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Cultivating Change: Women's Involvement in a Brazilian Seaweed Collective

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CULTIVATING CHANGE:

Women’s Participation in a Brazilian Seaweed Collective

By Wren Brennan

Macalester College
Honors Project in Anthropology
Professor Arjun Guneratne, Advisor
Spring 2013
Increased tourism, depleted wild fish populations, and land reassignment have caused socio-environmental changes in a Brazilian artisanal fishing community. This paper examines the implementation of a seaweed cultivation project and the causes behind dwindling local support and management of the project. I argue that the success of the seaweed project hinges on women’s increasing involvement as participants and leaders. The project has improved the availability and value of communal resources and lessened habitually gendered labor divisions; as a result, women have begun to elevate their social status and shift the community’s main livelihood from fishing to sustainable aquaculture.

Cover Image: Fishing boats line the beach in Flecheiras
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This project would not have been possible without the help of several systems of support—communal efforts, really—which carried me from my gray, temperate home in Seattle to the beachside barraca in Flecheiras, and then back to school in Saint Paul. First, to my community at home in the States: thank you to my friends and family who encouraged me to work for this opportunity to research and write something of my own, and who always reminded me to do the best I can in the time available to me. Second, to the community of educators at SIT (School For International Training): I am grateful for your academic and cultural guidance during my semester abroad. Third, to the Fortaleza community: thank you to my family, neighbors, and friends in Carlito Pomplona for your generosity and support.

Thank you to my academic advisors, in Guajiru, in Fortaleza, Seattle and Saint Paul—without you, I would not have known where to start, or how to end. Special thanks to the Macalester College Anthropology Department and my Honors Advisor, Professor Arjun Guneratne. Not only did I feel prepared for the many peaks and pitfalls of ethnographic research, but I also felt incredibly fortunate to have guidance throughout my time abroad, my time readjusting at home, and my reentry into academia at Macalester. Your feedback throughout this process has been invaluable.

Finally, to the communities of Guajiru and Flecheiras and your changing seascapes: thank you for allowing me to begin to understand your history, your community and your sonhos for the future. To the família de algas: thank you for your unending patience, kindness, and thank you also for your stories. I treasure these, so much so that I would rather begin this paper with your words than with my own.
There was once a big fire in the forest. A hummingbird passed over the lake and took a little bit of water in its beak and flew over the fire, dropping the water and going back to get more. Back and forth, back and forth. And all the other birds said, “Hummingbird, do you see that you aren’t going to be able to put out this fire like that?” And she replied, “I am doing my part. If you each did your parts, we would be able to put out the fire together. Each one must do his or her part.”

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Estava acontecendo um grande incêndio na floresta e a beija-flor passava no lago e pegava um pouco de água no bico e passava por cima do incêndio e saltava para pegar água de novo. Iria e voltava, iria e voltava. E os outros pássaros disseram, “Beija-flor, tu ‘tá vendo que tu não vai apagar isso incêndio?” E a ela disse, “Eu estou fazendo a minha parte. Se vocês fizerem de vocês, nos conseguimos apagar o incêndio juntos. Cada um tem que fazer a sua parte.”

—Pedro Edivan dos Santos Viana, on sustainable community development
Introduction

The sun has just risen over the edge of the clay tile roof. It casts a soft, hazy glow across the house and the sandy cobblestone street. In a few hours, the light will become harsher; the midday Brazilian sun shines with a blinding, near-debilitating intensity. In this fashion, it acts as an essential component of the coastal ecology, warming and nourishing an array of marine life that thrives in the shallow tidal region. The Northeast coast hosts many varieties of algae, crustaceans, fish, sharks, and countless other organisms that together form a symbiotic and self-sustaining ecosystem.

The algae—or more specifically the larger varieties of seaweed and the people who harvest them—have brought me to this particular coastal community, called Guajiru. The day is breaking faster than my body is used to; still heavy with sleep, my eyes struggle to adjust to the world brightening around me. As I squint and stretch both arms over the edges of my hammock, a man with a large, wrinkled smile, dark skin, and a pointed nose leans his head into the doorway.

“The tides have arrived,” he says. “It’s time to go.”
“Where are we going this morning?” I ask.

“To the barraca to visit the algas. They are angry with me because I haven’t been taking care of them. But today we will change that.”

I will soon learn that a barraca is a tent-like wooden structure with a thatched roof usually made from palm leaves. This particular barraca is the center of operations for a community-wide seaweed cultivation project. For this man, it is also a second home, a place of business, a restaurant, a meeting space, a recreational place, and, perhaps most importantly, the place where he goes to care for the algas (seaweed), also affectionately called lodo (muck, mud, or slime).

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Land is one of the most prized resources in Brazil; it is also one of the most contested. Brazil is nearly the size of the continental United States. It contains everything from green hillsides to tropical rainforests to desert plateaus. Territory for fishing and other aquatic activities is currently in dispute along much of Brazil’s expansive coastline. The federal government has established administrative structures for aquaculture and ecosystem management; it also legally recognizes artisanal and commercial fishing practices during specified annual seasons.

While a reported seventy percent of the fish consumed in Brazil still comes from artisanal fishing using traditional methods and non-motorized boats, only ten percent of the fisheries branch of government is devoted to assisting these fishing families; the rest focuses on commercial fishing regulations (Osava 2012; National Aquaculture Legislation Overview 2013). The coastal territory where most fishermen and fisherwomen live and work remains unprotected as a result. Researchers, non-profits, and advocacy groups are testing different methods of community development and territory control in these coastal communities—many of which are in some of the driest, nutrient-poor areas with the majority of families living at or below the
poverty line. These families have mixed ethnic heritages but predominately identify as having both indigenous and Afro-Brazilian ancestry, which is also reflected demographically by physical characteristics (i.e., dark skin and hair) and self-identified ethnic categories.¹

Figure 1: Trairi (bottom left), Flecheiras (top left), and Guajiru (center-right)
(Image accessed from Google Maps, May 2013)

¹ For further discussion of racial politics in Brazil generally and in this community specifically, refer to “Engrained Inequalities,” pages 21-28.
Depleted wild fish populations, land reassignment, and urban development have greatly affected the coastal ecosystem and shifted traditional practices in many coastal fishing villages. Much of the Northeast coast has also been developed to facilitate increased national and international tourism. Recent community development projects have encouraged sustainable environmental practices and facilitated socioeconomic changes; women in particular have responded to environmental preservation efforts and increased their participation in trabalho coletivo (collective or community work).

The community of Guajiru, about 120 kilometers away from the city of Fortaleza, Ceará, is one such village in the midst of environmental and social transformation. Guajiru provides a small-scale example of the large-scale effects of environmental degradation on many of the world’s coastal communities, particularly those whose residents practice a subsistence trade like

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2 I use the term ‘traditional’ with some hesitation. Culture—that of a community or of a particular subsistence strategy—is an ever-changing system of symbols. Thus, the notion of a ‘traditional’ or ‘authentic’ culture is nonsensical in many ways. However, I have used it throughout this paper because my informants self-identify as being part of a traditional culture (cultura tradicional).
fishing. It also represents an avenue for social projects that can mitigate these effects and redirect community skills and efforts toward a more sustainable future.

Guajiru is home to roughly 142 families, or 700 people. Houses are distributed on a strip of land between a coastal beach and inland sand dunes. Ninety percent of those families participate in pesca artesanal (artisanal fishing). There are approximately 120 pescadores (fishermen) and 50 pescadoras (fisherwomen). The neighboring fishing community of Flecheiras sits about ten kilometers northeast, and the population is twice that of Guajiru. Members of the communities own and operate 450 fishing boats of varying sizes, all of which are wooden and non-motorized; they are steered using either a long wooden paddle or a cloth sail. Generally, three to four families share each vessel and its equipment, with at least one member of each family going out to sea at every voyage. In addition to fishing, community members collect fruit and participate in subsistence agriculture on the edges of tropical lagoons and sand dunes.

The term ‘family’ is used throughout this paper as a unit of social significance and economic production: families contain female and male heads of house and their children. They often also include extended relatives living in the same household (three or more generations under one roof is common). A family’s status is determined by the goods they own and produce together. When children grow up and marry out of the family, they often move into a separate household and become a new family unit (with an independent income) but still part of the same extended family (kinship group). Thus, the terms ‘family,’ ‘household,’ and ‘extended family’ are overlapping yet distinct descriptors of socioeconomic relationships that dictate informal modes of ownership and status (e.g., fishing equipment and catch) along with formal modes of income (e.g., eligibility for social welfare and other benefits).

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3 Artisanal fishing exists mostly as a form of subsistence but also garners monthly earnings of around $200.00 Reais or $109.00 American dollars at the current rate of exchange, according to surveys from the Terramar Institute.
The public (workforce) and private (domestic) spheres of this community are changing along with the environment. Shifting gender relationships and familial structures—such as women’s increased involvement in community projects and their continued role as caregivers in the home—provide a unique framework through which to understand these environmental changes. Community projects have arisen in Guajiru and Flecheiras in the last fifteen years that not only provide additional sources of income, but which also feature women as visible community participants and leaders. One such endeavor is the Seaweed Project (Projeto Algas) and the Association of Seaweed Production (APAFG).\(^4\) Eleven families from Flecheiras and Guajiru founded the organization together in 2002,\(^5\) which facilitates the collection, processing, and sale of seaweed using sustainable harvesting practices and solar-powered drying techniques.

The project is still very much a work in progress. Of the original eleven families, only two or three are currently participating, and only one is continuing the collection cycle on a daily basis.\(^6\) Seaweed has become so much a part of their familial identity that they are known throughout the coastal communities not only as one of many traditional fishing families, but also as the one and only *família de algas* (“seaweed family”). Their work in the seaweed collective exemplifies small-scale subsistence practices as gateways to broader, sustainable community development. It also underscores the potential for seaweed to be an innovative resource that is used and controlled by women but valued by the entire community, in the same way that fishing boats and equipment serve that purpose for men.

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\(^4\) *Associação dos Produtores/as de Algas de Flecheiras e Guajiru (APAFG)*


\(^6\) The reasons behind this drop in membership are multifaceted and culturally relative; perspectives on the motivations for continuing or discontinuing seaweed work are discussed at length in “Access and Barriers to Opportunity,” pages 71-78.
Hundreds of varieties of seaweed thrive in Flecheiras and Guajiru’s system of coastal reefs (more than three kilometers of reefs line Flecheiras alone). Women in these communities have a long history of seaweed harvesting that relies on cultural knowledge about the coastal environment, including tides, the moon and stars, ocean currents, and marine life. This skill set is passed on from one generation to the next through experiential learning that begins in early childhood and which originated from indigenous fishing traditions in the eighteenth century.

Before the seaweed project began, locals knew and understood the ecological value of seaweed when it was in the water. But outside of the ocean, they disregarded it almost entirely. Most acknowledged it only as the residue that washes up on the sand and gets mixed up in the water when the ocean currents pick up. They thought of it as mud or trash rather than a nutrient-rich and widely beneficial resource.

It wasn’t until after the development project took effect that these negative associations with seaweed harvesting—removing plants from their rightful place in the ocean—began to shift. Seaweed collectors, known colloquially as *catadores de lodo* (muck collectors), made a pivotal transition from gathering seaweed directly from the reefs to implementing a cultivation site in order to grow and extract one specific kind of algae from the genus *Gracilaria*, without negatively affecting the diverse marine ecosystem. The type of *Gracilaria* that grows in Flecheiras is a spindly, firm, reddish-brown seaweed with several species that can be used for a variety of goods, most notably for the production of agar. Agar is used most often for cosmetics or as a natural gelatin food product. It has been affectionately nicknamed *macarrão* (pasta) because it is the size and texture of spaghetti.

The project, initiated by the Terramar Institute in Fortaleza, provided courses on cultivation, production, and the various applications of *algas marinas*. With these educational
courses came a greater awareness of the legitimacy of seaweed harvesting, and the name shifted from *lodo* to *algas*. The people—mostly women—working with this resource are now called seaweed collectors or algae workers. Outside organizations provided technological investments such as solar powered lighting and a *secador* (drying station) for the seaweed. Families involved in the collective each received a portion of a government stipend before and after they completed the collection cycle (*ciclo de coleta*), the process in which seaweed is taken from the reefs, replanted, grown, cared for, and then harvested and prepared for sale and subsistence purposes (Terramar Institute 2003b).

Seaweed is responsible for keeping the symbiotic balance of the aquatic ecosystem in the Northeast and in much of the world. Locals say it produces more oxygen than the entire Amazon rainforest. Whether or not this is accurate, it shows a sort of pride in the natural environment that has become a signifier of traditional fishing communities. Studies have shown that in the Brazilian Atlantic, seaweed is one of the primary producers in the ecosystem; it frees trapped oxygen and recycles carbon dioxide, facilitating the mineralization process and balancing temperature and salinity levels (Mendes do Amaral 2008:2).

Predatory, non-sustainable modes of seaweed extraction, in which seaweed is harvested too frequently and entire plants are uprooted and rendered unable to reproduce, have impaired fish populations to the point of depletion. The varieties of seaweed growing in the reefs of Guajiru and Flecheiras are exposed to periodic natural stresses, from climate changes to rough ocean currents. These disturbances slow the regeneration process but rarely permanently destroy the seaweed; partial fragments of the plant often tear, but the roots remain intact. The same goes for the species of fish inhabiting the area. Sustainable seaweed harvesting is a process in which only a small portion of the plant is removed to assure speedy regrowth. The algae are replanted.
in a separate growing site away from the reefs, strung out at sea on a rope framework. It does require increased human intervention, but the disturbance is so minor that it causes only a temporary slowing in growth and nutrient availability.

After predatory harvesting ended in the mid 1990s, communities in the state of Ceará were able to grow, process, and export approximately 265 tons of seaweed for profit between 1997 and 2001 (Mendes do Amaral 2008:3). The introduction of a sustainable form of aquaculture, which uses many of the same skills of traditional fishermen and fisherwomen, has the potential to create a self-perpetuating, alternative income for families in coastal communities where a lifestyle of subsistence fishing is increasingly difficult to maintain. This project specifically, and the idea of environmental sustainability more generally, is still a new and evolving concept in Brazil. As Edivan, a member of the familia de algas, explains:

In many ways, we are crafting a new culture, which is this culture of cultivo no mar [mariculture]. You take a family of traditional fishermen, and you send them to this new culture, also in the sea. Because the traditional fishermen and women, they aren’t just fishermen. They are, or they represent, cultural values. Flavors. When [my wife,] Marta, for example, gets seaweed and prepares it, and makes a salad, and then takes that flavor and passes it on to each person that passes by the barraca—it is clear that we are furthering these rich cultural values.

This “new culture,” one which has its fair share of challenges, is nonetheless an example of sustainable living that links traditional practices to both familial structure and to the social and physical territory of that preexisting culture. The end result is something entirely different—at the very least, it is an adaptation, a shift in cultural beliefs and practices and, for traditional fishermen, a means for maintaining land and livelihood.

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7 According to the Food and Agricultural Organization of the United Nations (FAO)
8 Due to increased tourism, land traditionally used for fishing is purchased and developed into beachfront resorts that ban boats and fishing gear from the waterfront; the equipment is viewed as feia (ugly or unsightly). For more information, see “Land Lost,” pages 80-88.
This paper centers on seaweed collectors (*catadores de algas*); it highlights the value of family relationships in furthering the cultivation project and on the role of women as community organizers and leaders. It evaluates the efficacy of an alternative and still imperfect mode of sustainable living—one that depends on interaction with and compassion for the coastal environment. I begin with the cultural settings that serve the seaweed collective and the opportunities available to women in those settings. Chapter 1 provides a theoretical context for persisting gender divisions in Northeast Brazil. Chapters 2, 3, and 4 identify labor divisions as they relate to the structure of community work and sustainable environmental practices: first, through patterns of behavior in the home and the family that facilitate the operation of the seaweed collective; next, through the production and distribution of seaweed as both an alternative source of income and an adaptation of traditional skills; and lastly, through a discussion of the social movements that struggle to define and support these cultural practices.

At each level—domestically, communally, and externally—I argue that the success or failure of the seaweed cultivation project hinges on women’s increasing involvement as participants and leaders. The project has improved the availability of communal resources and lessened habitually gendered labor divisions; as a result, women who participate in the project are beginning to elevate their social status through their control over seaweed and its derivative products. By blending traditional skills and innovative technologies, women have the potential to shift the community’s central livelihood from fishing to sustainable aquaculture.

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This thesis is the culmination of my studies in Anthropology at Macalester College in Saint Paul, Minnesota. It is an extension of the independent research I conducted while studying in Brazil for three and a half months with the School for International Training. It evaluates the efficacy of a community development project in the Brazilian Northeast, and most importantly, it
tells the story of a singularly entrepreneurial family working to better their own lives and the lives of people in their community—through the production and sale of seaweed, of all things.

When I purchased my bus ticket for Guajiru, I was in many ways accepting an unknown and perhaps unknowable fate. I had never been to this community before. I knew from studying the map in my classroom in Fortaleza that the small beach community occupied one of the three principal beaches of the municipality of Trairi, in the state of Ceará. I had heard that it was a beautiful beach with a few nice *pousadas* and other small hotels that attracted seasonal tourists. I had learned from socio-economic diagnostics of the region that Guajiru might also be a potential site for new research—on social movements and the struggle for land rights, on the recognition of the cultural tradition of fishing communities, and on the relationship between gender, the environment, and divisions of labor.

Ticket in hand, I still had no idea where I was going. I was staying with a family, but I had no address, only the first names of my host parents: Marta and Edivan. There was a phone number, but my call never went through. I asked my program coordinator on the way out the door where I should ask to get off the bus. “Guajiru is at the very end,” he said. “You tell them you want to stop at the home of Marta and Edivan, and they will know. Everyone knows Marta and Edivan.”

Thankfully, the bus did exactly that. After about four hours of travel, the road changed from asphalt to gray cobblestone. A fellow passenger on the bus told me that this meant we were in Guajiru, and that Marta and Edivan were living in “that yellow house, just there.” It was the last in a long line of brightly painted cement and stone houses, each with open doorways and

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I obtained permission for the use of the (first) names of all people, locations, and organizations. I chose not to use pseudonyms in an effort to show support and solidarity for this community and this family.
windows with wooden shutters. Orange tiled roofs and leafy mango trees added to the array of color. Everything was dusted with a thin layer of off-white sand.

My arrival in Guajiru was unannounced, since I wasn’t able to call ahead. And yet from the beginning, I was absorbed into a family of fourteen (two parents, three brothers, four sisters, and five nieces and nephews). My host father, Edivan, is the longtime leader of the Municipal Fishermen’s Association and the former president and still-active member of APAFG. He is a native of Flecheiras, while my host mother, Marta, comes from Guajiru, participates in both associations, and is the dona (owner) and cozinheira (chef) at the barraca das algas.

