The red gold rush: the impact of governance styles on value chains and the well-being of lobster fishers in the wider Caribbean

Monnereau, I.

Citation for published version (APA):
Chapter 5: Fishing and haggling along the frontiers of Jamaica

Introduction
Jamaica’s best fishing grounds are located 80 kilometers from the mainland. A few tiny inhabited atolls, in a very extensive reef, harbor the most productive fishing grounds for lobster in Jamaica. As it is a fifteen-hour boat ride to return home through the “deep blue,” fishers live on two atolls of the Pedro Bank. Pedro Bank is a large bank of sand and coral located approximately 80 km south and southwest of Jamaica. It is relatively shallow and large which makes it extremely suitable for fishing for conch and lobsters.

Pedro Bank was once a busy and treacherous shipping passage used by seafaring Europeans in the sixteenth and seventeenth centuries; archaeologists estimate there are over 300 shipwrecks on the Bank. Originally named La Vibora (the Viper) by Spanish mariners because of its shallow reefs, the rocks and shoals are laid out in the shape of a gigantic serpent. Four keys are situated in Pedro Bank, of which two are inhabited: Northeast Cay and Middle Cay. Hundreds of fishers will live for years on these two miniature atolls without electricity, running water, or toilets. Most fishers will stay on the keys for eleven months per year, only going back to see family and friends for a short period during the hurricane season. These atolls are home to hundreds of fishers, at least 25 sex-workers and eight coast guard members. As the keys are located so far from shore, fishers living on the Pedro Bank are highly dependent on intermediaries to buy their fish and lobster, and bring water, fuel, and food. There are thousands and thousands of fishers in Jamaica who fish from the mainland as well. Even though the Pedro Bank is the most productive fishing ground of Jamaica, lobster fishing is also conducted nearer to the mainland. Along the coastline of Jamaica there are 148 landing sites where fishers land their catch. This chapter examines the well-being of both the inshore and offshore lobster fishers in Jamaica.

In Chapter 3, I have examined the governance arrangements of the lobster fishery at the national level where I concluded the governance style of Jamaica is a combination of co-governance and hierarchical governance. The government had attempted to set up a cooperative structure in the 1950s and 1960s but failed in its endeavor. Currently attempts are being undertaken by the government to involve more stakeholders in the governance of the fisheries in Jamaica. Nevertheless, market parties as well as fishers’ representatives are only slowly becoming involved in the process. This chapter explores the achievement of well-being of lobster fishers in Jamaica as a result of the governance arrangements in which fishers are embedded.

As I have discussed in Chapter 1, I depart from a three-dimensional view which distinguishes material well-being, relational well-being, and subjective well-being. These dimensions will be different across the three fishing métiers in Jamaica: small-scale trappers, small-scale divers, and industrial divers. I will cover the fishers living on the mainland and Pedro Bank separately in this chapter. The fishing grounds in Jamaica are diverse and spread widely across the country’s waters. First I will provide an overview of the different fishing grounds.
5.1 Fishing grounds

Jamaica is an archipelagic state located in the Caribbean Sea 145 km south of Cuba and 161 km west of Haiti. The country consists of a main island, several offshore keys, banks, rocks, and shoals (Morris 2010). It consists of a total of over 60 islands, cays and rocks, of which some six are continually inhabited. The total area of the mainland is 10,991 km², with a coastline that is approximately 885 km long (Kelly 2002). The exclusive economic zone (EEZ), at 274,000 km², is very large, equal to 26 times the area of the main island (Van Riel 2005). This is the result of the location of some of the small keys to the south and southwest of the mainland called Pedro, Morant, and Formigas Keys. These have historically been inhabited by Jamaicans, which enabled Jamaica to declare itself to be “an archipelagic State.” In addition to the EEZ, there is a Joint Regime Area (JRA) which represents a Maritime Zone jointly managed by the governments of Jamaica and Honduras. The Jamaican government has divided the fishing areas into four fishing zones for policy purposes (FAO 2005b):

1. The continental shelf around the main island of Jamaica, including the slope down to 200 m adjacent to it, often divided into the north coast, where the shelf is very narrow and the south coast, where the shelf is much wider;
2. All banks inside Jamaican waters down to 200 m, in particular the large Pedro Bank and Morant Bank, except the Jamaica/Columbia Joint Regime Area;
3. The remainder of the EEZ of Jamaica, consisting of waters deeper than 200 m;
4. The Jamaica/Columbia Joint Regime Area, consisting of the Alice Shoal, a fishing area that lies far away and that is managed under an agreement with Colombia.

The spiny lobster is found in the Areas 1, 2, and possibly 4, although no fishing currently occurs here. The main lobster fishing zones are thus zone 1 and 2: the shallow continental shelf on the south side, and the fishing banks (especially the Pedro, Morant, and Formigas Banks). The focus of this research will therefore be on these two areas.

The country’s fishing industry is described as small scale in nature, with most vessels between eight and eighteen meters in length. Jamaica’s capture fisheries sector includes a very small industrial fleet mostly fishing the offshore banks for conch, lobster, and fish (Auditor 2008: 11). The small-scale fishery is an open-access multi-species fishery. With the exception of the Pedro and Morant Banks, which require a special license, the general commercial fishing license authorizes small-scale fishers to fish anywhere in Jamaican maritime space for any species of fish.

The local fishing industry is a vital social and cultural activity in many coastal communities, where it is the main means of livelihood; it provides employment for over 20,000 fishers—including 14,000 registered and 6,000 unregistered ones.88 During my fieldwork, only four industrial boats were in operation. Four industrial boats only employ approximately 50 fishers. This is a very small number in comparison to the total number of approximately 20,000 fishers in Jamaica. In addition, the owner of the boats claimed the crew were Honduran rather than Jamaican. I have not included the industrial fleet in this research.

88 There are estimates, however, by Van Riel (2005) who claim that when unregistered fishers are included, the real number of fishers might be double. In their scenario the local fishing industry provides direct employment on a full-time, part-time, or seasonal basis to at least 34,000 individuals, making the industry contribution to total employment comparable with that of small farming in the agricultural sector (Van Riel 2005).
During the 1980s, about 60 percent of total lobster landings came from the Pedro Bank, but that declined to 20 percent in 1996-1997 (CRFM 2009: 6). The contribution of lobsters landed in Jamaica that come from the island shelf and the banks have not been recently quantified (CRFM 2009). The main landing parishes are seen in Figure 5.1.

![Diagram showing lobster landings in 1997 per month per parish](image)

**Fig. 5.1: Landings (metric tons) of spiny lobsters in 1997 per month per parish.**
Source: CARICOM 2000

The figure shows landings in the parishes Westmoreland, Clarendon, St. Catherine, and St. Andrew are highest. These catches relate also to small-scale fishers’ lobster catches in Pedro Bank and Morant Banks, as small-scale fishers go there for approximately eight days and bring the catch back to shore. Westmoreland, Clarendon, St. Catherine, St. Andrew, Pedro Keys, and Portland are the parishes in Jamaica where most fishers reside (see Fig. 5.2).

