issues. Some of this "missing" policy and enforcement relates to coastal zone management, co-management, transnational conflict, cruise tourism, caye development, aquaculture, climate change, bio-prospecting and many more. I briefly explore some of the policy issues surrounding cruise tourism, but it is important to recognize the vast number of potential impacts on marine

conservation, many of which lack policy or planning. The controversial nature of these issues adds to the complexity of developing and enforcing policy. In this climate, managers are left to without comprehensive national strategies or plans.

Tourism is a key economic contributor to the Belizean economy, responsible for about 23% of GDP (World Travel and Tourism Council, 2004). The relationship between the government of Belize and the tourism industry has shifted dramatically over the past twenty years. The government of George Price and the early PUP condemned tourism as “whorish” (Hunt & Higinio, 1993). This rhetoric changed quickly as ecotourism developed into a alternative to traditional “sun, sea, sand and sex” tourism (Hunt & Higinio, 1993). For the past fifteen years the government of Belize has promoted tourism as one of the keys to the country’s economic success. The coral reef is one of the major tourist attractions. Belize has been very active in promoting and attracting tourists. Despite these successes, there has been a general failure to implement a national tourism policy that balances tourism and its associated environmental impacts (Launchpad Consulting & Russell, 2005) The tourism sector has made a concerted effort to plan, but there has not been effective movement on the government’s part to implement plans or policy for the industry.

In 1998 Belize developed a national strategy for tourism: the Blackstone Report. This strategy provided guidelines for how tourism development should take place and included recommendations on a wide range of topics as they related to the tourism industry (Blackstone Corporation, 1998). It called for moderate growth of 4% annually over the next five years from 1998-2003, or approximately 120,000 tourists in 2003, and a focus on natural-cultural tourism (Blackstone Corporation, 1998). Belize has not followed this strategy and the rapid growth of the industry has led some to question how the industry is managed and what policies should be in place to regulate tourism (Launchpad Consulting & Russell, 2005). The majority of the visitors in 2005 were cruise passengers, a form of tourism which is barely mentioned in the 1998 National Strategy.

Although currently cruise tourism is concentrated in northern Belize, the current and potential impacts of the industry in the north are relevant to southern co-management for a number of reasons. For example, there have been talks of developing a cruise port in the southern part of the country. The Mayor of Punta Gorda Town has been working on a proposal for the development of a cruise terminal (Personal Communication, C. Galvez, 2005). The port would serve smaller ships and is hoped generate income and provide jobs for Toledo residents (Personal Communication, C. Galvez, 2005). Already small ships serving 200 passengers occasionally visit Punta Gorda and the Sapodilla Cayes. This indicates the growing need for effective policy to guide cruise tourism development in the future. In addition, any expansion of the cruise tourism industry could directly affect local NGO development of eco-tourism initiatives.

I have chosen cruise tourism as an example of the implications of the lack of effective policy across all sectors. There are a number of other issues, such as aquaculture and pollution, which lack policy and/or enforcement and adversely affect marine reserve co-management. However, concerns about cruise tourism impact, both on the economy and environment, provide a clear example of how policy and planning are needed for effective management of coastal and marine resources. Since the mid-90's the cruise tourism industry in Belize has increased rapidly. When the Blackstone Report was published in 1998 Belize hosted 15,000 cruise visitors. By 2005 that number had risen to over one million, and although cruise tourism accounted for over 86% of the visitation in 2003 it only accounted for 14% of the total tourism revenues (Belize Tourism Board, 2005b; Launchpad Consulting & Russell, 2005). This dramatic rise in visitation over the past seven years has had a number of impacts on the Belizean tourism industry. The most popular cruise tourism attractions are archaeological and natural sites (such as Hol Chan, Goff's Caye, the Maya ruins of Xunantinch and Altun Ha and the Belize Zoo) which makes effective management of both crowds and resources important (Launchpad Consulting & Russell, 2005). There is growing concern that high visitation during cruise days has adversely impacted the environment and endangered Belize's reputation as an "ecotourism" destination (Launchpad

Consulting & Russell, 2005). Although the tourism industry has grown, and some regulations exist, the rate of growth has outpaced the ability of the national strategy or existing tourism laws to handle the increase in visitor numbers.

Although cruise tourism may have potential economic benefits, it can also adversely impact the environment. Potential effects include pollution and coral reef damage, making the establishment of specific carrying capacities and limits of acceptable change important. The draft cruise tourism policy clearly addresses the need for carrying capacities for protected areas and tourism destinations (Coastal Zone Management Authority and Institute, 2003b). It recommends that carrying capacities be developed for all natural and cultural sites, taking environmental, social and physical factors into account. Carrying capacities can help both tour operators and managers better control tourist actions and effects. Despite the recognized need for carrying capacities, few of the popular attractions currently have such guidelines or enforce them.

The marine sector is one of Belize's major tourism attractions. In 2004 Hol Chan received over 85,000 visitors (Belize Tourism Board, 2005c). Although cruise passengers visit only one section of the reserve, increased tourism pressure has led to concerns about impacts to the reef ecosystem. This led Hol Chan to conduct a study to evaluate tourist's impacts on the reef and how guides were working to reduce them. The study revealed numerous potential detrimental effects (i.e. coral breakage, stirring sand, touching animals) and documented the importance of trained and qualified guides to ensure minimal tourist impacts (Paz, Grimshaw, McField, & Alamilla, 2003). Although tourist activities did not seem to be negatively affecting the reef at present, increased tourism pressures pose future risks.

Hol Chan is not alone in feeling the impacts from cruise tourism. Goff's Caye, a small caye off of Belize City, has become a popular cruise passenger destination with reports of over 500 people visiting the caye on crowded days (Coastal Zone Management Authority and Institute, 2003b). CZMAI is currently working to develop a management plan for this caye (Personal Communication, I. Fairweather-Morrison, 2005). It will be important to monitor the impacts of

cruise visitors and adjust management strategies to minimize adverse impacts across the marine sector.

There are advantages to concentrating tourism in certain areas through zoning. However, careful planning is needed to ensure that harmful effects are mitigated. Carrying capacities and careful monitoring could be used to help managers make decisions about how to balance sometimes conflicting priorities. These decisions require government guidelines and enforceable policy, both of which are currently lacking. Government's focus on revenue generation, although understandable given the state of public finances, has overlooked the need for comprehensive policy.

