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FLORIDA INTERNATIONAL UNIVERSITY

Miami, Florida

UNDERSTANDING THE CHALLENGES OF EXPANDING COMMUNITY
FORESTRY IN NORTHWEST CAMEROON

A thesis submitted in partial fulfillment of the

requirements for the degree of

MASTER OF SCIENCE

in

ENVIRONMENTAL STUDIES

by

Caitlin Farnung

2015

To: Dean Michael R. Heithaus
College of Arts and Sciences

This thesis, written by Caitlin Farnung, and entitled Understanding the Challenges of Expanding Community Forestry in Northwest Cameroon, having been approved in respect to style and intellectual content, is referred to you for judgment.

We have read this thesis and recommend that it be approved.

Mahadev Bhat

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Date of Defense: June 26, 2015

The thesis of Caitlin Farnung is approved.

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ABSTRACT OF THE THESIS
UNDERSTANDING THE CHALLENGES OF EXPANDING COMMUNITY
FORESTRY IN
NORTHWEST CAMEROON

by

Caitlin Farnung

Florida International University, 2015

Miami, Florida

Professor Pallab Mozumder, Major Professor

The tropical afro-montane forest of the Northwest region is unique and is facing many threats, including from the high population density of the region. Community-based forest management is an opportunity to sustainably manage the remaining forest fragments.

Community forestry was introduced to Cameroon with the legislation of the 1994 Forestry Law. Although an expanding literature covers the subject, little research has been conducted in the Northwest region of Cameroon. Twenty-four semi-structured interviews were conducted, and forestry records, such as Simple Management Plans were analyzed as exploratory research that would act as a base for further research.

This research found that the tenure of the community over the community forest needed to be strengthened, marginalized populations needed to be empowered to participate, and governance needed to be improved both nationally, and locally. Further research may, strengthen these conclusions and help Cameroon, and community forests around the world, be effectively established and managed.

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Preface

Community forestry is a concept and a practice and a concept for sustainable management of forests being implemented globally (Wiersum, et al. 2013). Community forestry is defined as “...forest management that has ecological sustainability and local community benefits as central goals, with some degree of responsibility and authority for forest management formally vested in the community.” (Charnley and Poe, 2007). Examples of developed community forests exist in Latin America, with weaker experiences in Asia and Africa (Arnold, 2001). Cameroon is a country within Africa that has had Community Forestry legislation in place for the past 20 years.

In 2011 59% of Cameroon was covered in forests (Javelle, 2013). Cameroon passed a Forestry Law in 1994, which introduced state-certified community forests to the country. This legislation decentralized rights over the control of the forest, allowing local communities to have control and benefit from the forest’s resources. The investment the community puts into the forest provides protection for the area and any income gained can be used to benefit the community (Djeukam, 2010).

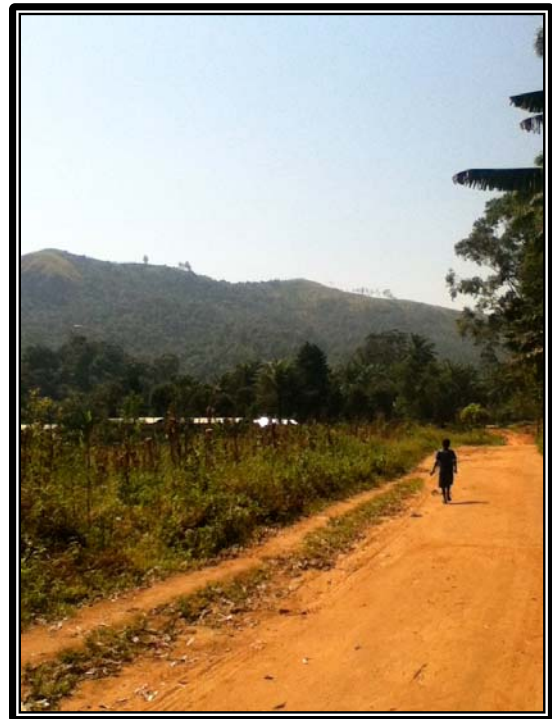


Image 1: A view of the Northwest

Cameroon has experienced some difficulties regarding the actual implementation of community forestry. In the Northwest

region of Cameroon application rates are low, and villages seem wary and unaware of the benefits of certifying a community forest (Minang, 2007). Once a forest is certified it is in danger of elite capture; benefits may not be distributed to the whole community. Also, without proper training communities may be unaware of how to operate a functioning community forest (Mcdermott, 2009). As community-based forest management expands in Cameroon these challenges and more will play a role in successful implementation.

Cameroon is located in West and Central Africa; it shares boundaries with Nigeria, Chad, Equatorial Guinea, Central African Republic, and Gabon (Minang, 2007). Cameroon is an emerging state in the global economy. Participation in the global

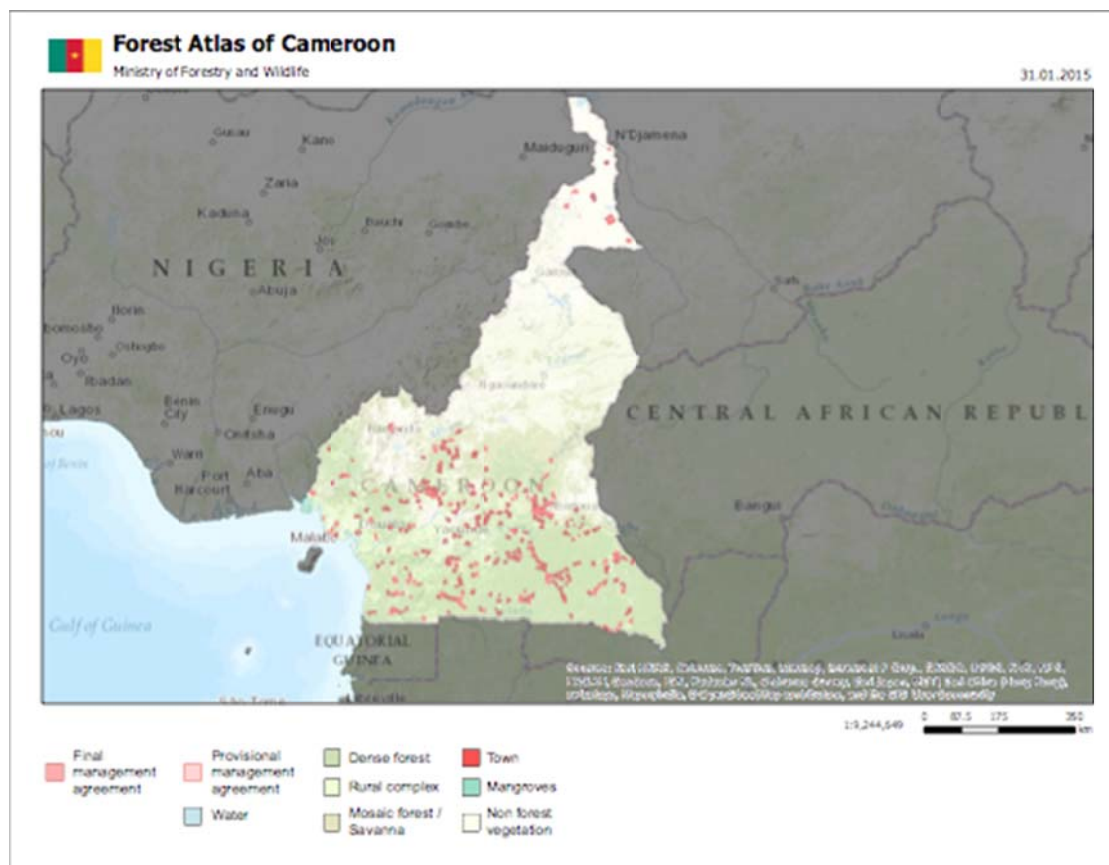


Image 2: A Map of community forests in Cameroon

economy by Cameroon is bringing with it environmental issues for the country including deforestation, loss of habitat through urbanization, desertification, water scarcity, and poaching. Steps have been taken by the Cameroonian government to prevent and amend these and other environmental problems, although they have also been beset by poor management, corruption, and bureaucratic policies.

With encouragement from international organizations, like the World Bank, Cameroon passed the 1994 Forestry Law to provide protection through decentralization of forest rights to local communities. The law set up two categories for the forest ‘non-permanent forest domain’ and ‘permanent forest domain’. These in turn were broken down into manageable, small-scale forestry units. This law made provisions for state-certified community forests, in which communities would have the ability to manage and profit from their forests. Previously, many forests were managed for community benefit but were not given clear rights. (Djeukam, 2010)

Community forests have now been an aspect of Cameroonian environmental policy for over 20 years. Community forests have been established in 7 out of the 9 regions in Cameroon as of the year 2000 (Brown, 2001). By 2011 301 Community Forests were established on paper, but only 80 were estimated to be operational at that time (Javelle, 2013).

The Northwest is located within a chain of volcanic mountains making up the Gulf of Guinea Highlands. This tropical afro-montane ecosystem contains a high degree of endemism and is a hotspot of biodiversity due to its unique climate and history. This ecosystem is also one of the most threatened tropical areas in Africa due to the high

population density found in the region. (Tropek, 2009) Human settlements are usually close to, or integrated, into the forests.

Compared to other regions such as the South, the Southwest, and the East; the Northwest has a surprisingly few number of community forests (Djeakam, 2010). The potential for community forests is significant in the Northwest region, but the community forests that have been established are clustered and scarce. Villages that have established community forests face difficulties in funding, technical knowledge and behavior change. This research will delve into some exploratory research and data in order to investigate the challenges of community forestry in the Northwest region.

CHAPTER 1: BACKGROUND AND LITERATURE REVIEW

Globally, 400-500 million people live in and around forests. Forests in Africa are being increasingly cut down, mainly due to the changing use of the land, to create fields, or as cities expand. Within Cameroon, the deforestation rate is 0.90% per year, about 220,000 hectares (thredesk.org). The forest that is intact is experiencing fragmentation and degradation. Forests provide important resources for many communities, as well as jobs, and ecosystem services. Socio-culturally forests often play a role in religion, identity, and people's sense of place. The co-existence of communities within and around forests means that there is extensive traditional knowledge of the forest within the local communities (Charnley and Poe, 2007).

Globally, areas with the most forest cover and highest biodiversity are often home to impoverished communities. The forest acts as a resource for these communities trying to get out of poverty. One strategy that utilizes the local forests resources to alleviate poverty is community forestry. Community forestry is found to be most effective at the community, regional and national levels, rather than directly benefitting households. Power is devolved from the central government, to the local level with a community forest. Communities will be able to gain skills and capacity as they become involved in community forestry. (McDermott and Shreckenber, 2009)

Starting in the 1970's community forestry became a popular form of forest management (Charnley and Poe, 2007). Some of the earliest Community Forests can be found in Nepal, the Philippines, and India, community forestry gained popularity in Africa in the 1990's. Community forestry within Africa is burgeoning as a form of forest

conservation (Wily, 2004). In Africa, overlapping rights and usage use to be the norm in land use and resource access. Increasingly, agriculture, grazing use, and land titles are limiting access to resources that were traditionally available (Arnold, 2001). Community forestry is a way to conserve communal spaces. Despite the growing interest and importance of community forestry it is largely understudied, and more research needs to be done to fully grasp the pros and cons (Mcdermott and Shreckenber, 2009).