---

89 No more recent data could be obtained.
Figure 5.1 shows the landings of spiny lobster in 1997 per parish (comparable to a province) per month of the year by full-time and part-time fishers. The figure clearly shows the parishes of Westmoreland, Clarendon, St. Catherine, St. Andrew, and St. Thomas produce the largest number of lobsters. These are as can be expected also the parishes where most boats are registered (CFRAM/CARICOM 2000). Only few fishers are part-time fishers, in general fishers are full-time fishers. Only in St. Andrews do fishers to a larger degree engage in part-time fishing. In Jamaican in total there are 148 fishing beaches and an additional few on the Pedro Keys and Morant Keys (CFRAM/CARICOM 2000). Nearly 60 percent of the fishermen are based along the South Coast because the continental shelf is largest on this side of the island (CARICOM, 2000). According to surveys done in 1996 fishing communities in Jamaica are considered among the poorest of the island (Van Riel and Wijkstrom 2005).

### Types of fishing gear

The majority of the fishing vessels (79%) can be considered small-scale with a length not exceeding 8.9 meters; there are 3,217 of such vessels. Most boats are made of fiberglass, followed by wood, and a combination of wood and fiberglass. In addition, there are another 689 boats up to 25 meters and only seven larger than 25 meters (FAO 2005a). Although the boats used most frequently are large, open wooden boats, fishers employ a variety of fishing gear in the lobster fishing industry. These are traps (wooden and chicken wire), diving gear (scuba, hookah and free-diving), and nets. The figure below (Fig. 5.3) shows the variety of types of gear used and the percentage of the lobster catch they represent. The figure clearly shows that Antillean Z-traps and diving (free-diving followed scuba) are the main gear types employed. Wooden traps, employed by the industrial fleet, only account for a small percentage of the total landings (FAO 2007).
The Antillean “Z” is named for the shape of the trap outline and is used for catching coastal fish and lobster. The traps are built from wooden or metal frames with wire mesh (chicken wire) covering them. Two entrance funnels are shaped to allow fish and lobster easy access, while the tapered shape of the entrance makes escape difficult. These typical Jamaican fish traps consist of rectangular wood-framed boxes measuring on average 230 x 120 x 60 cm, encased in hexagonal wire mesh through which an ingress cone is fitted to allow the fish to enter but not to escape (Waltho and Biggers 2004). Traps should be constructed with 44 mm minimum mesh size; however, this is not consistently done and often 32 mm mesh size is used. This does not allow sufficient juveniles to escape the traps (Waltho and Biggers 2004).

The trap fishers using wire mesh are generally not considered to be specific lobster fishers, but multi-species fishers. Their main target is finfish, lobsters are considered valuable by-catch. On the Pedro Banks interviewees indicated they placed these traps specifically at more easily accessible bottoms covered in seagrass in order to target lobster. If placed on rocks they aim for fish. If there are plenty of lobster and the lobster season is open, fishers are more likely to target lobster. The traps are set near (but never on) the fringing reefs at depths between 20-40 m (Aiken and Kong 2000).

Diving is conducted in three ways: using scuba tanks, “hookah,” which is by means of an air tube, and “free diving” in which divers do not use any equipment. Scuba tanks are used by divers on the south coast to target lobster. In the hookah system, air is supplied to one or more divers through hoses from a compressor on a boat. Use of compressed air allows divers to spend one-and-a-half to two hours underwater. The tubes are often up to 50 meters in length, but as fishers do not always swim directly under the boat, the depths will be up to 35 meters. The tube is tied around the torso of a fisher. The conch and lobster fisheries are the major diving fisheries. In both of these fisheries, the majority of divers use compressed air to permit exploitation of areas deeper than is possible for free-divers. The divers take their catch by hand (conch), or with a stick with a metal hook or wire loop (lobster).
Lobster nets or gillnets are used by some fishers to catch lobsters. These lobster nets are similar to trammel nets. A trammel net is a larger mesh gillnet made of synthetic material set near coral reefs for coral reef fish, or in open areas targeting jacks. Lobster nets are similar to these nets but have a larger 4½-inch mesh size (4½ inch = 11 cm) set near reefs to capture lobster. The nets are made with panels of netting attached between a floating top-line and a weighted line at the bottom (i.e., a leadline).

Florida traps are used exclusively by the industrial fleet based in the fishing grounds of the Pedro and Morant Banks. These industrial vessels, ranging size from 20-35 meters, are the only ones licensed to fish with wooden traps, known as Florida traps. The vessels are steel-hulled, usually 20 x 5.7 x 3 m and have an inboard engine up to 500 hp. Crew size ranges from eight to twelve. The vessels fish with approximately 1000 traps. Average immersion time is around three days. Fishers might spend up to three months at sea before returning to the mainland. Smaller quantities of lobster are carried to the mainland by other vessels going that way.

5.2 Material well-being

The main lobster fishing areas are thus on the south coast of Jamaica and on the Pedro Bank. The main villages of concern to lobster fishing are Whitehouse, Old Harbour Bay, Port Royal, Rocky Point on the mainland, and the Pedro and Morant Keys. For this research I have focused on the lobster fishers in Whitehouse on the southwest coast, and on the Middle Key on Pedro Bank.

Map 5.1: Major fishing banks and lobster fishing towns in Jamaica.
Source: UvA kaartenmakers

Pedro Bank

The Pedro Bank is one of the largest offshore banks in the Caribbean Basin (Espeut 2006). The total area of the bank measures 8,040 km². Approximately 2,400 km² are less than 20 m deep, with just over 3,000 km² up to 40 m deep.¹⁰ Large concentrations of lobsters are

¹⁰ http://en.wikipedia.org/wiki/Pedro_Bank#cite_note-NZ-0
found on the Pedro Bank, which accounts for about 60 percent of the total lobster landings (Venema 2004: 18).

Prior to the 1950s and the widespread introduction of outboard engines, fishing on the Bank was limited. In 1944, several fishers were encouraged by the Fisheries Officer to live and establish a fishing camp on the cays: “Establish a large ice box there for the storage of fish, and use his vessel to carry ice and supplies to the Cayes and bring back the fish caught.” Finding suitable fishers was difficult, however, as few fishers were prepared to undertake the hardship, long absence from home, and the long journey to get to the banks (which often had to be made by sail, as engines were still difficult to find). The scheme was abandoned in 1945 (Thompson 1945 in Espeut 2006: 18). In the 1950s 50-70 fishers lived on the cays who sporadically visited the mainland and dependent on traders to buy their fish, bring them food and water from Kingston. The traders were critiqued by the Commission of Enquiry on Beaches and Foreshore Lands for the lack of responsibility shown towards the fishers. As a response to the growing use of the cays, in 1956 a navigational beacon was erected by the Harbour Master of Jamaica (Espeut 2006).