Marta and Edivan were key informants during my three-week research period in Guajiru and Flecheiras. They participated in formal interviews as well as countless informal conversations, stories, and teaching moments. They are known throughout both communities, the greater municipality of Trairi, and in other coastal towns in the state of Ceará as community leaders, or líderes do povo do mar. These titles carry a certain power, influence, and responsibility; I was concerned at first that my association with a particularly influential family could affect my ability to build rapport with new informants. Additionally, their roles as community organizers could have caused them to describe their work in solely a positive light. I feared they might refuse to discuss problems and faults within the project, or that they might not realistically have the patience for my time-intensive research methods and my own cultural limitations as an American college student from a (cold and rainy) urban metropolis 6,000 miles away. I soon found that none of these potential problems became barriers to research. Cultural biases—e.g., moments of pride or shame and accusations about other community members and

10 See kinship chart, page 37.
11 Associação dos Pescadores/as (do Município de Trairi)
12 The site of the seaweed collective. Also called the Centro Ambiental de Algas (Seaweed Environmental Center)
13 Leaders of the “people of the sea” (A self-identified term for groups living and working in or near the ocean.)
movements—certainly existed, but they were almost always self-identified by the informant as an opinion, and not a pattern of behavior or a concrete fact.

In addition to being accepted as a participant-observer within this family, I conducted direct observations of community events and specific tasks related to algae cultivation and production. I conducted, recorded, and transcribed a total of eight formal, hour-long interviews with the family and friends of Marta and Edivan who had links to the Barraca das Algas, APAFG, or the original Projeto Algas. I chose informants from two different generations (ranging in age from 18 to 48) in order to gain insight into cultural and environmental transformation over time.\(^\text{14}\) I also conducted seven unrecorded follow-up interviews as a means of clarifying the data gained from the formal ethnographic interviews. I took notes in English and Portuguese whenever possible. All interviews were conducted in Portuguese, transcribed, and translated to English. For the purposes of accuracy and cultural sensitivity, folk terms appear in Portuguese, marked throughout the text in italics. Brief definitions of each term appear in the text or in footnotes at first use; a complete list of folk terms can be found in the glossary.

Language acquisition, and all of the cultural incongruities that accompany it, is perhaps the greatest barrier to this research. I relied heavily on in-person (and often on-the-fly) interviews as a means for gathering a large amount of cultural detail in a small amount of time. Yet because of my beginner’s grasp on the language—I began my stay in Fortaleza two months prior to the start of my fieldwork in Guajiru and Flecheiras—I recognize that I have likely misunderstood, or perhaps completely overlooked, a great deal of information. My intention with the following sections of this paper is to use only the data that I gathered, fully understood, and corroborated.

\(^\text{14}\) With the exception of my advisor from Terramar, Jefferson, and my advisor in Guajiru, Edivan, I only conducted formal interviews with women. This allowed me to focus the perspective of my research and build better rapport. I acknowledge the fact that this limits my understanding of labor divisions and community structure; I aim instead to represent a more detailed and culturally informed female perspective.
through lived experience as a *filha do coração* of Marta and Edivan at their home in Guajiru, and as a visiting seaweed collector in the community of Flecheiras.

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15 Literally meaning “daughter of the heart,” this term is used to refer to any visiting or informally adopted member of the family, or a close family friend.
Chapter 1

Theoretical Framework: The Brazilian Dilemma

Brazil has emerged as a world power in the past twenty-five years, and its selection as host for the 2014 Fifa World Cup and the 2016 Olympic Games solidifies that position. It is the seventh largest economy worldwide (Bergmann 2012), having just matched the United Kingdom’s Gross Domestic Product (GDP) (United Nations Trade and Development Report 2012:19-26). Progressive government programs targeting race, gender, and class disparities add to the global curiosity surrounding Brazil’s economic rise.

However, deep-seated social inequalities characterize the nation’s shaky path to development, as outlined in the past twelve years by the United Nations Development Programme’s Millenium Development Goals. Brazil was one of 189 countries selected to receive funding for projects that would target poverty and better the quality of life in 2000, using eight different criteria that ranged from the eradication of hunger to women’s empowerment to environmental sustainability (UN Women 2012). These programs have afforded nationwide social and financial improvements and attracted increased international scrutiny along with them. Equal rights are supported under the law, but in practice, poorer, darker-skinned, and female
citizens are shortchanged; they have limited access to resources for education, employment and healthcare, and they are subjected to subtle and overt forms of discrimination.

Historian Thomas A. Skidmore (1999) contrasts Brazil’s unique, if imperfect, women’s rights movement with other South American equality movements, arguing that “the women’s movement became the largest, most radical, and most effective” (207) of them all. Despite actively opposing structural violence against women and supporting their civil rights (including women’s suffrage in 1932), “Brazilian women have traditionally played a small role in Brazilian public life” (203), and this restriction continues today. What was once a vibrant and radical movement toward gender equality has become a reduced political influence that Skidmore says “reflects a familiar Brazilian dilemma: how to incorporate genuine citizen participation in a political system created for top-down government by a narrow white political elite” (208). ‘Male’ could certainly be added to this list of qualifiers. How, then, are Brazilian women actively involved in current community development projects after a history of social struggle that has left them politically marginalized and socially invisible?

Engrained Inequalities

Since the 1980s, in keeping with third-wave feminism and a greater degree of intersubjectivity within the anthropological canon, academics have debated the intersection between gendered identity and patterns of behavior. Within the broader context of gender, several theoretical discussions frame my research: scholarship on the origins, conceptions, and reinventions of female subjugation and female agency; literature on familial structures in fishing communities; and literature specific to coastal Brazil that examines socioeconomic demographics and existing labor divisions. The relationship between gendered practices and spaces—and thus between changes in gender relations and changes in the physical environment—remains largely
unexplored and undervalued. I hope to address this relationship in the following pages, using my case study of a Brazilian fishing family and their community in conjunction with existing research on the culture and ecology of the Northeast coast.

Brazil’s post-colonial history of political and religious strife has furthered the naturalization of inequalities on the basis of race, class, and gender. Until the drafting of the 1988 Constitution, the federal government refused to address existing racism, sexism, and structural violence that plagued the nation in the twentieth century. In a discussion of contemporary inequalities, director of the Afro-Brazilian Studies and Research Institute, Elisa Larkin Nascimento (2007), found that in 1981, Brazil was third after Haiti and Sierra Leone as the country with the “most unequal income distribution in the world.” Since then, Nascimento continues,

The concentration of wealth has increased consistently. … Poverty and hunger are particularly severe in the North and Northeast regions; seasonal droughts make this situation worse in the Northeast. Rural poverty induces migration to the urban centers. … At the same time, technology-intensive development of agricultural production has driven landless peasants out of the countryside, further increasing inequality in rural areas. The miserably poor rural populations, particularly in the Northern and Northeastern regions…are inhabited mostly by people of mixed African and indigenous descent, caboclos. They are such a large majority that the word caboclo came to designate both the residents of those rural areas and their racial identity itself. The sertanejo, inhabitant of the sertão—the rural backlands—is almost by definition a caboclo. (43-45)

Nascimento argues that inequalities in gender, race, and class are inextricably linked. Just as the Brazilian government has been historically ignorant of female subjugation, it has also been resistant toward racial and ethnic labeling. Similarly, most Brazilians resist classification into specific ethnic categories as much as they reject outsider perceptions of a unified ‘Brazilian identity’ that supposedly encompasses all their racial and cultural diversity but which actually limits the visibility of women, Afro-Brazilians, and indigenous groups.
As a result of civil rights movements that drew attention to these and other marginalized groups, an official article on antidiscrimination was added to the Constitution of the Republic emphasizing “the multiethnic and pluricultural nature of Brazilian society” (Nascimento 2007:31). By the mid 1990s, Brazil had developed a skewed distribution of wealth that left forty-three percent of households at or below the poverty line, which was higher than neighboring countries Paraguay, Uruguay, and Argentina (Nascimento 2007:43). Combine that with the lowest literacy rate in the region and the highest infant mortality rate—over seven times the mortality rate of the United States—and Brazil suddenly appeared much less developed than its position among the ten largest economies might have otherwise suggested (Nascimento 2007:43).

Even from the national census, it was clear that unified multiculturalism was not a reality for most Brazilians. When prompted, citizens were more likely to identify as indigenous or mixed-race than they were to call themselves black. The demographic census, conducted by the Brazilian Institute of Geography and Statistics (IBGE), used to ask Brazilians to simply write what ‘color’ (cor) they were, since it is culturally acceptable for family members to be labeled differently despite shared ancestry. This fact—that two full siblings born with different skin color or ethnically identifying features could be different ‘colors,’ (e.g., one black, one white)—has led many scholars to label the nation a “racial democracy,” where overt racism has been all but eradicated (BBC News 2011) and where race is self-identified and thus self-affirming (Fish 2006). Others see fluid and adjustable racial categorizing as evidence of persisting ethnic inequalities hidden under the guise of diversity.

Until the 2010 census redefined the categories, more than a hundred different classifiers ranged in specificity from ‘blonde’ to ‘light brunette’ to ‘deep brown’ to ‘cinnamon-colored.’
While in some ways, the census data celebrated the unbounded perceptions of race in Brazil, they were less helpful for understanding the race-based inequalities that existed below the surface. When the census was reevaluated, the IBGE encouraged citizens not only to identify their color, but also to mark if they considered themselves to have African or indigenous ancestry.

Analysis of the 2010 data revealed that Brazil is home to the largest population of self-identified African descendants outside of Africa. It also showed that, for the first time, non-whites (Afro-Brazilians and people of mixed descent) make up more than half of the overall population. Those identifying as white are now 47.7% instead of 53.7%, as recorded in 2000 (BBC News 2011). This shift is not due to population change but rather due to the fact that more Brazilians are willing to acknowledge their mixed ethnic background even though their voluntary, heritage-based identification would not necessarily represent that ancestry. This data also show the income disparities that persist despite a steady movement toward social equality, economic growth, and global trade. Afro-Brazilians generally earn about half of what lighter-skinned Brazilians earn, and women earn about forty percent of what men earn—and while white women earn marginally more than black men, black women earn least of all.

Women are Brazil’s poorest citizens, proportionally. They currently represent 98% of the paid domestic workforce, but less than half of those roughly twelve million female domestic workers receive employment benefits (Alcântara 2008). Women hold only ten percent of elected office seats, although feminist campaigns helped to secure a women’s caucus (bancada feminina) in the 1980s that allowed women to cross party lines and lobby for legal reforms that supported women’s agency, from maternity leave to increased female political participation. Despite the efforts of the organized and vibrant women’s movement, which remained active
throughout the 1990s, most official positions of political power are still reserved for men. Recent scholarship has identified the “paradox of Brazilian feminism: its political strength has succeeded in putting women’s demands on the table, but it has failed to open political spaces to women themselves” (Alcântara 2008). The dilemma has garnered international attention and debate.

In a discussion of the impacts of globalization on Brazil, J.A. Burity (2008) argues that the nation is “reproducing a pattern of non-recognition of the poor, women, blacks and other discriminated groups that is reflected in the figures of inequality” (745). An exploration of this “naturalized inequality” (745) can be applied specifically to the discussion of gender relations in Northeast Brazil. Socio-political scholars Renzo Taddei and Ana Laura Gamboggi (2008) argue that gender division and subjugation is present in both local folk narratives and governmental and political ideology (150). Women are granted central yet unofficial roles in community leadership and local government, and they are depicted in myth, legend, and pop culture as marginalized heroines. Female involvement in the public sphere is often “invisible in dominant narratives” (Taddei and Gamboggi 2008:152). Women must form unofficial groups in order to successfully make a place for themselves in community politics and policy.

However, gender divisions do not always cause gender inequality, nor do they always restrict the visibility of female presence and agency. Contrary to many of the conclusions of these authors, my research shows that the impacts of globalization are causing a shift in both lived and perceived gender relations in the Northeast. Current semiotic trends in Brazilian music and television promote an increase in female agency rather than solidifying gender hierarchies. Perceptions of gender divisions in politics and labor in the Northeast are also shifting, particularly now that a woman holds the most visible, and arguably the most powerful, political
position in the country—the presidency. While the election of a female president does not necessarily correlate to greater female agency, the current president of Brazil, Dilma Rousseff, has continued the progressive agenda of the previous president and fellow member of the Worker’s Party (PT), Luiz Inácio Lula da Silva (known popularly as Lula). Rousseff was Chief of Staff under Lula, and has since upheld many policies, such as land redistribution and agricultural reform, that aim to lift Brazilians out of poverty (Fellet, BBC News 2012).\footnote{Rousseff has also garnered high national and international ratings, and in 2012, Forbes ranked her as the third most powerful woman in the world, behind Germany’s Chancellor Angela Merkel and U.S. Secretary of State Hillary Clinton.}

Shifts in female agency and women’s involvement in local or national political campaigns inevitably start small. During my fieldwork in Guajiru and Flecheiras, I observed gender relations and social trends that reflected both a compliance with and a rejection of expected female behavior in the space of the home. Men and women in my host family worked together in specialized roles to complete tasks inside and outside of the home. Women’s access to opportunities for employment, education, and recreation outside of the home were restricted on the basis of their gender, and yet those limitations did not in every case make them subordinate to their male counterparts. Often, women’s bargaining power within the home (to take a phrase from Bina Agarwal’s [1997] economic analysis of married women and household relations), granted them greater agency and social freedoms than the men. Agarwal suggests in her earlier work on women’s agency in rural South Asia that, “Women’s overt compliance with practices which disadvantage them does not necessarily mean that they accept those practices as legitimate; their perceptions are better revealed in the many covert forms of resistance to gender inequities” (1994:57). In this way, women are and will continue to be key players in both household economies and community relations, despite being confined to specific gendered tasks and behaviors.
Though cultural conventions undoubtedly affect women’s advantages and disadvantages, Agarwal’s analysis of compliance and resistance has cross-cultural applications. Anthropologist Sherry Ortner’s work questions, and ultimately qualifies, the universality of gender divisions. She looks to cultural ideologies that enforce the devaluation of women’s status and labor relative to men in virtually every society, adding that though some cultures might have more balanced labor structures and systems of value, “the search for a genuinely egalitarian, let alone matriarchal, culture, has proven fruitless” (1972:8). She argues that women are conditioned to take on roles more closely associated to nature, while men are conditioned to associate with culture. Every culture distinguishes between the natural (as biological, familial) and the cultural (as manufactured, symbolic). Culture also ascribes social relationships and systems of value to the natural world, therefore having a measure of control over nature, and thus culture is considered superior to nature. Ortner concludes that men, in terms of status, power, and social persuasion, are continually considered superior to women.

While Ortner focuses on the persisting and all-encompassing structural reasons for female subordination, her peers and contemporaries pursue examples of female social mobility that transcend these confining societal categories of nature and culture. Ernestine Friedl (1975) and Bina Agarwal (1994) each offer explanations for changes in female status based on communal and individual control over resources and responsibilities. For Agarwal, the resource that correlates most directly with status in rural South Asia is land—men have historically occupied a position of superiority in their communities because they inherit property and maintain control over it throughout their lifetime. She argues that women need independent rights to land for the sake of social welfare, efficiency, equality, and empowerment. She also describes the barriers women encounter in the management of land, which range from gendered
specification of behavior and social containment to the gendered segregation of space and the physical limitations that women experience at home or at work (298).

Friedl’s work draws from a variety of hunter-gatherer groups to support the claim that, when given access to community resources, “women can attain equal or dominant status in any society” (2006:231). Friedl elaborates on Ortner’s argument, agreeing that “evidence of a society in which women control all strategic resources like food and water, and in which women’s activities are the most prestigious, has never been found” (233). She adds that patriarchies are strongest when men control not only communal resources but also goods that can be imported, exported, and distributed publicly:

In any society, status goes to those who control the distribution of valued goods and services outside the family. Equality arises when both sexes work side by side in food production…and the products are simply distributed among the workers. In such circumstances, no person or sex has greater access to valued items than do others. … Different societies can and do adjust the frequency of birth and the care of children to accommodate whatever productive activities women customarily engage in. (238)

In reference to childcare, Friedl provides varying ways in which women limit the size of their families, from spacing births according to harvest seasons, to nursing customs that naturally suppress ovulation, to, very rarely, infanticide. The sexual differentiation that allows women to give birth is perhaps the one predisposition that limits women more than men, regardless of access to natural resources and man-made products. And yet, Friedl insists, whether in a hunter-gatherer culture or an industrial metropolis, “if a society requires a woman’s labor, it finds ways to care for her children” (238).

Women in Guajiru and Flecheiras have relied on community connections and resources, family relationships, government services, and other strategies to balance childcare and other labor. While these fishing communities are not centered solely on hunting and gathering, they do incorporate subsistence fishing and harvesting techniques that require the same cooperation
among all able-bodied members of the community in order to be successful. The seaweed cultivation project in part provides women greater access to resources and revenue; it also highlights the importance of control over coastal territory as a means for overcoming social and physical barriers and empowering women as landowners, fisherwomen, and *algueiras* (seaweed workers).

**Women’s Status in Fishing Communities**

Academic literature pertaining to the division of labor often incorporates gender and environment as factors that contribute to “bargaining power” (Agarwal 1997) and “property rights” (Durrenberger & Pálsson 1987). Agarwal (1997) argues that, in addition to social class (or caste) and property, social norms—though not formal means of control—can still limit or enable women’s “intra-household bargaining position [and] restrict their earning possibilities in multiple ways” (16). A woman’s bargaining power is related to the physical and financial assets that she not only owns but also controls. According to Deere, *et al.* (2012), “ownership of assets is an important component of women’s economic empowerment to the extent that such ownership increases their participation in household decision making and their range of choices and abilities to respond to opportunities—or their capabilities” (5). A woman’s “fall-back position” (Agarwal 1997) measures the extent of her bargaining power in the case that the household or her marriage should fail. Agarwal’s analysis claims that informal control over a resource or an activity often trumps formal ownership of that object or task.

Similarly, in a discussion of “ownership at sea,” Derrenberger and Pálsson assert that property relations are not always controlled by formal or legal means; often concepts of ownership neither order production nor determine who gets what. Instead they serve as reminders of informal “perimeter defense” rather than official claims over territory (514-517).
Informal ownership is common in coastal Brazilian communities. Boats and fishing equipment are owned by each family unit but often shared among friends and kinship groups; they are hand-built and bought and sold without formal deeds. Even the land belonging to the seaweed collective is not controlled by any governmental organizations or preserved in any way, other than being occupied and used by community members. Brazilian land laws allow any unclaimed land, once proved to be “productive,” to be legally inherited by the people working on it,\(^\text{17}\) which encourages undocumented occupation. In part, it also aligns with Durrenberger and Pálsson’s claims that informal possession often replaces formal documentation of ownership.