For the past few years cruise tourism has been a flash point for concerns about environmental protection and development, it is an area where effective policy is desperately needed. However, cruise tourism is just one prominent example of where policy has not kept pace with on the ground developments. One could make similar arguments for other activities like aquaculture, pollution, and bioprospecting that impact the coastal ecosystem and coral reefs. All of these areas like cruise tourism, have seen the development of draft policies, but lack legal guidelines and formal policy. Without enforceable policies local non-governmental organizations have limited room to act. Organizations have educated local people about impacts on the reef, trained local guides and monitored environmental changes, but they need government support to effectively manage Belize's marine resources. Most importantly, existing laws need to be supported and enforced.

Ministerial Power

Politics in Belize are divisive. Clashes between the UDP and PUP can be fierce. While there is little philosophical difference between the PUP and UDP, party loyalty runs deep. The parliamentary cabinet-based system has allowed dominant party leaders to exert complete control over policy. In this climate, politicians are nothing if they are not in control and supporting the

wining party can have profound benefit. Politically favored villages have electricity and paved roads, while those of the opposition loose out. The focus on party unity and clientilism has had a huge impact on the direction that Belize has taken in recent years. The public is starting to loose confidence in their leaders and feel powerless to affect the decision making process (Personal Observation).

Ministers wield considerable power in Belizean politics. As described above, the cabinet is the ultimate source of political power. It meets behind closed doors, and there is a tradition of “collective responsibility” which discourages dissent. Members of the cabinet are always loyal members of the political party in charge, and a common method of party discipline is the granting and removal of cabinet positions. Since Said Musa’s re-election in 2003, his cabinet has changed five times, illustrating instability within the country as well as the PUP. The members of the cabinet are responsible for the generation of all public policy. In addition, Ministers exercise near complete control over the financial resources of their ministries.

In the Fisheries sector, the Minister has control over marine reserves, enforcement of Fisheries Law, and issuing of permits. One of the most controversial aspects of this control is the degree of ministerial discretion over reserve managers. If the Fisheries Minister decides that reserve boundaries should change or a reserve should be eliminated, they have that power; and there is no public recourse. Although no reserves have been de-reserved, some have seen their boundaries change, and there is a continual threat of action.

Historically, the Fisheries Department has been lumped with that of Agriculture and agricultural interests have taken precedence over fisheries. However, the current Minister of Agriculture and Fisheries comes from a coastal district as the representative of Toledo East (this district includes Punta Gorda and many of the areas addressed in this paper), and has more of a fisheries focus. This could be good for the management of the fisheries, but electoral politics and the use of southern Belize’s marine resources by non-nationals creates an uncertain political dynamic. The current Minister is seen by many as favoring economic interests over conservation

(Personal Communication, L. Garbutt, 2005; M. McField, 2005). This has led to a noted move away from restrictive types of fisheries management and the relaxing of some laws.

A recent example of the impact of ministerial power is the changing of Fisheries Law in regards to licenses. All commercial fishermen in Belize must possess a valid fishermen's license, awarded through the Fisheries Department. The conditions for who is eligible for these licenses have always been controversial given the productivity of Belizean waters. Until 2004, non-national permanent residents were allowed licenses if approved by a local fishing cooperative (Trujillo, 2005). This law changed in 2004 when the presiding Minister of Fisheries signed a Statutory Instrument preventing all permanent residents from acquiring licenses (Trujillo, 2005). Many took issue with this change, including a number of politically powerful northern fishing cooperatives. Then, early in 2005, after the current Fisheries minister took over, the law was changed to again allow permanent residents open access to Belizean waters. This change was opposed by environmental NGOs who argued that allowing more fishermen in Belizean waters would only speed the decline of fisheries stocks (Trujillo, 2005).

Foreign fishermen are a flash point for controversy throughout Belize, particularly in the southern part of the country. Most southern fishermen lament the number of "non-Belizeans" who not only don't speak English, but have Punta Gorda addresses on their valid fishermen's licenses (Personal Communication, V. Jacobs, 2005). High fish productivity and relatively low exploitation has kept Belizean fisheries in fairly good condition, especially when compared to other nations in the region. Because of easy access (the SCMR is basically equidistant from Belize, Guatemala and Honduras) cases of Guatemalan and Honduran fishermen illegally fishing in southern reserves are common. Increased fishing pressure has led to the depletion of a number of commercial stocks (Personal Communication, J. Nightingale, 2005; V. Jacobs, 2005). It may not be too far out of character for licensing officials to be accepting bribes. In fact one Punta Gorda fisheries officer was fired for issuing invalid licenses in 2004 (Nembhard, 2004). In that case, the licenses were issued at a steep price to fishermen from Honduras, and the scandal led to

changes in how licenses are issued. Given this incident, many speculate that corruption extends further up in the Ministry.

As FON, TIDE and TASTE have worked with local communities to decrease fishing pressure and provide alternative livelihoods; foreign exploitation has become very troublesome. It is a problem local NGOs have little ability to change without support, not only from the Belizean government, but from the governments of Guatemala and Honduras. This problem is being addressed through the MBRS project as well as the Tri-national Alliance for the Gulf of Honduras (TRIGOH). Their efforts have focused on harmonizing fishing laws and developing education programs. Although resolution of this issue will require multinational approach, none of this will be possible without a national consensus that over-fishing is a problem. The failure of any organized action has been a major frustration for co-managers and community members alike. In recent years, fishing and the drug trade have become intertwined, making foreign intrusions into Belizean waters even more common and patrols more dangerous with reports of chases, booby traps and gunfire (Personal Observation).

Because of these many challenges, political will to change is often lacking. There was interest by local fishermen for a moratorium on fishing within the SCMR in an attempt to regulate illegal fishing. When this idea was brought to the Fisheries Department, SCMR management was told that a moratorium was not politically viable (Personal Communication, J. Nightingale, 2005). The national fishing cooperatives are very powerful both economically and politically and generally oppose strong measures that exclude anyone from fishing (Personal Communication, V. Jacobs, 2005). Furthermore, there are questions about who benefits from allowing foreign fishers into Belizean waters. Some have argued that politicians are bowing to pressure, including accusations that political officials are pandering to foreign interests by granting fishing licenses in exchange for votes (i.e. fishing licenses provide documentation that grants voting eligibility) (Trujillo, 2005).

Over-fishing is just a symptom of weak political will to tackle controversial issues. This is not just the case for the Minister of Agriculture and Fisheries, but for elected representatives in all sectors of Belizean government. As long as the ministerial system gives unregulated power to Ministers, there will be more problems and opportunity for corruption. Elected officials are aware of the importance of maintaining constituencies and there is little likelihood they will adopt policies that endanger their political position, even if these policies might have long term social or environmental benefit.