By 1959, a total of a 100 fishers lived on the Pedro Bank cays. Despite the hardships on the cays in those days—even worse than today—fishers were able to make approximately one and a half times the income from fishing that they would be able to make on the mainland (Espeut 2006). It was generally believed to be very productive, with fishers making a lot of money on the cays. Currently it is estimated that between 300-400 fishers live there, although Espeut concludes that in the years prior to his investigation in 2004-2005 up to a thousand fishers inhabited the cays. Aiken and Kong write in 2000 that a thousand fishers and 200 boats were registered with the Fisheries Division for fishing on the Pedro and Morant Banks.

Fig. 5.4a: Middle Key, Pedro Bank (left).
Fig. 5.4b: Middle Key, Pedro Bank (right).

Four keys are situated in Pedro Bank, of which two are inhabited: Northeast Cay (locally known as Top Key), and Middle Cay (locally known as Middle Key). Despite the decades of inhabitation in the keys, living conditions are marginal at best. There are insufficient operational sanitary facilities, no piped water supplies, no electricity, and no social services. Southwest Cay was designated a bird sanctuary in the 1970s, while Top Key and Middle Key continue to be used by the fishers.

The Jamaica Defence Force also operates a security post on Middle Cay. The soldiers patrol the community, but specific activities depend on the Chief of Duty for that week (TNC 2012: 6). Each morning, one soldier in full regalia raises the flag. In the afternoon the soldiers
patrol, relax, or play games. In the evening the soldiers will patrol as well, and when accidents or violent conflicts occur people will approach the defense unit for help.

Middle Key is the more densely populated island of the two islands, with 212 houses and seventeen shops which are all concentrated on the north side of the island. At the center of the key there is a small depression containing a small amount of water (Espeut 2006). On Top Key there are approximately 125 houses and eight shops. Permanent standing structures are not allowed to be built by the government on either of the islands, so structures usually have a sandy floor, wooden walls, and corrugated iron roofing. Some structures are completely built from corrugated iron, such as some storage rooms. However, on a few occasions more sturdy materials such as cement blocks and steel are used.

As no standing structures are allowed, a collection of rugged shacks is scattered across the island. Nearly 60 years after the first people first settled on the islands, there is still no
running water, no electricity, and no toilets. A section of the beach is designated as toilet and when you take the boat out you see people squatting on the beach. Even though there is one toilet located here as well (with a runoff pipe into the sea) it doesn’t function.

Fishers live on the keys for many years on end. Most fishers (36.8%) have lived on the Pedro Cay between 11-20 years, whereas nearly one fifth indicated they had lived on Pedro Cay between 21-30 years (Espeut 2006). Fishers do not usually live on the key the entire year; most fishers indicated they live between 8-11 months on the key (Espeut 2006: 62). This is still a very long time under these rough conditions, and even though fishers told me they “loved” the life on the Pedro Keys, they also told me how it can be difficult. There are no medical services, no sanitation, and in case of storms and hurricanes very little protection is available.

Figure 5.7a shows the interior of a fisher’s hut: chicken wire, a drum of fuel, a barrel of water, and a few clothes. The picture on the right (Fig. 5.7b) shows another basic house built by a fisher. These are very basic living conditions considering that the fishers live there for decades. Fishers indicated, however, that they often have a concrete house on the mainland where their family lives. Yet they are only able to spend a few months a year on the mainland. The remaining part of the year they spend in their little tin hut on the Pedro Bank keys. The community is small, with fishers, intermediaries, and shopkeepers highly dependent on one another. This creates close friendships as well as disputes, fishers tell me. Quarrels can occur as a result of theft, or over women. The soldiers patrol and can help out to settle disputes. Some fishers share their sleeping quarters and become even closer during the years they spend together so far from their families and friends.

I watch fishers playing soccer on a small stretch of beach on Middle Key while I sit on a gasoline drum on the windy beach. I talk to some other fishers sitting around regarding their life here on the key. One fisher offers to show his hut, a small construction made of corrugated iron. It is beyond basic: a small narrow hut containing a 1.5 m high wooden bed frame. The space under his bed is filled with chicken wire to build traps, next to his bed, is a barrel of gasoline, one with drinking water, and some fishing equipment. He gets rainwater off the roof. The
run-off pipe ends indoors, as otherwise people steal the drinking water, he explains. He has only a few worn clothes that hang on the walls throughout the room. He’s been a fisher for ten years he tells me. He loves to be a fisher, the freedom. But it is a hard life he tells me. “You miss your family, your kids. I live here all alone and in the night I stare at the stars. Yet this is where the fish are and I can’t complain,” he says. He likes to go out drinking sometimes and asks whether I can find him a girlfriend in my country as he writes down his phone number. Middle Key, despite being located in the middle of the ocean, has some extraordinary nightlife. While during the day the little tin huts in the blasting sun don’t raise many expectations, during the night the little streets transform completely. There are many shops that also serve as bars, there are DJs, and men and women dance and drink for hours. The generator necessary for the party is noisy well into the night. Besides drinks, the shops also sell little bags of weed hanging freely among the other products for sale. Women offer their services, and the little packed sand streets, so deserted during the day, turn into lively dancing stretches in the night.

Fig. 5.8: Rainwater collection device, with water running inside to protect the rainwater from theft.  
Source: Author

| **Fig. 5.8: Rainwater collection device, with water running inside to protect the rainwater from theft.**  
Source: Author |
|---------------------------------------------------------------|

The majority of fishers are trap fishers (83%), hand-line fishers another make up another eleven percent (11%), while the remaining number of fishers are mostly divers (scuba, hookah or free-divers) (Espeut 2006). Only hand-line fishers do not fish for lobster. Hookah divers use scuba regulators attached to a long air hose connected to an air compressor on board the fishing boat. One or two divers can be attached by tube to the air compressor. Divers interviewed stated they can stay down for two to three hours. Sometimes they wear rugged wetsuits (see Fig. 5.9 below), but they have often had little training with regards to diving safety. According to The Nature Conservancy (TNC), an environmental NGO, hookah diving is much more efficient than free diving (i.e., breath-holding, as practiced in e.g., Belize), and has been replacing free diving since it was introduced to Jamaica by Hondurans in the late 1980s and early 1990s.91 Divers work during the day as well as in the night, depending on the preference of the fisher. During my visit in 2007 I saw many fishers leave at the end of the afternoon, yet in 2012 this was made illegal throughout Jamaica.92 Some fishers indicated they dive as deep as 120 feet (36.6 meters). Decompression sickness (DCS), also known as the bends, is considered a problem on the keys (Espeut 2006). Bringing them to the decompression chamber in Discovery Bay is a challenge as well as a costly event.