The authors recommend that future research on coastal fishing communities should “expand the view of fishing to include as much of the inland system as is possible; to define the forms of household, capitalist, and other production systems…and their relationships to other components of the economic and political systems; and not to confuse the organization of production with ownership” (519). These recommendations are useful in considering formal and informal modes of resource control in a coastal community, particularly from the female perspective—i.e., the ways in which women in Guajiru use (and maintain) bargaining power and formal or informal property rights, and the extent to which socioeconomic status and access to land may affect that power.

James Acheson’s “Anthropology of Fishing” (1981) discusses gender divisions in the context of fishing communities. The analysis often links coastal environments characterized by subsistence fishing economies and the families that live and work there, asserting a structural interdependence between the former and the latter. Acheson also discusses the varying cultural explanations for excluding women from the realm of fishing. His comparative approach not only

\(^{17}\) For more information on land legislation and the movement toward official recognition of fishermen’s claims on coastal territory, see Chapter 4: Territory and Tradition (pages 79-93).
draws from cross-cultural case studies, but it also provides a critique of existing anthropological explanations for labor divisions:

It has been suggested that fishing requires stamina and strength, and women presumably do not have these qualities. A variant explanation is that boats are small and cramped, and there is no room for someone who cannot do their share of the work. However, such explanations give a somewhat simplistic view of the division of labor in fishing societies, because there are a large number of cases where women do participate in fishing. … The relative mix of men and women in different work situations must always be explained in cultural terms and fishing activities are no different. The conditions under which different mixes of men and women are included in fishing activities has not been delineated. (297-298)

For the most part, women in Guajiru and Flecheiras have equal access to the resources and skills required for subsistence fishing. However, there is a gender division in the kinds of fishing tasks that community members complete. Women generally do not spend as much time out at sea as men; they spend significantly more time at home cleaning, preparing, and cooking fish, seaweed, crustaceans, and other goods harvested from the ocean. In many ways, Acheson’s call for “delineation” of gender roles (both within types of work and conditions or “situations” of that work) is precisely what my study of gender and the environment in Guajiru and Flecheiras aims to explore. However, Acheson still characterizes fishing and fishing communities as having similar structures and behaviors as a result of their marine environment.

Other authors (e.g., Carolyn Ellis) have argued that fishing communities may vary greatly in both individual expression and community organization. As a result, a more effective perspective on the characteristics of fishing communities may be to examine “the interface between the peripheral community and the mainstream institutions of its society’s center” (Ellis 1984:524). This alternative investigative approach helps to avoid overgeneralization of the specific experiences of the people in these communities and to provide additional levels of meaning in my own research as well as in the broader conception of the anthropology of fishing.
Guajiru’s proximity to the city of Fortaleza, which has a population of nearly four million, undoubtedly shapes the control and trade of the community’s coastal resources. Thus, social customs and gender norms from the city must also influence how women are treated, which resources they have access to for education, transportation, and recreation, and their status in the community as both caregivers and *catadoras* (collectors). The relationship between the coastal community and the nearest urban center will be discussed further in Chapter 3: Gender and Community (beginning on page 57).

**Gender Roles Before and After Projeto Algas**

In an argument for the development of women’s consciousness in order to combat the social invisibility of women’s work in rural communities, co-authors Deere and León de Leal (1987) conclude:

> Rural women are empowered to generate new and creative development solutions. … By providing women with a new and different vision of themselves (through participatory research) we will guarantee that they develop an understanding of the conditions that reproduce their subordination—only in this way can they begin to change them. (263)

The goal is very much the same for social and environmental development projects in Guajiru. With only the influence of expected gendered behavior from Fortaleza and what they see on television or in the news for reference, women in this coastal fishing community are not always fully aware of the opportunities available to them for work, education, and recreation. Before the start of *Projeto Algas* and the Seaweed Association (APAFG), women were almost entirely excluded from organized discussion of fishing rights and regulations in the community, because they weren’t fishing at sea nearly as often as men. They still harvested seaweed, but in much smaller quantities and almost exclusively for subsistence.
The Project has offered courses on the science and practical applications of seaweed and on the ecology of the coastal region. Though open to everyone, mostly women and girls attend the classes. There is currently a female president of the Association (though this is a rotating position) and a greater number of women in attendance as a result of these classes. Female participants are also increasingly aware of their role in the cycle of seaweed production, which remains vital to the success of the project. While each family unit maintains possession of land, boats, and fishing equipment, men are responsible for the majority of the maintenance. Women, on the other hand, are often responsible for the family’s finances, because they sell the day’s catch at the market. Women’s financial responsibilities have increased since the implementation of the project; they monitor the income from the seaweed harvests and the bulk orders that are exported throughout Brazil and abroad to Argentina, Chile, and parts of Asia.

The Portuguese-language literature specific to Flecheiras and Guajiru—which discusses the socioeconomic realities for coastal communities in Ceará, Brazil—provides an overview and critique of current community, governmental, and non-governmental structures in the coastal Northeast. The Terramar Institute’s Sheila Nogueira (2003) focused her doctoral dissertation on APAFG and the role of women in developing and furthering the project. In it, she specifically asks, “What strategies does this project propose to allow for the insertion, or perhaps the re-insertion, of women into sea-work?” (107). She focuses on how the geography of the area partially determines the divisions of labor and concludes that the sea should be demarcated for both the “cycle” of fishing and the “cycle” of algae production (96). In this way, the spaces—which are also heavily influenced by the tides and the coastal ecology—are no longer divided by gender; she argues that the collection of algae is creating new routines and “new rhythms of work and community in the same, shared, tidal space” (96). Thus, the division of labor in

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18 All text and audio from both primary and secondary sources has been translated from Portuguese.
Flecheiras and Guajiru is undoubtedly in transition, along with the ecology of the tidal region and the natural and cultivated seaweed reefs.

In a 2007 report on the influence of gender on the implementation of Protected Marine Areas (AMPs), which could include the seaweed collection territory, Terramar’s Cristiane Faustino da Silva argues that several questions should be addressed before officially restricting access to the area. They range from “How do men and women use the ocean?” to “How would creating a Protected Area favor the needs and interests of women and men in a way that encourages more egalitarian gender relations?” (2007:3). These questions are particularly relevant to the success of the Seaweed Project and others like it; they pinpoint the need for community members to collaborate and allow for more equitable gender structures and relations. Faustino goes on to say that on the Northeast coast, there is a noted absence of data on women’s involvement in labor outside the space of the home (4). While greater visibility and acknowledgement of women’s work doesn’t necessarily correspond with an increased physical presence of working women, it is a key identifier of the cultural value placed on that labor. In the case of rural coastal communities, political offices are the most visible and economically powerful positions women can hold. Faustino argues that, although women tend to have less access to political information and education, they must be involved in every step of the political process of protecting and restricting coastal territory, both in daily practice and in formal legislative discussion.

Increased visibility can help women overcome stereotypes associated with their gender. Fishing, Faustino explains, “is seen as an essentially masculine activity, but beyond it there is a network of tasks in which women are fundamental subjects, such as making equipment, cleaning and domestic work, and processing fish” (6). Working with shellfish and seaweed is seen as a
lower form of work because it is valued less as a commercial good and more as an immediate provision for families—a form of subsistence. The subordinate status of working with seaweed and crustaceans is a reality for women on the coast. And yet, Faustino adds, its nutritional value “should make it an important tool in food security and sovereignty for fishing communities” (6).

This and other resources from the Terramar Institute provide statistical and ethnographic data to support the possible links between shifting gender roles, community development, and environmental change. Yet they do not explore these shifts in the context of family structure or address the impact of environmental change on family (and community) structure. This presents a gap in current research that I hope my fieldwork in Guajiru and Flecheiras may begin to fill. The theoretical and historical perspectives on gender and labor divisions situate the research from Terramar into a broader academic context that is instrumental in corroborating and organizing my own research. My work addresses these social and environmental changes from the perspective of the fishing families, their interaction with this unique coastal environment, and their newly established tradition of seaweed cultivation.

In the following chapters, I examine ethnographic evidence for the theories aligning women’s agency and status with their control over culturally valued resources. This research builds on the idea that women are key players in community development efforts, as evidenced in Guajiru and Flecheiras by women’s involvement in the transition from traditional modes of production to alternative and sustainable mariculture.
“When we were little, Mom was always collecting seaweed and hanging it to dry in the back yard,” explains Georgiana, “right next to the laundry.” Her dark hair is dyed golden brown at the ends and ironed straight. She runs her fingers through it as she looks through a kitchen cabinet, searching for soap.

I look at the sandy back yard with clotheslines crisscrossing a driftwood fence and with coconut trees on one side and a papaya tree in the center. I imagine it full of the spindly maroon branches of seaweed for the family to collect and sell. In this arid environment, it seems logical to harvest seaweed for its nutritional value alone.

“Everyone thought we were crazy for cooking with it and selling it. They didn’t think it was clean and definitely not healthy,” she continues. She turns on a spigot and begins filling a large metal basin with water for the wash.

Luiza, Georgiana’s five-year-old daughter, runs out of the house and announces that she’s doing her laundry too. She takes off all the clothes she has on and adds them to the washbasin
with mine. She throws a stuffed teddy bear in for good measure, and says, “I’ll show her how to do everything” with a bob of her head. Her voice is high and soft, but her piercing hazel eyes, curly flyaway hair, and her small hands resting on each hip exude confidence.

It took us about three hours to do our laundry. But in that time, I learned as much about seaweed as I did about how to hang my clothes so they would dry before the evening rain. “You can wash clothes quickly and with no chatting, if you have to,” says Georgiana. “That’s how my brothers do it. But that’s no fun.”

Figure 3: Kinship Chart

19 Self-identified professions appear in the original Portuguese. See glossary for full translation of terms.
Work, Home, and the Vida de Empreguete

In the space of the home, women in Guajiru know all. They manage not only the upkeep of the house, but also familial obligations and finances. Kinship ties have played a major role in organizing divisions of labor—within the family, the community, and the business of seaweed cultivation. Marta and Edivan’s sons have found work outside seaweed collection through informal referrals made by an extended family member, such as a cousin who lives and works in Fortaleza or an uncle who needs help on a project the next beach over. This work is almost never permanent, and they often return to Guajiru and Flecheiras to work with the family or independently within the beach community. Their daughters have stayed even closer to home; they work in the seaweed collective when they are not busy with other tasks, such as housecleaning, childcare, or cooking—all of which have traditionally been, and continue to be, tasks reserved for women. This separation of work and place assigns women more to the spaces within the home rather than outside it, recalling Ortner’s theory on cross-cultural subjugation and the links between the (female) domestic sphere, nature, and inferiority—as contrasted by the public sphere, culture, and maleness.

Yet gender-specific work does not in every case point to an inequality. It also fosters strong individual identities, encourages pride in specific tasks and skills, and supports a family-based workforce that effectively maintains a tradition of sustainable living. Women often control domestic tasks like laundry, but they are not exclusive about this domain; men occasionally also do domestic tasks, with a lesser degree of skill and enjoyment, however. As Georgiana explained, her brothers will wash their clothes, but they will leave them wrinkled or do the wash as quickly as possible, without talking, taking breaks, or enjoying the work.
Men’s work is usually “heavy,” my host sisters explained to me one afternoon. Women’s work, on the other hand, is often called “simple” or “easy,” a *tarefa* (task) rather than *trabalho* (work). They said that women are always juggling many tasks at once, while men come back from bringing in the boat or preparing the fish, and they are done. Their work is over, and they might rest in a hammock or drink a beer. Women, on the other hand, often have an endless list of tasks to complete, and, “When it comes down to it, men sleep more. And women are always tired.” This is a simplistic view of gender divisions, and yet it is true to their daily experiences. Women generally sleep less and talk more than men. They gain much of their knowledge of community events in the afternoons and early evenings when they are cleaning and visiting with each other before preparing the evening meal—and while men are most likely still at sea, or resting. They talk about a range of subjects; the most popular subjects are intra-family relations (a birth, a death, a marriage, and other developments), followed by changes in local politics and property development due to increasing foreign tourism.

Gabi, age twenty, is the only one of Marta and Edivan’s four daughters without a child of her own—her brothers and sisters already have five children (all under the age of six) among them. The kinship chart at the start of this chapter (page 37) contains more information, including names, ages, and occupations of each family member. Gabi explains sheepishly that, “none of the kids are *mine*, but they’re all mine, really.” Her workday is packed, but she finds time to keep up with family gossip and community happenings by talking to each of her sisters throughout the day when they are home for meals, and by attending a women’s church group in the evening in the town square (*praça*). Her boyfriend of two years, Alexander, attends the men’s group.
At home, Gabi takes on the majority of childcare responsibilities during the day because her sisters have to work paying jobs in order to provide for their children. She also cares for the home(s), often staying at the house in Guajiru by herself in the morning while her siblings and parents are at the barraca. Next, she goes to the barraca in the afternoon to inventory or deliver supplies. On the weekends, she cooks in the kitchen at the barraca, which doubles as a small lunchtime restaurant. As she lists all of the different things she does for work, Gabi pauses to explain:

My father and my mother, they have a lot of confidence in me. They leave me responsible for everything: taking care of the house, taking care of the money, paying bills, buying groceries and supplies, always staying home when they go to the barraca to make sure nothing happens here while they’re gone. I also run the store [lojinha]. There always has to be someone here all day for that, too, watching over it. I also do craftwork [trabalho artesanato]. I do a lot of work with my sisters. I make and sell all of the fish scale pieces [artesanatas das escamas]. … We don’t depend only on the money we get from those, but it helps.

Throughout all our conversations, Gabi never said that she had a job, only that she always had plenty of “things to do.” She also clearly understood, and took pride in, the contribution that she was making to her family and to the seaweed collective; she not only controls the profits from the restaurant at the barraca, but she also contributes to the family income in an individual way with her artwork.²⁰ When I asked her about her boyfriend’s day before he came over each evening to help her with groceries and spend time together before the whole family ate dinner, she said, “that’s easy—he works at the new hotel making breakfast, he’s a line cook. He has to wake up early every day, but he is home by midday, and then he can help his mother and his sister at their house before he comes to see me. I get angry at him if he doesn’t help them first.”

There is a primary responsibility to one’s immediate family, Gabi explains, that everyone

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²⁰ Each contribution to the seaweed collective becomes equally valuable in the cycle of production and in overall revenue for this and other participating fishing families. For more information on the seaweed cultivation cycle and the value of handcrafts and other goods made from seaweed, see Figure 5: Paradigm of Seaweed Uses, page 68.
respects even after they are grown up and in relationships. The proximity of all the houses in the area allows extended families to stay close-knit and encourages inter-household relations.

Gabi’s younger sister, Clarisse, is married and living in a house at the end of the block, so she is only peripherally involved in the work of the family home and the *barraca*. She works on handcrafts (*artesenatos*) with her sister and with friends, but the majority of her time is spent maintaining her home and caring for her two-year-old son, Gabriel. At eighteen, Clarisse is living almost completely independently from her immediate family. But she is still present at family meals, celebrations, and other events.

Georgiana, twenty-one, also works in a house—just not her own. She is a domestic worker for a wealthy Polynesian homeowner. The owner (*dono*), whose name Georgi did not disclose, only stays there one or two months out of the year, and he never rents the house out when he’s gone. Instead, he pays Georgi and two other workers to clean and maintain the property, inside and out. She leaves home at sun-up and walks her daughter, Luiza, to school on her way. She is able to leave work in the afternoon to take Luiza home, but then she often has to return to work and leave Luiza with her aunts for the evening. She enjoys work most when her boss is out of town. When he calls to say he is returning to Guajiru for a vacation, he often neglects to give notice, and she and the other staff have to rush to prepare his favorite meals and other amenities so that everything is perfect when he arrives. When he is in town, she says that he and his friends sleep late, request breakfast at two in the afternoon, and leave the house in disarray.

One afternoon, Georgi asked me how to say ‘thief’ in English. She explained that the *dono* spoke no Portuguese, only Polynesian and a little English, so it was almost impossible for her to communicate with him. He would be arriving the following weekend, and she needed to
explain to him that someone had broken into his house at night and stolen some things. They had already solved the problem, she hoped, by hiring a nighttime security guard to watch the property.

The *dono* wouldn’t care about the missing sound system, clothes, or food, she was sure, but he would blame her for the robbery if she wasn’t clear about what happened. “Work is much harder when he is here,” she said. “He has a lot of money, and he pays us fairly, but he doesn’t treat his workers well. He treats us like slaves.” She didn’t give many details on how exactly she was treated poorly—only that he was never friendly, that he never made an attempt to learn Portuguese, and that whenever she couldn’t understand him (which was often), he would get extremely angry.

Georgiana decided to take English classes (offered once a week in Trairi, a twenty-minute bus ride from Guajiru) to improve her chances of finding a better job. But she missed three classes in a row because she couldn’t find transportation home. The classes are offered in the evenings so that people who work during the day can still attend, but buses stop returning to the beach communities after dark, and the only way to go home is to pay for a taxi, which she couldn’t afford. “Right now it’s just a waste because I’m paying for the classes even though I can’t go,” she explained one day. “One day I’ll take the English classes at the University in Fortaleza, the good ones. But I would need reliable transportation there, too, so who knows. And I have Luiza. I would love to go and learn English in time for the [World] Cup, but I can’t leave Luiza.”

In addition to caring for Luiza, taking English classes, working for the wealthy foreigner, and spending time at the *barraca das algas* on the weekend along with the rest of the family, Georgi often works as a masseuse at a local hotel where her friend works as a maid. Georgiana’s
experience as a young, single mother is not uncommon in the community, and she explains that many girls her age who get pregnant cannot rely on the men in their lives to help them with the financial costs of raising a child, nor with the daily parenting responsibilities. She turns to her sisters and her parents for that, as with most other important things in her life.

When the *dono* is in town, Clarisse helps Georgiana clean the house, and Julianna, their oldest sister, helps with the cooking. The three of them joke that they live the *vida de empreguete* (the *empreguete* life). The phrase is an emerging mantra for domestic workers; it was originally referred to in a popular Brazilian soap opera, and has since become a pop-culture sensation. The term *empreguete* reclaims the word *piriguete* (a term for a promiscuous woman, which roughly translates to the English pejorative ‘slut’) and merges it with the word *empregada*, or worker. The majority of domestic workers in Northeast Brazil are young women, and the soap opera features three young workers as principal characters fighting for better worker’s rights and for their own personal empowerment. For more about the Brazilian *telenovela* and its function as social commentary, see pages 51-53 in “Formal and Informal Education.”

Juliana, twenty-four, owns a house with her husband on the same street as the family home, just two doors down. She has a one-year-old son named André and her husband works in Fortaleza, so he owns a car and makes the three-hour commute weekly to and from work. Juliana makes *cosméticos* (beauty products such as lotion, soap, shampoo and conditioner) using local materials and the seaweed gathered by the collective to supplement her husband’s income. She also rents out a portion of their house to tourists passing through for festivals, vacation, or work.