The impact of national political forces can not be underestimated in Belizean society, including natural resource management. Agency cooperation, planning and policy and ministerial power shape the ability of co-managers to work with the government. These are also issues which co-managers have limited ability to change. Co-management involves power sharing between the government and local organizations and the current national political situation has made it difficult for co-managers to consistently engage government partners.

The Influence of Power and Control, Financial Resources and National Politics on Marine Reserve Co-management

The Belizean government is facing mounting debts which has prompted concerns about how investment and policy decisions are being made and enforced. As mentioned above, the government desperately needs additional financial investment. Financial resources within Belize are spread very thin which has led the government to look for investment from outside the country. Investors are willing to come to Belize, especially when offered lucrative financial incentives from the GOB (Duffy, 2002). The practice of clientilism in the context of a ministerial system, which concentrates power in the hands of a few, contributes to this problem (Shoman, 1994). A study by Duffy (2000) evaluated relationships between government, elites and eco-tourism development. Her study showed that while there were extensive laws directing tourism development, it was not uncommon for decisions to be made based more on informal links

between government and investors than by mandated laws and policies (Duffy, 2000). The influence of these relationships is understood both by the tourism and environmental communities who often feel powerless to take action to protect local and environmental interests (Duffy, 2000). The influence of power, money and politics affects the ability of co-managers to carry out their duties.

The Carnival Cruise Deal

In recent years there has been growing concern among interest groups about the direction and influence of tourism development. As the government looks for ways to encourage economic development, cruise tourism has been increasingly attractive. The promotion of cruise tourism and recent deals by the government has led many to question the economic and environmental impact of expanding this sector further.

Early in 2004 the GOB signed a contract with Carnival Cruise Line. When news of this “secret agreement” came to light in October national organizations representing the tourism industry, hotels, ecotourism interests and tour operators expressed concerns over questionable clauses which seemed to give Carnival the ability to side step existing laws and policy (The San Pedro Sun, 2004). Much of the controversy focused on a portion of the contract which appears to give the Belizean government no right to ensure that Belizean citizens are employed by Carnival. In addition, the contract binds BTB and other government organizations to carry out terms of the agreement, ensures no increases in the tax paid per visitor, and seems to guarantee Carnival will not be subject to portions of the newly drafted Cruise Tourism Policy (The San Pedro Sun, 2004). This could exclude Carnival from complying with laws, such as carrying capacities, that restrict visitation or passenger numbers (The San Pedro Sun, 2004). The contract also seemed to conflict with another “exclusive” contract signed by the government and Royal Caribbean Cruise Lines who operate the existing tourism village. These concerns eventually led to the renegotiation of the contract by the GOB as well as a settlement with Royal Caribbean (Ramos, 2004b).

Although the Carnival deal will bring money and development to the impoverished south side of Belize City, many are concerned about how much of that money will actually go to the Belizean economy. The Belize Tourism Industry Association (BTIA), which represents the tourism industry, was active in challenging the deal with Carnival. They expressed concerns that the deal would adversely affect the more lucrative overnight sector. Although construction of the new terminal officially began in mid-2005, the BTIA has asked for a judicial review of the contract process (Belize Tourism Industry Association, 2005). The situation with Carnival is just one example of the government's power to negotiate important decisions of great importance without public participation.

During the discussions of the Carnival deal fears about foreign workers and foreign influence grew. BTIA called for greater transparency in the decision making process, and expressed concerns about tourism dollars staying within the country (Belize Tourism Industry Association, 2004). After issuing this statement BTIA leadership was called "foreigners who want to gobble the entire tourism pie" by the PUP newspaper (The Belize Times, 2004). This attack is not uncommon as many of those involved in tourism, as well as conservation, are expatriates and concerns over environmental imperialism have grown. Some Belizeans see environmental protection and tourism, two areas dominated by international interests, as just another type of colonialism (Sutherland, 1998). These thoughts have appeared on radio talk shows and in the newspaper as Belizeans struggle to balance economic needs, trade dependency and nationalism (Personal Observation).

By entering into a deal with Carnival the government endorsed cruise tourism and paved the way for continued expansion of the industry. This will have important ramifications for the economy and the environment. The concerns of local people and national organizations such as BTIA seem justified when there is little guiding legislation or planning for cruise tourism. The influx of cruise visitors, if properly planned and regulated, can have benefits. If cruise passengers pay entrance fees and taxes there are employment and revenue benefits for all Belizeans,

including protected areas managers. However for these benefits to be realized government needs to address and manage potential long term impacts, not just short term gains. In addition, careful consideration should be given to the effects of cruise tourism expansion on the growing eco-tourism industry.

Cruise tourism currently does not heavily impact southern Belize, although as indicated above that is likely to change in the near future. The example set by political elites in Belmopan entering into a “secret” agreement does not bode well for future public engagement in the decision making process. Cruise tourism may offer significant financial incentives, but requires proper planning and secure mechanisms to ensure economic gain and avoid adverse environmental effects. Local NGOs have spent considerable time and energy seeking to balance local social and environmental effects. A similar effort needs to be made at the national scale.

Tourism Development

The quick adoption and rapid expansion of the tourism industry has led to a number of concerns about the type of tourism Belize offers. Across the country, but especially in southern Belize, there is an interest in promoting eco-cultural tourism, as proposed in the 1998 National Tourism Strategy. Many feel that southern Belize has the most to offer in terms of tourism with a diverse population and easy access to Mayan ruins, jungle, and the reef (Personal Communication,, G. Eiley, 2005). This has led all of the NGOs in the region to promote ecotourism as a development and conservation concept. However, ecotourism does not bring in the big dollars that high volume conventional or cruise tourism can, making it unclear how much eco-tourism will contribute to economic development. The way that tourism development is planned and implemented will affect both local people and the environment, and is a controversial topic.

Local participation in planning tourism is vital to protecting local interests in the face of growing foreign investment. Placencia is an example of what San Pedro must have looked like

twenty years ago. Francis Ford Coppola is just one of the American (and European) investors who have bought large lots along the beach to build luxury resorts. These resorts increasingly conflict with local people over a wide range of issues. Despite growing similarities, the Placencia Village Chairman cites San Pedro as an example of what Placencia doesn't want: extensive foreign investment and domination of the tourism sector (Personal Communication, G. Eiley, 2005). Placencia has an active village council which has taken full advantage of the Village Council Act. This act allows village councils to levy taxes and develop bylaws, and the Placencia Village Chairman has played an active role in ensuring that the community remains involved in the decision-making process and is consulted on proposed development activities.