91 [http://www.sciencewithoutborders.org/the-other-end-of-the-bank/#more-1615](http://www.sciencewithoutborders.org/the-other-end-of-the-bank/#more-1615)
92 Ibid.
Fishers get up early in the morning to go fishing in the fishing areas. Although divers can thus fish both during the day and night, trap fishers only fish during the day. Yet interviewees indicated they are day fishers, as well fishers for longer periods (approx. 4-5 days). On average, trap fishers use 63 traps (Espuet 2006). Interviewees indicated they usually empty the traps every two to four days. This means they have a lot of idle time while their traps are soaking. Fishers play dominos, games of soccer, cook fish on little grills, or simply hang out on the beach (see Figs. 5.10a and 5.10b).

Putty is a boat owner from Treasure Beach. He’s sitting on a few fuel drums right at the beach waiting for his boats to come in. He has been living on the keys for seventeen years. He used to be a fisher, but he now he owns two boats and doesn’t go out anymore. One boat has 55 traps, the other 76. He likes Middle Key because it’s peaceful. “You know everyone,” he says. Top Key is quieter, Middle Key has all the bars. He likes the fact it is a lively island, but sometimes it’s too much he says. When he first got here there were hardly any women. Now you fall over them on the streets he says. And “the fisherman them like to drink plenty an them cause trouble.”

Fig. 5.9: Diver just returning from sea after a hard day’s work.
Source: Author

Fig. 5.10a: Playing dominos on Middle Key (left).
Fig. 5.10b: Playing soccer on Middle Key (right).
Source: Author
Trap fishers have more time on their hands than divers (as they go out every day). Traps are set between 80 and 110 feet (24-34 meter). Divers are active up to depths of 13 to 30 meters (Espeut 2006).

Fishers share these frontier keys with 400 other fishers, eight coast guard members, and 25-50 sex-workers. The large revenues generated by fishers from their fish and lobster catch on the banks has attracted the sex-workers to the island. No wives or children are allowed to live on the keys, as everyone needs a fishing license. As a consequence, even the sex-workers often hold a fishing license, which might even state a gear restriction. Despite the fact they are located so far from shore and lack even the most basic infrastructure, there is no shortage of nightlife on the keys. No one under fifteen years of age is allowed to be on the Cays. In fact, no one without a special permit from the Fisheries Division is allowed to be on the Cays, and the minimum age for obtaining a fishing license under the Fishing Industry Act is fifteen. Most residents are young, with the majority between 30-40 years of age (Espeut 2006). The survey by Espeut revealed the youngest person was seventeen and the oldest 84. Most homes only have one resident (66%), while remaining houses have two to three people living in them. In approximately 34 percent of these cases this was a man with his girlfriend. Some men live together with sex-workers. Some women are fish traders, shopkeepers, or a bartender or hairdresser. Most likely these women combine several jobs.

On an early morning after the fishers had left to go fishing, I got involved in a conversation with a few fishers, intermediaries, and sex-workers. They stated living conditions were rough for women on the keys. There are no toilets, and no running water or electricity. It’s dangerous for women to go outside to go to the bathroom in the night they claimed. Payment for sex differed according to their “arrival” on the island. When they first arrive the women receive a higher price for sex. “If you are fresh and just come in from the land you get 40 dollars [USD].” After a week or two this will drop down to approximately seventeen. However, the women explained to me, “If you are a regular customer, it’s only nine dollars.” The men told me that intermediaries bringing fresh water could sometimes “get it” for only five gallons of water. This is also the reason many intermediaries bring extra water, the fishers
explained. The women indicated they also did laundry for the men, or cook on the side, in order to make some money. The women lived for a shorter period on the island than men did. Most women, nearly 60 percent, lived on the island between two and five years, nearly 24 percent less than one year (Espuet 2006).

Natasha has been coming to the keys for the past dozen years. She’s introduced to me by one of the fisheries officers with whom I came to the island. They are good friends apparently, and have known each other for eight years. The Fisheries Division had actually helped me to get to the Pedro Keys by offering their boat, services, and staff. The only advice the fisheries officer gave me before he ran off was: “Don’t write anything down in front of them, it makes them nervous.” So I didn’t. Natasha is from St. Andrews and comes to the key every few months. She has three children on the mainland by two fathers. They don’t provide any care for them so she’s been doing this for years. It makes good money in a few months, she tells me, and she was able to send her kids to a decent school. She initially had come along with her boyfriend, but they had split up long ago and she began in the business on the island soon after she broke up with him. A lot more money can be made here than on the mainland. She’s got some investments in traps, and she cooks and does laundry as well for some to the men. She lives on the key with a new boyfriend. He doesn’t particularly like her job, but he has to accept it because that is how she makes a living. It’s safer for her to live with him, she explains. It’s not a dangerous place but a “girl has to protect herself.” She likes living on Middle Key as it’s like living in a small village.

Espeut has estimated fishers make an annual gross income on the cays of USD 3,417-12,074 per fisher. The Fisheries Division is convinced that the real income can be much higher. Even though the fishery is declining, fishers on the Pedro Cays are still earning more than they could at a minimum-wage job on the mainland (USD 2,632 per year) (Espuet 2006). This helps explain why fishers choose to live a large part of their life under these basic conditions far away from their families. Despite the high earnings, they also face serious safety risks. On Pedro Bank, both fishers and intermediaries run high safety risks. They need to cross the great distance to the Jamaican mainland frequently, often in the night. On the keys most fishers also leave on average for three-day fishing trips, followed by fishing trips taking two days, one day, and four days respectively. These fishers, mostly without life jackets or radio, face high safety risks. In addition, when hurricanes hit, or other bad weather occurs, there is no way to get in touch with these fishers.

Whitehouse

Whitehouse is a small fishing village located on the coast of Westmoreland. The village has a strong history in fishing, and fishing at present is still a major contributor to the local economy. There are two fishing beaches: Top Beach and Bottom Beach. The fishers use large wooden boats with outboard engines. In Whitehouse there are two main groups of fishers: day fishers who have slightly smaller boats, and fishers who leave for approximately six days at a time and fish around Pedro Bank. The day fishers leave early in the morning (between 4-5 AM) and return in the afternoon around two.
“It’s all up here,” he says, and taps his forehead. He knows the location of the trap, but the precise location is marked by a long pole sticking out from the water. Some pieces of cloth attached to it mark it as Gilly’s, and a few empty plastic bottles keep the pole straight and afloat. To protect their hands during the heavy lifting, the fishers have cut out protective gloves made from the inner lining of car tires. The trap is emptied and some fish, a crab, and a lobster are retrieved. The small juvenile fish are clubbed to death and serve as bait in the trap. We keep the trap on board once empty, and set it again at a ten-minute boat-ride distance.

The traps we pull this morning are not all owned by captain Gilly. His brother and crew also have their own traps. We empty these as well this morning. Everybody knows exactly which are which, and each man has a bucket where his catch is thrown into. Gilly explains that if his brother’s catch is very low he will give him something, otherwise he doesn’t have to pay him, as his payment is in the fuel and boat. Upon our return, the fishers sell their catch to different buyers. They sell the lobster to female buyers on the beach and at the fish market, but not all to the same one. Each fisher has his own trading connections and might sell different types of fish and lobster to different traders.