Hardin (1968) felt because of the ‘tragedy of the commons’ that state-institutions were the only ones able to sustainably manage a non-renewable resource. Since Hardin’s classic paper was published one criticism is that Hardin’s ideas were oversimplified and that social groups can in fact successfully manage a common resource. (Dietz, et al. 2003, Ostrom, 1990)

A user group or community creates self-governing institutions, a system of governance, traditionally outside of the State but in the contemporary world there are almost always formal links with other levels of the government. Without this appropriate development of governance within the community a resource is in danger of exploitation by the growing population, consumption, and advanced technologies, and Hardin’s predictions will come true (Dietz, et al. 2003).

Ostrom set forth groundbreaking work in her book “*Governing the Commons*” (1990). Community forestry is based upon creating a forest of the commons. This book set forth 8 design principles that lead to successful management of the commons. The 8 principles are; 1. clear demarcation of the land as well as the user group, 2. The benefits must equal, or outweigh the costs, 3. that all stakeholders are able to be involved in the management and decision-making, 4. that monitoring is done by those that manage the

resource, 5. punishments for infringing on rules must be graduated and fair, 6. those managing the resource must have the right to organize institutions, and conduct their own affairs, 7. there must be mechanisms in place to resolve conflict, and lastly, 8. nested enterprises. (Ostrom, 1990) Under these conditions a common pool resource can be managed productively.

Governance of a common property is easier to achieve under a certain number of conditions. This includes when rules are considered to be legitimate by the community, the resources can be monitored, the use by individuals can be monitored, and the information can be gathered and understood efficiently, and sanctions for violations of the rules exist. Also, when the conditions of the community and the resource are stable, with relatively low levels of change, including technology, and economic and social conditions. The population involved with the governance should also be stable, the exclusion of outsiders makes governance easier to achieve as well. This reduces the number of people that are unaware of the rules, and that may add pressure to the resource. The conditions of the community as a transparent communicative body are important. With a high level of communication, a high level of participation and agreement, governance will be achieved more smoothly. These are ideal conditions, one or more of these conditions will most likely not be found on the ground, many challenges face emerging community governance structures (Dietz, et al. 2003).

The idea of a community is vague and not often clearly defined in community forestry legislation (Bruce, 1999). The traditional view of community is linked to the geography; groups of people that have had generations live and work in the same territory. This discrete and bounded community makes it difficult for mobile

stakeholders, such as nomadic indigenous peoples, to gain recognition (Charnley and Poe, 2007). With increasing movement people and the increasing complexities and interconnectedness of economies the idea of a community becomes even more difficult to bound (Bruce, 1999). It is therefore difficult to achieve part of the first of Ostrom's 8 principles (1990), that is, a clear demarcation of a user group. Over-simplified plans developed from the view of homogenous communities can fail to take complexity and community diversity into account (Bruce, 1999)

An important aspect of a group functioning as a community is the amount of social capital that the group possesses. Social capital is defined as, "...the ability of actors to secure benefits by virtue of membership in... social structures." (Portes, 1998). The level of interactions and communications within a clear group strengthens trust contributes to social capital. Social capital is important to reduce the uncertainty and transaction costs of the group. With low levels of social capital individuals may be disincentived or neutral of group efforts (Gibson, et al. 2004). For a community to function and successfully manage a resource there must be a high level of social capital within the group.

Community forests have been established all over the world. One study done by Mcdermott and Shreckenber (2009) looked into the differences of community forests between the global north, and the global south. One of the findings in this study is that "...community capacity is both a benefit of community forestry and an important factor facilitating its success." This means that groups and individuals that are already rich in social and political capital will be more successful with community forests, but that community forests also foster those skills creating positive feedback loops.

If a community begins with low social capital it may be difficult for them to successfully start a community forest. Communities in the global South may find it difficult to have, or apply for, a functioning community forest. This can be due to lack of experience in group organization, and low levels of technical knowledge. This study also found that the transfer of responsibilities from governmental forestry agencies to communities has to be a slow transition in order to ensure success. Capacity building for those taking on the responsibilities of management is needed, and the forestry departments need to adjust to a new cultural and behavioral system. Experience of establishing and functioning a community forest will strengthen the social capital of the group.

To understand the challenges of community forestry I will review a case study done in Nepal done by Malla and colleagues. Malla et al. (2003) explored in "Why Aren't Poor People Benefiting more from Community Forestry?" Community Forests within Nepal. This study focused on the socio-economic aspects of benefit distribution, as well as participation and understanding. The study included a survey in 1998, with a follow-up survey two years later. The survey included questions on forest product use, involvement and understanding of the community forest, and knowledge of the policy. Malla and colleagues found that there was a disparity between poorer households and wealthier households. The community forest functioned with little input from poorer households, which may have been due to their lower awareness of the law. The community forest put in place was not equitably benefitting the totality of the community. Some persons were excluded or under-informed due to their status within the 'community'. Benefits were disproportionately benefiting wealthier households.

The community did not have a high level of social capital, and Ostrom's principle three (Ostrom, 1990) was ignored. The differences within the community hindered the realization of the objective of the community forest.

It is important that the community gains sufficient benefits from the community forest. In order for a community-based forest management to succeed monitoring and sanctions are necessary, and if individuals do not perceive any benefit to themselves they will be less likely to enforce the rules (Bruce, 1999). This is also Ostrom's second design principle to successful management (1990), that the benefits must be equal to or greater than the costs.

Community forest management can benefit participants socially, economically and environmentally. Socially, the community is strengthened from coordination and functioning of the community forest. Individuals gain a sense of empowerment from expanding control in their local environment. More materially, community members will benefit from access to timber, and non-timber forest products for their households, and potentially from income gained through forestry products exported. Broad environmental impacts that may benefit the community include watershed protection, soil health, and biodiversity of the ecosystem. (Mahanty et al., 2009)

Research done by Glmour, Malla, and Nurse (2004) illustrated through case studies that communities are provided with noticeable benefits from community forests. The community is able to sustainably harvest and profit from resources within the forest. Forest degradation impoverishes local communities; therefore Community Forests can revitalize communities by revitalizing the forest (Djeukam, 2013). Income generated from Non-timber forest products can be significant, but is often taken by individuals, or

elite groups, as seen in Nepal (Malla, et al. 2003). Power structures created or already in place, can be strengthened with the power and the income possible with a community forest (Charnley and Poe, 2007).

While there are potential benefits to community members and other stakeholders there are also potential costs to community-based forestry management. Setting aside land for a community forest means alternative land uses have to be given up which could possibly bring more economic benefit, the opportunity costs of managing the land as a community forest. Community forests can also be costly to apply for, in administration charges, materials needed, and technical support. There are significant time costs with community-based forest management as well. Time with conflict resolution, planning and information gathering, designing management plans, upkeep and revitalization of the forest, and monitoring for infractions. These are all transaction costs that need to be outweighed by the benefits of the community forest in order to make them worthwhile. (Mahanty et al., 2009)

Community forestry is often idealized in the planning process. The homogeneity of communities is wrongly assumed. The romanticized idea of eager participation and the process being conflict-free are inherent challenges to community-based forestry management. In a community with differences in power and values conflict will arise (Dietz, et al. 2003). Ostrom's seventh design principle (1990) puts forth that conflict resolution mechanisms need to be in place in order to effectively govern the commons.

Conflict will arise and it is important to foresee this and be prepared with measures put in place for conflict management. Communities in the past have had problems when conflict-resolution was not addressed (Skutsch, 2000). Even if conflict is

not visible it should be anticipated, and if the conflict cannot be resolved it must be managed (Arnold, 2001). A common form of sabotage is ‘non-participation’, a silent protest by not participating in the activities of the community forest. This threatens the functioning of the community, and undermines any work the community has done. There are also more direct forms of conflict, whether disobeying the rules put forth for the community forest, or getting into fights with fellow community members. It is important that all individuals of the community participate, and conflicts should be resolved in a socially equitable manner to ensure everyone is contributing to the management of the community forest (Skutsch, 2000).

Early colonization brought with it different ways of thinking about land ownership. In 1896 the Germans introduced the concept of ‘vacant and ownerless lands’. Land that was not being utilized, including common lands, was seen as ‘not used’ and therefore was put under the ownership of the State (Djeukam, 2013). Cameroonian law now states that any untitled land is owned by the State. The government does not recognize customary rights (Javelle, 2013). Community-based management is the government giving partial rights over forest resources, to some degree, if not fully, to the community. In the case of Cameroon rights over the timber and non-timber forest products are devolved, but the State remains the owner of the land. The certification of a community forest is a concession given to the community by the government.

Cameroon has had legislation in place for over two decades to decentralize central government authority to local governments and communities. This has been a painstakingly slow process and little real decentralization has occurred in the last few decades. The decentralization that Cameroon has so far allowed to take place has been a

sort of false decentralization characteristic of Cameroon's 'intrusive and ubiquitous' central government (Kofele-Kale, 2011). This strong hold is associated with the ruling party of the central government, the Cameroon People's Democratic Movement (CPDM) party. The minority opposition party is the Social Democratic Front (SDF), which is based in the Anglophone Northwest and Southwest calls for less government control and intervention.

Tenure is the 'rights' held in the land (Bruce, 1999). On the ground less than 2 percent of land in Cameroon is titled. Traditional land rights and institutions are the main form of tenure (Javelle, 2013) (Ribot and Treue, 2010). It has been seen that decentralization is often partial. Devolution of management authority and rights over resources is advantageous for the State, but it has not always led to the devolution of meaningful authority that benefits the community (Arnold, 2001). When the certification of community forests is not accompanied with sufficient management and decision-making power, management of the land can be viewed more as a privilege than a right; and a privilege can be more easily taken away (Ribot, 2003). With insecure tenure the resource becomes open access instead of common property and can lead to overexploitation of the forest and a "tragedy of the commons".

The right to organize and conduct affairs is the sixth design principle (Ostrom, 1990). This means the community should have the right to function at an independent level. As it is now in Cameroon the community functions with the government acting as an overseer.

Wily (2004) researched the varying tenure agreements in a variety of African community forest programs. She argues that ownership of the land is important for the

development of long-term decision-making. In order for communities to be motivated to conserve the forest and manage it sustainably they have to feel secure in their long-term rights. In Africa, community forests are commonly created on lands within National Forest Reserves. Therefore State-community co-management agreements are the norm. However, the degree to which tenure is awarded through community forestry varies from country to country.

The amount of power and decision-making power the State is willing to cede is crucial. At times communities end up being consultants more than decision-makers; have to follow rules rather than make them. An example that Wily uses of a country that has withheld tenure rights is Cameroon. Communities in Cameroon must work to get licenses from the State, and the forestry agreement is contingent on 5-year re-assessments. Wily found that secure tenure could be an important incentive; this is seen particularly in successful community forests in Mexico. (Wily, 1999; Bray, 2003)

Cameroon is commonly known as ‘Africa in miniature’; within Cameroon’s borders you can find a sampling of all the ecosystems found in Africa. This includes rainforests, montane forests, savannahs, desert, and coastal ecosystems. 20 million hectares, or 40% of Cameroon is covered in forest (Djeukam, 2013). The Northwest region of Cameroon is made of montane tropical forests. The biodiversity within this ecosystem is plentiful and, the Northwest region holds many endangered and endemic species. The forests of the Northwest region of Cameroon are important to the world at large. (Nurse et al., 1995)

German colonization began in Cameroon in 1884. As part of a League of Nations mandate the country was turned over to be jointly run by the British and French in 1919.

Cameroon's French colonization brought a tradition of strong governmental control over forests (Brown and Schreckenburg, 2001). Cameroon's independence from France occurred in 1961. (Lee and Shultz, 2011), but the tradition of strong central government control continued, and the forests of Cameroon continued to be state-owned and managed until the 1990's.