Growing tourism development has brought valuable dollars, as well as foreign influence, into Placencia village. Tourism can raise the cost of living and the growing expatriate community sometimes clashes with long held community values and interests (Duffy, 2002). The Executive Director of Friends of Nature noted that FON has tried to keep the organization locally based by building a board of local representatives (Personal Communication, L. Garbutt, 2005). In his opinion a more open system could allow the large number of non-native Belizean's living in Placencia to take over conservation initiatives (Personal Communication, L. Garbutt, 2005). In recent years the community based system has become difficult as local people are growing less interested in participating and there is now movement toward more interest-based participation, even if that means increased international influence (Personal Communication, L. Garbutt, 2005). Problems balancing tourism development, social and environmental impacts, and outside influence are not limited to Placencia. Much of southern Belize confronts these problems.

In Punta Gorda there are growing numbers of NGO trained guides. However, guides often outnumber tourists making reliable employment difficult. One example is the fly-fishing industry. TIDE has done an excellent job of training local fishers as fly-fishing guides. When a fly-fishing resort opened in Punta Gorda in 2003 some of these men were employed there. However, the resort relies on a small core of fishermen who own their own boats and have fairly

consistent work during the peak tourist season. Other trainees lack equipment, and due to low tourist volume and the seasonality of Belizean tourism many are unable to find consistent work. It is common for people to move to Belize City or San Pedro where they can find more consistent work in the cruise industry (Personal Communication, W. Jones, 2006). Resentment about who is making money and who is not boils beneath the surface, and many community members feel that NGOs are making money while their lives have not improved (Personal Communication, W. Jones, 2006).

As Duffy (2000) documented, tourism developments can be pushed by politicians despite local opposition. Existing laws give Ministers extensive powers over protected areas and developers have power when they are able to secure support from high ranking government officials. From 2003-2005 there were at least two instances in southern Belize where tourism development seemed to be given precedence over community and NGO interests. In both cases political connections and economic interests were as important, if not more so, than community interest and environmental protection.

One example of ministerial intervention and tourism development occurred at Payne's Creek National Park. The park was declared as a Nature Reserve in 1994 and a National Park in 1999. The area contains a variety of ecosystems including broadleaf forest, mangroves and pine savannah, and protects important coastal habitat. Until 2004, TIDE had played the dominant role in day-to-day management of the park, although official management was through the Payne's Creek Advisory Committee consisting of local community members, NGOs and government officials. In 2004, when TIDE received a large grant for a project targeting both Payne's Creek National Park and Port Honduras Marine Reserve, clarification of their role in Payne's Creek was needed. Around this same time a politically influential family expressed interest in creating a resort within the park's boundaries. This led to negotiations and ultimately the government granted a development concession and realigned the park's boundaries.

Although it is unclear if and when the proposed development may take place, many groups were

concerned. Concerns focused not only on the nature of the development, which was to include canals and potentially an area for cruise ships, but also the precedent set by the actions. For TIDE, the deal was not all bad. The park size was expanded by almost 9,000 acres with the new agreement, and the realignment gave the small fishing village of Punta Negra room to grow.

The Payne's Creek case is an example of how political power and conservation interests can work together for mutual gain, but also could have repercussions for other conservation groups. There was a feeling by the executive director of TIDE that the new agreement was satisfactory, with benefits for development, conservation and local communities (Personal Communication, W. Maheia, 2005). The Punta Negra community which borders Payne's Creek is interested in expanding tourism. The proposed development would bring money to the region and could be carried out in an ecologically sensitive way. In addition, TIDE was able to expand protection of an often undervalued ecological system. The outcome of this case was likely influenced by the fact that TIDE's executive director and the Minister of Natural Resources are well connected, a relationship that some local NGO leaders don't have. It is unlikely that the open dialogue and positive outcome of this case will be repeated when reserves without ministerial connections are involved.

One of the idiosyncrasies of marine reserves is that the cayes within the reserve may be granted as a free hold, allowing land to be leased. The leaseholder then has the right to develop the caye. The granting of leaseholds in recognition of political connections or dutiful government service is common; in fact most leasehold's are initially granted in this way. Leaseholds have become another area where political connections and tourism development are entangled. An example of this problem is currently playing out in the Sapodilla Cayes Marine Reserve.

When Sapodilla Cayes Marine Reserve was declared in 1996, its northern border was marked just north of two very small cayes. These two cayes are currently leased by a loyal PUP justice of the peace. In this case, the leaseholder has partnered with an expatriate for tourism development. The development is to include an underwater observatory, hotel rooms, and bar

and restaurant. The plan also includes a turtle rearing project and a sea wall. All of this is to be built on two cayes with a combined area of less than one acre, in the middle of a fragile ecosystem. The management of the SCMR, local Fisheries Department representatives, as well as representatives from the Department of Environment, have all visited the site and observed construction methods which appear to violate current laws (Personal Communication, A. Nolberto, 2005). In addition, the environmental impact statement seems to ignore the construction of a sea wall, a development that has been forbidden at multiple sites in Belize due to its negative effects on the reef. Despite concerns raised by a variety of officials, construction has continued. In this case the management of the SCMR has been challenged by the developers to “try and stop” the development (Personal Communication, J. Nightingale, 2005). This type of attitude indicates the power of political connections and the limited ability of co-managers to influence decisions made far above them on the political chain.

In this case, concerns are not limited to the type of development because the boundaries of the reserve itself may be changed. The maps drafted of the reserve did not include the two northernmost cayes inside the reserve. However, the GPS points cited in the Statutory Instrument lie to the north of the two cayes. This has brought into question whether or not the cayes are within the reserve at all. If the cayes are located within the reserve, it might give more credence to arguments against the proposed development. In addition, clear marking and public awareness about park boundaries is imperative to effective management. Despite repeated questioning, TASTE, as the co-management partner, has not been given clarification about the status of the park’s boundaries from the Fisheries Department (Personal Communication, J. Nightingale, 2005). To both managers and local people, this case has illustrated the power of political connections over conservation efforts (Personal Communication, J. Nightingale, 2005).

While tourism can benefit local people, the majority of benefits from tourism development remain in relatively few politically well-connected hands (Duffy, 2002). Alliances developed between politicians and external investors only further alienate local people from

control over the natural resources they traditionally relied upon. Furthermore, when local NGOs negotiate and make deals it reinforces public suspicions about the true priorities of these organizations. All three southern NGOs have brokered deals with international lending groups or individuals that allow them use of resources in exchange for information, land or money, illustrating the power of foreign influence. Belize is a country where organizations with the right connections have power and authority. The active and organized Placencia Village Council has kept local people involved in decision making. TIDE was able to ensure that any realignment of boundaries would be spun in a positive light. TASTE has struggled to identify powerful partners with whom to bargain. All of these local organizations are trying to navigate a course that balances development, political realities and conservation interests. It is a challenging balancing act.