The day fishers set their traps in the vicinity of the village. Some day fishers also operate without a boat and free-dive close to shore. Every evening you can see many snorkelers speargun fishing in the vicinity of the village. Yet most of the fishers from Whitehouse fish at Pedro Bank. Of the 21 fishers interviewed in Whitehouse, only two fished inshore, the other nineteen at Pedro Bank. Most of these fishers are trap fishers (15), whereas six fishers are divers (one using scuba gear, one free-diving, while the remaining divers use hookah). Excluding the day fishers, fishers on average make trips of for approximately five to six days. These fishers do not actually visit the atolls of the Pedro Bank (see previous section) but fish on the bank itself.
These fishers have to prepare for an entire day before they set off to Pedro Bank. The long trip to the distant fishing grounds requires large barrels of fuel, drinking water, food supplies, and blocks of ice. In the middle of the boat there is a large square wooden structure to hold the ice, and later also fish and lobster. After it is filled, it is closed off with a thick plastic cover to keep the sun from heating it. The fishers going to Pedro Bank are either trap fishers or divers. Out of the 21 fishers interviewed, thirteen respondents said lobster was their most valuable catch, followed by fish (7), and conch (1).

Unfortunately, I was not able to go with any of the fishers out to sea for safety reasons so have not been able to witness these types of fishing trip. Fishers indicated in the surveys and interviews it takes them 10-21 hours to get to the fishing grounds. They own 25-40 traps, which are located on the Pedro Bank. They do not always fish in the same area, but move their traps within a certain area which they frequent.

When fishers arrive after a few days fishing, they usually do so in the night, or early in the morning. Fishers call their intermediaries from sea once inshore, in order to have the intermediaries meet them at the beach straightaway. The lobsters are too valuable to leave on the boat during the night. The intermediaries will come at whatever hour and pick up the lobster; the fishers won’t be paid until daylight, however, as they otherwise run the risk of being robbed, they told me. The finfish, on the other hand, are sold in the morning at the landing beach to the numerous vendors (often women) that are around.

93 My contacts at the Fisheries Division strongly advised me not to engage in these sorts of fishing expeditions for safety reasons. The journey to the fishing grounds is long and dangerous (10-20 hours), and conditions difficult and dangerous for the entire fishing trip. Fishers usually do not bring life jackets, and do not have any way to communicate in case of problems and storms. As I was able to visit the Pedro Bank with the Fisheries Division and was taken aback by the large waves we experienced crossing “the big blue,” I felt I should follow their advice.
Every morning, the beach is full with tens of people shouting and moving around the small beach trying to sell and buy the fish. Others are trying to sell coffee, breakfast, such as “ackee and saltfish,” or marihuana. Other fishers are just hanging around, grilling fish on the beach, or drinking and discussing politics. The fish is placed on large pieces of cloth—all finfish are spread out across an area of approximately three by three meters.

Fishers stated they earn on average USD 412 per month from the lobster fishery. In addition, money is made from fish, and the total income according to the fishers in the survey is close to USD 600 per month. This is an average of USD 7,200 per year, and significantly higher than average minimum-wage job on the mainland, which makes USD 2,632 per year (Espuet 2006). Fishers indicated they made more money than teachers in the area. Out of the 21 fishers in Whitehouse and surroundings, ten claimed they had additional income from activities such as barbering, farming, and working as taxi driver.

Fishers mostly have to invest in fixed costs for the boat and traps. In addition, they need to pay for fuel and ice. Investment for trap are high, as the traps costs between USD 35 and 60 to make (wire, nails, poles, man-hours etc.), depending on size and material. The average number of traps that the interviewees had was 34 traps. In the case of USD 35 in value each, the total investment comes to USD 1,190; if it were USD 60 per trap, to USD 2,040 in total. In two cases fishers stated their wives had invested in their traps, in one case the fisher’s sister had invested in the traps.

More than half of the interviewees stated they owed money, mostly to their intermediaries or to the boat owners. Payment of trap fishers depends on the style of ownership of the boat. If the captain is boat owner, he will give a share to the crew, although sometimes crew will have their own traps, which will be regarded as payment. A captain might, for instance, own approximately 20 traps and all the crew owns their own traps.

94 The role of wives, sisters, and female fish buyers in trap investments is very interesting, but proved beyond the scope of this research. It would provide an interesting topic for further research.
other cases fishers own either only a few and the captain owns the majority, or the captain owns all traps. One fisher explained:

I am the captain [of a trapping vessel] but not the owner. I own my own pots [fish/lobster traps]. The boat I work on works with 290 traps, the owner owns 96 traps, I own 34. All crew members have their own too, roughly 20 traps. There are seven crew total, so in total we have 300 and leave for three days [two nights] every week.95

Divers indicated in interviews they are usually not boat owners. In case of a boat owner who is not a captain, the diver’s profits are split between the three. One fisher stated he had to pay 60 percent to the boat owner. The fishers that fish at the bank will be paid immediately for the lobster, whereas the payment for fish will come after it has been sold on the beach in the morning. Fishers mostly sell to different vendors, but nine fishers stated they usually sell to the same intermediaries, ad had been doing so for over six years, on average.

With regards to safety, Jamaican fishers have a poor record. Even though the Pedro Bank is located further than any fishing ground of Belize or Nicaragua, fishers in Jamaica rarely carry a radio on board or life jackets. Interviewees indicated they might carry a few life jackets, but seldom actually wore them. Many small boats are lost at sea, due to a lack of navigation, emergency, and safety equipment (FAO 2007). Small boats seldom carry radar reflectors or compulsory flares, which makes detection difficult.

One fisher said: “We bring no radio and no life jackets but we have no accidents. You have to watch the weather carefully.” Another fisher indicated they do have accidents, but it would be of no use bringing life jackets, as they were not convinced the coast guard would come and search for them. “Fishing is about life and death, when something happen they coast guard is not gonna come out and look for you. Better to die one time.”96

Fishers in Whitehouse fishing inshore are safer due to the smaller distance and being able to return easily if the weather deteriorates. Fishers from Whitehouse fishing on the Pedro Bank run more risk, as they have to cross the long distance in heavy seas, and are not able to come back as easily if the weather turns bad. In addition, they cannot communicate if something happens while out at sea.

Fig. 5.15: Boat called “Satisfaction” on Middle Key
Source: Author

95 Interview E14: 05/03/2008
96 Interview E13: 04/03/2008
5.3 Relational well-being

Jamaican fishers sell their catch in a number of ways via different fish traders and intermediaries. There are a large number of people employed by the spin-offs of the fishing industry, such as in gear making and repair, engine repairs, boat building, fish processing, and in the fish trade as vendors (CFRAM/CARICOM 2000). Fishers hardly ever sell their lobster directly to the processing plant; it always goes through the hands of at least one middleman. Fish is often sold several times before it reaches the consumer.