After independence Cameroon fell into economic hard times in the 1990's due to falling global oil prices and the devaluation of the CFA franc. The World Bank stepped in with a Structural Adjustment Plan (SAP). Community Forestry was a major policy initiative of the World Bank at this time, and under the conditions of the SAP Cameroon was to include community-based forestry management in their legislation as part of the conditions of World Bank aid (Etoungou, 2003). The government did not support this conditionality, and there was little public advocacy. Many officials resented the Law because there was a loss of profit, stricter controls prohibiting corruption, and it involved a timely administrative procedure (Brown and Shreckenburg, 2002).

Peak oil production in Cameroon occurred in 1986 with 185,000 barrels, and has been steadily declining since (gov.uk, 2013). With oil, or 'black gold' being threatened as an economic asset Cameroon began to focus on the 'green gold' of the trees, and more focus was put on forestry. Cameroon's forests and forest products account for 10% of the country's GDP (Alemagi, and Kozak, 2010). Cameroon's Minister of forestry and wildlife reported in 2008 that 30% of Cameroon's total non-oil exports revenues come from the forestry sector. This number is largely made up of timber products (Amougou Akoa, et al. 2010). MINFOF (Ministry of Forestry) has control of forest concessions, Cameroon in the sixth largest exporter of tropical woods in the world. It was estimated in

2002 that 5.3 million dollars worth of timber was illegally harvested from the country's forests. The 1994 Law is a device put in place to help curb illegal harvesting (Alemagi and Kozak, 2010).

The 1994 Forestry Law was the introduction of community-based management and conservation of the forests. With steady deforestation rates, and a lack of knowledge and enthusiasm for conservation by citizens the Cameroonian government took steps in the early 1990's to make stakeholders more involved with forestry management (Minang, 2003).

Community forests are defined by Cameroon law as, "...a forest forming part of the non-permanent forest estate, which is covered by a management agreement between a village community and Forestry Administration. The management of such a forest is the responsibility of the village community concerned, with the help or technical assistance of the Forestry administration." (Etoungou, 2003). The 1994 Forestry Law in Cameroon allows for community forests on non-permanent forest estate to be managed sustainably by a community for 25 years, with Simple Management Plans submitted every five years. The procedure for the development of a community forest was established in 1998, and then revised in 2009. Revisions were made to streamline the overcomplicated application process. Before revisions were made in 2009 it took communities an average of four years to get a community forest certified (Javelle, 2013).

The community then has to prepare their application for submission. Their application has to be submitted and approved by the Divisional, Regional and National MINFOF offices (Javelle, 2013). Any programs mapped out within the simple management plan must be deemed by the Ministry of Forestry of Cameroon to be

sustainably sound. (Minang, Bressers, Skutsch, and McCall, 2007). However, ‘sustainable’ is not defined within the law and there are no clear criteria (Javelle, 2013).

There is the requirement to have a series of preliminary informational and public awareness meetings. The procedure begins with a 60-day period in which villagers and nearby communities are informed about community forestry and the plans and guidelines for the potential community forest. This period is meant to sensitize and ascertain the interest of the community. These meetings have to be attended by an official from the Ministry of Forestry, or from a support organization, such as an NGO. ‘Internal consensus’ must be reached at these meetings.

The next step is to create a legal entity that the government will recognize as the ‘community’ managing the forest. This can include an Association, a Co-operative, a Common Initiative Group (CIG) or an Economic Interest Group (EIG). The Law states that there should be “...provisions to ensure that the legal entity is representative of all components of the community, including women, youths and minority groups.” The guidelines set down by the legal entity should detail how the income gained will be used to improve the entire community.

Once the community is in agreement and a legal entity is formed then a formal consultation meeting is held. The entirety of the community is to be in attendance to choose the person that is to manage the community forest, and other executive members of the legal entity, and to define the boundaries and objectives of the forest. Local administrative authority, the local technical officials, and the local traditional authorities all have to be in attendance.

An application is assembled after this meeting. The application includes a application stating the objectives of the forest, stamped and signed by the head of the legal entity, a location plan of the forest, documents verifying the name of the community and the address of the designated official, a description of the past activities of the forest, the minutes of the consultation meeting, a certificate of surface area measurements, and a provisional agreement form for the community forest that defines and plans the activities to be carried out. Forestry officials are to help communities prepare all the documentation. Outside help can also come from NGOs.

Two copies of the application have to be submitted to the Divisional Delegation of Forestry. The Divisional Delegate forwards the documents with recommendations to the Regional Delegate, in at most ten days. The Regional Delegate forwards the application with recommendations to the Minister, after a maximum of ten more days. If the community fails to hear from the administration in sixty days they can file a copy of the application together with a submission receipt to the Minister of Forestry. If in another ten days the community still does not hear from the Ministry, then they consider there request granted. (MINFOF, 2009)

With the signature of the Minister of Forestry the community is able to provisional operate their community forest, up to two years, while preparing the final management agreement. This two-year period is one of the revisions made in the 2009 edit. This allows the community to potentially gain income from the forest to finance the technical surveys that are required in the final management agreement (Javelle, 2013).

Within two years the community must submit for Ministry approval a Simple Management Plan and a final Management Agreement. The Simple Management Plan

spans a five-year period. The final Management Agreement is more extensive, and covers the 25 years the forest is certified for (MINFOF, 2009). Within these plans there is required to be a resource inventory, and a socio-environmental survey. The Divisional, Regional, and National MINFOF offices, as well as the head of the Division (Prefet) must approve the Management Plan after submission. (Javelle, 2013)

With all the signatures required the community would begin to implement their management plan for the forest. MINFOF does supervise and advise in the management of the forest. The Ministry is to supply advice and technical aid at no cost to the community. Every year an operation plan must be submitted to the Ministry on top of the five-year plan. The Ministry issues an exploitation authorization every year for the community to commercial exploit products, both timber and non-timber forest products, within the forest. This is contingent on the Ministries approval of the operations and management of the forest. (Javelle, 2013)

Community forests under the 1994 Forestry Law are formed from the non-permanent forest estate of the country. Within the non-permanent estate there is competition and conflict between potential community forests and timber companies. The permanent forest estate makes up 64% of the country's forests and is reserved for use by the State. The land outside of the permanent estate is the only area available for use by any non-State group. (Etoungou, 2003)

Cameroon's devolving forest-management to communities has been described as half-hearted. As noted above, the State has had excessive State control for thirty years and starting in the 1990's began to devolve powers to the local level (Etoungou, 2003). The legal entity in which the community forests functions under is a general

unaccountable local body (Ribot, 2003). Governance needs to be addressed, and strengthened on the ground. The legal entities appointed have been seen to not be functioning or effective on the ground (Etoungou, 2003). The unaccountability of the legal entity threatens local equity and the environment.

Agrawal and Ostrom (1990) identify five property rights that are the most important for common property rights, these are; access, withdrawal, management, exclusion and alienation. Under Cameroonian law communities are able to access, withdraw manage, and exclude others from the common pool resource, however, the State retains the right to alienate the resource. This means that the community is able to enter the forest, they are able to withdraw resources from the forest (after approval by the government and if they are to be sold commercially a permit needs to be acquired), they have the right to manage the forest (after government approval), decide what and when is to be planted in the forest. The community is also able to determine who has access to the forest, and under what conditions. The State however, has the power to sell, lease the forest, under instances that the community is deemed unsuitable managers, and when the forestry agreement expires.

The State also monitors the community forest closely. They have a series of approvals, permits, and extremely detailed plans that are required to be submitted. Ostrom's fourth design principle is that those that manage the forest should also monitor the forest. Under Cameroonian law the government is effectively monitoring the community, and the community forest.

Cameroon's central government retains control and avoids establishing local democracy by overcomplicating the planning process, and micro managing through a

series of government approvals (Ribot, 2003). All this undermines the sixth design principle and weakens the managing of the community forest (Ostrom, 1990). The State retains control and does not give a more complete bundle of rights is not given to the community managing the community forest.

Non-timber forest products (NTFPs) are products, other than trees, that are available within the forest. Within Cameroon's montane forest in the Northwest region barks, honey, *Raphia africana* and *cola nitida* have been harvested for centuries. These



Image 2: Beekeeping is an activity that takes place in Community Forests.

products are used as medicine, tools, food, energy, and for cultural uses. (Ingram, 2015)

The 1994 Forestry Law allows communities to harvest NTFPs for local use and commercial export. Community Forestry utilizes local knowledge about such products (McCall and Minang, 2005).

NTFPs are an important part of the economy of Cameroon; they are estimated to be valued at 32 million dollars each year. With the encroachment of agriculture and growing demand NTFPs are being overharvested and the forest habitat is being threatened. Ingram (2015) sought to untangle the complex governance structures that affect the value chains of NTFPs. There is currently insecurity within the trading of NTFP. The system of governance is random and arbitrary with no established system in place. The risks of NTFPs like the seasonality of products, fluctuating harvest volumes, and overharvesting are factors that make it difficult for individuals and groups to predict the market.

The statutory framework established around NTFPs is vague, applied inconsistently, and randomly enforced. Programs introduced by foreign government, and NGOs add another layer of governance and complexity to the system. These groups have their own aims, goals and rules to add to the intricacy. Such programs are often short-term and add to the uncertainty surrounding NTFP management. All this ambiguity surrounding NTFP leads to short-term management practices, and overexploitation. (Ingram, 2015)

This study found that a network of governance structures control the commodity chains of NTFP. Where one may be weak another form of governance steps up to fill the void, this may be traditional customs, the government, or NGOs. When there is a void within the patchwork an opportunity is made for an actor to gain power, and therefore a voice in the governance. Community Forestry could act as one of the structures within the patchwork of NTFP governance. The governance structure is context-specific to the locality and the need of the NTFP being traded. (Ingram, 2015)

The most important NTFP in Northwest Cameroon is *Prunus africana* is a non-timber forest product found in the afro-montane forests of Northwest Cameroon. *Prunus africana*'s common name is red stinkwood, it is considered a 'special product' under the NTFP categorization of Cameroonian law (Amougou Akoa, et al. 2010). *Prunus africana* is versatile and used for fuel, timber, and medicine. Outside local markets the bark of *Prunus africana* is used as a raw material in medicines to treat prostate problems, as well as health supplements. Along with the community uses *Prunus africana* is a possible source of income for forest communities. Globally, Cameroon exports of *Prunus africana* make up 38% of the total trade.

Because of the degradation of the montane habitat where *Prunus africana* is found, it is currently endangered. The IUCN has *Prunus africana* listed as a ‘vulnerable’ species (World Conservation Monitoring Center, 1998). Restrictions have been in place since 1995 to ensure the sustainable harvesting of the product, as well as restrictions on international trade.

Community Forests are able to harvest and exploit *Prunus africana* as long as the harvesting methods set forth in the management plan are deemed sustainable by the Ministry of Forestry. Authorization from MINFOF is required to export special forestry products, and a tax is collected based on volume.

Within the Northwest region *Prunus africana* is the one NTFP that is currently being exploited for export by community forests. Eight communities have management plans approved by the Ministry to exploit this product.

From the law’s fruition to 2009, 135 licenses for community forests have been granted. These licenses cover 637,000 hectares of land within Cameroon (Oyono, 2009). The village utilizes Community Forests for timber, non-timber forest products (such as honey, medicinal herbs, and firewood), as important cultural sites, and as a watershed (Collins, 2013).