Financial Sustainability and the CZMAI

The Coastal Zone Management Authority and Institute has been a valuable agency for both government and non-governmental interests. It brought people together and influenced a wide range of sectoral policy. In spite of its mandate and the projects many successes, there is a feeling that the growing economic crisis facing Belize as well as a lack of government support, have played a huge role in the failure of the CZMAI to have a lasting impact (Hildebrand, Putney, & Vega, 2005). The problems faced by CZMAI are indicative of growing concerns about the Belizean government's ability to maintain services during a period of financial duress, and an example of the need for financial sustainability to ensure effective management of natural resources.

The Coastal Zone Management Authority and Institute was granted over eight million dollars, primarily from UNDP/GEF, over five years. During this period, a number of successful projects were carried out. However, eight months after funding from UNDP/GEF expired in 2004, the staff had dwindled from 26 to seven and the political force behind the organization was

rapidly declining (Hildebrand, Putney, & Vega, 2005). The independent final evaluation of the CZMAI project noted that the major drawback to the project was the failure to secure financial sustainability (Hildebrand, Putney, & Vega, 2005). Part of the reason given for this failure was grant planning that focused more on identifying potential funding mechanisms than actual implementation (Hildebrand, Putney, & Vega, 2005).

The major plans for CZMAI (and MPA system) sustainability have focused on user fees. In the Coastal Zone Management Act, sports fishing fees are mentioned as a possible mechanism for financial security. Prior to the 2001 elections, the Prime Minister indicated he would not institute any new fees on the tourism sector before the elections in 2003 (Hildebrand, Putney, & Vega, 2005). The implementation of user fees requires government support, and the CZMAI and other organizations have found it difficult to raise governmental support for a fee based system.

In late 2003, as UNDP/GEF support was winding down, the CZMAI developed a complex document outlining how fees could be raised to support coastal zone management in addition to other funding mechanisms such as grants, donation and government budgets. This strategy included a proposal for CZMAI to manage Goff's, Sergeant's and Rendezvous' Cayes off Belize City in exchange for the ability to collect visitors fees from tourists using these areas. (These cayes are heavily visited by cruise passengers.) In early 2004 the cabinet announced changes to the operation of the CZMAI including: the implementation of a US \$10 fee for all MPAs, granting CZMAI management of Goff's Caye (not the wider area) and the amalgamation of the CZMAI with the Fisheries Department. These changes were not popular and ultimately led to the resignation of the CZMAI CEO (Hildebrand, Putney, & Vega, 2005).

While most MPA managers supported fee collection at the MPAs, there were concerns about how the strategy would be implemented. The restriction of CZMAI management to Goff's Caye, although lucrative, represented minimal environmental protection. Another major issue was the amalgamation of CZMAI into the Fisheries Department. CZMAI was created as a cross-sectoral agency responsible for representing a wide range of interests, not only fisheries. Many

felt that locating CZMAI within the Fisheries Department would limit its reach, and suggested its incorporation into the Ministry of Development or Ministry of Natural Resources (Hildebrand, Putney, & Vega, 2005). In addition, CZMAI was regarded by most stakeholders to be more fiscally responsible than the Fisheries Department and concerns were expressed about financial management (Hildebrand, Putney, & Vega, 2005).

The CZMAI's financial problems escalated in mid-2004 when fee collection was to begin at Goff's Caye. Tour operators boycotted the area and took visitors to a nearby caye where no fees were levied (Channel 5 Belize, 2004b). The boycott was due in part to the lack of consultation with key stakeholders (Hildebrand, Putney, & Vega, 2005). Stakeholders, including those in the cruise industry, expressed frustration at the lack of holistic management for an area heavily used by cruise passengers, a situation not remedied by giving CZMAI management of only Goff's Caye (Hildebrand, Putney, & Vega, 2005). With the end of UNDP/GEF funding and little revenue generation from Goff's Caye, CZMAI was forced to lay off personnel (Channel 5 Belize, 2004a).

It is important to note that although the Coastal Zone Management Institute and Authority are no longer fully functional, the CZMAI project had a number of positive outputs including generating ecosystem data, providing training and equipment for resource managers, implementing educational programs and drafting of policies. In addition, the CZMAI brought attention to integrated coastal zone management. The CZMAI highlighted the need for cross-sectoral cooperation to regulate development as well as protect the coasts ecological and economic resources. However, the failure of the authority to maintain itself may have long term impacts. Those involved with co-management benefited greatly from the CZMAI. It offered a forum for discussion and gave managers support with their projects and agendas. The fiscal constraints and lack of planning to ensure sustainability are similar to problems faced by the both the Fisheries and Forest Departments. This lack of finances threatens the sanctity of protected areas throughout the country and has a huge impact on the operations of co-managers.

Issues of power and control, limited financial resources and national politics are the most complicated to resolve. The example of the Carnival deal illustrates the importance of governmental transparency and proactive planning in order to realize environmental and economic advantages. As the country of Belize expands its tourism industry, co-managers and the government need to work together to incorporate the diverse needs of local stakeholders, the conservation community and foreign investors. The case of CZMAI shows how interagency coordination, integrated management, and financial sustainability are linked and reveals the challenges these issues pose to effective long-term co-management of marine resources. As local NGOs work to better manage their reserves, they have had little success changing policies or developing long term plans given the current political and economic climate. These constraints will likely become more pronounced if the political and economic situation of Belize deteriorates.

Recommendations on Working Together to Improve Co-management

Given its history of natural resource dependency, many in Belize are attempting to balance conservation and development. This is true in every sector of resource management as issues are debated across the country. In recent years there has been growing recognition of the need to incorporate local people in the management of coastal and marine resources. This lead to the adoption of co-management, but today co-management is at a cross roads. With marine reserves increasingly viewed as potential money makers, the government and local NGOs responsible for MPA management have been challenged to balance conservation and development priorities. Some of the problems faced by protected areas in Belize and other Central American countries include: regional instability and poverty, lack of government funds, exclusion of local communities, paper parks, control of land, neglect of coastal environments, and sustainable management plans and policy (Govan, 2003). There is growing recognition that while co-management can be highly beneficial for management of resources, there are certain external factors which influence the effectiveness of protected areas management.