In Whitehouse, the local fish market is located in the fishing complex. The Whitehouse Fishing Complex (WHC) in Westmoreland was constructed through a partnership Grant Aid Project between the governments of Japan and Jamaica. The WHC was supposed to be equipped with fish handling and sorting facilities, gear lockers, and an area designated for boat repairs. It was designed to facilitate effective and efficient fishing operations and marketing, and it was envisaged that fishers and fish vendors would participate in making the WHC self-sustaining after its completion. The facilities were completed in 1999 at a cost of USD 6.5 million, and are owned and operated by the Fisheries Division (Audit 2008).

Nevertheless, there are no proper fish handling and sorting facilities, gear lockers, or boat repair area. Instead, the female fish traders usually have a metal-framed icebox which they themselves own, and which can be closed with a padlock. The facility provides electricity—but not always—and the quality of fish storage is still relatively low, given the initial investments made. The fish stored are not properly cooled, and the electricity often fails, causing the quality of the fish to deteriorate. I witnessed many fish sitting in a puddle of melted ice in the “coolers.” Yet many customers drive for hours in order to buy the fish from Whitehouse.

Fishers sell lobster to small traders or intermediaries. In the case of lobster, most fishers indicated they work with intermediaries for a longer period of time. The surveys with fishers in Whitehouse revealed the average number of years fishers worked with the same vendors was over seven years.

![Fig. 5.16a: Typical catch by small-scale inshore Whitehouse fisher—lobster, and some finfish (left).](image-url)
These are not necessarily intermediaries in the sense they provide credit for supplies or fuel, these can also be smaller traders that do no supply credit up front. Fishers often have a longer-term relationship with the intermediaries, who supply the fishers with credit to buy food supplies, fuel, and ice. One fishers said he sold his lobster to “a friend so he can make a little money too.” One fisher was more practical and said regarding his middleman: “I owe him 25,000 dollars 97 for the traps, so I need to pay him back.”

Although fish is often sold to the female traders98 who work from the fish market in Whitehouse, lobster is mostly sold to male intermediaries. They often have scarcely any trading facilities or stock freezers at home full with lobster. These intermediaries have lasting relationships with the fishers, and often also provide fishers credit and advances. Fishers are therefore “tied” to selling to these particular intermediaries. A number of intermediaries also indicated in interviews they actually own the boats the fishers go out in. The intermediaries sell the lobster either to the hospitality industry or to small processors. The intermediaries will stock up the lobster and sell it to their contacts in the hospitality industry every few weeks or months, depending on the season. These small processors export the lobster to the United States. These relationships between fishers and intermediaries are long-lasting and clearly defined. A boat works for a particular middleman. The middleman helps the boat with credit and getting supplies before the start of the fishing trip.

97 The fisher means Jamaican dollars and at the time of the interview (summer 2009) this equaled approximately USD 350.
98 Women contribute greatly to the post-harvest sector in Jamaica, in line with other areas in the world. The great contribution of women to the fisheries sector has long been recognized by researchers and the development community (Williams et al. 2002; Mills et al. 2011). Yet I have observed that particularly in the case of lobster it is mostly men that buy up the lobster. Nevertheless, I do not have precise data on this subject and this would need further research.
Although all fishers in Whitehouse sell to intermediaries, fishers on Pedro Cay depend on their intermediaries to an even greater extent. Fishers on the Pedro Keys cannot leave the area, and depend on the intermediaries for food supplies, fuel, sales, and ice. The intermediaries can be in “packer” boats (larger covered boats with inboard engines), or regular open wooden boats. The intermediaries that come to the keys can operate licensed packer boats which transport fish and lobster from the Morant and Pedro Cays to the mainland. The CFRAM/CARICOM (2000) makes the following distinction between “packer boats” and “carrier boats.” “Carrier vessels may simply carry fish purchased offshore from others, primarily inshore vessels operating from the cays, and land it on the mainland of Jamaica. These are ‘packer’ boats. Others both fish for themselves and carry for the others and are called ‘carrier’ boats. In either case, these are larger vessels (>10 m) than either inshore type and are equipped with inboard or outboard engines. These are limited to the reef fish fisheries.” The licensed packer boats are commonly contracted (owned) by processing plants to whom the catch is sold exclusively. In 2006, ten industrial vessels were licensed to fish with Florida traps on the Pedro Bank. These vessels are contracted by four companies. In 2009 only four industrial vessels were licensed to fish for lobster on the Pedro Bank (and in entire Jamaica as well).

Fishers on the Pedro Bank also work with a third category: intermediaries that arrive in the regular small-scale wooden boats which have a large ice hold. These intermediaries stay on the Pedro banks for eight to ten days (they wait until the freezer is full and the ice has not yet melted). Both types of intermediaries bring supplies, ice, and drinking water for the fishermen. Intermediaries on the keys complain it can be difficult to “tie” fishers. At times fishers might do business with another middleman to whom they are indebted. As a result, the intermediaries have to wait longer at the keys until their ice hold is full and therefore lose income. One middleman explained:
I get stressed when other packermen come and steal my fish away. Then you have to wait and lose money. Before I used to come and fill my igloo in two days at Pedro Bank. Now I mostly have to wait and stay for six or seven days.  

A fisher explained:

I usually sell to the same vendor but when you have a lot of expenses you have to take the vendor that offers the best price. You have to.

Another middleman on Pedro Bank:

I have been coming here for seventeen years and stay for five or six days and go back to land. When I am not here the fisher then sell to another buyer so fishers have different buyers they work with. We bring them ice for free because you want them to sell to you.

The relationship between middleman and fisher is thus complex. Fishers depend very much on the intermediaries, but intermediaries also can not survive without the fishers.

Fish and lobster might be sold to different vendors. Some intermediaries only buy lobster, whereas others might only buy fish. The icebox on the boat in which lobsters and fish are held is generally made of fiberglass. Lobsters are usually kept alive and intact until they reach the mainland. Lobsters are generally kept alive until they reach the mainland. Due to the handling of the product, the long time before the product is frozen, and the high temperatures, the quality of the product is low. To start with the latter: rather than using chipped ice, blocks of ice are used. This cannot fully encompass and protect the lobster. The trip to the keys takes approximately fifteen hours, and what is more, intermediaries will often stay an entire week.

99 Interview G3 22/01/2007  
100 Interview E9: 22/01/2007  
101 Interview G4: 23/01/2007
on the keys. The ice slowly melts, and as it is not chipped ice, the lobsters are soaked and not surrounded by pure ice. The temperature of the lobster (held in the same hold as other fish and conch) is therefore relatively high in the ice hold. Once on land, lobsters are either tailed and cleaned by intermediaries and transported to the processing plants, or—alternatively—tailed, cleaned, and wrapped individually in small plastic bags for the tourist industry. These bags of individually wrapped lobsters are filled with water to protect the lobster from freezer burn. The water will obviously also add weight to the lobster tail.