Application rates were low when the law was first passed. The Cameroonian government received 8 applications for community forests from the Northwest region in the year 2000. This is only 3% of the total applications of community forest certification in the country that year (Djeumo, 2001). It has been estimated that the cost of filing a for a Community Forest, and developing a simple management plan can cost from US\$1,850 to US\$21,500, depending on if outside help was contracted out (Etoungou, 2003).

Technical support is legally supposed to come free of charge from MINFOF, but often communities have to pay significant sums for help from the Ministry (Javelle, 2013). A failure to disseminate information, cost, a lack of interest, and an intimidation to complicated procedures may be some of the reasons for the lack of involvement.

Information on the tangible economic benefits from the established community forests in Cameroon is sparse. Studies that have tried to estimate the economic benefit have had trouble with small sample sizes and the lack of accounting records of the communities. Communities did not effectively track the expenses and profits of the community forest. The lack of records and accounts has resulted in a deficiency of transparency within community forests for researchers, and community members.

Income generated from forest products are to be equitably shared among the members of the community. The profits that are gained by the community forest are put towards community development projects. Projects to be undertaken are decided upon by a vote including the whole community. (Javelle, 2013)

The government has been taking the initiative in some ways to try and improve participation and the efficiency of Community Forests. Peter Minang (2003) has researched MINEF's (Ministry of Environment's) project of including the community in participatory geographic information systems (PGIS). Minang studied two sites in the Southwest region using semi-structured interviews, diagramming, and focus groups over a period of 3 and 7 years for the two sites.

The hope was that including the community in another aspect of community forest certification it would foster ownership, and investment in the forest. Minang found this to be largely successful. Community communication was encouraged; individuals

within the community were empowered, social capacity grew. Some other benefits were that local knowledge was recognized and appreciated, and there was training and exposure for community members at an advanced level. The degree of success was influenced by a number of factors; the degree to which the community was organized, the local land and resources provisions, relationships between community members, and NGO facilitation. (Minang, 2003) The strengthening of social capital within the community strengthened the functioning of the community forest as a whole.

The day to day functioning of a community forest has its own challenges. The technical knowledge to harvest forest products in a sustainable way may be limited to a small village community. Forest officials are in charge of disseminating information on management techniques but may not reach remote areas where forests are located on a regular basis. Another challenge is behavioral change of individuals within the community (Javelle, 2013).

Certification of a community forest places restrictions on the area that may change the way the land had been used previously. A stipulation of certification is a restriction on hunting wildlife within the bounds of the community forest. Another restriction is a ban on intensive agricultural activities and land use change. Many people are concerned initially when community forests begin to be discussed in the village there are often concerns that individuals will lose their land. This fear causes many to distrust the Law and oppose the creation of a community forest in their community (Javelle, 2013).

Patrice Etoungou (2003) studied the effectiveness of decentralization through community forestry in the East region of Cameroon. The study focused on the difficulties

faced by communities in the Upper Nyong Region of East Cameroon, particularly how devolved power was distributed, and how accountability functioned. Etoungou (2003) found that the traditional power structure was disrupted by the creation of the community forest.

In many regions of Cameroon, including the Northwest villages are considered to be part of a *Fondom*, an area that the village chief, the *Fon*, rules over. The *Fon* is a title that is passed down through the male line, and he is advised by a Council of Elders, all male. Many traditional ceremonies are only allowed to be attended by men. The *Fon* has the responsibility of solving any disputes within the village, to heal, and to advise. Traditionally the *Fon* had the power to distribute land to individuals, or to control hunting and harvesting from the forest. This traditional royalty is still revered and seen as the ultimate authority in many villages in the Northwest of Cameroon. (Diduk, 2004)

Etoungou (2003) found that the legal entity created by the community forest, which included a forest manager and forest officers replaced the authority of the *Fon*. The forest manager now had the power to control the management of the forest, a power that the *Fon* once had. The governance structures of the community shifted with the implementation of the community forest.

Benefits were unequally distributed as well. Women were excluded from the community forest and the benefits. Original contentions between lineages in the village have been exacerbated, old conflicts coming up, and new ones being added. A system of patronage has developed as members of the community seek the favor of the forest manager to receive benefits from the forest and timber sales.

A Dutch NGO (*Support to Sustainable Development in the Lomie Region*) led the certification process for the sites in this study. Once the Community Forest was established the question became what the NGOs role was in the future management of the forest. Many of the villagers accused the NGO of treating villagers like children. Tension developed between the village and the NGO from the perceived condescension. In the end the participants of this study agreed that life without community forestry was easier, although the community forest is still in place. The frustrations of the technicalities surrounding timber production, conflicts produced, and the regulations set on the use of the land outweighed the benefits that were not concrete, “new problems without any lasting solutions”. (Etoungou, 2003)

The amount of resources available within a country can lead to corruption within a society. Opportunities for individual gain become possible with resource abundance. The gain from resources are not put back into the society, but are kept for the individual. Corruption can be increase efficiency, but will ultimately become entrenched and negatively affect the society. Foreign investment will avoid countries with entrenched corruption. (Leite and Weidmann, 1999)

Corruption is entrenched within Cameroon. Transparency International ranks Cameroon 136 out of 175 countries in terms of corruption (TI, 2014). There is a range of corruption within Cameroon. Both collusive and non-collusive forms of corruption can be found in Cameroon. This includes government official and private individuals depriving the government of its revenues, as well as the government demanding compensation for its services (Alemagi and Kozak, 2010).

Small ‘dashes’ (Pidgin for ‘gift’) can be given to move work along and motivate officials. At a larger scale ‘big men’ (a term that can apply to men or women) can capture power and wealth, withholding such benefits from the society as a whole. ‘Clan politics’ is the distribution of offices and favors to the members of kin, and ethnic group, disregarding the most competent person (Rowlans and Warnier, 1988). State officials and traditional authorities also often invoke a strategy of clientalism, relying on a system of patronage. There is a varying degree of corruption, but it is present in most areas of the country (Ingram, 2015).

Corruption has been linked to a country’s poor environmental performance. Those looking to benefit from natural resources under legal protection can offer a bribe to usurp any consequences (Kelvin et al., 2010). Systemic corruption affects the efficacy of community forestry.

Community forests have been found to be fronts for illegal logging operations. Alemagi and Kozak (2010) found that the government’s own involvement in corruption gives them little clout when trying to deal with other forms of corruption. With the high cost of applying for a community forest logging companies offer to pay for the certification, with an agreement that they can then harvest timber from the forest. It was estimated in 2003 that timber companies had hijacked 44% of the community forests operating (Minang, 2007). Communities unfamiliar with their rights are easy targets for companies looking to take advantage of them.

NGOs are also participating in corrupt activities. This can lead to public mistrust and a drop in foreign investment. The entrenchment of corruption is challenging to address when it stems from the central government. Officials, such as forest guards, are

often left without their salaries for months at a time. There is a high reliance on the income made from bribes; in this way corruption is perpetuated. (Kelvin et al., 2010)

Once the forest is certified more opportunities for corruption arise. The law is designed so that the whole community benefits from the forest, but it is possible that those in high social and economic positions within the community can monopolize profits gained from the forest. Traditional Councils and dominant adult males have been found to control community forests and keep the benefits for themselves; this is called ‘elite capture’. Elite capture prevents the equal distribution of benefits to the entirety of the community.

Forests have to be safeguarded from this elite capture of individuals and small groups (Brown, Malla, Schreckenberg and Springate-Baginski, 2002). For many communities it may be difficult to actually define a solid ‘community’. The population may flux, and boundaries of who is included in the community is not always clear. And many times through the manipulation of a community, forest officials, or other powerful groups still remain in control of the domain. (Brown, Malla, Shreckenberg and Springate-Baginski, 2002).



Image 3: The Afro-montane forests of the Northwest Region.

The first principle (Ostrom, 1990) is not being complied with, there is no clear delineation of the group meant to manage the resource. Ostrom’s third principle is also ignored in that not everyone is allowed to participate in decision-making. Even when it is

not a particular individual or small group community forests do not often involve the whole community. Women, marginalized groups, and youth are often ignored, they can be prevented from participating, and their interests are often disregarded. It is documented in the Korup forest in Southwest Cameroon that youth were excluded from community forest development. (Malleon, 2003)

A small, often marginalized minority, which is found in the Northwest, is the Fulani. The Fulani are traditionally nomadic pastoralists. Currently, many Fulani are still semi-nomadic, while some populations have permanently settled. The Fulani speak Fulfulde and have their own traditional royalty, the chief is called the *Lamido*. The Fulani are Muslim and often have lighter skin. Grazing cattle, sheep, and goats causes the Fulani to roam searching for pastures, sometimes trespassing on farms. This causes conflict within the community, and often the Fulani are seen as a problem to the larger, more agricultural community. (Davis, 1995)

Deforestation and forest degradation are trends on the rise in Cameroon. Benolt and Lambin (2000) have studied the land-cover change in Southern Cameroon over time. The activities resulting in deforestation in Cameroon include fires, agricultural encroachment, and logging. Land clearing opens up new areas to be encroached on, resulting in 'spatial spread'. This land-use change is the motivation for improved forestry management such as community-based forestry management.

The Northwest region is comprised of an area of 17,910 km² (Amougou Akoa, et al. 2010). Much of the Northwest region of Cameroon has been converted into farmland and grazing land, with few remaining patches of forest. These forests are rich in biodiversity, and are vital for the peoples that live around them (Collins, 2013).

Communities in the Northwest are able to harvest and cultivate many non-timber forest products from the forest. Honey, medicinal herbs, fuelwood, and wood used for carving are some of the products that can be harvested from the forest (Nurse et al., 1995).

Communities have utilized the forests in these ways traditionally, but by getting a community forest certified the forest are state-owned but the benefits of the forest are guaranteed to go to the community for the duration of the forestry agreement.

Research allows for insight into the benefits and difficulties around community forestry. Within Cameroon studies have focused on deforestation and community forests particularly in the South, Southwest and East regions. There is a gap in inquiries regarding the Northwest Cameroon's potential and implemented community forests. This baseline research will provide a jumping off point for future research to fill this knowledge gap.

CHAPTER 2: METHODOLOGY AND DATA COLLECTION

From 2012 to 2014 in Cameroon I gathered data during my Peace Corps service to explore Community Forestry in Northwest Cameroon. I conducted 25 semi-structured interviews in two Community Forests in the Northwest region. Another source of information is my notes from meetings trying to initiate a community forest that never went forward. An assortment of documentation was collected as primary data; this included a sampling of Simple Management Plans, the Manual of community forestry, and the 1994 Forestry Law. This data will be used to gain insight into community-based forest management specific to this particular region, and will provide a catalyst for further research.

An important aspect of community-based forestry management is the support of the local government. The local government is an important stakeholder, which plays a part in the application process and acts as a technical advisor after certification. Seven forestry officials and members of the local government were interviewed in the local large towns of the research sites, and in the regional capital of Bamenda. This information will help to analyze the government's level of involvement and support in community-forest management.

Two sites were chosen in which to conduct the interviews. Both sites had certified community forests and are located in the Northwest region. Ajei is located in the Momo district outside the town of Mbengwi, and Anyajua is in the Boyo division outside the town of Belo. Government officials were also interviewed in the regional capital, Bamenda.

Ajei is a small, rural community; officials estimate the population to be between 500 and 1,000. The town is agrarian growing mainly corn and cassava. Depending on if it is rainy or dry season it can take two hours to half a day on a motorcycle to reach the closest town, Mbengwi. I was unable to leave the community during one of my visits because of the conditions of the roads and had to wait until conditions cleared the next morning.