Given the realities of Belize today, it has become difficult for co-managers to balance the growing demands of local communities, national government and international forces. Friends of Nature, the Toledo Institute for Development and the Environment, and the Toledo Association for Sustainable Tourism and Empowerment face growing challenges as they try to ensure community based conservation and development, while navigating a changing political environment. While co-management offers a way for government, non-governmental organizations, and communities to collectively consider marine reserve management, discussions take place a highly politicized environment. Marine reserve management can not be separated from the political and economic realities of life in Belize.

My intention throughout this paper has not been to assign blame for the difficulties encountered when trying to manage marine resources. Quite the contrary, I regard the efforts of

parties engaged in co-management in Belize as attentive and attuned to the difficulties they have faced. During my time in Belize, I was continually impressed with the dedication of the people involved in conservation and marine protected area management. Nonetheless, challenges arise. Effective management requires recognition and action to address the wide range of influences, especially politics and economics, that affect management decisions. The experiments in marine reserve co-management in southern Belize can inform managers throughout Belize and the region. Below I offer recommendations as to how local people, Belizean NGOs, government agencies, and international groups might work together to balance sometimes conflicting interests and priorities.

The management of natural resources is a complex problem. As I have illustrated, it involves careful assessment of social, economic, political and scientific factors. The use of co-management is one way to incorporate different values into resource management decision making. The inherent complexity of these issues makes simple solutions difficult. In the case of Belize, the current political and economic situation is likely to make the process even more complex. However, it is important to search for ways to improve how co-management works for the wide range of stakeholders involved.

Empower the Local Communities

Involving local communities and stakeholders in the management of marine reserves is not easy and local NGOs have struggled to identify ways to truly ensure local ownership in the decision making process. The Government of Belize and Belizean NGOs have set up some formal mechanisms to include local people. However, the use of boards and Advisory Committees leaves much to be desired. If these groups remain the formal way for community participation, GOB and local NGOs need to carefully examine how representatives are chosen and local people informed about activities. Most of the organizations draw upon only a small core of local elites for participation on these decision making bodies. Although participation of

these people, who are well respected, is important for managers, it is equally important to engage marginalized stakeholders (i.e. non-elites, such as those who lack equipment and training to serve as tour guides and women). Co-management was designed to include community members and stakeholders in the decision making process and if participatory methods continue to exclude marginalized community members co-management is not addressing one of the major reasons for its use in resource management.

The current system for choosing board members focuses on the appointment of participants based on their involvement with other stakeholder organizations such as tour guide associations. This process gives NGOs control over what stakeholders will be involved and can limit representation to elites or people already in positions of power, further alienating certain groups. Creating a democratic process which allows stakeholders to decide who will represent them is a possible mechanism for diversifying boards and establishing accountability. In addition, NGOs should specifically seek to expand stakeholder participation to include currently unrepresented groups. FON has tried using a board made up of elected village representatives as a way of ensuring some sort of accountability and local participation in their decision making process. This method has had less than desirable results and FON is considering developing a membership based board involving democratic election for key decision making roles (Personal Communication, L. Garbutt, 2005). This type of change might enhance accountability, something key to securing strong community support.

A democratic process for board member selection should be accompanied by clear term limits and a mechanism for elections. This would need to be accompanied by clear guidelines specifying the role of board members. Most local board members are currently unaware of how their advice is used, if it is used at all, and how they are participating in the decision making process. Creating clear guidelines for how board and community participation is solicited and integrated into the decision making process might improve local participation. A democratically

based system also can increase board member accountability which may improve communication and create more reliable participation in management activities.

Currently boards are not empowered to oversee the organizations activities, although that is their official role at local NGOs. This is not unusual in Belizean society as most decision making is centralized and there is little room for public involvement. An active board requires efforts by both local NGOs and board members to engage in the process. If stakeholders are convinced that their advice is actually being considered and put into tangible action, it could increase willingness to engage in the process. At many of the board meetings that I attended at TASTE, the same topics were raised again and again, making it unclear to participants what exactly the organization had been doing since the last meeting (Personal Observation). Government officials have also complained the local people are “complacent” (Personal Communication, J. Azueta, 2005). Complacency may be a symptom of concerns not effectively being integrated into the decision making process.

With the development of clear guidelines, it will become critical to ensure that board members are accountable to their constituency. One possible mechanism to attain a greater diversity of local participation and more effective representation might be to offer incentives. TIDE has often paid for participation in consultations, something which has raised concerns about stakeholder motivations, but has succeeded in engaging local people (Personal Communication, J. Nightingale, 2005). It is not uncommon in Belize for board members to be reimbursed for time and travel, or even given a small stipend for attending meetings. In fact, most community consultations involve some sort of food and drink as a means of reimbursing participants for their time and input. In addition, compensation implies that there are expectations of board members.

Even if existing boards and advisory committees are reformed to include a more diverse range of interests, local NGOs and government will still need to work to improve communication with local stakeholders. This includes greater honesty and transparency about financial dealings and consistent contact with community members through community consultations, newsletters,

radio and one-on-one interactions. Community consultations can be effective if care is taken to plan appropriately to reach and include the maximum number of participants. All NGOs release some kind of newsletter to inform local people about their activities. TIDE has developed a weekly radio show as one mechanism to inform local people about activities and events. The most effective communications are carried out by one-on-one interactions between local people and managers. Administrators need to be available for dialogue. Unfortunately, these types of interactions are rare given the bureaucracy surrounding protected areas management.

Co-management offers local people the opportunity to make decisions about how resources are used. It also gives local people the opportunity to integrate traditional management structures and to work with the government to improve resource management. This method of management is often much more complicated than traditional top down management, but it can improve management effectiveness. Co-management requires participation by both the local people and co-management partners in the decision making process. Delegated co-management has used Belizean NGOs participation as representatives of community interests and has allowed NGOs to drive the decision making process, this gives communities limited control as to how management activities are actually carried out. While Belizean NGOs speak highly of their community relations, actual local participation leaves much to be desired. Greater community involvement requires that that local people are aware of their role within the organization. It also requires that NGOs consider how and from whom community perceptions are collected. While this is a complicated process, without more inclusive and effective systems for communication between local communities, organizations and government agencies, it is easy for locals to be forgotten and local NGOs to surrender to outside national and international influence.

Secure Financial Sustainability

One of the greatest threats to effective management of marine reserves is finances. The current status of the GOB has made it necessary for NGOs to look for money outside government

channels to fund management activities. For the Fisheries Department the potential dollars brought in by co-managers was a main motivation for giving up control in co-management agreements. There are no easy answers to the financial difficulties currently being faced by protected area managers across the country.