The small-scale catch is thus distributed by both licensed and unlicensed carrier boats to the fishing terminal in Kingston Harbour, among other places, or by the fishermen themselves, usually on Jamaica’s south coast, for instance at Whitehouse and Rocky Point (Clarendon) when landing from Pedro Bank, and at Rocky Point (St. Thomas) when landing from Morant Bank. These lobster tails are sold in individually wrapped in plastic. Another part of the lobster catch is sold to processing plants. These lobsters are processed according to international standards and packed in boxes and shipped in large container ships. The quality of the lobster for the hospitality industry is lower than the lobster designated for the international market. These products are frozen and exported, following the HACCP, EU, and US standards for quality regulation, which is controlled by the Veterinary Division. Frozen fish is imported in bulk and reprocessed locally for sale in supermarkets (FAO 2005a).

Fishers in Jamaica are thus multi-species fishers that sell their catch to different outlets. Fishers in Jamaica are not well organized in cooperatives. In 1952, the Inter-American Bank already began promoting fishing cooperatives as a way to improve production and marketing techniques. The Jamaica Social Welfare Commission began promoting fishing cooperatives among fishers on different beaches around the island. The government sold engines to fishers between 1956 and 1961 in order to encourage fishing. Government supported aid to fishers (engines, mesh wire, cheap fuel). A no-tax rule on fuel was established in 1964. Yet these cooperatives and initiatives by the government have in general been unsuccessful. In some areas fishers have formed cooperatives, but most of these have failed. Members used their cooperative more as a “shop,” and did not pursue the social benefits that can be derived from such cooperatives. Currently only a small proportion (6%) of the fishers is organized in fishing cooperatives.

In Whitehouse, the fishing cooperative has 160-170 members, of which only 90 are active members. The director of the cooperative explains that fishers are weary of cooperatives as they have had bad experiences with them.

In 1957, when we first developed the coops they were run bad and fishers lost their money. These fishers told their sons and they told their sons not to become a member. Now we have to go around and explain people why they should be a member. In times of disaster the cooperative attempts to help the fishers. Even in recent years Miss Nathalie Zenny from The Nature Conservancy attempted to set up a cooperative for fishers on the Pedro Keys. In this way fishers could collectively bargain for a better price. She

---

102 I found the Fisheries Division has very little information regarding the fish-processing sector, due to the fact this sector falls under a different ministry (FAO 2005a).

103 Interview F3: 26/10/2006
collected a small payment from many fishers but after complaints of fishers who were afraid the money would be lost, she returned it all and no cooperative was set up. This shows the mistrust fishers have of fishing cooperatives in Jamaica, as they have often have failed in the past.

As fishers are generally poorly organized, they have very little decision-making power in official affairs. In addition, fishers are poorly organized at the level of collective market bargaining, and their bargaining power is thus severely limited. Even though fishers acknowledge the fact that cooperation is crucial, they are still skeptical as so many attempts have been made and failed (Bedasse 2004). Cooperative representatives are invited by the government to attend meetings on fisheries management issues. Yet, fishers view cooperatives as belonging to the “Old Boys Club” and as not being unbiased. In addition, fishing cooperatives have a history of disappearing funds and generally fail in setting out an overall policy. However, the government does often hold consultations with the fishing cooperatives, and a representative group of Jamaican fishers has recently visited Belize to learn from their cooperative structure and fisheries governance. The influence on management of these cooperatives appears to remain in Jamaica mainly at the level of consultation. A government representative commented:

Fishers can give feedback to the government when the government visits them in their communities. The involvement of fishers is low, as they only come by once a year [to register]. It could definitely be far better and I think the fishers would want to more involved.  

Entrepreneurs with financial means, power, and connections have easier access to those in charge, given the importance of “old boys networks” in Jamaican politics in general, with the fishery sector being no exception. Jamaica’s fishing cooperatives often function more as cheap stores than as entities through which fishers engage in collective action and lobbying.

5.4 Job satisfaction of fishers

The last component of well-being relates to the subjective component. Job satisfaction surveys in Jamaica were administered at a variety of fishing beaches in and surrounding Whitehouse. The results of the job satisfaction surveys per category (see Fig. 5.20) show that the category Nature scored highest, followed by Social Needs and Basic Needs, whereas Self-Actualization and Management scored equally low. Mean values for all scores, except those for Management, fall above the mid-point of 3, indicating general satisfaction with regard to the other four categories. The result for the category Nature is rather striking, as the fishery is believed to be highly overexploited. Nevertheless, fishers are satisfied with the landing sites and level of stocks. This could be related to the fact it is a multi-species fishery, and fishers have other marine resources they can fall back on when certain catches are low.

---

104 Interview C1: 22/09/2006
Fig. 5.20: Mean values and confidence intervals for job satisfaction categories in Jamaica.

The category Social Needs is second, closely followed by Basic Needs. Social Needs relates to fishers’ satisfaction with being their own boss, and the time they have available to spend with family and friends. In fact, the question on the respondents’ satisfaction with “being their own boss” is the highest scoring item of all. This could relate to the fact fishers in the Jamaican fishery are highly autonomous in their working conditions and very satisfied with this state of affairs.

Satisfaction of fishers with the Basic Needs category could relate to the fact it is a multi-species fishery, whereby fishers are able to target conch and finfish during the closed season for lobster, with conch and lobster both being high-value products. Fishers rate their satisfaction with their ability to provide for their families very high (third highest scoring item in the survey). They are also very satisfied with their level of earnings, which could maybe also be related to the fact it is a multi-species fishery, where fishers are never without an income any time of the year; prices for conch and lobster are high at the international market. In addition, this chapter has shown fishers’ income is clearly above the average minimum-wage income on the mainland. High lobster prices in the hospitality industry aid fishers’ income.

Management nevertheless scores relatively low; fishers are clearly less satisfied with the “level of conflicts,” as well as with the “performance of government officials,” and “rules and regulations” of the fishery. This could relate to the government’s inability to enforce rules and regulations due to lack of funds. In the qualitative interviews mentioned previously, ten out of the 21 fishers interviewed were very negative about the role of the government. Fishers were not convinced the government worked in favor of the small-scale fishers. This can also be the result of previous subsidy schemes by the government. The government in the 1970s and 1980s provided discounts on fuel and imports of equipment, and provided loan schemes for boats and engines. As this ended in the course of the 1990s, fishers grew dissatisfied and are convinced the government should help them with wire for traps, engines, and so on.

The level of trust between government and fishers appears to be very low, although this might not be unique to the sector. A government official stated: “There is very little trust between fisher population and the government, but this also goes for the rest of the
Fishers were convinced “the government don’t really care about fisheries,” and added: “They are not doing enough for fishing industry.” Nevertheless, the majority of fishers in the interviews preferred not to say too much about the government unless it was in a very informal setting.