Juliana says that her first responsibility is to her young son, and that her work is always “simple” and “something she can do in between other tasks,” like when André is napping, or while she is cooking dinner. Like her sisters, she is doing many different jobs at the same time,
and it is still not discussed as “work,” but rather as “tasks” or “responsibilities.” And yet these women carry some of the most important responsibilities in the home, and as a result, their bargaining power within that space—their ability to negotiate with other family members to get what they want—is very high.

Their work is not necessarily treated with the same value, respect, or visibility as men’s work, though. Even though they often control more of the finances, food, and other goods coming into the home, community members do not value those resources as highly as fishing and fish products—the community’s cultural output. Women in these communities are searching for ways to make a more visible contribution to their own homes and to the community, as detailed in the following chapter. But unofficial bargaining power within the home can become useful as they move into public forums for additional income, activism, community development, and recreation. Their bargaining power most often manifests through their control over resources, as theorized by Agarwal (1997; 1994) and Friedl (1975) in their research on labor divisions in subsistence-based cultures. The women in Marta and Edivan’s family control most of the food through the preparation of meals—not to mention the money—that comes into the home. The men are in charge of securing labor outside the home that brings money in, and they are often also in charge of bringing in the main sources of animal protein (fish or chicken) although women buy all the other groceries and harvest fruit, seeds—and, of course, seaweed—for consumption.

These resources are tied to women’s (natural) gathering role, whereas fishing (a kind of hunting) has long been male-dominated cultural activity. Harvesting seaweed, a plentiful and renewable coastal resource, has the potential to raise women’s social status and improve their bargaining power as they apply their so-called domestic skills to seaweed cultivation outside the
home. The seaweed collection cycle employs existing cultural knowledge of the coastal ecosystem along with women’s seaweed gathering, washing, drying, and cooking skills. In this way, they are able to craft an alternative livelihood that blends tradition with new technologies for larger-scale production that, for the most part, does not rely on men as cultural mediators. Women’s key roles in the seaweed production cycle are outlined in Chapter 3, pages 57-78.

**Formal and Informal Education**

The Brazilian Government has acknowledged—at least in part—the importance of securing women’s agency in the home. The *Bolsa Família* anti-poverty program, finalized by Brazil’s Lula administration in 2003, grants families with children a modest, monthly supplemental income as long as children attend school and get regular medical check-ups. Detractors believe that the program creates dependency among low-income families and a lack of initiative to find steady jobs. Most existing research, on the other hand, shows that the program has helped to get families above the poverty line and boosted attendance and enrollment in schools. The *Bolsa Família* or Family Allowance Program, the largest and most progressive of its kind, helped reduce poverty by nearly 28% in Lula’s first term in office—the program is estimated to cover 11.2 million families or about 44 million Brazilians (Brandão & Aragão 2007: B14)

Perhaps the most effective requirement of the program is that the money must be collected by a mother who presents a *Bolsa Família* identification card in exchange for cash at designated pick-up sites. This grants women additional control over family finances and pushes them to support education for themselves and their children. Georgiana, Juliana, and Marta each collect the *Bolsa* on their assigned day each month. The only drawback is that they have to travel
into the neighboring municipality of Trairi by bus to get it, and there are often long lines at the cashier once they arrive.

A lack of affordable transportation becomes a barrier to accessing public goods for families in these beach communities. Elementary school and middle school can be completed in Guajiru, for example, but in order to complete the third and final level of school, students must commute to and from Flecheiras every day by bus.\textsuperscript{21} Going to high school also makes it harder for teenagers to work or help their families at home, which before the \textit{Bolsa Família} program took effect, would have crippled the family income. The cost of attending school—paying for things like transportation, books and supplies—was magnified by the absence of child labor, and formal education was cost prohibitive for most families.

The siblings agree that they skipped school more frequently in the years before the \textit{Bolsa}. Most of the time it was because they weren’t given meals at school and had to wait until midday when their father came home with the day’s catch to eat a full meal. Georgiana explains:

João Lenon, Jack and Juliana and I would have to wait for dad to get home with fish to eat. We sometimes had no other food and school didn’t provide snacks. The house was smaller then. Fewer rooms, no restaurant. We had very little furniture, so we would all sit together on the floor to eat in a big circle. … Jack and I were so close in age that we always went to and from school together and we were in all the same classes. He fell behind by a year and didn’t finish the last year, but he had already aged out of the \textit{Bolsa} anyway. I stayed until I became pregnant with Luiza.

For Marta and Edivan’s seven children—four of whom were in high school at the same time—the \textit{Bolsa Família} provided a way to stay in school for most of their teens\textsuperscript{22} and to have at least one meal a day provided for them.\textsuperscript{23} The program has limitations, though (The Economist 2010).

\textsuperscript{21} For more on limited modes of transportation affect families as well as community development work, see “Access and Barriers to Opportunity,” beginning on page 71.
\textsuperscript{22} Children are required to continue until they reach third level of school, which aligns with the start high school in the U.S.—finishing the third level is optional, but encouraged. Applying for and attending a university is much more rare in these communities. I only met one native of Guajiru or Flecheiras who had pursued her bachelor’s degree.
\textsuperscript{23} The grant also funds a midday meal for all eligible students.
The money is not sufficient to live on, and many children still leave school early to find jobs, waiting until they age out of the *Bolsa* (usually at fifteen or sixteen) so that their families aren’t barred from receiving the funding. Girls who become pregnant while still in school often do not finish, and, if they are still living at home, they usually are not eligible to receive their own *Bolsas* because they are still dependent on their mothers’ grant incomes.

Despite its flaws, the *Bolsa Família* program helps children stay in school and helps their mothers support them. But many women value the education their children get outside of school as much if not more than their formal learning. In these beach communities, women are involved in sharing cultural knowledge from one generation to the next because of their integral role in childcare. Gabi’s mother taught her how to cook and care for the home, and Gabi is teaching these same tasks to her young niece, Luiza. When Gabi washes dishes, Luiza plays kitchen with dolls and stuffed animals. And when it’s time to do laundry, Luiza climbs into the large metal basin and turns on the hose, dancing around and throwing clothes (clean or dirty) into the water before her aunt even has a chance to get the soap.

“Luiza is my life,” says her mother, Georgiana. “Everything I do—and everything I don’t do, or can’t do—is for her.” For this reason, having and caring for children is both a limitation and an inspiration. There are many things that Georgiana used to do before having a child that she no longer has the opportunity to do, such as recreational activities\(^24\) and working at the *barraca* with the family. Her responsibility now is to make money in order to provide for Luiza, get her to school, and help her study; she only goes to the seaweed collective on the weekends when she can bring Luiza with her or when someone is available to watch her. Getting pregnant at sixteen meant that she lost the opportunity to finish out her adolescence—it also meant that the next generation of the *familia de algas* was already learning the ins and outs of seaweed.

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\(^{24}\) She used to surf but says it’s too dangerous now, and that she doesn’t have the time for it.
cultivation and sustainable mariculture. Georgiana explained the benefits and setbacks, and the continuing seaweed tradition (*tradição das algas*):

When I was pregnant with Luiza, I ate so much seaweed. Plus I was all round, so I was like a turtle! [Laughing] And when she was born, even as a baby, she ate it. Mom always made soft *gelatinas* [desserts] and fruit yogurts from seaweed that Luiza loved. Now she’ll snack on them raw like candy. And she’ll even eat the salads, if she sees the rest of us doing it anyway. … But when I first got pregnant—I was the first girl to get pregnant so young around here. I went out on the street once after I had started to show and people stared. They wouldn’t stop. One man stopped and said, “Look at that girl, pregnant. She wasn’t thinking,” like the blame was only on me. After that I didn’t go out. … I stayed in the house for the rest of my pregnancy. I was depressed; I cried all the time. I had my family, but no one else.

It is impossible to understand the multitude of ways that having a child changes someone’s life. But in this specific cultural setting, within this environmental movement and this particular family, having children young is very common; it is engrained in the structure of both family and community relations. Georgiana was one of the first in her generation to become pregnant as a teen, but she says that she now has several friends who are younger than her but already have three or four children of their own. She mentions that the youngest daughter of the man who stopped her on the street became pregnant a few months after that encounter. “Sometimes I think it was God teaching him to understand,” she offers.25 Her parents are in their early forties with children as old as twenty-four, and her grandparents are in their sixties. Unlike other limitations (to education, steady income, and transportation), having children affects women more than men. Not to say that fathers, brothers, and uncles are absent from the child-raising practice—in most cases they are very present, positive influences—but rather that children born to unmarried

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25 Though I believe that religion plays a role in both family and community dynamics—Brazil is after all a predominately Catholic nation—I did not gain enough insight into the cultural value and practice of religion during my research to include it in this paper. In moments such as this one, however, religious belief becomes an important form of personal expression; it also indicates broader cultural trends and expected, gendered behavior related to family planning.
parents almost always live with their mothers or the extended family on their mother’s side, and so the mother ultimately assumes responsibility for her child’s daily well-being.\textsuperscript{26}

Having multiple generations living together in the same community (and in many cases in the same house) is an opportunity to pass on cultural values and traditions from an early age and to ensure the continuation of those values and practices. Luiza’s affection for seaweed exemplifies a positive outcome of raising children at a young age, with the help and support of family members. It also reinforces existing kinship bonds; having and caring for children is a communal and continual practice shared by all women (and men, though less directly and less often) in the household. Any relative who is not otherwise occupied will be sent to spend time with the children or to watch them while their parents are working. Children keep the extended family closer together, both physically and emotionally. Since five out of the seven children of the família de algas already have young children of their own, this family is not likely to separate or leave the communities of Flecheiras and Guajiru, or the seaweed business, anytime soon.

Cultural expectations, traditions, and adaptations are also often exchanged through music and dance. Music is something everyone seems to know and love, no matter their financial standing or their education level. It ranges from the most popular style in the Northeast, the lively partnered dance forró, to the grittier, more sensual baile funk, which combines samba and reggaeton beats and has a strong youth following often compared to that of hip-hop in the United States. Dancing is a favorite pastime and can also be a way to learn nordestino values and tradition. Dança quadrilha is a Brazilian square dance with influences from Holland and Portugal, introduced to Brazil in the colonial period. It is a popular event at many winter festivals, especially in smaller towns and rural communities. Every June, a quadrilha group

\textsuperscript{26} This is the case with Jack’s two-year-old daughter, Eloá. His former partner lives in Flecheiras with Eloa. They were never married, so Jack visits his daughter whenever he is in Flecheiras for work, which is several times a week. Eloá often visits the family house in Guajiru and occasionally spends the night there, with her mother’s permission.
travels to the nearby municipality of Trairi for a quadrilha performance complete with a live band and several pairs of dancers dressed in traditional peasant clothing. In the space of the home, music is often played from small portable speakers or from cell phones while children sit on front stoops or do chores in the back yard. Juliana swears that André could dance before he could walk, and that Luiza has nearly mastered complicated forró steps at age five.

Dance can also be a way to reinvent these traditions. Many of the more risqué baile funk songs feature female vocalists preaching an empowered, no-nonsense approach to sex and love for young Brazilians. Some of the popular verses have lines like, “I’m young and hot / you got a problem with that? / I’m not just a great little body / I’ve got a great mind, too.” My host sisters often said that listening and dancing to funk music was “the time to break the rules.” In this way, music also provided a presentation of values and information from outside the community; lyrics, whether empowering, degrading, or neutral, are an invaluable cultural tool with which to challenge gender norms.

Television is another mode of informal education that has particular significance for women in Guajiru and Flecheiras. In the past few years, more families have purchased TV sets, and some have even splurged on computers and Internet. Most of the mercadinhos (corner stores or grocery shops) have a few computers in the back or along one wall and a hand-painted sign saying “Internet here!” Very few individual families have their own Internet service, however. Marta and Edivan forego an Internet connection in favor of pay-as-you-go cell phones, which they will occasionally pay to reload and use as a main mode of communication. Marta’s children pooled their money and bought a television and a DVD player for her last Mother’s Day. Since then, the family has taken to carrying the TV back and forth from Juliana’s house to Marta’s whenever someone wants to watch a movie. Often, if everyone can agree, they will also set the
TV up semi-permanently on the back patio of Juliana’s house for the week. In the evenings, the patio becomes a meeting place for the family. Everyone crowds around on hammocks, stools, and chairs to watch that night’s novela (telenovela, or soap opera).

Unlike most American soaps, Brazilian telenovelas are known for including spicy social commentary and controversial themes and plotlines. The shows air on public access channels that anyone can watch, and the storylines usually only run for one season. As a result, production value is higher and viewers tend to be more invested in plots and characters. The influence of the telenovela on Brazilian social norms is most apparent in rural and impoverished areas where everyone watches the same channel at the same time (usually between 7 and 10pm, after sunset and the end of the workday). In his discussion of the social significance of novelas on social governance, Jeff Garmany (2009) goes so far as to say that these more remote areas actually experience greater, if informal, regulation of expected behavior than urban centers, even though cities have a more explicit governmental presence through social services and other resources. Increased governance in impoverished and rural areas occurs, Garmany argues, because of informal methods of social control, like television.

In addition to watching soap operas, residents of Guajiru and Flecheiras view news segments on local instances of violence, theft, and protest often in between programs. These newsreels are a way to disseminate information to the public. Television affects cultural behaviors, including appearance and style trends and work routines; watching TV is a recreation and a distraction from daily tasks and stresses. It is also where people, especially in smaller, more isolated communities, learn expected modes of behavior and information on public safety, politics, and current events. TV also has the power to influence gender roles and divisions of labor; most shows reinforce cultural attitudes about gender by featuring stereotypical male and
female leads, with women characters who are untrustworthy and often hysterical and male characters who are stubbornly aggressive—but who are employed, while the women usually are not.

One program this past season used romantic comedy and satire to inspire female agency and challenge expected class-, race-, and gender-based behaviors. The show, Cheias de Charme (“Full of Charm”), ran from April through September 2012 (Globo TV 2013). It followed the lives and careers of three young maids working for a rich and famous female singer in Rio de Janeiro. The women rechristen themselves empreguetes (the combination and reinvention of the words for ‘slut’ and ‘domestic worker’) when they realize their shared ambition to break into show business. They start a movement for better treatment of domestic workers by writing catchy pop songs and singing them to whoever will listen. The release of their songs online, most notably “The Empreguete Life,” results in their wrongful imprisonment and creates public outrage. Devoted fans organize protests and tag city blocks and buildings with phrases like “long live the empreguetes” and “free the empreguetes.” Needless to say, these events catapult the women to stardom and make for a dramatic and fun-filled season of television.

The empreguetes became a cultural phenomenon, on-screen and off. The actresses began playing concerts together and making public appearances to talk about what the characters meant to them as young women in show business. I even heard of a few places in the city where people had actually spray painted “empreguetes livres” on sidewalks and storefronts. The women in Marta and Edivan’s family loved the show; they would often make joking comparisons between the main characters’ storylines and their own experiences, even though they had never traveled to Rio (where the show was set), and Georgiana was the only one officially working in domestic service.
It is unlikely that the show will bring about any lasting changes in the treatment and recognition of domestic workers and their rights. Even so, the program undoubtedly influenced the social dynamics of my host family. It inspired heated conversations about so-called women’s work and the way women were often ignored and undervalued (“Finally, someone is talking about us,” Georgiana said one day after the show ended), and it created a commentary on social relations and gender norms—one which could have just as easily taken a passive stance on women’s work, but instead chose to actively counter the assumption that women act only out of submissive support for others rather than taking a position of power, in this case at center stage.

**Adapting Family Dynamics**

Just as television can provide informal education along with social guidance and commentary, it can also function purely as a form of recreation, an escape from daily stresses and responsibilities, and a social activity that brings everyone together at the end of the day. Yet the women in Marta and Edivan’s family would sometimes have to miss part or all of their favorite *novela* in order to prepare dinner for the family. The women still maintain sole responsibility for meals and housecleaning, and those tasks take priority over recreational activities. Just as Georgiana gave up surfing after she had Luiza, Gabi gave up plans to continue her education once she took on more responsibilities at home and at the *barraca*, and Juliana and Clarisse both agree that all of their extra money from the *Bolsa* and their work goes directly to caring for their children. For example, the *Bolsa* requires doctor’s visits, and although Brazil has socialized medicine, the grant money is never enough to cover the cost of things like diapers, toothpaste, and sunscreen—which is more of a necessity than a privilege (even for the lower class) in a region where skin cancer rates are extremely high.
Women are ultimately tied to the space of the home more so than men, and this often puts them at a disadvantage when it comes to balancing recreation and responsibility. Each of my host sisters said that she enjoyed cooking. They admitted, though, that spending hours walking to the market to purchase, pluck, and prepare a whole chicken (or more) for a dish of *crema de galina* (a creamed chicken stew, made from scratch) could get tiring. They wouldn’t relinquish their monopoly on childcare so easily, though. They insisted that only women are capable of looking after children properly. Childcare is a task they wouldn’t pass off to men even if they could.

My sisters also said that their own experiences of the violence and machismo (that scholars say is engrained in Brazilian culture) is much less than in the big cities like Fortaleza or Rio. Although their husbands, boyfriends, and brothers expect them to cook dinner and clean house, if they don’t feel up to it one day, the men are capable of filling in. The men in the family acknowledge that they don’t have the time or patience to prepare a meal or keep a house like their female counterparts, but they will step in when someone is sick or has to work outside the home, or when one of the children needs special attention. Stepping in to help a spouse or a sibling and assuming an alternate role was expected behavior among most fishing families in these communities, my host mother explained. Labor divisions in Flecheiras and Guajiru, though gendered, are also co-dependent on both male and female heads of house. Furthermore, the women in the *família de algas* understand their domestic roles as safer and more stable than the lifestyles of women in urban centers such as Trairi or Fortaleza.

The physical labor that men do outside the home—working on fishing boats, as construction hands on new hotels or other structures in town, or out at sea with lobster traps or casting nets—often takes an emotional toll on them once they return home. There were several instances of alcoholism and drug abuse among mostly middle-aged men in the communities,
which their wives and girlfriends explained as a result of their receiving their off-season fishing benefits from the Brazilian government in cash. This dependency on a supplemental cash income as a way to self-medicate is common in coastal communities, and certainly contributes to machismo, violence, and intra-household conflict. Yet the government maintains that lump sums of cash are the most effective ways to distribute money in poorer and more remote communities.27

From my study of intra-familial roles and relationships, I found that the family unit functions best when every person is doing his or her specialized task. Though women are less free to take breaks and relax, they are also proud of the work they do within the home. Gender relations on a micro level within these beach communities, then, lead to another cultural dilemma not unlike Skidmore’s assessment of women’s participation in Brazilian politics: how can women exercise personal agency when they are limited in their occupational, educational, and recreational opportunities at home?