In 2003 the Coastal Zone Management Authority and Institute documented a possible financing system that would support the management of the coastal zone, including the MPA system. The strategy proposed using a variety of different fees depending on visitor activities and also included government subvention, donations, merchandizing and grants (Coastal Zone Management Authority and Institute, 2003a). It was estimated that if the strategy was instituted it would boost monies available for management of the system, perhaps providing for the majority of money need for effective management of the coastal system (Coastal Zone Management Authority and Institute, 2003a).

This strategy was generated after comprehensive discussions with a wide range of stakeholders. In fact, mechanisms for coastal zone management's financial sustainability have been extremely well analyzed over the five-year duration of the CZMAI project. Of the proposed financial mechanisms discussed in the CZMAI strategy, only MPA entrance fees have been implemented. The controversy surrounding the implementation of entrance fees illustrates the necessity for clarity, cross-sectoral support, and careful planning and implementation for any sustainability measures. In addition, revenue from entrance fees alone will likely not be sufficient for comprehensive management needs. The strategy itself notes that failure to implement the entire suite of recommendations will severely limit potential funds (Coastal Zone Management Authority and Institute, 2003a). The GOB needs to continue to work with all stakeholders to implement the recommendations generated by the CZMAI.

In addition to the development of reliable funding mechanisms, proper money management will be of utmost importance for effective management of marine resources. Hol Chan has provided a good model for how monies can be collected and used to secure

management. Again, the CZMAI financing strategy proposes a Barrier Reef Trust fund based on the model of Hol Chan and the Protected Areas Conservation Trust, for dispersal of funds and money management. By carefully selecting members and clearly outlining the ways that money can be spent, trust funds can ensure that money gets where it is intended. When the plan for MPA fee collection was first broached with local NGOs the biggest concern was how fees would be distributed and managed. The creation of a trust fund that is administered by a board that is as politically neutral as possible would help to ensure financial accountability.

The transparent management of funds is key to an effective MPA system. Government, NGOs and local stakeholders need to understand how the financial system functions and how monies are disbursed in order for them to support fee collection and other programs, a point illustrated by the boycotts of Goff's Caye when CZMAI first started to collect fees. Financial management is also important at the local level. When local people see NGOs receiving huge grants but lack the understanding as to how money is being spent, it can lead to speculation and rumor about how moneys are being used. Although NGOs have been well trained by outside agencies such as MBRS and USAID and now have sound accounting systems, greater financial transparency can go a long way towards alleviating some of these tensions. Current law requires that all registered non-governmental organizations in Belize present audited financial documents to the government, however few follow these rules. Although most NGOs do use local accountants, requiring independent external audits might be one way to ensure money is being spent in an appropriate fashion.

Although co-management organizations have been successful in securing substantial investments from a variety of national and international sources, funding is always a challenge. The outside sources which Belizean NGOs have depend upon in the past are unreliable and often have different priorities and conceptions of need than the local organizations. Local NGOs need to be clear to funders what their needs are and work with donors to find ways to secure funding for those needs. Although international funding will likely continue to be an important source for

specific project funding, relying on donors for all costs seems an unrealistic option. NGOs are as dependent as the government on implementing fees and identifying new ways to secure management costs.

The Government of Belize has made the first steps towards effective management of its marine resources by establishing an extensive MPA network. This network is only as valuable as government's ability to secure funding to enforce regulations and manage the system. Co-management has provided a way for some of the financial constraints to be met; however, co-managers can not be expected to bear the entire burden. CZMAI has worked to develop a comprehensive system for the financial sustainability, only a portion of which has been implemented. Immediate implementation of the entire CZMAI strategy would be an important step towards financial sustainability and improved management of the MPA system. In addition, government needs to tackle the tough issues of how funds will be disbursed in a clear and transparent manner. If implemented and managed properly this strategy could help to secure benefits for government, co-managers and local people.

Clarify Roles and Responsibilities

As empowering local communities is key to co-management, the relationship between government and local NGOs is crucial. Genuine communication that incorporates the opinions of co-management partners is critical to the success of management. The practice of co-management in Belize is currently clouded by issues of power and control. These conflicts inhibit meaningful discussions about policy, management, and enforcement. The CZMAI attempted to bridge these issues with limited success. Issues of power and control are difficult to solve and will require creative thinking by a diverse range of parties.

The lack of sustainable financing mechanisms is one of the main reasons that conflicts between co-managers over power and control have become so pronounced in recent years. The establishment of a transparent financing system would have a direct impact on how the co-

management relationship is carried out. In most cases the current system gives maximum authority to whichever partner is able to finance activities. Delegated management has pushed government authorities out of the decision making process; while collaborative partners like TASTE, who have not been able to provide extensive funds for management are not meeting government need (Personal Communication, J. Azueta, 2005). If operating costs can be predictably met through sustainable financing mechanisms, one of the main drivers of the conflict will be reduced and the focus of co-managers can return to effective management.

The predominant use of delegated co-management has had implications across the system, and in some ways weakened community and government involvement. The creation of powerful local NGOs has positively affected conservation efforts through reserve designation, fundraising, and improved management and enforcement. But delegated co-management organizations are autonomous and largely unaccountable, which has alienated stakeholders (especially local poor) from the decision making process. There has also been reluctance on the part of government, specifically the Fisheries Department, to share power. Both parties are aware of these issues, but seem unwilling to make sacrifices in authority to transform the process. If co-managers are able to discuss openly the benefits and pitfalls of co-management relationships it might be possible to develop more effective ways to balance issues of power and control.

For co-management to really be successful both government and co-managers will have to evaluate their relationships and likely give up some of their control. The history of Hol Chan and its centralized authority have made more collaborative models difficult to implement. The repercussions of these decisions need to be evaluated. The Fisheries Department needs to evaluate co-management on a national and case-by-case basis, allowing partners to evaluate and plan policies and relationships. Accordingly, many people have suggested that it might be beneficial for the Fisheries Department to take on the monitoring of management effectiveness and integrity across the MPA system, while co-managers are responsible for more day-to-day control of reserves (Personal Communication, J. Gibson, 2005). The National Protected Areas

Strategy Plan (NPASP) offers a number of suggestions about how co-management agreements and relationships could be structured. Hopefully, through implementation of NPASP policy recommendations and collaboration between co-management partners the nature of co-management relationships can be clarified.