When asked in what way the government could help the fishers, the majority of fishers responded by naming very practical things, such as fish tackle, subsidies, and wire for traps. This makes sense, given the history of the government of Jamaica in supplying fishers with these items, as mentioned in the sections above. Fishers did not mention things such as better enforcement, or more regulations. Fishers are coming from a situation where their operations were subsidized for years, for example their fuel. Easy access to wire, engines, and boats have also been seen to through government loans. This system failed, as fishers did not repay their loans. There was also a time when they were compensated for loss brought upon them by natural disasters, such as hurricanes. As this has now stopped, they consider themselves wronged by the government—by their not helping them. None of them mentioned, however, any other type of help they might need. In answer to the question what group(s) should play an important role in improving fisheries management, very few listed the government first, while in fact most fishers replied with either “don’t know,” or “everyone.”

In Jamaica the job satisfaction surveys examines factors influencing willingness to change fishing type, to leave the occupation of fishing, or to advise a young person to fish. In the Jamaican sample, 62 percent said they were unsure, 23 percent said they would not, and 15 percent said they would change fishing type. A full 46 percent said they would leave fishing for another occupation, while 39 percent were unsure, and 15 percent said no. With regard to advising a young person to enter the occupation, almost all (85 percent) said yes, 11 percent said they were unsure, and only 4 percent said no. These responses indicate an ambivalence concerning the occupation, but the large percentage reporting that they would advise a young person to fish seems to imply a rather positive evaluation of fishing as an occupation. At the same time, it relates to the surveys carried out whereby ten fishers out of 21 indicated their father had not been a fisher. This indicates that many fishers entering the fishery were not necessarily brought up in a fishing family. One could argue that they are less attached to the fishing occupation than might be expected.

Conclusion

In Chapter 3, I concluded that the governance style in Jamaica can be regarded as a combination of a defective co-governance style which developed into a hierarchical governance of the state. In Jamaica, the state has attempted to create and support strong fishing cooperatives from the start of the fishery in the 1950s. The government has maintained a special focus on the small-scale fleet and few industrial boats are licensed; historically, fishers have also been supplied with subsidized fuel, mesh wire, engines, and boats. At the same time, fisheries governance cannot be actually regarded as co-governance. The interests of small-scale fishers are poorly represented in decision making, while the subsidies by means of tax exemptions and cheap fuel were curtailed in the 1990s when the government removed the subsidies and services to the fishing industry.

This chapter has examined the well-being of fishers in Jamaica. The fishing sector is mostly made up of small-scale fishers. They are multi-species fishers working in both inshore
and offshore areas. In this research I focused on fishers in Whitehouse and those on the Pedro Keys. These fishers use multiple types of gear: trap fishers and divers (scuba, hookah, and free-diving).

Some fishers from Whitehouse operate close to shore and are day fishers. The inshore fishers leaving on day trips will sell their catch to different intermediaries, mostly female traders from the Whitehouse Fish Market facility. The working conditions for these fishers is medium intensive and relatively safe. They do not work every day, and when they work they return to shore in the early afternoon. They work close to shore and if conditions are bad they can decide to not go out or return to shore.

These day fishers are in the minority though, as most fishers actually fish in the offshore areas of the Pedro Bank. These fishers work approximately five to six days at a time and are thus absent from their families a large part of the year. They do not frequent the keys of the Pedro Bank but only fish at the bank, which implies at least a ten-hour journey from Whitehouse for them. These are dangerous trips, while fishers take very few safety precautions. Working conditions are difficult, as fishers live on small boats for five to six days at a time, in the middle of the ocean with very little protection.

Fishers on the Pedro Bank often live separated from their family for years. Living conditions on the Pedro Keys are very basic. Fishers live in very small, corrugated iron dwellings, with no running water, electricity, or toilets. They are either day fishers or fish in other areas of the bank for three or four days. As fishers are so far from the mainland, they strongly depend on the intermediaries for food supplies, water, fuel, and ice. Relationships between intermediaries and fishers are thus very important to both. Fishers on the keys are able to make a large profit from the fishery. Even though they will live in a basic dwelling all year round, their wife and children might live in a very nice and large concrete house on the mainland. Safety is low and fishing highly dangerous. Fishers usually do not carry life jackets or radio equipment. Fishing in these areas at 10-20 hours from the mainland is extremely dangerous. Remuneration of fishers is high in comparison to the average minimum wage on the mainland.

<table>
<thead>
<tr>
<th>Jamaica</th>
<th>Whitehouse</th>
<th>Pedro Bank</th>
</tr>
</thead>
<tbody>
<tr>
<td>Remuneration of fishers</td>
<td>Medium</td>
<td>Medium</td>
</tr>
<tr>
<td>Single-/multiple species fishery</td>
<td>Multi-species</td>
<td>Multi-species</td>
</tr>
<tr>
<td>Economic alternatives</td>
<td>Yes (tourism)</td>
<td>No</td>
</tr>
<tr>
<td>Capital investment requirements</td>
<td>Trap investment high; skiffs high</td>
<td>Gear diving low investment; traps high; boats high</td>
</tr>
<tr>
<td>Safety conditions</td>
<td>Inshore fishers high; offshore fishers low</td>
<td>Low</td>
</tr>
<tr>
<td>Trade relations</td>
<td>High use of intermediaries: medium dependency</td>
<td>High use of intermediaries: high dependency</td>
</tr>
<tr>
<td>Participation in decision making</td>
<td>Low</td>
<td>Low</td>
</tr>
<tr>
<td>Job Satisfaction</td>
<td>High (above mid average)</td>
<td>High (above mid average)</td>
</tr>
</tbody>
</table>

Table 5.1: Well-being of fishers in Jamaica.
Fishers indicated they have long-term relationships with intermediaries. They often last over six years. Fishers have different intermediaries or vendors for different types of their catch. Fish, lobster, and conch might have different vendors for the fishers. Fishers also have relationships with different vendors, with some for a longer period of time, and with others for a much shorter period of time. Part of the lobster catch is sold to the hospitality industry, and part to small processing plants that export lobster to the international market. The quality desired by the hospitality industry is lower than the standard demanded by the processing plants. As lobster is generally poorly handled, the quality of the product is relatively low in comparison to other countries in the region.

Historically, the fishers are poorly organized. Although in the past the government has attempted to support fishing cooperatives, these initiatives have usually failed. Only six percent of the fishers are members of a fishing cooperative, and these cooperatives serve more as shops than as powerful economic groups that are able to influence the politics of fisheries governance. Nevertheless, the representatives from some of the cooperatives are often asked by the government to give advice on the fishery. Fishers are also poorly organized from a market perspective, and their bargaining position regarding prices is thus very low. Job satisfaction of fishers is generally high, with average scores per category above 3 points. This could partly be explained by the fact it is a multi-species fishery with high remuneration in comparison to other jobs. Although the job entails high safety risks, fishers enjoy the high level of autonomy they experience in the lobster fishery.