In a study of rural-urban migration among Brazilian farmers, Anita Brumer (2008) concludes that two factors often further the division of labor in small communities. First, “The family production unit brings together the efforts of all members of the family with a view of benefiting all, and the units of production and consumption are the same,” and second: “the androcentric culture of the society makes men [most often] responsible for providing for the family and women responsible for the material care of the family members” (22). Brumer also supports the previous scholarly opinion that, “While males more frequently venture beyond their homeland, women are more migratory than males within it” (12). Women are especially capable

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27 I was not able to fully explore this aspect of domestic life during the course of my research, but I did observe a relevant cultural pattern of behavior: receiving Bolsa Família funds in cash was not a problem for the women that qualified for them, but that the majority of men that received a stipend for the off-season of lobster fishing lost most of the money to these kinds of vices.
of extending domestic skills to spheres beyond the household, while men are better suited to one form of employment at which they are proficient and knowledgeable, like fishing in the case of the Northeast coast, and family-farm agriculture in the case of Brumer’s study. The men in my host family were able to take on diverse forms of employment, from construction to food service to utilities. Men saw these jobs as both culturally valuable and profitable, whereas an innovative but undervalued resource like seaweed was not.

With this in mind, it follows that women should be key players in many activities within the home and outside of it. Assuming the historical limitations on their gender can be actively combatted by formal and informal modes of education and empowerment, women in these communities should be able to participate fully in activities that foster community development and jobs that encourage a sustainable way of life for the community and the environment on which it survives. Once they are full participants with equal access to unmediated natural resources, such as seaweed, they should also be able to elevate their historically subordinate social status by utilizing that resource for profit.

The following chapter outlines women’s involvement in the community as a whole and in the work of the seaweed collective specifically. The women of Marta and Edivan’s family seek camaraderie and greater access to opportunity outside the home through the seaweed project, religious groups, and other community events. In the case of the seaweed project, they have taken an activity that they used to do at home and adapted it to better serve the community as a whole. In keeping with Brumer’s findings, these women are more willing and able to adopt a new way of working and making money with an unusual resource—through the cultivation, processing, and sale of seaweed and its derivatives—than the men in their lives.
Chapter 3

Gender, Community, and the Cycle of Seaweed Production

“There are three kinds of territory in Ceará,” Edivan explains to me as we stand at the edge of a shallow stream. It is cradled on one side by row after row of mangroves, and on the other by a nearly flat expanse of coarse sand the color of eggshells. “There is sertão (desert), serra (mountains), and mar (ocean).” The stream is brackish (salobra); its mix of fresh and saltwater marks the convergence of the community’s potable water source (which allows for small-scale agriculture and provides water for filtration and consumption) and open sea (the main source of subsistence, revenue, and recreation). The mangroves sustain the richness of the coastal ecosystem, filtering toxins and providing essential nutrients that support a wide range of marine life, from microorganisms to fresh- and saltwater fish, not to mention an abundance of seaweed.

The Gracilaria seaweed gathered along this strip of pristine coastline is high in manganese, which supports healthy bone growth, and it also contains potassium, zinc, and A and B vitamins. Whether in its boiled-down version as agar or in its fresh form—“crunchy like a
carrot, but watery and with the aftertaste of ocean,” Edivan explains—it is a valuable addition to the Northeastern diet.

Three beaches, two homes, one family

The three principal beaches in the municipality of Trairi, Ceará are Guajiru, Flecheiras, and Mundaú. They are only three of many small and relatively isolated coastal communities on the outskirts of a much larger metropolitan area, the state capital of Fortaleza. Local residents express a disdain for city life, which at times borders on fear. For the most part, locals travel to Fortaleza and even Trairi for four main reasons: for medical emergencies and more advanced treatments (Guajiru and Flecheiras each have a health post [posto de saude], but they only have basic supplies and often run out of medications); to obtain or submit government documents or payments (such as the fishing license that any artisanal fisherman or fisherwoman can receive,\textsuperscript{28} or the Bolsa Familia that the majority of women with children also collect); to purchase large amounts of groceries or bigger-ticket items like electronics at a lower price (they expect everything to be nearly twice as expensive in the communities as compared to the city); and for cultural events like concerts, films, or soccer games.

Aside from these reasons, residents do not have much interest in traveling to metropolitan areas. Many women expressed a particularly strong dislike for the task of commuting by bus to Trairi to buy groceries because of the extra commute time, the heavy loads of food, and what was described as the “busy-ness” of the town; more people, more cars, more unwanted attention from passersby (a whistle, a honk of a car horn, or an obscene gesture). They also were under the

\textsuperscript{28} The license, or carteira (dos pescadores) is a government document created by the Ministry of Fishing and Aquaculture, (MPA) that registers traditional fishermen with the state and federal government, allowing them to qualify for benefits including rights to fish for subsistence and profit and a small stipend of about 3,000 Reais (1,500 U.S. dollars) at the end of the six-month-long lobster fishing season.
impression that the city is more dangerous and more closed off (*fechada*) than the beach communities. This sentiment applies to city residents, too; city people are described as more guarded (*guardado*) and less friendly, less open.

The *família de algas*, as they are so often called, occupies two locations, each well outside the city. The first is the home in Guajiru—a one-level house with a tile roof, three rooms, an outdoor kitchen, an attached room that was once a restaurant and now a small store (called *ArtAlgas*) and sandy back yard space called a *quintal*, complete with fruit trees, a clothesline, a chicken and several cats. Inside the house, wooden chairs line a long, rectangular table along with several hammocks hanging in each bedroom (and three twin mattresses in total). Each bedroom has a large, standing wardrobe shared by two or more siblings. A small indoor bathroom with a sink, toilet, and tile shower is the most recent addition, attached to one side of the kitchen.

The second house is the *barraca das algas* in Flecheiras—officially a communal space built about ten years ago for the purposes of the seaweed collective, it is considered by the family to be a second home. (They spend long days and occasional nights there “watching over” the seaweed.) The structure sits on the side of the paved road that connects the communities to the municipality, just at the entrance of Flecheiras. A fence constructed of driftwood and tree trimmings surrounds the entire plot of land, which extends from the road to the start of the beach. Recently planted *coqueiros* (coconut palms) line one edge of the fence, and the *barraca* itself sits in the middle. It is an open-air structure with a roof thatched from palm leaves and a walled in kitchen on one side. There is no electricity there, which means no refrigeration. There is a gas stove for cooking and a large solar-powered battery in one corner that provides energy for three small mounted lights at nighttime. On the opposite side of the plot of land sits another walled-in
room with hammock hooks, a bookshelf and a wooden table. A second thatched, open air
structure shelters the seaweed washing table and meeting area where families can work together
to clean and prepare the plants (see Figure 4, page 61) before moving them to the drying stations
(also solar-powered) that sit against the fence.

The beach itself is part of the collective, too. A gap in the fence leads out to a stretch of
sand and shallow waters in between the two ocean reefs (usually called bancos naturais). Boats
do not pass over the cultivation site, where long ropes attached to buoys string out into the ocean
beyond the breaking point of the waves. There is no official prohibition of sea traffic or
documentation to protect the land; it is known throughout the community as a communal space,
and the network of communication among fishing families is enough to keep boats and
trespassers away.29

In both locations (the house and the barraca), each member of the família de algas also
has a place, a sort of system of tasks and spaces for these tasks. Yet, since the family has been a
part of this system their whole lives, it is impossible to delineate and separate each individual
process; skills, activities, and spaces constantly overlap, and individual work transforms into
communal work seamlessly throughout a day at home in Guajiru or at the barraca das algas.
The most overt distinction occurs between the cozinha (kitchen) and the quintal (back yard or
grounds) and between cuida (care) and proteção (protection).

29 Recently, however, government agencies have threatened to commercialize seaweed mariculture, which would
transfer ownership from community to state and deprive families of the physical space of the collective and the
additional income it provides.
**Construção:**
Constructing rope structures (*cordas*)
- Building a *modula* (structure) of rope 100meters long.
- Attaching Styrofoam or plastic *bôias* (buoys) every 3-5 meters for flotation.

**Coleção:**
Collecting from coastal reefs (*bancos naturais*)
- Selecting clean, robust plants.
- Tearing off a portion of the plant from the reef, leaving roots for regeneration.
- Gathering *mudas* (seedling bunches) weighing between 50 and 100grams.

**Fixação:**
Attaching seaweed to ropes
- Tying *mudas* to rope structure one meter apart.
- Securing knots and cleaning away other *algas*.

**Plantação:**
Submerging ropes into ocean (Leave at sea for 30-45 days)
- Selecting cultivation site away from boat traffic and heavy fishing.
- Launching small boat(s) (*Rolando o paquete*) into ocean, carrying rope structures.
- Stringing ropes out into water, allowing currents to pull structure out to sea. (Making sure seaweed bunches are submerged one meter below surface.)

**Limpeza:**
Cleaning seaweed crops
- *Rolando o paquete* and paddling to cultivation site.
- Jumping into ocean and scrubbing each *muda* by hand.
- Removing other *algas*, microorganisms, or small crustaceans and reattach falling or slow-growing bunches.
- Scraping ropes clean with knife.

**Colheita:**
Tearing seaweed from structures
- AFTER 45 to 70 days: Tearing (*tirando*) seaweed from ropes. (One structure should yield 200-250kilograms.)
- Filling plastic or burlap sacks and carrying to washing station.

**Separação e Lavagem:**
Separating and cleaning seaweed at washing station
- Filling washing station with fresh water and scrubbing seaweed by hand.
- When water becomes murky, draining table and refilling. (Repeat washing process 3 to 4 times.)

**Secagem:**
Drying
- Placing seaweed in *secador* (drying table with mesh bottom, ventilation on sides, and solar-panel lid) and spreading flat.
- Checking color and texture every few hours. If still dark and/or dirty, let soak overnight in a basin of fresh water and limes before returning to drying table.

**Comercialização:**
Packaging and preparing for sale or production
- Packaging *algas naturais* (dried seaweed in small bunches) for direct (local) sale.
- Packaging bulk seaweed for export; store in a dry, enclosed space.
- Making *produtos* (products). (See Figure 5, page 68, for more information)

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**Figure 4: Taxonomy of Steps in the Seaweed Collection Cycle (Cycle of Production)**

For the most part, only the women cook meals and only the men work on the grounds around the structure of the *barraca* or in the back yard of the house. Similarly, women stay
within the structure of the barraca, cleaning, taking care of seaweed that has been brought in from the ocean (by men, usually), while men work on the perimeters of the physical space, securing the structure, building the fence, planting trees, or by keeping watch at night (segurança). Within these broader labor divisions, there are also individual variations and specialties in work, which create spaces for creative expression and individuality within the structure of family—opportunities to which they would not have had access had they not entered into this kind of community work, but which still delineate spaces and opportunities for work on the basis of gender.

**The (In)visibility of Women’s Work**

Many scholars have commented on the economic and social invisibility of women’s work as a cross-cultural trend. They tend to disagree on the origin of ignorance surrounding labor divisions, however. A range of historical and contemporary theoretical texts discuss female subordination—from Ortner’s “Is Female to Male as Nature is to Culture?” (1972) to Frield’s *Women and Men* (1975) to Deere & León de Leal’s *Rural Women and State Policy* (1987) to Agarwal’s *A Field of One’s Own* (1994). Yet fishing communities have been known to defy this model and operate within a more egalitarian social structure, and in some ways this continues to be the case in Northeast Brazil. Women in Guajiru and Flecheiras feel that they are treated more fairly than they would be in a big city. This opinion may be based on stories they hear from relatives and friends living in larger urban centers, or because of a strong sense of kinship bonds and familial protection within the space of the community. However, as explored in the previous chapter on gender divisions in the home, women do experience limits to their roles, abilities, and opportunities on a daily basis.
Researchers at the Terramar Institute recognized these limitations and sought to circumvent them through the implementation of the seaweed project. They took the traditional form of mariculture that women knew well and adapted it to fit both a local and an international market; they emphasized community involvement and the importance of shared and sustainable resources. Seaweed harvesting has historical gender divides, but not necessarily inequalities. As she explains her commitments and connections to the fishing community, Marta considers the contributions that women make to both their family and their community:

A woman who stays at home and cleans the house, takes care of the family and cleans and prepares the fish, or who collects seaweed for food, to sell, to make products—she is still a fisherwoman [pescadora] and a collector [catadora]. … It used to be mostly women collecting seaweed, but always with other members of their families, too, in family groups. Then when the cultivation started—they called it “Seaweed: Cultivating Sustainability” [Algas: Cultivando Sustentabilidade]—we were able to produce and collect and sell more and more, the loads became heavy and we had to use the small boats [paquetes] and use heavy anchors sometimes, or carry large bags of seaweed when they were still wet, so men became more involved. But it was always valuable work, important work, even before the men.

This gendered distinction reinforces not only “heaviness” of men’s work, literally and figuratively, but in the same breath it also legitimizes women’s roles as workers, rather than diminishing them. The structure of work within the seaweed collective often emphasizes family relations over gender relations. This suggests that, for the formation and continuation of this project of “cultivating sustainability,” the familial bonds—and the ability of each family member to become proficient in specific tasks as well as group work—are a highly valued component of the collective process and of the community as a whole. It recalls the cultural transformations from “muck” to “algae” and from “collect” to “cultivate,” which marked the technological and cultural innovation of seaweed harvesting and exemplified women’s increased participation in an alternative occupation.
In the ten years since the seaweed project’s inception, the presence of female community leaders has grown. They have gained a greater influence over meetings, events, territory management and revenue-generating work. The examples are numerous: the community meetings used to be run by local fishermen, but now they are held by the neighborhood association, which is regularly attended by about three times as many women as men; women always collected seaweed, but the advent of the cultivation project allowed for them to make a profit and to receive support from the rest of the community for their efforts; women used to spend a lot of their time “waiting”—for men to come home with food, for news about their spouse’s well-being out at sea, for an opportunity for work in town or in small-scale aquaculture when the seaweed was growing well in the natural reefs—but now they can control when and how much seaweed and seaweed-product they produce, harvest, and sell. This extends their bargaining power from the domestic sphere to the public (cultural, political) sphere.

The young women involved in a local *ponto de cultura* (a youth group started by Terramar in 2010) focused on the environmental importance of seaweed put it this way:

> The fact that we have so many women working here on the seaweed project is by virtue of freedom—the independence of women now. Because before, women were focused more on the home. Buying things for the family, getting and preparing the food, and caring for their kids. They still have to do these things, but they have help. Everyone at the project helps each other.

Cassiane, an eighteen-year-old native of Flecheiras, explained this to me during one of her visits to the *barraca* with the other members of the group, Gabrielle and Jessica (sixteen and seventeen respectively). They said that they were the most active members of the group, along with one boy, who couldn’t be there that day because he had to work. There were thirty original

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30 There are four elected speakers at the association, three of whom are men. The fourth is a woman, Gláucia Sena, who is also the Association President. The increased female attendance was noted formally at the start of the meeting. The meeting times were recently switched from a weekday evening to Sunday afternoons, which allowed more women to attend and often bring small children or elderly relatives with them.
participants in the group at the start, and the ratio of girls to boys was just as high. Cassiane said
the others only show up on a day where there is a fieldtrip or a dinner or a community event—
they are much less likely to come to the weekly meetings and learn about the environmental
science of seaweed. The three girls looked up to Marta and Edivan. They explained that Natalia,
a Terramar employee, is technically their teacher but that Marta and Edivan are teachers too,
“almost like mentors.” In their conversation and excited chatter throughout that day at the
barraca, they commented on the relative independence of women who participate in the project
as compared to stories they were told about women’s work when they were younger. They only
wished that their friends and family valued the cultivation project as much as they do. For more
on youth involvement and the cultural value associated with the project, see “On production
value” and “Access and Barriers to Opportunity,” pages 71-78.

Other members of the beach communities do not acknowledge the importance of the
project to the same extent, my family explained to me, nor do they fully acknowledge the value
and visibility of women’s work. Women may be more active participants in the seaweed project
than men, and they may be more influential in the project’s success because of their influence on
the structure of the home and the communication of customs and traditions from one generation
to the next. But they still do not consider their work to be as legitimate as that of fishermen or
men who have jobs in the city. Most women do not obtain a fishing license (or carteira) because
of de facto gender divides that still exist in practice even if not in theory. Women prioritize their
husbands’ or brothers’ licensure over their own. Similarly, barriers to transportation, education,
and other opportunities that affect women more than men often keep fisherwomen from getting
the permit even if they want one; this is an ongoing issue that has hindered the seaweed project’s
success and will be explored further in the following sections.
Despite Marta’s argument that a woman working with fish or seaweed can call herself a \textit{pescadora} and have access to the legal rights (not to mention the social visibility and respect) afforded by the permit, most men and women do not think it is all that important, in the long run. Yet women continue to value the knowledge, revenue, and camaraderie gained from the implementation of the seaweed project. They are good at the work, and they have control over the resources and products that they make and sell. The lingering devaluation of the tasks they are responsible for stems from persisting cultural expectations for women and barriers to opportunity that they face in these communities.

\textbf{On production value and the application of algas}

The members of the \textit{família de algas} have always taken a certain pride in their position as leaders, this air of “being known” (\textit{conhecida}) by everyone in town: Edivan is a longtime \textit{pescador} and community organizer from Flecheiras, and Marta is a \textit{algueira/marisqueira/pescadora}\textsuperscript{31} (a \textit{conhecida} in her own right) from Guajiru. Their work, along with the work of their children, both furthers and adapts these cultural traditions. This family exemplifies the value of bonds formed between communities, between families or groups, and within the generations of a single family. Ten years after the start of the Seaweed Project, only a handful of the original eleven families are still involved in the collective. And of those still involved, no one spends nearly as much time at the \textit{barraca} (the center of production for APAFG), as Marta and Edivan, their children, and their children’s children. Marta explains that over time, the collective has experienced its share of internal struggles and family-to-family competition:

\textsuperscript{31} Women who work with seaweed (officially called \textit{alguieras}), women who work with other forms of mariculture (\textit{marisqueiras}), and women who go fishing or prepare fish (\textit{pescadoras}) seem to use these terms interchangeably; the tasks are always related and overlapping.
Within these groups working together, there are individuals that do things like make handicrafts, beauty products, and study nutrition and uses for the seaweed, and this can give an incentive for each group to continue to work. But working together, collecting in the sea together, cleaning together, caring for the seaweed together, this is the way it should also work. … But that was getting very hard. And it wasn’t enough to better the lives of each family, And we of course we started a sort of *retorno.* … And now it is just continuing between fewer families, two or three, but we are maintaining it. The weight of this small structure here, the *barraca,* but it’s important. It impacts, and is impacted by, all of the families that care for it.

She is very aware of the importance of maintaining this movement toward alternative and sustainable subsistence strategy. Yet, for the time being at least, she believes that simply “maintaining” the movement is enough. She mentions later that, “we are just one family, yes. But here, just one family still means many people, many talents.” The talents of this one family are certainly many, and varied.