Plan and Enforce Policies

The Coastal Zone Management Authority and Institute served an important role in creating dialogue between the different agencies responsible for effective regulation of the diverse impacts on the coastal environments. Until mid-2004, CZMAI was fairly successfully connecting diverse interests, engaging in dialogue and bridging conflict between agencies. The government's decision in 2004 to incorporate the CZMAI within the Fisheries Department will only further galvanize the problems of agency authority. The dual missions of CZMAI, advisory and research, allowed the CZMAI to evaluate diverse issues surrounding conservation and development. The incorporation of the broad cross-sectoral CZMAI within the Fisheries Department will limit CZMAI's reach. In most cases the pressing threats to MPA management are political in nature. As argued in the independent evaluation of the CZMAI project, the goals of the Authority would be better met through affiliation with the Ministry of National Development or Ministry of Natural Resources which have broader scope (Hildebrand, Putney, & Vega, 2005). Movement of the CZMAI to one of these agencies would reduce the perception that these issues are strictly conservationist, which could improve consideration of the broad impacts on coastal zone management and might encourage greater participation in discussions. The recommendations and guidelines offered in the Integrated Coastal Zone Management Plan were developed with careful consideration of a wide range of stakeholder participation, representing a comprehensive attempt to balance environmental and economic concerns. This approach is vital to successful management of MPAs and natural resources.

In southern Belize and throughout Belize in general, protected areas have become almost synonymous with eco-tourism. Eco-tourism can provide economic opportunities for local people, but it requires local participation and benefits are not guaranteed. Any kind of economic development will have both positive and negative benefits which need to be balanced with input from locals, NGOs and government agencies. The 1998 Blackstone Report outlined an approach to tourism development that would focus on high-value eco-cultural tourism. Although, Belize does use these resources to draw tourists, in recent years more intensive cruise tourism has expanded rapidly bringing into question how tourism is planned and managed, as well as government's dedication to the nature-based tourism strategy.

There is a need to plan and legislate how tourism development effectively in order to minimize adverse environmental effects and maximize benefits for Belizeans. Government needs to analyze how tourism will be integrated into economic plans. If a nature-based tourism strategy is to be followed, the GOB will need to review current developments and coordinate with agencies, NGOs and local people to implement a long-term tourism strategy. If properly planned and managed tourism has the potential to positively contribute to the economy while maintaining environmental quality. Cruise tourism and nature tourism are not necessarily incompatible, but it will be important to develop strategies that balance both environmental and economic impacts. Unregulated development based on political liaisons should no longer be acceptable policy.

Once guidelines and laws are written, government will need to do its best to support and enforce laws. Sustainable financing measures and clear roles and responsibilities for co-management partners will be critical to enforcement. Many of the local co-managers have become very efficient at enforcement; government should continue to support their efforts. Government also needs to identify areas where enforcement is weak and work to fill in gaps. By empowering local partners the government has hugely expanded its capacity. However, that does not mean that GOB does not play an important role in enforcement. Laws, much like marine protected areas, are only a powerful tool if they are effectively managed and monitored.

Issues of politics have inhibited cross-sectoral cooperation, and the lack of funding for enforcement has reduced the effectiveness of existing laws. In addition, the current political structure has stifled open policy debate, discouraging civic engagement. All of these factors broadly affect Belizean society, not just the natural resources sector. The complex nature of resource management further complicates long term planning. There is a growing need for effective planning and legislative action to regulate increasing pressures on coastal and marine ecosystems.

From my research it seems clear that co-management has offered local people, Belizean NGOs and government with more effective marine resource management. FON, TIDE and TASTE have had clear successes and their experiences in MPA management offer insights into how co-management might be improved. The above recommendations suggest ways that Belize can improve the management of marine resources. Although some will be much more difficult to implement than others, it is important that all parties involved in Belizean marine resource management particularly address increasing local participation, overcoming partisan national politics and improving financial viability.

The political, economic and ecological history of Belize has created a decision making process which favors short term, political expediency at the expense of long term sustainable resource management. The current political climate also does not encourage constructive political debate and stifles attempts at compromise. As the Carnival Cruise example illustrates, there is growing imbalance between ecological and economic interests and a critical need to plan for the future. While these types of discussions will not be easy, if co-management partners continue to focus only on short term political and economic interest and fail to consider more constructive ways to work together, marine protection and conservation will suffer. The winner take all attitude has inhibited integrated management at all levels. Furthermore, co-management can not be everything to everyone at all times; compromises need to be made. By building on

mutual self interests and recognizing the shared value and importance of marine resources, local, national and international partners may be able work together to improve management.

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Appendix A: Current Ministers

Hon. Said Musa
Prime Minister, Minister of Finance, National Development and the Public Service

Hon. John Briceno
Deputy Prime Minister, Minister of Natural Resources, Local Government and the Environment. Minister of State in the Ministry of Finance

Hon. Francis Fonseca
Attorney General, and Minister of Education, Youth, Sports and Culture

Hon. Ralph Fonseca
Minister of Home Affairs and Public Utilities

Hon. Vildo Marin
Minister of Health, Labour and Defence

Hon. Godfrey Smith
Minister of Foreign Affairs, Foreign Trade and Tourism, NEMO and Information

Hon. Jose Coye
Minister of Works, Transport and Communications. Minister of State in the Ministry of Finance

Hon. Sylvia Flores
Minister of Human Development and Housing

Hon. Michael Espat
Minister of Agriculture and Fisheries

Hon. Marcial Mes
Minister without portfolio, Office of the Prime Minister

Hon. Servulo Baeza
Minister without portfolio, Office of the Deputy Prime Minister

Appendix B: Interview Questions/Topics

1. What is your connection to marine resources in Belize? What do you do?
2. Has your role changed at all in recent years? Why?
3. How have you seen the management of marine resources change over the years?
4. In your experience how does the co-management work?
5. What are the strengths and weaknesses of Belizean resource management?
6. How do you think the public, NGO's and government are working together?
7. How are stakeholders and the public's needs addressed in MPA management?
8. What is the role of the GOB in the management of marine resources?
9. How has the policies of the GOB effected the management of marine resources?
10. What are the major constraints that you see to natural resource management in Belize?
11. Have you seen or do you feel that MPA management has been effected by the political situation in Belize?
12. How has tourism impacted the protection and use of MPA's in Belize?
13. How has the economic situation effected MPA management and conservation?
14. Do you think that there are adequate policies for the management of the variety of factors that effect MPA management? i.e. tourism, development, pollution, etc.
15. How do you see the future of MPA management and conservation?