A community forest was approved in January 2014, the first community forest in that division. The community's recent experience with the application process allowed them to easily remember the details of the application process. Also, they will have gone through the application process after the 2008 revision of the 1994 law. The revisions were meant to streamline and simplify the application process, in order to get up to date data it is therefore important to interview a community such as Ajei, which has gone through this amended process.

Anyajua is also a small rural community with only 1,000 to 2,000 inhabitants. This small community is close to an urban center city, Belo; it can take as little as a half an hour to reach the town by motorcycle. Anyajua is located in close proximity to other communities, which also have community forests. The community forests are a network protecting a large swath of area, the Kilum-Ijum Forest Reserve.

The Kilum-Ijim project is a concerted effort by NGOs, a network of villages and the government to conserve a significant patch, 17,323 ha. of montane forest ecosystem that contains a number of endemic species. The effort began in the 1980's and the forest is now lauded as a patch of preserved unique terrain. The area is popular with many

birding enthusiasts. Since its inception sensitization and conservation education has been ongoing within the communities. (Forbeseh et al., 2003)

Each community and their community forest are managed in consideration of each other and act as a network to preserve a larger portion of land. Anyajua has had their community forest certified since 2004 and have spent a decade managing their forest communally. This site will be valuable for providing insight into the implementation side of community forestry in Northwest Cameroon.

The semi-structured interview was designed to provide prompts for stakeholders to discuss the application process and implementation of community forestry. General information on agricultural activities and community involvement was asked in order to learn of the interviewee's position within the community. Interviewees were asked to provide their political party association and their feelings on the current national administration. Other opinions of the interviewees were discussed; such as their feelings on community forestry as a concept, and their personal definition of a forest.

Knowledge of community forestry and the legal aspects were assessed. Various stakeholders were asked how well they understood the application process, and what their own involvement was. The interview also asked about the interviewee's involvement after implementation. They were asked to assess the benefit they perceive as gaining from the forest.

The interviewer asked the stakeholder if they were aware of the community forest creating any conflicts. They were asked about disagreements that may exist as well as if they knew of any individual or group disregarding the management of the forest put down by the Simple Management Plan. Meetings concerning the Community Forest

were discussed, including how often they were held, if they were open to the public, and how many people attended. The interview was designed to find out if the whole community, and various stakeholders were aware and involved in the management and decisions regarding the community forest. The interview also asked who initiated the idea and application for the community forest.

In order to find out the differences in management before and after the implementation of the community forest certification the interview addressed how the forest was used before certification, as well as how it is used currently. The interview inquired as to the history of the land; was it always a forest? Or is the community forest on reclaimed land?

Training on management and technology for the community forest was discussed, as well as who led the trainings. Each interviewee was asked how much they would estimate the cost was for certifying a community forest. And the final question was very broadly their impressions of both the process of certification of the Community Forest and the implementation.

The sampling strategy was self-selection. The date for the interview was decided with a local community member that would know of the village's availability. The head of the community forest was in charge of disseminating information about the day and time of the interview to the whole community. The date of the interview was a market day to ensure that all community members would have the opportunity to participate. Individuals showed up at a local community center to conduct the interviews in a private space. The head of the community forest was the only stakeholder that I made sure to interview, the rest of the interviewees were self-selected.

The interviews were analyzed in a qualitative manner. Some demographic data will be used to analyze those participating in community forestry. Quotes were extracted and words that the interviewees used were quantified and word bubbles were created (Figure 2, Figure 3, and Figure 4). The words that appear more prominently were repeated the most often. This illustrates what the interviewees focused on in their responses. Quotes will also be pulled from the interviews to illustrate important points drawn from this research (Figure 1).

In 2012 I was a Peace Corps volunteer in the village of Sang in Cameroon. Sang is a village of less than a thousand in the Northwest Region of Cameroon, in the Momo division outside of Mbengwi. After initial meetings with the community there was some interest in looking into creating a Community Forest in a forest located in the highlands outside the village (Image 4).

My notes and attendance logs from these meetings will be used to gain information on communities that decide never to begin the application process.

To reinforce data from interviews I also collected primary data of various forms. Legal documentation and Simple Management Plans are not available on the Internet and had to be gathered from regional forestry offices in Bamenda.



Image 4: A meeting being held in Sang to discuss the prospect of a Community

In order to get access to this documentation an individual has to go to the local Ministry of Forestry. I was unable to find copies of any Community Forestry documentation at the Momo Divisional Forestry Office in Mbengwi. I had to travel to Bamenda and go to the Regional Office for Forestry in order to view any documentation on community forests. I researched, and asked administrators if the Law or the Manual of Procedures for community forests was available on the Internet; the Regional Delegate assured me it was, but I was unable to find it. All the legal documents on Cameroon's government website are only available in French. The legal documentation of the 1994 Forestry Law is very difficult for a Cameroonian to obtain.

The 1994 Forestry Law Community Forestry Manuals are handbooks to explain the Community Forestry aspects of the 1994 Law. I obtained a copy of the 1997 version, which would be the original manual; and the 2008 manual, which includes revisions, made to the law. These manuals will provide information on the application process for community forests and the guidelines for implementation.

Simple Management Plans and Management Plans are the documents communities submit to the Ministry of Forestry, which describes how the forest will be managed. Management Plans are a detailed description of the history of the forest as well as plans for the management of the forest over the 25 years it is certified. Simple Management Plans cover the management of the forest for five years, and have to be edited and resubmitted every five years that the forest is certified. 8 Simple Management Plans and 3 Management Plans were acquired from the Regional Ministry of Forestry.

CHAPTER 3: RESULTS

The administrators interviewed were five forestry officials and two members of the local government. Most of the government officials declined identifying with a political party, one participant identified as a member of the dominant CPDM party. Although working in politics many of the respondents chose to identify as apolitical.

The officials interviewed are assigned integral roles in the application and subsequent functioning of community forests. The administrators interviewed did not know a great deal about the 1994 Law or the procedure for applying for a community forest. Administrators of the local government, and not directly involved in the Ministry of Forestry, had a particularly weak knowledge of the Law, although they are involved in the application process of certification. They are not directly involved in forestry their approval is necessary for the certification of the community forest.

The Administration felt their role in a community forest is to assist the community, mainly in a technical capacity (Figure 1.A). All the Administrative participants acknowledged the difficulty of the application procedure (Figure 1. E). They cited the length of time it takes for certification, as well as the need for assistance because of the complicated nature of the procedure.

One official noted 'old scores' as being a particular deterrent to community cooperation. However, the benefit of the community forest was seen to have people come together despite their differences. Conflict that has come up has been resolved through talking.

Administration Quotes

- A. “The Law is a welcome relief to protect forests...”
- B. “(The forests of the NW) ...were always used for hunting, farming, gathering of non-timber forest products, and some areas were part of the sacred forest.”
- C. “Our role is to assist technically, follow-up on activities, and make sure they are following the plan- if not, put them in order.”
- D. “It is found there is always going to be conflict, especially where benefit sharing mechanisms are not clear.”
- E. “(Applying) is complicated for communities, community’s cannot do it on their own, someone has to spearhead it. Simplification would be better.”

Ajei Quotes

- F. “We are just trying. Decentralization should increase, and be more effective. Small small elements are sent down, but they should be more effective.”
- G. “...(applying) takes time, it is tedious. They should simplify, there are many consultations. Some people may not like it because they don’t understand the process, things have really had to be pushed through with sensitization.”
- H. “With the bureaucracy it took two years. The cooperation of the local forestry people, and the D.O. made it easier.”
- I. “Many people think ACUDA (the Community Forest Association) is trying to seize their land; but they are trying to preserve the forest so future generations can enjoy the trees and animals.”
- J. “...some top elites of the community initiated the process.”

Anyajua Quotes

- K. (About the Cameroon Government) “Must manage what you have.”
- L. “The Law meant that the government took over the forest, and now we apply for the forest.”
- M. “(the Community Forest) was an initiative of Birdlife International and the *Fon* and the government to negotiate, to preserve the forest.”
- N. “Must use (the forest) sustainably. All of us are protectors now. The forest is divided into different parts, each village has its own part. We get seeds and plant them, foster the forest, and trace the boundary so wildfire does not consume it- as use to be the case.”
- O. “Never enter Community Forest, not like before.”

Figure 1: Selected Quotations from the interviews conducted.

Another administrator saw inherent conflict between different members Of the community (Figure 1.D). The lack of clarification of a benefit-sharing mechanism was particularly noted. There are 18 community forests in the Northwest region. The forests that are now community-managed use to be State forests but were utilized by the communities as sacred forests and traditional hunting grounds (Figure 1.B). Non-timber forest products were also previously harvested from the forest. An administrator estimated the cost of certifying a community forest to be 5-8 million CFA.

Pastoralists make up part of the community around the community forest, and yet no grazing is allowed in the community forest. This conflict is difficult to resolve, and some grazers have broken the rules of the community forest and grazed their cattle and goats within the protected forest. Grazers, the Fulani populations are often cited as a problem.

In terms of economic exploitation administrative interviewees say that eucalyptus is the number one export, followed by *Prunus africana*. *Prunus africana*'s bark is used as medicine for prostate cancer. One official provided the information that 1 wet kg of *Prunus africana* is worth 130CFA (about US\$ 0.26). Administration did not see any benefit for them; the benefit of the forest they said is the income and resources being available to the community.

Forestry technicians are currently carrying out sensitization about community forestry. There is no hard copy or Internet document available explaining community forestry. A community or individual interested in community-based forestry has to go to the Ministry of Forestry for information.

The largest benefit seen by the interviewees was the forest as a watershed. The elderly of the village have noticed a difference in the availability and quality of water. The Community Forest would protect the watershed, ensuring there is enough clean water for agriculture and other activities.

The community also has plans to harvest timber within the forest. Timber species such as *Swietenia macrophylla*, and *Milicia excelsa*. They will also harvest medicinal plants, such as *Prunus africana*. Beekeeping will occur within the forest, and other non-timber forest products will be collected.

Elders in the community have noted a dramatic change in water availability and quality. The village recognizes the changes taking place and the importance of preserving the forest to protect their water supply. Many of the interviewees remarked on the importance of their children, and the future children of the community being able to see the forest and the animals that they have grown up with.

There are mixed feelings about the government in the village. Three interviewees identified themselves as supporting the CPDM party, three expressed preference for SDF, and three responded as being apolitical or declining to answer. There was no clear indication that associating with the dominant political party made it more likely to participate in government initiatives. Talking in-depth about the government there is a range of responses; some say the government is doing well, others point to initiatives that need to be improved (Figure 1.F) and still others lament the corruption and bureaucracy present in the country.

The development of the community was stressed as the ultimate goal of the community forest. Referencing notes from one of the first consultation meetings the

primary objective of the community forest was identified as "...to improve (the) livelihood of the population by enhancing all possible sources of income from the forest." Secondary priorities included the conservation of resources in the forest, and employment for those in the community.

The knowledge of the 1994 Law is limited within the community. Most interviewees knew that the Law prohibited felling trees, without a government permit, and that hunting was also restricted. The forestry manager had read more of the Law and had a more complete knowledge of its details.

Conflict has arisen within the community due to the community forest. Individuals were concerned the local development agency, or the government was trying to take their land (Figure 1.I). Originally boundaries were drawn for the community forest in a way that the area was mainly within one quarter. This meant that the community forest would lie largely within one section of the community. This was raised as a concern, being unfair to lay the burden of restricted access to land on one quarter; the boundaries of the community forest were re-drawn to be spread more equally among the quarters. All of the conflict is seen as in the past; at the time of the interviews each participant responded that there was no conflict.