The family is very concerned with using as much of the seaweed as possible, focusing on their work as a cyclical and communal task rather than a competitive or commercialized form of revenue. They also rely heavily on generating income and participating in a regional and global market in order to make money from raw seaweed and its byproducts. By specializing in artisanal products, and in the spirit of their historically subsistence-based lifestyle, they aim to benefit the community first, and the wider world second. They also maintain an environmentally responsible sentiment of zero waste and minimal harm to the natural reef. This is likely a relic of a subsistence economy, a component of their lifestyle that the Terramar Institute and other outside contributors acknowledged and which became an integral part of the Seaweed Project’s strategy to transition the community out of subsistence and into a more competitive and profitable mode of living.

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32 *Retorno* means a process of exchange. In this case, it refers to a rotation system in which one family cares for their *cordas* for the entire collection cycle, and then passes ownership responsibilities onto the next.
<table>
<thead>
<tr>
<th><strong>Contrast Set:</strong></th>
<th><strong>Dimensions of Contrast</strong></th>
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<tbody>
<tr>
<td><em>Aplicações das algas</em> (Seaweed uses)</td>
<td><strong>Within (dentro) or outside (fora) the ocean ecosystem?</strong></td>
</tr>
<tr>
<td><strong>Alimentação</strong> (food and nutrition): Products include— Sauces, soups, salads, yogurts, mousses, gelatinas (pudding-like dishes), <em>cocalgas</em> (from the term <em>cocada</em>, a coconut-vanilla custard, and <em>algas procesada</em> [to be put into other food products as a gelling agent] or <em>secas</em> [in the original, dried form, to be added to any recipe])</td>
<td><em>Fora</em></td>
</tr>
<tr>
<td><strong>Cosmético</strong> (Beauty products): Products include— lotion, shampoo and conditioner, liquid soap, bar soap, massage oil, exfoliating gel, exfoliating bar soap. (Each product is made <em>só algas</em> (only with seaweed extract) or <em>com fruta</em> (with added fruit extracts [pitanga, passion fruit, strawberry, peach, or mango])</td>
<td><em>Fora</em></td>
</tr>
<tr>
<td><strong>Farmasátıca</strong> (Pharmaceutical products, mainly clinic diagnostic kits.)</td>
<td><em>Fora</em></td>
</tr>
<tr>
<td><strong>Artesanatos</strong> (craftwork [decorative objects, furniture, artwork]): Popular items include lamps, stools, and floral bouquets made from fish scales</td>
<td><em>Fora</em></td>
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<tr>
<td><strong>Agar</strong> (byproduct of seaweed in gel form): For national and international export and community use</td>
<td><em>Fora</em></td>
</tr>
<tr>
<td><strong>Support other forms of ocean life</strong> (e.g., fish, crustaceans, and microorganisms)</td>
<td><em>Dentro</em></td>
</tr>
<tr>
<td><strong>Oxygen regeneration cycle</strong> (<em>thought to produce more oxygen than all of the trees in the Amazon</em>)</td>
<td><em>Dentro</em></td>
</tr>
<tr>
<td><strong>Recreational activities (for locals)</strong> (including fishing, visiting coastal reefs, visiting the project, and children’s games involving seaweed)</td>
<td><em>Both</em></td>
</tr>
<tr>
<td><strong>Tourist attraction</strong> (the project, the products, and the coastal reefs)</td>
<td><em>Both</em></td>
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*Figure 5: Paradigm of Seaweed Uses*
Figures 6, 7, and 8: Images of the collection cycle

Top: harvesting from the natural reefs in Flecheiras. (*colheita*)

Left: washing cultivated, collected raw seaweed (*limpeza*)

Above, right: Seaweed (detail); its color fades as it begins to dry (*secagem*)
Marta and Edivan’s community work takes them to conferences, campaigns, and meetings in communities throughout the northeast coast and even, on occasion, to the nation’s capital. “We have friends at every beach,” they say. And even so, they are more concerned with maintaining connections between these communities, and keeping these friends along the coast, than with earning a profit:

The work that we do isn’t just to benefit our family; it’s for everyone. [We often wonder about] how many thousands of people have passed by this place, or heard about it in a report or seen it on TV? How many students, researchers, tourists, or even other fishermen from other towns? And for this reason we believe that what we have done here, and what we are doing, has been for the sake of bettering the lives of the people here. If this were all just for my personal benefit, I would have had a nice house with a car or something by now. But this isn’t what we want. We just want to survive. We buy food today, and other days we don’t have money for anything. But we continue constructing this history. And we recognize that not everyone wants this kind of life.

Edivan emphasizes their reasons for continuing, adapting, and transforming a traditional subsistence practice. Yet neither he nor Marta directly addresses the potential problem of simply “maintaining,” and not expanding, the environmental movement. Theirs is a fishing family that no longer goes fishing, at least not in the traditional sense. 33 And they are the familia de algas, but they are currently the only family.

Marta and Edivan recognize that not all families are inclined to work toward the same goals as theirs, and yet they don’t know exactly how to change the mind of a courageous yet stubborn fisherman 34 who does not understand the cultural value and the potential profit of working with seaweed. The most apparent divergence in understanding seems to be that traditional fishing families are used to reaping the benefits of their work immediately, rather than

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33 Only the oldest son, João Lenon, used to fish with his father. The rest of the children were either uninterested, or else became extremely seasick whenever they did go out in the ocean.
34 Being stubborn (teimoso) and having courage or willpower (coragem) are two adjectives frequently used to describe traditional fishermen. Neither one carries a strong negative connotation, nor would these terms be used as compliments.
waiting for a cycle of cultivation, cleaning, and processing with an uncertain and often delayed monetary reward.\textsuperscript{35}

The seaweed collective is a shared experience, one which unites two coastal communities in the same cycle of production, but one which also relies heavily on the participation and the individual talents of one family, rather than many. This creates an uncertain future for this project specifically and for future sustainability efforts introduced by outside organizations and left to develop independently in coastal communities.

\textbf{Access and Barriers to Opportunity}

The uncertainty of the future of \textit{Projeto Algas} in Flecheiras and Guajiru is particularly apparent when generational gaps—in knowledge, understanding, and systems of value—are taken into consideration. Young people are most often choosing to pursue education and careers outside of the physical space of the community, or at least outside of the traditional cultural practices of the community. While at first it may seem that residents are apathetic to the environmental cause maintained by the \textit{família de algas}, a range of cultural factors contribute to the perceived disinterest in the project. These various limitations on opportunities—for education, for work, for leisure and personal freedom—affect the quality of life of the residents of these communities. Some limit women more than men, but most often the barriers themselves create inequalities on an individual, familial, and communal basis. Until this generation of \textit{nativos} of Guajiru and Flecheiras can negotiate these limitations, sustainable living in the form of the \textit{cultivo}—while still extremely beneficial to the coastal environment—will not better the quality of life for families or for the community as a whole.

\textsuperscript{35} The \textit{algueiras} and \textit{algueiros} only receive the second half of their earnings for the raw export of seaweed if their loads reach a certain weight, and they may lose a portion of profits depending on the (ever-changing) national and international markets.
During the course of my research, I found four main barriers to opportunities, factors that limited the amount of personal freedom and independence of (young) people in Guajiru and Flecheiras. The first three are very much interrelated: access to income, transportation, and education. The fourth is more complex and is also both a barrier and a pathway to opportunity: having and raising children. Children further strengthen existing kinship bonds and are constant sources of joy and enrichment; yet having a child, particularly at a young age, also severely limits personal freedom and ability to pursue things like education, a steady job, or a better quality of life (and the ability to afford a separate home, basic amenities, or transportation to and from work).

Access to money for the purposes of continuing the daily tasks at the barraca is the most pressing limitation on the continuation of the project. The restaurant portion of the barraca is actually losing money, according to the handwritten and extremely detailed inventory and income books that Gabi keeps in order to monitor the family finances. One probable reason for this revenue loss is that anyone who comes to work on any part of the seaweed collecting cycle, for any length of time, eats at the barraca for free while they work. The restaurant exists as much for the collective itself as it does for an alternative source of income. Without a steady, independent source of revenue, many people depend on communal activities like a shared meal or hitching a ride (pegar a carona) to and from work or school (rather than paying for a bus or taxi). This holds true for the família de algas; when the whole family needs to go to the barraca for the weekend to staff the collective and the restaurant, they often have to pile into a friend’s car, send two people via moto (motorcycle), and a third (and sometimes fourth) on the family’s one and only bicycle. The total distance between the two locations is only about six kilometers, but the winding roads are far from direct.
The young women involved in Projeto Algas’ youth group explained the barriers to their own experience with the seaweed project. The problems they face with group membership, focus, and goals reflect a generational gap in understanding:

We tell others about the project, our families, our friends, but there are prejudices, biases. They ask: and you get what from this? Do you make money? They don’t realize that the seaweed here in our community and in Brazil, it has a great importance for all of the people that live off of the land. It is one of the largest producers of oxygen in the world. They are only thinking in terms of money, so they build up these biases. And so that is why we always work in the schools and try to get people involved. But of all the kids we talk to, only a small group shows up for meetings. We hope to preserve the seaweed and we hope that the other young people worry about it, in the future.

These questions illustrate the apparent limitations of the project, at least from the perspective of community members. The youth group aims to shift the view of seaweed from waste to valuable resource. The three key members of the group acknowledged that they are able to work in the collective because they are young, they are finished with school and they do not have children of their own yet. Making money is not as pressing of a concern as it is for many older members of the community, and the primary goal of the youth group is education and sustainable resource management rather than profit.

For the researchers at Terramar, however, other limitations hinder the project more than the lack of interest and the monetary problems community members cite. Jefferson Souza da Silva, head of the Institute’s Development in Solidarity Program (*Programa Desenvolvimento Solidário*)—which runs coastal resource management programs in a dozen villages in the Northeast—sees it differently. He is critical of the leadership. Marta and Edivan had told me that they used to rotate, but that other families had dropped out because of financial stress and a lack of time and interest. Souza sees it as a sign of structural instability, a dependence that needs to change if the project is to succeed:
The association had trouble getting young people to join. And so it couldn’t renew itself. … The same leaders are there that started it. And they’re leaders with limitations. They have family issues, commitments. And so Edivan’s family assumed the responsibility of the operation because he’d raised his children for business, for trade. The others not so much. They were being tailored for other activities, fishing, agriculture, like Edivan was when he was young. A fisherman, but he never tried his hand at this thing of small business and trade.

Eridan [Edivan’s brother] and the other [families that joined the collective] weren’t ever invested in trade. The women had a lot of trouble with internal machismo. If they stayed out of the house for a long time, they would have to return to the house and do all of the house things. They have to come back for the kids and the house and they can’t make as much of an impact in the work. So the biggest difficulty of the group is the relief of the leaders by the younger generation. But the group also has to change its goals.

The absence of rotating leadership, which was integral to the original design of the project, has resulted in a debilitating dependency that not only hinders the project, but reinstates some of the machismo that women were dealing with ten years ago, before the project began. If only one family makes the time to run things at the barraca, other women may fall back into their routines at home, and the men in their lives may simply continue to fish for as long as they are able before seeking work outside the community. This fear, as expressed by the researchers at Terramar and evidenced in the drop in overall participation in the project, is tied to the inequality in access to resources. This inequality exists both within the nuclear family and in the gendered divisions of labor, as well as among families in the communities and the familial collaborations within the seaweed collective, or lack thereof.

Souza explains that recently established seaweed collectives in other communities are much more successful than in Flecheiras and Guajiru, which was the first cultivation site. In the city of Maceió, another nearby coastal community adopted the project in 2008. There, members produce and sell larger amounts of seaweed and have more than thirty people working on the collection cycle each week. There, they have a rotating leadership system in which one family is primarily responsible for seaweed care and harvest for a full four-month cultivation period, from
start to finish. They have also managed to remain more or less independent from Terramar and only contact project advisors when they need to sell bulk orders of dried seaweed locally or internationally. Otherwise, they manage their own production and sales.

In Guajiru and Flecheiras, this same independence has not lasted. Souza explains:

The poorest person in the group was still getting about 500 or 600 Reais [or 300 U.S. dollars] just from the raw seaweed, but he didn’t realize it. So they need to make their management better: where is [the seaweed] coming from, where is it going to, how is it getting there, all the money and the products need to be counted. They need to pay attention to these things in order to understand the importance and the value of their work.

Souza identifies one possible reason for the devaluation of working with seaweed. Although progress was made when workers stopped referring to seaweed as muck or slime (lodo) and started calling it by its formal name, algas, progress was lost in other ways. Researchers at Terramar are attributing this to an inability to shift cultural practices and understandings of labor from a “hunting-gathering” immediacy to a more long-term and cyclical agricultural labor model:

The farmer is different from the fisherman. He puts the seeds, or the bulb in the ground, adds water, waits two or three months for it to grow. Then he collects it and brings it to the market. He respects this process easier, with more ease. The fisherman out at sea, on the other hand, he gets a catch and brings it back and is rewarded that very evening. And there in his head he forms a different logic. And this is another difficulty—because seaweed is a collective, and it has a process that is more agricultural—it lasts a few months. The fishermen are used to instantly getting a payment for their work. They have trouble with these longer processes. It’s not the people. They’re not doing anything wrong. It’s the organizational systems, the political systems in place that they don’t fit into. They’re told they have to modernize and use more computer technology, GPS and all that. It’s the public management process that’s the problem. They require them to use computers, write the forms and the weights and the formulas for the seaweed products, not to mention all the accounting and local and international business orders.

The seaweed collective project demands a rapid change in livelihood, in gendered labor divisions, and in the way community members think about and interact with their environment. Since the turn of the century, women in the community have begun to adopt these changes,
according to Terramar’s periodic research and diagnostics. Since the majority of people working at sea are men, more women are available to process and sell the fish and other goods that are brought in. Men continue to rely on traditional methods like star-based navigation and tracking ocean currents rather than GPS, which they have repeatedly described as “untrustworthy” or simply offensive, “like cheating.”

Marta and her daughters explain that women in the communities, on the other hand, have been more accepting of new technologies for increasing production and sales, and they are thus in control of a greater share of public goods and the revenue generated from the processing and sale of those goods. Marta makes a point of starting conversations with women in town about the project and she says, more often than not, they think it is an important innovation precisely because it connects to traditional knowledge, to how seaweed was used “in the old days”—they remember the history and the skills behind harvesting directly from the ocean reefs for subsistence and respect the work being done, even if they feel they cannot sacrifice other commitments in order to participate. In the years since the project began, however inconsistently, women have adopted more practices related to sustainable production, gathering, processing, and sale of marine products than the men in the community, who have spent their entire adult lives at sea bringing in a day’s catch and eating it or receiving money for it that evening (with the help of their wives and female relatives, of course).

The researchers at the Terramar Institute believe that, without the rotation in leadership and continued female involvement in the cycle of production, members will become too discouraged by a political and economic system to which they cannot successfully adapt. Furthermore, as Souza and other members of the Development in Solidarity Program have concluded after preliminary evaluations of the cultivation sites, the project will only succeed if
seaweed is harvested and sold in bulk and made into artisanal products at the same time. Community members must aggregate the value of the seaweed as quickly as possible; since the cultivation process is slow for large, bulk orders of raw, dried seaweed for industrial use, they must also learn how to manipulate smaller quantities of seaweed into the natural gelatin, agar, and then into products to be sold locally and nationally.\(^{36}\)

This gap in understanding of the value of the process of seaweed cultivation seems to affect men more than women, but it undoubtedly affects the community as a whole. As women have become more visible agents in the movement toward sustainable aquaculture, they have had to adopt a new system of value that allows them to work for several months before receiving monetary compensation for their time, if and when the seaweed and seaweed-based products sell, that is. This shift is slow, and many women still feel that because they do not control the equipment (the boats) and the traditionally valued source of income (a day’s catch of fish, a cultural signifier for the community and a main source of protein for families), their work is not as important. This is why most other families, usually led by mothers, have dropped out of the project. But Marta and Edivan still believe they will come back, once they realize the value in it—both in terms of social status and revenue.

This again recalls Friedl, on gender equality: the people who control society’s most valued resources also have the most power. Even though women have the opportunity to elevate their previously subordinate social status by controlling a greater number of goods and services related to fishing and seaweed production—and even though they understand and are involved in more steps in the cycle of production—they often do not consider their work to be of equal cultural value. Men work effectively in their contributions to the seaweed project, and they are proud of their work—but they are not involved in the entire cycle of production. That

\(^{36}\) See Figure 5, page 68, for more information on seaweed uses.
responsibility falls to the women. The hope is that as the value and utility of seaweed increases, this work will accumulate a greater societal value and so in turn will women’s roles in the process.
Chapter 4

Territory and the Future of ‘Tradition’

The women in the family have been packing suitcases, arranging the house, and making phone calls all day. They even took the bus into Trairi to buy a new, enormous wheeled suitcase using that month’s Bolsa Família money. The bag is now filled to the brim with packages of dried seaweed, hand-made artwork, fish-scale flowers and other decorative gifts, and a dozen bottles of seaweed-based shampoos and conditioners.

“We have to take a little of everything with us, so that people understand this is a community-wide effort,” explains Marta as she throws her bodyweight on top of the suitcase in order to cinch the final zipper.

Marta is in charge of leading a brigade of fishermen and fisherwomen on a three-day bus trip to the nation’s capital, Brasilia, for a conference on the rights and territory allowances of fishing families. As of yet, there is no formal definition for—or governmental recognition of—traditional fishing territory; this conference aims to clarify the rights and benefits afforded to fisherfolk in Brazil. The right to land is perhaps the most pressing issue on the table.
This is the third national conference Marta has attended, but this is the first time she has organized transportation there and back for other interested community members. Edivan has taken care of all the necessary paperwork in Fortaleza and done a lot of recruiting around the communities, encouraging anyone who has ever fished a day in his (or her) life to attend and learn more about rights, heritage, and opportunity. At the conference, they will present the seaweed project as an example of supplemental income and opportunities for land use that should be afforded to coastal communities. They will take three busses and almost 1,000 people from the Northeast coast with them to attend the conference and ask questions of their government representatives.

“My only fear is that no one will know how to speak up, says Marta. “Fishermen, they’re not big talkers and they’re terrible negotiators,” she adds with a grin.

But with this many people in attendance—more than any previous year, and with a record number of women representing the cause—Marta is confident that they will help advance the campaign for official recognition of traditional fishing territory.

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*Land Lost*

Community organizing in the name of sustainable seaweed cultivation is a new idea within a pre-existing socio-environmental movement. The history of both the physical location of the seaweed project—and of the relations between families and governing or supporting organizations—is helpful for understanding the way larger social and environmental movements are forming, struggling, and continuing in Brazil. The familial and individual relations outlined in the preceding chapters are evidence for the inseparable links between community development, environmental change, and the persistence of individual and group identities. Yet the specific circumstances, successes, and setbacks of this movement show that cultural identity
is flexible, adaptable, and resilient in the face of rapid socio-environmental change. Furthermore, the ways that community members present their collective identity to outsiders—at a national conference on territory allowances for self-described traditional groups, for example—can help them obtain greater visibility and access to resources needed to continue their traditional livelihoods.