The community expects their community forest to be an important element of their development. The community plans to harvest timber for income from their forest. They are also hoping that by being certified by the government, that the government will be more liable to provide aid. They would like the government to provide help in planting nurseries, in the construction of a forest research station and in providing technical assistance in the creation of market products from the forest. Many within the

community feel that the community forest will draw foreign investors and researchers, and that this will result in the roads leading to the village being tarred, and overall development to occur.

It is hoped that the community forest will bring employment, for the youth within the village and the introduction of new people. The jobs foreseen in the forest are tree planting, beekeeping, forest patrolling, and fire keeping. Members of the community will also be able to obtain important resources from the forest; such as medicinal plants and firewood.

The forest was traditionally used for farming. During the process of certification individuals with plots within the boundaries of the community forest were re-located. Traditionally hunting was also conducted within the forest, as well as the harvesting of timber for houses.

The cost to certify the community forest, before the creation of the forest's management plan, was estimated at 500,000 to 1 million CFA (1,000-2,000 USD). One village elite, living outside of the community, as well as the Development Association paid for all the costs.

The community of Ajei had very recently gone through the certification process to obtain a community forest. Each of the interviewees was asked their impressions and thoughts on the application process. This community applied after the 2008 revisions to the Law that was designed to pare down and simplify the process. Many participants felt the process was still burdensome and tedious (Figure 1.G). It took the community two years to get their community forest certified. The local forestry officials and government were acknowledged as having been very cooperative and making the process easier

(Figure 1.H). With the intrinsic difficulties of the application, the community appreciated cooperation by these officials.

While many participants complained of the lengthy application process overall their impressions of community forestry in Cameroon are good. This can be seen in the word bubble in Figure 3, the most prominent, and most repeated word



Figure 3: A word bubble created from the interviews gathered in Ajei.

was ‘yes’. While other common words included ‘trees’, ‘people’ land’, ‘development’, and ‘Ajei’. This reflects the overall positive view the community has for their community forest.

One individual recognized the lengthy time frame of certification but saw it as a positive aspect. If the forest were certified too quickly you wouldn’t be able to guarantee that everyone understood the implications and consequences of having a community forest, which could lead to more conflict in the future. Protection of the forest from degradation, fighting climate change, and economic development and exploitation were all seen as positive aspects of community forestry.

Anyajua is an established community forest within a network of community forests in the Kilum-Ijim Forest Reserve. The seven volunteer interviewees in this community were all elderly men. Many of the participants were also members of the traditional royalty. The importance of the traditional royalty remains strong in this

community. The *Fon* and his council, in a similar fashion to the traditional way of forestry management, lead the management of the community forest. Four of the interviewed members identified as being a member of CPDM, one identified as a member of SDF, and two declined to answer. It is possible the greater number of CPDM members meant the village was more inclined to interact with the government. One interviewee expressed that you “...must manage what you have,” when talking about the government (Figure 1. K) When I inquired if there were any women that were going to volunteer to be interviewed I was told that the women were working in the fields.

Ecosystem services and the resources available in the forest were identified as reasons why the forest is important. The forest acts as a watershed and water catchment for the community. Some of the resources harvested from the forest include medicinal plants, bamboo, red feathers for traditional use, and firewood.

Traditionally the forest had many uses. Some was used for agriculture. Charcoal was also made there in order to smelt metals to create gongs and other traditional paraphernalia. Royal hunts took place inside the forest, and the trees were used for carving. Non-timber forest products were collected, such as medicinal plants, bamboo, and honey.

Activities within the forest were restricted after certification. Honey is still produced in the forest, and medicinal plants are gathered. Bamboo, and firewood is collected from the forest. *Prunus africana* is the only cash crop currently inside the forest, but efforts are being made to cultivate more. It is now forbidden for any hunting to occur within the forest, and there are strict patrols within the forest to make sure there

is no trespassing. Restrictions on entering the forest were noted as a difference that occurred after certification (Figure 1.O).

The initiative to create a community forest did not come from the community, but was introduced by an NGO called Birdlife International, and the government, with the cooperation of the traditional authorities (Figure 1.M). The community sees the intervention by Birdlife International and the government to protect the forest as a positive thing. Many of the interviewees' observe that without preventative measures the forest would have been exploited to the point of destruction. Before the Community Forest set up boundaries of protection land was being allocated as agricultural plots by the traditional authority, to the point where there was not much forest left. The forest supplies the community with many vital things so it is seen as a good thing that it is now protected.

The awareness of the 1994 Law is similar to community members in Ajei. There is awareness of restrictions put in place, but not much else. The law restricts the exploitation of the forest. This includes hunting, medicinal plants, and timber. It was also known that fires were no longer allowed in the forest, some community members were even jailed for that offence. One respondent said that the Law put all forests under governmental control, when this had happened decades before, the Law allowed for a degree of community ownership that was previously not possible (Figure 1.L).

The initial introduction of conservation by Birdlife International was met with distrust. The people were not happy when they were told that they could not trespass within the forest. Birdlife helped with sensitization, along with the government, and

eventually the community forest was certified. Birdlife International paid most of the expenses to certify the forest; there is not a clear estimate of what the cost amounted to.

Many community members are involved in the functioning of the community forest. Fire tracing is done, as well as forest patrols to make sure no one is trespassing in the forest. Hives are kept in the forest, and bamboo is harvested to make baskets. *Prunus africana* and other medicinal plants are harvested as well. The community sees it as their job to protect and preserve the forest, and to sensitize other communities on the importance of conservation (Figure 1.N). The collaboration of other community forests in the Kilum-Ijim Forest adds accountability. All the forests have to report to each other and there is a shared set of rule that have now become like laws. This code of laws is the basis for each communities individual rules, but they have to include the rules set down by the network of communities.

Benefits from the community forest can be seen within the community. The community came to an agreement to use money earned from the forest to construct two toilets for the government technical school. With profits from harvesting *Prunus africana* the community expects to construct culverts to improve the conditions of their roads.

Within the forests that make up the Kilum-Ijim reserve there are a number of endemic species and rare bird species, such as the *Cuculus gularis* and *Andropadus virens*. The uniqueness of the forest and its inhabitants is another reason for its preservation. The interviewees express a desire to pass on their forest to the next generation to enjoy. There is also the possibility to gain income through ecotourism and research.

‘Water’, and ‘*Prunus africana*’ are also terms enlarged within the bubble. These are important resources that the community forest offers to the community.

There seems to be a good impression of the community forest. Many participants recognized the scarcity of forests in the region, and the priority of preserving what is left. There is also a pride in the preservation of such an important resource for generations to come. They felt the community forest is running smoothly. One participant did note that the government pushed the idea of the community forest through.

In order to discuss the prospect for a community forest the population of Sang had to hold a community-wide meeting. Announcements for meetings about community forests were held at the local Presbyterian Church and Catholic Church. While this includes most of the population besides word of mouth there was no effort to contact other community members. Those community members not at church and the nomadic Muslim herding population, the Fulani, were not informed of the meeting.

A little over fifty community members attended early meetings on Community Forests. The meetings were held in a local community hall. Benches lined the walls to accommodate participants and a local community member helped me lead the meeting. At the first meeting there were fifty-three community members in attendance, the majority identifying themselves as ‘farmers’. The average age of the participants was 57. The community has expressed that the youth of the village goes to larger cities for the employment and social opportunities.

After initial formalities the meeting began with a description of community forests, the Law, the benefits, and possible implementation. Questions and concerns were voiced at the end of the meeting. There was a long discussion on the actual benefits the

community forest would actually impart on the village. Expectations were high; community members discussed the possibility of income resulting in paved roads and electricity for the village. Concerns about the boundaries of the community forest were also discussed. Many people voiced concerns that their land would be taken away for this new project. While many women were in attendance most of the contributions were from male community members.

With the conclusion of the first meeting enough interest was expressed to merit additional discussions. Two more meetings were held in a similar fashion but with dramatically lower attendance. It was decided that a MINFOF representative should be brought in to further explain Community Forestry and the application process. At this fourth meeting a forestry official came to the community to answer questions and more thoroughly explain the application process, but there was not enough people in attendance to make the meeting productive. Also the forestry technician from the local Ministry of Forestry arrived in the village and she spoke only French. The Ministry had posted her in an Anglophone region despite her lack of English. This hindered the communication between the administrator and the local population.

There were ten people in attendance for this meeting. When community members were asked why they failed to attend many cited the need to be in the fields, or the need to prepare the family meal. As interest waned other activities were prioritized. A fifth meeting was held to see if waning attendance was temporary, but only five people attended. It was decided at that time that community interest had waned and it was inadvisable to continue to begin the application process.

The Manual and especially the entirety of the 1994 Forestry Law are lengthy and intimidating documents. The Manual of Procedures is over a hundred pages long. It includes a breakdown of each of the steps to create a Community Forest, as well as an annex giving examples of the documents expected for certification.

These example documents leave spaces for the plethora of details the community is expected to fill in. It is helpful to have such a template, but the amount of information expected to be gathered can be daunting. The Provisional Management of a Community Forest has to include an inventory of the community forest, GPS coordinates of the boundaries, descriptions of each compartment of the community forest, a five-year socio-economic development plan, inventory outputs (for flora, wildlife and non-timber forestry products), as well as a five-year action plan.

Many of the details of the Law have been discussed. Some of the important points include that the Ministry of Forestry is required to give free technical help to the communities applying for a community forest. Also, that the Law concedes the forest to the community, but the government retains ownership.

The Manuals from 1997 to 2009 changed slightly. The goal of the revisions was to speed up and simplify the application process. One of the amendments included allowing the community forest to provisionally operate for two years after a request for certification is made, but before the Simple Management Plan is assembled. This would allow the community both time, and operating the forest would bring in finances that could be used to complete the Simple Management Plan.

Each Simple Management Plan begins with a brief description of the community forest. Maps are included in the Plan at a scale that details the area surrounding the forest, however it is difficult to determine the location of the forest within the Northwest region.

The forest is sectioned into compartments and there is a description of each of the compartments. The compartmentalization of the forest is consistent throughout the Simple Management Plan. The topography of each section is described, as well as the ecosystem. The uses of the compartments in regards to community forestry are then described, activity, operations, location and the persons responsible are included in table format.

For one year most of the Simple Management Plans include a day to day breakdown of the activities to be carried out in the forest. Most of the activities include sensitization on *prunus Africana*, planting, and tending to young *prunus Africana* plants. The stock of *prunus Africana* currently within the forest is recorded, along with the diameter of the trees. This will determine how many trees are available for potential harvesting. The plans then include descriptions of future nurseries of *prunus Africana* to harvest in the future.

Within the five-year plan most of the 8 communities that have submitted these documents plan to harvest and sell their products. Some of the communities include within their plans trainings on marketing and selling products. It is assumed that income will be generated from these activities. Means for accounting and keeping track of expenditures and income are not present. There is also not any discussion on what is to happen with the money once it is earned.

NGOs and outside sources were cited as responsible for the more technical aspects of the Simple Management Plans. This included the development of the map, and species inventory done within the community forest. In the community of Bongkop the agency they hired to do their Simple Management Plan also did a socio-economic survey.

The eight Community Forests that submitted these Simple Management Plans belong to the network of community forests surrounding the Kilum-Ijim Forest Reserve. When the plans discuss the rules and restrictions in place in the forest each of them include that their forest also abides by the larger set of laws put in place by the *Fons* to protect the Reserve. The cooperation and coordination of this network of community forests helps by creating another layer of accountability.

Table.1: Summary of the Simple Management Plans

Community Forest	Mbai	Emfveh-Mii	Yang-Tinifoin-Muloin	Bongkop	Nchily	Ijim	Mboh Mboleng Ilung	Yang Tinifoin Bimulo
Year of Certification	2000	2001	2009	2003	2001	2004	2009	2000
Size	484 ha.	1,217 ha.	1,300 ha.	34 ha.	435 ha.	468 ha.	475 ha.	431 ha.
Map present in the Simple Management Plan	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Year-long description of daily activities	Yes	Yes	Yes	Yes	Yes	No	Yes	No
Plans for marketing and selling products	Yes	No	Yes	Yes	No	No	No	Yes
Socio-economic survey	No	No	No	Yes	No	No	No	No
Notable aspect of Simple Management Plan	-“fondom-wide rules of the community forest”	-Traditional authorities stopped farmers from destroying the forest	-a small registration fee is required to be part of the legal entity	it took this community four years to get their forest certified	-Measures included on how they will market <i>prunus Africana</i> ,	-Written in French -Fulani are mentioned as stakeholders for the forest	-Written in French	-Written in French -Clearing for farms is the primary reason for forest destruction

CHAPTER 4: DISCUSSION AND CONCLUSION

The current state of community forestry in the Northwest Region of Cameroon was explored through semi-structured interviews with stakeholders and analysis of primary data from relevant literature; including the 1994 Law itself, a sampling of Simple Management plans and notes from the failed initiative for a CF.

The community of Sang abandoned the idea of creating a community forest. There was initial interest that quickly waned. This can be contributed to a variety of possible reasons. One reason identified by members of the village was the importance of priorities. Women and men could not prioritize a meeting that seemed to hold little benefit when there was work to do in the fields and at home. To this community the benefits did not outweigh the costs, Ostrom's second design principle.

The village of Anyajua has had sensitization and education projects on conservation for decades. This legacy of stressing the importance of conservation may have been a contributing factor to the community's involvement and dedication to community forestry. Sang has not had any such initiatives, and there is little to no education on environmental issues in schools. The importance of conservation may not be seen as a priority. The village was initially interested when they thought a community forest may be able to get them electricity and paved roads, but when it became evident that these were far-fetched possibilities the remaining benefits were not enticing.

The age structure of the village may also have been an influence. The village is largely elderly, the average age of participants at the meeting was 57. This is attributed to rural-urban migration. The youth have left this small village to seek employment,

opportunities and socializations in the larger town and city. This older population may not have the energy to undertake a new project, or to change the way things have been done for generations. There was also no individual that came forth from the community to spearhead the project. Without a push from the community the idea collapsed.

I learned that the motivation to create and maintain a community forest has to come from the community. The community was eager to learn of community-based forestry management and its possible benefits. However, with different priorities, such as tending to agricultural plots, and taking care of the home, it was difficult to make time for a new undertaking. The amount of work even to create an application for a community forest was intimidating to many participants. There was the question of who would take the lead, and how many people would be willing to aid in the enterprise in their free time.

There was also a strong interest in the benefits that would be tangible if a community forest were to be created. The current state of the forest is as a watershed in which some non-timber forest products are gathered, the certification of the area as a community forest wouldn't alter the communities use of the forest. The community had hopes that certification by the government would lead to roads being built, improved electricity, or access to new markets. None of these desired benefits could be guaranteed. Since the benefits of conservation, and tenure were not tangible the current state of the forest was seen as acceptable. The perceived benefits did not outweigh the costs. Certification would lead to a lot more responsibilities, costs, and the government intervening in their community.

The 1994 Forestry Law was an initiative put in place as a condition of World Bank assistance. Support for the Law within Cameroon was low (Egbe, 2001). The Law

did not come from the insistence of the public, nor did it develop from the government, it was foreign imposed. Lack of awareness and motivation by the public has been a problem when implementing this legislation.

NGOs are stakeholders like any other. They have their own motivations and goals. They can place these on the communities they work with. The protection of habitat important to endemic bird species is a large motivation for Birdlife International to try and motivate communities to participate in ways to conserve the ecosystem, such as community-based forestry management. The community may not be as eager to participate in conservation activities, but may go along with it if foreign donors are providing services, and promising benefits. However, if the core motivation doesn't come from the community once the NGO leaves and the community is left to manage the forest then it will quickly drop off. If an NGO is pushing for community forestry but the community is not behind the idea, ultimately the project will fail. Since the community of Ajei was motivated to manage their community forest Birdlife International and the community were successful.

If the community is motivated to manage their forest for the long-term, it is important they have the skills to do so. Once a community forest is put in place with the help of an NGO, what role does that NGO now play? If an organization helps a community navigate through the administrative process of certification it is imperative that the NGO or some other organization then provides tools to help manage the forest. The skills, knowledge and ability have to be cultivated within the community to ensure they are able to properly manage the forest on their own.

Strong governmental control has been in place mirroring the policies of French colonizers. That coupled with corruption in the government leaves individuals with little political empowerment. There is no control or decision-making power at the individual level. Community forestry offers an opportunity for active citizenship, but because of the norm of governmental control many may not know how to embrace their power. The sixth design principle is weakened in Cameroon's community forestry because of such strong government intervention.

Many community members see the government as the one in control of the forest, as evidenced from the interviews conducted in Anyajua. This is largely true; the government retains ownership over the forest while agreeing through the 1994 Forestry Law to manage the forest in a 25-year concession. This retention of power undermines the efficacy of the local democratic bodies. Without discretionary power the executive branch fails to empower the community and power remains concentrated in the central government (Ribot, 2003; Wily, 1999).

Decision-making power should be coupled with substantial tenure of the land being transferred to the community. The forest is a resource for the community, and will be for generations, as long as the community feels there are safeguards that the future generations will be able to access the forest. Without secure tenure the government can plausibly sell the land, or restrict access. New investments are therefore restricted without tenure over the land and resources (Rohit et al., 2008).

Community forestry is legislation put in place to decentralize power to the local level. The interviews in Anyajua told a different story. Most of the participants talked about how the government told them, or made them establish their community forest.

The interviews from Anyajua do not suggest that the creation of the Community Forest was an initiative of the local population. It was not a decision made by the community to create the Community Forest. The government, Birdlife International and the traditional royalty are cited as the drivers behind the project.

Most of the individuals in the Northwest region try to avoid interacting with the central government. The central government of Cameroon is often viewed with mistrust. Many feel the government isn't looking out for their best interest, and any interaction with government authorities generally includes a bribe.

The SDF party, the opposition to CPDM is based in the Northwest and Southwest regions. Could low participation in Community Forestry in this region be due to an avoidance of government initiatives? The forestry department has had policies in practices in the past that have made the population mistrust the department. Because, of this tension the forestry department cannot currently play the supporting role it is meant to play with Community Forests activities (Arnold, 2001).

Anyajua and Ajei had members of their community that identified with the CPDM party. Is there an unusually large proportion members of CPDM than the average community the Northwest in the communities that decided to certify their community forests? If a community sympathizes with the dominant party it is possible that they would be more likely to participate in government initiatives.

Within the Northwest region of Cameroon there is a disconnect between the populace and the government. Most of the regions of Cameroon, as well as the central government speak French primarily. The country is bilingual, but there is a clear preference for French, and it is expected that you have a working understanding of

French. French is taught in the schools, but for those unable to afford an education, and living in a region, such as the Northwest, that speaks English and Pidgin, you are left at a disadvantage. This can clearly be seen in interactions with the government.

In the village of Sang a Forestry representative from MINFOF came to sensitize the community on Community Forestry, at the request of the community. Upon arrival we found that she was recently transferred from the Francophone West region, and knew almost no English. The elderly population spoke no French, a functional amount of English, but mainly relied on the traditional Meta dialect of the region. The meeting that was supposed to take place was ineffective. There was little communication or understanding on either side.

The inability to communicate with administration also contributed to the Sang's abandonment of a community forest project. The government is non-navigable to the large portion of the population that does not speak French. Government officials posted in an Anglophone region, with a job that requires community interaction are useless when they cannot communicate. The 1994 Law expressly states that the forestry officials of MINFOF are to supply technical advice and aid with their community forest. This is an administrative weakness that needs to be addressed to ensure the success of community forestry in this Anglophone region.

The burdensome administrative side of a community forest is a deterrent to applying. Within the forward of Yang-Tinfoinbi-Muloin's Simple Management Plan they state, "The procedure to acquire a community forest is long and difficult..." their Community Forest took four years to be certified. Ajei's community recently obtained certification for their forest after a two-year period of applying.

There are a plethora of factors contributing to the length and complexity of the application process. The initial time investment is community meetings where unanimous agreement is required with local officials in attendance. It can be difficult to get a hundred percent agreement within a community. But as a community member of Anyajua said, it is important to take your time at this point to ensure that all community members and neighbors are aware of what having a community forest really means, this will avoid conflict in the future. And as Ostrom's seventh principle states, conflict mechanisms must be in place to ensure effective management.

The required presence of government officials can add time and cost to the application procedure. One interviewee related "...to create a community forest you must have a meeting with the community and the D.O. (District Official) present, the D.O. charges 50,000CFA (US\$100) to come to the village, there is also a 20,000 CFA (US\$40) charge to pay in order to receive the certificate." This meeting and its related costs are just to begin the process of applying for a community forest.

Aid from forestry officials is stated within the 1994 Forestry Law as a service that is to be provided to the community at no cost. This is not always the case, forestry technicians will ask for money for 'transportation', similar to the D.O. The amount of money requested for such 'transportation' far exceeds the actual cost of transport from the town to the community. The term 'transport' is a colloquial way to request a bribe. Another time sink and difficulty in the application process is the inventory and mapping of the proposed community forest. This is not only a time investment but requires skills and knowledge to complete. McDermott and Schreckenburg (2009) discussed in their case study how a community forest may be difficult to establish without a base of social

capital and skill. In the global South it is less likely that a community will be able to complete complicated bureaucratic and technical requirements. Ajei was an exception in that they had a trained scientist, a PhD in seismology in their community, but this is not the norm. While community forests can build social capital the initiation of a community forest more possible with a strong base already intact. (McDermott and Schreckenburg, 2009)

Often these requirements have to be outsourced to an NGO or a for-hire agency. Another cost added onto the community. As the Mbibi Community stated within their Simple Management Plan, "...not having the technical know-how to do all activities leading up to the establishment of a SMP, le Projet renforcement des Initiatives pour la Gestion Communitaire des Ressources Forestieres et Fauniques (RIGC) came into agreement with AYUKEGBA Forestry to do this for the Mbibi community." However, if an NGO or some other agency is able to train community members while completing the required tasks the skills of the community members could be enhanced. The skills of the community would grow, as stated in the case study conducted by McDermott and Schreckenburg (2009).

NGOs and timber companies are the most common entities to finance community forestry undertakings. The presence of threatened ecosystems or valuable timber species will therefore be a determinant in a community's ability to get outside funding. The Kilum-Ijim forest reserve represents an area where endemic montane species have a last stronghold, Birdlife International and other NGOs took an interest in the area and aided in creating Community Forests in the area. The remaining area of the Northwest does not have these unique species to draw the attention of conservation organizations; neither

does it have valuable timber potential to draw the interest of timber companies. Without these draws the communities will have to be more persistent in finding funding or fund the undertaking themselves. This could be an important factor in the lack of community forest applications in the region.

Once a community forest is certified there are still administrative challenges. In order to harvest and exploit a non-timber forest product, such as *Prunus africana*, the community needs to obtain an annual exploitation permit from MINFOF. The government authorities have been so slow to process requests that the harvesting season comes to an end before permission is granted for exploitation. If the community were to harvest from the community forest without these permits they endanger the certification of their community forest. The community has to harvest their products in order to receive the financial benefits.