Aside from cultural factors that shape family and community relations, additional factors help and hinder sustainable community development and social movements in this region. Gláucia Sena is a native of Flecheiras, a current community organizer and former Terramar employee. Her unique perspective as both a native of the coast and a member of a non-profit organization from the city gives her a combination of insider and outsider knowledge about the ecological and cultural environments of the project:

Toward the end of the 1990s, the inns and hotels started appearing on our beaches. And we started to have land conflicts because we were used to playing ball, playing other games with friends, all of our free time was spent on the beach. When the pousadas arrived, the owners didn’t want people to play soccer in front of the pousada. They didn’t want it to get in the way of the beach access. They wanted to take that beach access away from the nativos. There were a lot of conflicts, especially with the fishermen. The owners of the businesses thought the fishing boats, nets, and other equipment were ugly, and somehow disturbing the shoreline. … One of the most important fishing tools is the knife. And so the fishermen would leave for the boats with a big knife in their hands to work with the fishing nets, and the donos of the pousadas would call the police and tell them to take the knives away from the fishermen. Lots of conflicts like this happened with the arrival of tourism. … Then came property speculation, and where there were once dunes and lagoons, there is now a community of displaced fishermen that were once on the beach, but who lost the rights to their land without even realizing it.

Although the effects of invasive tourism and land speculation are in many ways a divergence from the topics of this research, they are also inextricably linked to the movement toward environmental awareness and sustainable community development for which the cultivo de algas stands. They act as limiting factors by restricting access to the space necessary for practicing a subsistence trade, yet they also act as motivators, as reasons to bring the community together;
they help stir up reactions and inspire social change. Gláucia commented on changes since the early days of the collective:

By around 2000, our reefs were completely degraded. Because people would carelessly tear out large portions of seaweed again and again. The Project brought about change in attitude. Not just for the women of the collective, but for the community [população comunitario]—to protect the natural banks, the communal environment, all of it. And today the community is infinitely more aware, more sensitive to the conservation effort. … The collective also brought the return of many species of fish, turtles, and shellfish that came back once the natural reefs were healthy. It restored a sort of balance [equilibrio] to things.

The “balance” that she sees within both the community and the aquatic ecosystem is perhaps the main objective of the collective. With continued conflicts over territory, and with an ongoing struggle to maintain cultural traditions, and to adapt to environmental changes in order to create new tradition, the residents of these communities are still a long way from finding balance, or equilibrio, in their daily lives. The marked change in understanding concerning the natural reefs shows the process of reinvention and transformation of traditional knowledge and the creation of a new environmental awareness among nativos. The fact that this transformation of mindset has stalled with regard to the Seaweed Project must be further explored in the context of larger struggles for land and coastal fishing territory in the Brazilian Northeast.

Even within the locus of Guajiru and Flecheiras, other projects related to increased tourism, land speculation, and sustainable energy projects have altered the coastal environment and the role of community organizations within it. A recent project promoting clean energy involves flattening the sand dunes surrounding the communities a few kilometers from the ocean. The families living farthest from the beach and closest to the dunes will be displaced from their homes once major construction starts. The dunes themselves, some of which arch well above the town’s humble skyline, will be leveled and transformed into a windmill farm. The wind turbines will provide clean, renewable energy to the surrounding municipality. But why go to the trouble
of destroying natural sand dunes, which include fields of coconut trees, wild guava, and guajiru fruit? There is a flatter area farther inland that is dry and unproductive and which would be suitable for windmill construction, but since it already belongs to a wealthy landlord, the cost of purchasing that land is greater than the cost of moving in and flattening the dunes of Flecheiras and Guajiru.

The dunes are often referred to as a “hidden paradise” that locals brag about to outsiders. Despite being a source of pride and a local landmark, though, the dunes are often left abandoned by community members. Guava bushes, rippling expanses of sand, wild mules and a variety of birds are all that exist for miles. In the past five years, as more and more of the land abutting the dunes has been portioned out into plots for new ownership, fences and other physical barriers have begun to circumvent the wild otherworldly terrain of sand dunes. In 2012, the Brazilian energy company responsible for the wind power project put in official markers and flags delineating the placement of each new wind turbine. These barriers affect not only the physical space, but also the social perceptions of the dunes. Terramar’s Jefferson Souza elaborated on the issue of changes in perception over time in his recent research work for the institute:

The region of territory near the sea was originally used by the fishermen, but with the arrival of tourism, it became very valuable, and so all the people living there were thrown into the dunes. Behind the beaches. The dunes never had fences delineating the land. Because the lands beyond the beach didn’t have official documents. With increased tourism, the land speculation didn’t just stay on the beach. It extended past. Young people don’t hang out at the dunes anymore because they also just don’t really want to anymore on account of all the fences everywhere. Thirty years ago there were no fences. So they would go and pick fruit and coconuts, collect water, see animals, And now they can’t. Because they run into fence after fence after fence. So by putting up a fence, you also cut this relationship between young people’s pastime and the land. And so they are limited and cannot do the same activities that their parents and grandparents did for so long. And they can’t even really identify with that anymore. They don’t realize that they would need documentation to pass through that land because they have never needed it before.
These changes in understanding and in the use of the space over the past thirty years have rung true for members of the community, too. Gabi explained why she is concerned about the windmill project and other intrusions into the community:

We can’t let people come in and take over our beaches, make them dirty, fence them off, keep people from using them, exploring them. It’s important that we all keep caring for our community. It’s really important that we pass this on from generation to generation. Telling our story, never forgetting our oral histories and preserving the history of this place, always keeping this for when tourists come. Guajiru, the name Guajiru comes from a plant, a fruit. We had it here many years ago, and we still have it on the dunes. It’s amazing if you go out and take a walk on the dunes, they are beautiful, we can’t only have the beaches, we must value what we have here that is beautiful. People from the community never go to the dunes anymore. They don’t admire what we have anymore.

The opposition to the wind farm has been strong. Gláucia Sena and other members of the Neighborhood Association have led several protests, created a blog to spread information about the project, and looked into legal options for opposing the construction. However, since the dunes are not officially part of any national park or federal land, they are not protected from outside investments and land speculation. The land is public property controlled by the municipal government, and technically available for purchase by the highest bidder. In this sense, the divergence in local understanding of land rights and foreign motivations for repurposing coastal land has forced a shift in cultural practices within the community. Even though the project promises clean energy and a better quality of life for the people in the surrounding area—which the Neighborhood Association wholeheartedly supports—the greater concern for locals is the loss of traditional cultural practices and identifying landmarks. As the website reads, bluntly, “Eólicas, sim. Nas dunas, não!” (“Windmills, yes. On our dunes, no!”)37

In addition to their daily work with the collective, Marta and Edivan contribute to a larger campaign for land rights for traditional fishing families. They are members of the Artisanal Fishermen and Fisherwomen’s Movement of Brazil and are supporting the National Campaign

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37 For more information, and to read full posts, see: http://flecheirasceara.blogspot.com/
for the Regulation of Traditional Fishing Territory.\textsuperscript{38} The Movement began after the first national conference of fisherfolk in Brazil in 2009 (Silveira 2011), and has since struggled to find its footing, members say. They hope that the campaign for territory regulation and reclamation will help establish their rights, motives, and ambitions for future members. They have met together each year to discuss encroaching development and tourism projects along the coast, from offshore drilling to wind energy and hydroelectric dams. Their plan is to raise awareness of these issues as it relates to traditional fishing heritage and to collect the 1.38 million signatures required to officially petition for the legal rights to communal coastal fishing territory.\textsuperscript{39}

Brazilian land laws allow for the reallocation of unproductive land (infertile or underused inland territory) to landless workers who have occupied it for an allotted amount of time, but they do not protect coastal land and waters that are occupied and used by traditional fishermen and fisherwomen. The government does recognize small-scale, traditional fishing families as a cultural group eligible for other rights, such as those afforded by their identification cards issued by the Ministry of Fisheries and Aquaculture (Osava 2013).

The next step toward more permanent territory ownership is to extend ministry benefits to include access to (and protection of) coastal land for the continuation of the traditional fishing livelihood. The exact number of practicing traditional fishermen is unknown but estimated by the Pastoral Council of Fishermen to be close to 1.5 million, with only two-thirds of those having obtained official identification. Many women are likely excluded from this count, as well as families and community groups that do other kinds of aquatic work, such as seaweed collecting.

The movement also aims to resist large-scale development efforts of coastal territory for

\textsuperscript{38} Movimento dos Pescadores e Pescadoras Artesanais; Campanha Nacional Pela Regularização do Território das Comunidades Tradicionais Pesqueiras

\textsuperscript{39} Brazilian Congress, under the 1988 Constitution, must accept legislative proposals that are backed by at least one percent of the voting public.
government-run fisheries that would threaten artisanal fishing practices, food sovereignty in the region, and the continuation of a sustainable, symbiotic relationship with the aquatic ecosystem that has traditionally been valued above a solely profit-driven economy.

The campaign for territory regulation has the following objectives, (each one outlined in promotional pamphlets and on a regularly updated blog[^40]): to educate fishermen and -women about their rights to social and financial benefits; to affirm what they call an artisanal fishing identity (*identidade pesqueira artesanal*); to discuss and develop the viability of the artisanal fishing economy; and to reclaim, regulate, and protect coastal fishing territory to ensure the survival of the practice. The goals align with many other social movements in Brazil, most notably with the Landless Workers’ Movement (MST). Marta and Edivan discuss the movements as being interrelated in many ways. The fishermen’s campaign flag is a blue, aquatic version of MST’s decorative outline of Brazil with two rural workers, tools in hand—only they are holding fish and fishing knives. As for the motivations behind the movement, Marta explained:

> The changes in the environment here are already affecting this community. In many ways, losing our land is the same as losing our identity as a traditional fishing community. As a traditional family. We have been to two conferences in the past in Brasilia, and one is coming up next week. The fishermen always go to the conferences, but often they vote on things that they don’t fully understand. There is a certain intimidation problem, too. They just sit quietly with their arms crossed because they don’t understand the language that the government officials are using, or they don’t understand what their role is in the greater process. But this is our *luta* [struggle] and we need to be organized and educated and show that we have an opinion. That is why we are not flying there and staying in a fancy hotel. We are going by bus; we are cooking our own food; we are staying in camps in solidarity with our friends at MST. To do anything else would be contrary to the movement itself.

To sit quietly, arms crossed, while your rights are taken away from you might again appear to be a sign of apathy, even surrender. Yet these groups travel long distances to represent coastal

[^40]: Accessible at: peloterritoriopesqueiro.blogspot.com
fishing communities, and when they arrive, they are in a state of shock and, as Marta puts it, an environment of “intimidation.” Without the access to resources for specific education and training, and with an entirely different (but no less complex or valuable) set of skills and cultural knowledge, fishermen are neither prepared nor willing to enter into a dialogue with government officials. They risk losing both their traditional territory and their traditional identity and must once again return to the coast to find new ways and new technologies with which to craft a reshaped but still ‘traditional’ identity.

Reclaiming territory as a means for reinventing a coastal fishing identity is arguably at the heart of both the broader fishermen’s movement and the more grounded, daily struggles of the men and women of the seaweed collective. Yet the same relationship also functions in reverse: members of these communities support and at times exaggerate a shared traditional history and culture as a way to further assert their land rights and justify their ownership of the natural resources on the Northeast coast. If they do not, hotels, restaurants, and other foreign businesses will buy out the territory for more than any native of the community could hope to afford. And since—according to local residents and outside reports—artisanal fishing still accounts for about seventy percent of the seafood consumed in Brazil (Osava 2013), if they were forced to stop their practices, the industry would shift to an import-based, commercial market that would further stratify the distribution of wealth for rural families in Brazil.

Marta and Edivan’s family has been a part of this movement to reclaim territory on both a micro and a macro level. They spend time at the barraca caring for the seaweed and for the physical space because, if they do not, they expect that someone, (likely an estrangeiro, turista, or gringo—a foreigner), will come in and take it from them. They have no deed to the land, nor to the portion of the ocean where the seaweed grows, and Brazilian laws offer little or no
protection as a result of long-term inhabitance of the area. It is simply understood and respected by the community as space set aside for the collective. The doors are always open to anyone who would like to help, and the *família de algas* hopes that more families will return to the work they started together and which continues to survive, if slowly, without them.

**The Right to Fish**

The United Nations Development Programme (UNDP) recently published a collection of case studies in successful coastal community development through their Office for South-South Cooperation. One such study was carried out in the coastal area of the state of Paraná, Brazil. The project, titled “Supporting the Organization and Mobilization of Fisherwomen – Brazil” (2010) mirrored many of the steps taken by the Terramar Institute and the researchers at the Federal University in Ceará for *Projeto Algas*. Project coordinators from the UNDP evaluated the implementation and sustainability of the project based on both its expected outcomes and the progress the community members have made in daily practice.

The aim of the UNDP project was “to work for the survival of the small-scale fishing communities and the improvement of their living conditions by promoting women as political activists and developing agents” (59). This project also relied on outside research and financial partnerships from the Terramar Institute along with other governmental, non-governmental, and academic institutions. Rather than focusing on a new form of revenue, such as seaweed production, this evaluation simply justified the support of small-scale fishing communities in Brazil and identified the local responses to increased governmental regulation of private large-scale fisheries. It sought to highlight social and economic roles of women in these communities and develop their leadership skills to enable them to work toward better rights and recognition of individual work as well as “to promote the collective interests of small-scale fishery and the
fishing communities” (61). Researchers worked with communities to provide educational classes and other opportunities to women to advance their social status within and outside the home. They provided legal information and resources for women to obtain professional identification cards, giving them access to pensions, healthcare, and other social services.

The research team also funded trips to local and national conferences, workshops, and regional organizing meetings. They measured the success of the project based on women’s involvement in and response to national conferences and other events. They cited an increase in participation, signatures gathered for petitions, and general self-confidence among fisherwomen, adding that perhaps the greatest community benefit that came of the project was that women “created independent organizations to defend their rights and, in particular, one prominent local fisherwoman leader emerged from the process” (66).

This conclusion parallels the situation in Guajiru and Flecheiras, in which women were included as both participants and leaders, but where one family (with several female members) has emerged as a leader within the sustainable development project. The UNDP report offers several strengths and weaknesses of both the projects observed and their own evaluative methods. Some of these explanations also parallel the status of the seaweed project, including the lack of experience of the outside research and support team concerning local ideologies and labor divisions and the lack of scientific knowledge of fisherwomen and their community groups (67). Essentially, the main weakness of the project, according to the report, was the gap in experience and understanding from the outside perspective looking in and vice versa. The report concluded that “the relationship between small-scale fishworkers and Government officials was very paternalistic, which induced political dependency and immobility” (68), and that the sustainability of the project and its community benefits would depend on the continued
involvement and education of fisherwomen, along with continued collaborative work between outside NGOs and federal agencies in support of women’s contributions.\footnote{This study contrasts with Meltzoff’s analysis of the successful “Shellfish Revolution” in Galicia, in which a centuries-old brotherhood of shellfish workers was effectively replaced and improved by female marisquadoras. Women workers collaborated with existing male leadership to create new and legitimate political positions for female laborers to represent their craft and production within a traditionally male-dominated workforce (1995:20-21). This kind of widespread political recognition appears to be the exception rather than the rule with these kinds of community-based efforts, however. Further analysis of development strategies for these rare success stories could help improve future management of local politics and leadership strategies.}

Another sustainable development project, this time addressing deforestation in rural Haiti, focused on a shift in understanding and accepting new labor methods and community leadership roles. Anthropologist Gerald Murray revised the reforestation plan so that it incorporated both the external demands for increased tree growth and care, while also taking into account the economic system and cultural values of the local population. Murray realized that rural Haitian workers neither understood nor valued official land deeds, and that instead they valued the trees that were grown on their land as a sort emergency reserve, in case they encountered economic emergencies in the future—they were extremely reluctant to harvest them for sale.

Outside academic researchers and governmental funding agencies, on the other hand, were under the impression that the local population would be immediately receptive to the idea of trees as a cash crop, a lucrative source of renewable income (Murray 2001:91-92). He also addressed the discrepancies in harvesting cycles and notions of ownership. The quick-growing cash crop species of trees necessitated a radically different growth timeline than locals were used to, and at first they were mistrusting of the delay in financial and practical benefits of harvesting wood that they assumed would take months rather than weeks to grow back (93).

These recommendations, strengths, and weaknesses addressed in the UNDP report and in Murray’s contribution to the Haitian reforestation project could also apply to the Seaweed
Project. The most pressing limitation highlighted by both development projects was the gap in understanding: from the outside, it was a misunderstanding of community practices, values, and beliefs on the part of foreign investors; from the inside, it was a resistance to technological shifts and adaptations on the part of the community members. In each case the central struggle was over rights and resources more than legal identity or governmental recognition.

In the case of the Seaweed Project, the hope and expectation is for female participants to help shift the mindset of traditional fishermen from short-term, immediate reward for a day’s catch to long-term, agricultural practices that harness a sustainable cycle of aquatic production. It is not an easy task by any means, but one that they are more than capable of achieving—especially in the context of previously successful development projects focusing on female agency.

**Back to the barraca: the future of seaweed**

The family knows that they will not always be able to be at the barraca every day. Things will have to start changing, and fast. Marta and Edivan hope to move the restaurant location back to their home in Guajiru. They dream of adding on a few rooms to their house to accommodate the ever-increasing number of tourists passing through their long-isolated community. They want the space to cook (with seaweed products) for friends and family. They would also cater to natives and run a business that supports community tourism. Their children have other plans; the young women want to transform that same space in the Guajiru house into a salon where they can sell seaweed-based beauty products and provide basic spa services. The young men identify less with the space of the home; they are eager to move away to find work in Fortaleza, to play soccer in São Paolo, or to learn English in Trairi. But if even one of these dreams for the future comes true, what will that mean for the seaweed collective?
The work that Terramar has done over the years to monitor the original Seaweed Project has shown that just by keeping the *barraca* open, they are making a difference. The land is extremely valuable for development purposes, but at least for now, their presence is respected enough by local and foreign investors that all attempts to purchase the land out from under their control (there have been three attempts so far) have failed. Legally, the area is public property and could be purchased at any time. The Terramar Institute, along with representatives from USAID and *Brasil Energia*, have used annual funding allotted for sustainable technology and development to continue laying claim to the land and coastline. They have concluded that the only way for community members to make a profit from the operation is to either produce and export a much larger amount of seaweed for sale as raw material for industry, or to process and sell the seaweed products (gels, cosmetics, dried and packaged seaweed, decorative objects, etc.) that have a much higher monetary value, but which take more time, and more skills, to make.

Marta and Edivan expect involvement to bounce back, with time. “For now, we are here at the *barraca,*” says Edivan:

But ‘here’ is a communal space. We care for it, but the doors are always open for others to work, too. There’s plenty of space, they just need to have courage. To be hardworking. I go to meetings. I go to Fortaleza to get documents or to send documents. I care for things here. Get fish, clean fish, get seaweed, clean seaweed. Yet people pass by and see us lounging in the hammocks in the shade and think this is all we do.