The income and products produced from the community forests is required to be equally distributed between the members of the community. This is not always the case. Elites within the community are able to confiscate the benefits for themselves, often setting up a system of patronage to selectively distribute benefits to certain members of the community. This hijacking of community resources is clearly elite capture (Javelle, 2013). The case study by Malla and colleagues (2003) shows how the wealthy can use their power and privilege to obtain the majority of benefits from a community forest. In this case study the poorer households were even unaware of their own rights and the benefits that they should have been receiving.

One village elite's name is repeatedly brought up in the interviews in the community of Ajei. This individual now resides in the large port city of Douala, but

remains close with the village through family ties. This village member is the benefactor that funded and pushed for the Community Forest. Since the Community Forest is not operational it is yet to be seen if a system of 'elite capture' will develop.

This becomes a problem when Ostrom's third design principle (1990) is ignored. All members of the community should be involved and have a say in decision-making. Elite capture is the hijacking of the community forest by an individual or small group for their personal gain. It is possible that individuals and small groups may also be marginalized and left out to the detriment of the community forest.

In this instance the shifting power structure may disrupt the traditional management. In Ajei the *Fon* has been consulted in creating the community forest but will not be the forest manager. In Anyajua the *Fon* and his Council make up an important part of the forest management team. Etoungou (2003) illustrates the importance of taking the traditional power structure into account.

'Community' forestry does not always include the totality of the community. The word, 'community' is debated in meaning. For the implementation of Community Forestry in Cameroon 'community' is considered a group of people bounded by geography. The first design principle stresses the importance of being able to delineate the group of people that makes up the community (Ostrom, 1990). In the preliminary research I conducted there was the marginalization of women, youth, and the ethnic-group the Fulani, in the decision-making and implementation of the community forest.

Women are important members of a rural community. It is most commonly the women that work the fields, and take care of the finances. However, men are viewed as the decision-makers and leaders of the house and community. Women are often present

in public meetings but will be reluctant to speak in front of a crowd where there are a lot of men. Women are a portion of the population that are effectively left out of decision-making. The traditional royalty is patrilineal, and women are forbidden in many meetings, and rituals. This can be seen particularly in the interviews conducted in Anyajua.

Because women are so important in terms of cultivation and land use it is vital that they are able and empowered to participate in community forest activities. One of the conflicts mentioned in the Anyajua Community Forest was, "...women that burn too much fire, some that even enter and destroy." The women that disregarded the boundary of the community forest may have been ignoring a rule because they had no voice in making it. Since the women are the ones interacting with the boundary as they farm it is important to have their involvement.

The Fulani are another group that is an important stakeholder to the land considered community forest, but not involved in the decision-making. The Fulani are herders raising cattle and moving throughout the region to graze their cattle. Since the Fulani are semi-permanent members of the village they are not viewed as a part of the community. Conflict arises between the 'community' and the Fulani when the herders graze their cattle on farmer's fields, and now within the boundaries of the community forest. This conflict also emphasizes the Fulani as outsiders of the area.

As per the rules set forth by the Management Agreement the *Fon*, the chief of the village, will deal with conflict and indiscretions. However, the Fulani are of a different ethnic background and the *Fon* is not the chief in their eyes. The Fulani have their own chief, called the *Lamido*. The Fulani would not see this punishment mechanism as fair

according to their traditions; therefore Ostrom's fifth principle (1990) is not accomplished. The conflict resolution guidelines established are ineffective when dealing with the diversity that truly represents the community.

The seventh design principle stresses the importance of having a conflict resolution mechanism in place in order to govern a common resource (Ostrom, 1990). The interviews conducted in both Anyajua and Ajei suggest that there was conflict within the community about the community forest, but that current conflicts do not exist. Communities are complex and made up of individuals with their own motivations. Old scores not related to the Community Forest can also surface when the community works together, and can hinder the progress of the community forest.

Not acknowledging conflict, or the potential for conflicting can harm the potential of the community forest. By saying all conflict is 'resolved' there is the risk that conflicts that are under the surface can erupt catastrophically, instead of creating an open forum in which conflicts can be managed before they reach the breaking point. Some structure needs to be in place to be able to deal with the conflict that is present, and that will arise.

To successfully empower the community and allow for the most effective management discretionary powers should be transferred to the community before management burdens. The sense of ownership will motivate the community, and will engage the local population (Ribot, 2003). The third and sixth design principle put forth this idea. The third principle is that the managers of the resource should also monitor the resource. The sixth principle is that the community should be able to conduct and manage their own affairs (Ostrom, 1990).

Both of these principles are being undermined in Cameroon by the omnipresent central government. Research done by Wily (2004) shows through more complete decentralization that other African community forests have been successful. A more complete bundle of rights allows for long-term management, and the community invests in the future of the resource.

Community forests in the East, South and Southwest of Cameroon harvest timber for export in order to produce income from their Community Forests. In the Afro-montane forests of the Northwest region there is little potential for timber production. Within this region the Non-timber forest product, *Prunus africana* is the commodity of choice.

The bark of *Prunus africana* is used medicinally to treat prostate cancer, it has large markets in Europe and the U.S. All 12 Community Forests that are part of the Kilum-Ijim reserve have developed Simple Management Plans, with the help of outside organizations, to exploit *Prunus africana*. Many of these plans include nurseries and fostering the growth of current trees that may not be mature enough for harvesting. There are fewer details on the marketing and selling of the product. The plans do not include how much it costs to produce and take care of the trees, how much the product is expected to be sold at, or what will be done with the money once it is earned.

The lack of financial transparency is a weakness in the community forests. Without proper accounting it is difficult to determine how much communities are benefitting from their Community Forests. The interviews that I conducted included asking each participant how much it cost to certify, and then maintain a community forest. I was given some vague estimates for the cost of certification, and no one felt

comfortable estimating the costs of maintenance. Once profits are earned from *prunus Africana* there are no accounting measures that I found in place to keep track of their earnings.

Without financial accountability elite capture becomes much easier. The community as a whole is unable to determine the true value of the profits and ensure that it is going towards community-approved projects.

Another ambiguity within community forestry is the definitions of words commonly used. Sustainability and conservation are terms used a lot within the Simple Management Plans and in the interviews I conducted. These terms are used in positive ways to describe how the forest is to be managed as a community forest, however these terms are not defined.

There is no clarification or guidelines within the Law, or any other documentation on what is deemed ‘sustainable by the government, or the community. This weakens the terms, and the vagueness lends to an element of uncertainty within the community. There is a lot of reporting on minute aspects of the area, and the management but the idea of ‘sustainable use’ of that land will vary from person to person.

If these terms were to be defined it is possible that the overwhelming amount of reporting that communities have to supply to MINFOF could be reduced. The communities will be more prepared and have a comprehensible course of action with clearer guidelines, and government officials would be able to determine if ‘conservation’ has been successful in more visceral terms. This would unburden some of the complicated procedural aspects of community forestry in Cameroon.

Conclusion

The potential for Community Forestry in the Northwest of Cameroon is large and would conserve an ecosystem that is home to many endemic species. It is therefore important to try and understand the challenges the community forestry faces as it expands in this region. Challenges to those communities initiating the application process include daunting administrative and bureaucratic obstacles, as well as hefty costs financially, technically, and in terms of time. Ostrom's eight design principles (1990) allow insight into the challenges faced in the implementation and management of community forests as a resource.

First, the community that is to manage the community forest needs to be clearly defined, and membership needs to be clearly stated, as well as the boundaries of the community forest itself. Community forests in Northwest Cameroon currently identify their communities geographically, but fail to place guidelines on membership to include youth, and nomadic populations. GPS coordinates of the community forest successfully bound the resource to be managed.

The second design principle is that benefits should be equal or outweigh the costs of a community forest. For the village of Sang a community forest was not deemed beneficial enough to outweigh the costs. However, for the community of Anyajua, which had a history of conservation projects, a community forest was an important priority. For community forestry to expand in the Northwest region other communities will have to judge the benefits available from a community forest will outweigh the costs.

All members of the community should be involved in decision-making. The third design principle needs some work in Cameroon. Marginalized populations, such as

women and the Fulani, are not given say in decision-making. These omissions can lead to conflict and undermine the community forest.

The fourth and sixth design principles are weakened in Cameroon by strong government intervention. Communities are not given the freedom by the government to conduct their own affairs or monitor their community forest. The government keeps in place an elaborate system of checks that keeps the community running to administrators for approval of their activities. With true tenure the community would be able to fully have control of the community forest.

The seventh and fifth principles state that, a mechanism needs to be in place to resolve conflict, and punishments must be graduated and fair. The communities interviewed felt conflict in their respective communities had been resolved and did not foresee future conflict. However, in order to be sustainable a conflict mechanism should be established. Currently, the *Fon* of the community commonly distributes punishments, this becomes an problem when not everyone in the community recognizes the *Fon* as a traditional ruler.

The eighth principle introduces the concept of nested enterprises. This references the multi-level structure of management. Forest governance is usually characterized by its multi-actor and multi-level nature. This adds a degree of complication that can make governance difficult to accomplish. Governance in the case of community forestry can also be complicated by the merging of modern government governance institutions, with local traditional systems of governance (Wiersum, et al. 2013). It is important that this complicated structure is accounted for and managed.

More research needs to be done in order to clarify and strengthen the preliminary research conducted here. Preliminary conclusions suggest that tenure needs to be strengthened in Cameroon, marginalized populations need to be empowered to participate in community forestry, and governance needs to be improved nationally, and locally. With such improvements community forestry will benefit the communities and the environment of Northwest Cameroon.

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APPENDIX

Interviews for the Analysis of the Forestry Law of 1994 in the Northwest region of Cameroon

Date: _____

Section 1-

Location: _____

Community Forest: _____

Gender: Male OR Female

Age: _____

Level of
Education: _____

Occupation:

Any Community Positions Held:

Section 2- Agricultural Activities

How many hectares of land does the household cultivate?: _____

What crops do you grow on your land?: _____

Who commonly works the land?:

Where do you sell your crops?

Have you noticed any change in the seasons that have affected the way you plant your crops?

Yes OR No

If Yes:

Please expand on what you have observed:

Section 3- Opinions of the Interviewee

What political party do you associate yourself with?:

Do you have a positive view of the government?: Yes OR No

What are your feelings on the current administration?

What is your definition of a forest?

What do you think of community forests as a concept?

Section 4- Community Forest

What is the extent of your awareness of the 1994 Forestry Law passed in Cameroon and related to Community Forests?

What is the process like applying for the community forest? Who are the people involved?

What is your involvement in the development of a community forest (Question for forestry officials- Is information on the community forest readily available to others? Is documentation on a computer and/or in paper?

How much would you participate in the future management of the community forest?

How would you benefit from the community forest?

Do you feel like the community forest causes any disagreements between stakeholders in the community?

Is there conflict between the existing stakeholders?

Does anyone in the community disregard or explicitly break the protection of the community forest at this point?

Are you aware of any meetings being held concerning the community forest?

Yes OR No

If yes:

On average, how many times a year are meetings held about the community forest?

How many people attend the meetings? Are they open to the public? Or just the managers of the forest? Who initiated the process?

What did the village traditionally use the forest for?

How would the forest be used if it became certified?

To the best of your knowledge what is the history of the land that is the community forest?

Has there been any training on management or technology of the community forest?
And by who?

What is the estimated cost for certifying a community forest (official and unofficial)?

What is your overall impression of the process of certifying a community forest?

What is your overall impression of the implementation of the community forest?