Marta chimes in, “They say, ‘Edivan’s got the good life! At the beach all day, with plenty of money in his pocket. Just selling seaweed and relaxing!’ but really we are in it for more than all that. We are here for the *luta.*” And fought they have—at a decade, they are running the organization precisely the way they want to run it. Despite obstacles to opportunity

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42 Though this one family essentially makes up the whole of the organization and the seaweed trade associated with it, they still consider their work part of the beach community. From frequent visits from student researchers from the universities in Fortaleza to the youth group that schedules frequent field trips to the cultivation site, to the tourists
and to the continuation of the movement, they are still there, visiting and caring for the algas—and cooking lunch, every Friday through Sunday.

While it is true that people can never exist without affecting the environment in some way, this project (and the family that pioneered it and now sustains it) exemplifies an alternative form of subsistence that lessens the negative impacts on the coastal ecosystem and supports relatively equal and communal labor practices. Women have contributed valuable, and well-valued, work to the cycle of seaweed production, collection, and (re)cultivation. Their efforts underscore the need for identification and interaction with the environment; they stress awareness over ignorance.

During my brief period of research, it became apparent that one of the greatest setbacks with this and other socio-environmental movements in Brazil is the lack of understanding on the part of governing and supporting organizations—about the reality of the daily lives and the specific cultural skills of people in the community where the project is actually taking place. Further research could significantly affect how projects like this operate in the future. For the família de algas, dialogue with overarching organizations is essential to the continuation of their work. Their varied, overlapping, and unique entrepreneurial strategies—which combine artisanal craftwork and cosmetics with international exports and a local restaurant business—are also essential to the success, or at least the sustainability, of the seaweed collective. If they lose one component of the operation, be it a source of income, a step in the collection cycle, or a member of the family who chooses another form of work, the rest of the collective process will suffer. In this way, this family and their work represent a sustainable lifestyle that doesn’t just exist within a community, but which is a vital and ever-adapting community in itself.

that wander in off the beach for a meal or to buy some souvenirs—the família de algas continues to maintain community-wide connections.
Conclusion

Brazilian anthropologist Darcy Ribeiro (2000) declared a shared “national destiny” that would define his country’s rise to a position of global economic power. He wrote,

Our destiny is to join with all Latin Americans in our common opposition to the same antagonist, which is Anglo-Saxon America, in order to bring together, as is happening in the European Community, the Latin American Nation dreamed of by Bolívar. Today we are 500 million; tomorrow we will be a billion. … Truth be told, we are the new Rome—a tardy, tropical Rome. Brazil is already the largest of neo-Latin nations in population size and it is beginning to be so in artistic and cultural creativity also. It must become so now in the domination of the technology of future civilization in order to become an economic power with self-sustaining progress. We are building ourselves in the struggle to flourish tomorrow as a new civilization, of mixed blood and tropical, proud of itself—happier because it is more enduring; better for incorporating within itself more humanities; and more generous for being open to all races and all cultures and because it is located in the most beautiful and luminous province of the earth. (321-322)

This reads, from a North American perspective, as a no-holds-barred summation of Brazilian identity, politics, and cultural influence that purposefully resists Western conglomeration.

Ribeiro provides a narrative that actively opposes centuries of colonial history, one which asserts its difference from other colonized and colonizing groups. This proclamation is startling, yet in many ways, it is also in line with the preceding discussions of Brazilian politics, divisions of
labor and social movements. That is to say, the work of seaweed harvesters in Flecheiras and Ribeiro’s imagined destiny for Brazil share at least one quality: innovation.

At its core, the Seaweed Project is innovative in two respects: first, it blends traditional ideologies and skills with new technologies to produce an alternative source of income—one with the potential to be both renewable and environmentally responsible; second, it encourages women to take part in the cycle of production as both participants and leaders and in doing so gives them greater access to community resources—from finances, to government benefits and legal rights, to educational opportunities, to raw seaweed and its derivative products. This increased access should allow women to elevate their social status and better their quality of life, as long as seaweed cultivation can be as culturally valued—and as economically valuable—as fishing has been for men.

This paper has examined the roots of gender inequalities in Brazil alongside a cultural history of artisanal fishing knowledge and experience in order to situate this particular community development project within a larger cultural landscape. The analysis has focused on women’s experience and on their sense of the barriers and opportunities at hand within their community and the current project. I narrowed my analysis to the point that this paper reads, I hope, more like a case study of a particularly entrepreneurial family: the *família de algas*.

The first chapter explored theories on divisions of labor and development within the context of the so-called Brazilian dilemma of race, class, and gender disparities and diversities. It also introduced theories of female subjugation and gender egalitarianism from cross-cultural perspectives. Colonial histories and gender-based associations that structure culture (and maleness) as superior to nature (and femaleness) became sources of existing inequalities. Furthermore, resource acquisition became a means for promoting equality.
The second chapter used that theoretical perspective—on gender politics, access to resources, and independent land ownership—to identify contributing factors to women’s agency in the home. The next chapter expanded beyond the home to the project itself in the context of the neighboring beach communities. It addressed the discrepancies in perspective between outside contributors (academic, financial, governmental, or otherwise) and community members. The outside view of the project was one of profit-based production that would elevate women’s status and reduce gender inequalities. The inside perspective was also focused on women’s participation. Fishermen and fisherwomen saw the project as a slow and complicated endeavor, one which in practice had failed to garner profit or foster a sense of community identity and pride in the tradition of fishing and mariculture. To men especially, the work was not as valued, or as valuable, as artisanal subsistence fishing practices that had been passed on from one generation to the next.

The final chapter expanded on these diverging perspectives to evaluate the efficacy of the project as compared to other social movements in Brazil and development projects in other parts of the world. Finally, it elaborated on the current status of the project, which is one of near-stagnancy despite the economic and social need—practically desperation—for an alternative and sustainable source of income.

Marta and Edivan’s family represents, in daily practice and worldview, a small-scale example of large-scale patterns of behavior that challenges gendered expectations in the community. In their home life, the women are in control of a greater number of responsibilities such as food, finances, and childcare. This increases their intra-household bargaining power and gives them leverage over important familial decisions, including, in Marta and Edivan’s case, the choice to participate in the seaweed collective. Within the space of the home, however, women
in this and other families still face limitations to their agency; work in the home is ultimately less valued than work outside the home. Until this perspective changes, women will remain at a disadvantage and their work at the seaweed project will be similarly devalued.

The cycle of production for the seaweed collective employs the knowledge and skillset of traditional fishermen and adapts it to fit a more environmentally sustainable and economically beneficial timeline. This becomes important in the context of familial dynamics and gender relations for several reasons. I argued that rather than following a subsistence model, in which a worker experiences immediate gratification for a day’s labor, the project used new harvesting and drying techniques and followed a more agricultural timeline. Workers completed many steps of a harvest cycle that together produced more raw materials and crafted goods, increasing both the communal income and the quality of life for residents of the communities.

Since the project’s inception in 2002, the quality of life, and even the opportunity for work, has not improved for most residents. Increased foreign land and infrastructure investments and proposals for government-run fisheries have put pressure on the families living closest to the ocean to relocate. Foreigners have settled in the communities and brought with them business plans for high-rise hotels and kite-surfing schools that appeal to new trends in tourism. The shifts will have positive incomes for businesses, foreign residents, and for the young people who choose to work for them either in construction (mostly men) or domestic service (mostly women). But for the rest—the native residents with ancestral and vocational ties to the coastal region—work, home, and community continue to be in constant transition, and their livelihoods have yet to get easier or more comfortable.

The seaweed project still has the potential to bring increased financial security and better the quality of lives for local families. It requires an adaptation—longer periods of work and
waiting, with more work out of the ocean than in it—on the part of generations of people who consider themselves first and foremost povo do mar (people of the sea). This adaptation is one that incorporates local knowledge and systems of value rather than forcing a rapid departure from traditional customs, as seen with the arrival of hotels, eco-resorts, wind turbines, or internet cafes. If community members can organize in large enough groups to accommodate the many steps in the seaweed collection cycle, then the project could benefit the community while still preserving traditional practices and, most importantly, allowing artisanal fishing families to occupy the coastal territory they need to practice their trade.

Currently, the barriers to that shift in understanding and organization on the part of local residents are due to the continued devaluation of women’s work and social status, and their resulting limited access to communal resources. The seaweed project allows for women to take on more positions of leadership, and they have thus far shown ability, commitment and compassion for the work. Yet their other obligations to home and family—along with persisting ties to habitual gendered activities and behaviors in the community—limit the time they spend on the project. For that reason, most families have lessened their commitment or else shirked all responsibilities at the cultivation site.

Yet women are still organizing around new and innovative forms of work. Marta and her family are keeping the barraca and the seaweed harvest up and running. They are selling products, filling bulk orders, and traveling to conferences to showcase merchandise and promote the project. The Neighborhood Association in Flecheiras has record numbers of women in attendance and a female president who hopes to encourage other women to take part in decision-making processes. Evidence from other successful development projects shows that women who overcome cultural barriers and organize around issues they care about—such as acquiring more
territory and resources for subsistence and profit—can in turn elevate their social status and take on positions of political power and influence. Future comparative studies between this and other aquaculture projects could elaborate on more effective methods of leadership, such as rotating elected positions, educational courses on management and accounting, and other organizational opportunities.

Projeto Algas’ current membership is low, but the implementation of the project, and the resulting slow but steady socioeconomic transformation in one small coastal community, lends hope for its potential. Women’s participation has proved to be an essential part of the continuation of the project, and as long as they have access to the resources they need, especially the coastal territory in which they live and work, women can succeed in correcting gender imbalances that have previously divided labor practices in their communities.
There once was an old man who was very wise. One day, a well-studied young man came along who became jealous. He didn’t like the idea that the old man was so smart. And so he said, “One day I’ll get that old man and find out if he is as smart as me.” And so the young man got a tiny bird and held the bird’s feet between his fingers. He hid it behind his back while he waited for the man who was there talking, and he said “Old man! They say that you are very wise. Tell me right now what I have here in my hand.” And the old man said, “It is a little bird.” And he said, “Living or dead?” And the old man responded, “It is in your hands.”

— Pedro Edivan dos Santos Viana, on the future
# Glossary

## A

<table>
<thead>
<tr>
<th>Term</th>
<th>Definition</th>
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<tbody>
<tr>
<td>algas (marinhos)</td>
<td>seaweed</td>
</tr>
<tr>
<td>algueirais/os</td>
<td>seaweed collectors (formal)</td>
</tr>
<tr>
<td>ArtAlgás</td>
<td>small store (<em>lojinha</em>) operated out of Marta and Edivan’s house</td>
</tr>
<tr>
<td>artesanatos; artésã</td>
<td>handcrafts (handmade artwork and decorative objects); handcrafter</td>
</tr>
<tr>
<td>Associação dos Produtores/as de Algas de Flecheiras e Guajiru (APAFG)</td>
<td>Association of Seaweed Producers</td>
</tr>
<tr>
<td>Associação dos Pescadores/as do Município de Trairi (APESMUT)</td>
<td>Fishermen’s Association for the Municipality of Trairi</td>
</tr>
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## B

<table>
<thead>
<tr>
<th>Term</th>
<th>Definition</th>
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<tbody>
<tr>
<td>baile funk</td>
<td>popular contemporary Brazilian music genre with similarities to hip hop and rap in the United States</td>
</tr>
<tr>
<td>bancada feminina</td>
<td>women’s caucus</td>
</tr>
<tr>
<td>bancos naturais</td>
<td>natural algae banks, or coastal reefs</td>
</tr>
<tr>
<td>barraca (das algas) (Centro Ambiental de Algas)</td>
<td>(seaweed) tent; stall; shack (Seaweed Environmental Center)</td>
</tr>
<tr>
<td>Bolsa Família</td>
<td>Family Allowance; a social welfare program implemented in Brazil in 2003 as part of an anti-poverty campaign</td>
</tr>
<tr>
<td>Brasil Energia</td>
<td>Brazilian Energy company that develops renewable energy projects nationwide, including large-scale wind and solar power (also invests in coal, natural gas, and nuclear power)</td>
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<tr>
<td>Term</td>
<td>Translation</td>
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<td>----------------------------------------------------------------------------</td>
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<tr>
<td>caboclo</td>
<td>a person of mixed indigenous and African descent; a specific type of <em>mestiço</em> from the desert plateau</td>
</tr>
<tr>
<td>Campanha Nacional Pela Regularização do Território das Comunidades Tradicionais Pesqueiras</td>
<td>National Campaign for the Regulation of Traditional Fishing Territory</td>
</tr>
<tr>
<td>carteira (dos pescadores)</td>
<td>(fishing) license and identification card; cardholders receive employment benefits from the Brazilian government</td>
</tr>
<tr>
<td>casa</td>
<td>house</td>
</tr>
<tr>
<td>catadores de algas/lodo</td>
<td>seaweed/muck collectors (informal)</td>
</tr>
<tr>
<td>“Cheias de Charme”</td>
<td>“Full of Charm” a female-centered telenovela that aired nationally from September to April 2012</td>
</tr>
<tr>
<td>ciclo de coleta</td>
<td>collection cycle (in reference to the aquicultural process of seaweed production); see Figure 4, page 61, for descriptions (with translations) of each step</td>
</tr>
<tr>
<td>coletivo</td>
<td>collective</td>
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<tr>
<td>coleta</td>
<td>collection</td>
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<tr>
<td>colheita</td>
<td>harvest</td>
</tr>
<tr>
<td>conhecida</td>
<td>well-known</td>
</tr>
<tr>
<td>construção civil</td>
<td>(civil) construction</td>
</tr>
<tr>
<td>coqueiro</td>
<td>coconut palm</td>
</tr>
<tr>
<td>cor</td>
<td>Color</td>
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<tr>
<td>cordas</td>
<td>ropes (in reference to seaweed-laden rope structures at the cultivation site)</td>
</tr>
<tr>
<td>cosméticos (das algas)</td>
<td>(seaweed-based) cosmetics and beauty products</td>
</tr>
<tr>
<td>coragem</td>
<td>courage; willpower</td>
</tr>
</tbody>
</table>
cozinha; cozinheiro/a  kitchen; cook
crema de galinha  creamed chicken stew, made from scratch
cuida  care
cultivo  cultivation
cultura tradicional  traditional culture

D
dança quadrilha  traditional Brazilian square dance
dentro  inside; within
dono/a (de casa)  owner; boss (head of house)
dunas  sand dunes

E
eletricista  electrician
empregada (domestica)  (domestic) worker
empreguete  term coined by a popular Brazilian soap opera in reference to empregada and piriguete; used in reference to a young, female domestic worker; ‘empreguetes livres” (‘free the empreguetes’) was a slogan used by fans and supporters of the fictional domestic workers in the novela
empresário  businessman
eólicas  wind turbines
escamas (de peixe)  (fish) scales
estudante (‘de segunda nivel’)  student (in grade school)
equilíbrio  balance
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<th><strong>F</strong></th>
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<tr>
<td><strong>família de algas</strong></td>
<td>seaweed family (in reference to Marta, Edivan, and their relatives)</td>
</tr>
<tr>
<td><strong>fechada</strong></td>
<td>closed; closed-off</td>
</tr>
<tr>
<td><strong>feia</strong></td>
<td>ugly; unsightly</td>
</tr>
<tr>
<td><strong>filha (do coração)</strong></td>
<td>daughter (of the heart); a term of endearment for an adopted/visiting family member or close friend</td>
</tr>
<tr>
<td><strong>Flecheiras</strong></td>
<td>Beach community on Brazil’s Northeast coast. Location of the <em>barraca das algas</em></td>
</tr>
<tr>
<td><strong>fora</strong></td>
<td>outside</td>
</tr>
<tr>
<td><strong>forró</strong></td>
<td>popular northeastern Brazilian dance with an emphasis on acoustic guitar and accordion</td>
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<th><strong>G</strong></th>
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<tbody>
<tr>
<td><strong>gelatina</strong></td>
<td>gelatin; jelly; flavored desserts</td>
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<tr>
<td><strong>Guajiru</strong></td>
<td>beach community neighboring Flecheiras; location of homestay and research site (also the name of a local fruit—red and round, it looks and tastes like a tart cherry but has a chalky skin and a white, fleshy interior)</td>
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<tr>
<td><strong>guardado</strong></td>
<td>guarded; closed-off</td>
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<th><strong>I</strong></th>
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<tbody>
<tr>
<td><strong>identidade pesqueira artesanal</strong></td>
<td>artisanal fishing identity</td>
</tr>
<tr>
<td><strong>IDER (Instituto de Desenvolvimento Sustentável E Energias Renováveis)</strong></td>
<td>Sustainable Development and Renewable Energy Institute (supporter of <em>Projeto Algas</em> and supplier of solar energy technology)</td>
</tr>
<tr>
<td><strong>Instituto Terramar</strong></td>
<td>non-profit, non-governmental organization founded in 1993 with a focus on human development and socio-environmental sustainability.</td>
</tr>
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</table>
**L**

- *líderes comunitários*: community leaders
- *limpeza*: cleaning; washing
- *lodo*: mud, muck, or slime (often implies devaluation; also occasionally an affectionate term for seaweed)
- *lojinha*: small store or shop
- *luta*: struggle; fight

**M**

- *macarrão*: pasta; spaghetti
- *Maceió*: urban beach community approximately 1,000 kilometers southeast of Guajiru; site of a highly productive seaweed collective implemented in 2008
- *mar*: ocean; sea
- *maricultura (aquicultura; cultivo no mar)*: mariculture (a branch of aquaculture specific to harvesting marine organisms in a controlled environment; sea cultivation [informally])
- *marisqueira*: shellfish worker
- *massagista*: masseuse
- *mercadinho*: small corner store or grocery shop
- *motocicleta (moto)*: motorcycle
- *Movimento dos Pescadores e Pescadoras Artesanais*: Artisanal Fishermen’s Movement
- *Movimento dos Trabalhadores Sem Terra (MST)*: Landless Workers’ Movement
- *Mundaú*: third principal beach community in Trairi
- *‘muitos anos’*: very old; elderly
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<tr>
<td>Nordestino</td>
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<tr>
<td>nativo</td>
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<td>nova cultura</td>
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<tr>
<td>paquete</td>
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<tr>
<td>pegar a carona</td>
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<td>pescadores artesanais/tradicionais</td>
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<td>Petrobras</td>
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<td>piriguete</td>
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<tr>
<td>ponto de cultura</td>
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<tr>
<td>posto de saúde</td>
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<tr>
<td>pousada</td>
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<tr>
<td>povo(s) do mar</td>
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<tr>
<td>praça</td>
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<tr>
<td>privada</td>
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<tr>
<td>Projeto Algas: Cultivando Sustentabilidade</td>
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<td>proteção</td>
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United Nations

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