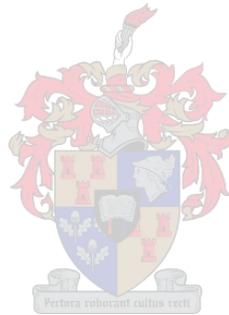


**Towards an Approach to Environmental Ethics
Responsive to Environmental Challenges
on the
Slopes of Mount Kilimanjaro**

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**Dissertation presented for the degree of
Doctor of Philosophy in Applied Ethics in the
Department of Philosophy at Stellenbosch University**

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Co-supervisor: Prof. Sirkku K. Hellsten

April 2019

DECLARATION

I, Michael F. Lyakurwa declare that the entirety of the work contained in this dissertation is my own, original work, that I am the owner of the copyright thereof (unless to the extent explicitly otherwise stated) and that I have not previously in its entirety or in part submitted it for obtaining any qualification.

Date: April 2019

ABSTRACT

The main purpose of the research for this dissertation has been to determine an approach to environmental ethics that could help resolve environmental challenges experienced today by people living on the slopes of Mount Kilimanjaro. This research goal was motivated by the fact that many of the hitherto developed environmental ethics approaches fall short when called upon to provide guidance on how to resolve some of the environmental challenges experienced on the slopes of this mountain. In this regard, I demonstrate why this applies to some western approaches to environmental ethics, as well as certain efforts to base an indigenous environmental ethics on traditional African values. I also show that Norton's process guidelines, which proceed from environmental pragmatism and the philosophy of adaptive management, provide a clue to how to effectively address the environmental challenges. Using Norton's guidelines, I show that the challenges identified on the slopes of Mount Kilimanjaro are down to two underlining causes. The first one is the lack of full involvement of the local people in matters regarding environmental management on the mountain slopes. The second one, which is closely related to the first, is the loss of the sense of pride and ownership, and hence the loss of sense of place values among the people living on the mountain slopes. I argue that Norton's process proposal is a tool that could help to address the two problems mentioned above; thus I propose some context-specific strategies that could help to concretise Norton's process proposal. I argue that proper implementation of Norton's process proposal implies full involvement of all stakeholders in all matters regarding environmental management on the mountain slopes, and that ongoing debates, reiterative dialogues, information gathering, and revision of goals, all of which are important aspects of process ethics, form the core of this. In short: I develop a proposal for an environmental ethics in which full involvement of all stakeholders, including the villagers, in matters regarding environmental management, stands central, with the aim of restoring the sense of pride and ownership of the mountain and its forests and, consequently, the sense of place values among the people living on the slopes of Mount Kilimanjaro.

OPSOMMING

Die hoofdoel van die ondersoek vir hierdie proefskrif was om 'n benadering tot omgewingsetiek te formuleer wat kan help om die omgewingsprobleme op te los wat ervaar word deur die mense wat op die hange van Berg Kilimanjaro woon. Die motivering vir hierdie navorsingsdoelwit is geleë in die feit dat die benaderings tot omgewingsetiek wat tot op hede ontwikkel is, tekort skiet wanneer dit daarby kom om riglyne te verskaf om die omgewingsuitdagings op te los wat ervaar word teen die hange van hierdie berg. Ek demonstreer waarom hierdie kritiek van toepassing is op sommige westerse benaderings tot omgewingsetiek, maar ook op sekere pogings om 'n inheemse omgewingsetiek op tradisionele Afrika-waardes te baseer. Ek toon ook aan dat die prosesriglyne wat Norton bied, wat uitgaan vanaf omgewingspragmatisme en die filosofie van aanpassingsbestuur, 'n rigting aandui vir hoe hierdie omgewingsprobleme doelgerig aangespreek kan word. Deur gebruik te maak van Norton se riglyne toon ek aan dat die probleme wat teen die hange van Berg Kilimanjaro voorkom, toegeskryf kan word aan twee onderliggende faktore. Die eerste een is die gebrek aan volle deelname van plaaslike inwoners in sake wat betrekking het op omgewingsbestuur teen die berghange. Ten tweede, en dit hou nou verband met die eerste, is daar die verlies van 'n gevoel van trots en eienaarskap, en daarom ook die verlies van 'n sin vir plek-waardes onder die mense wat teen die berghange woon. Ek argumenteer dat Norton se prosesvoorstel 'n instrument bied wat kan help om die boegenoemde twee probleme aan te spreek, en gevolglik stel ek sekere konteks-spesifieke strategieë voor wat kan help om Norton se prosesvoorstel konkreet te maak. Ek argumenteer dat 'n behoorlike implementering van Norton se prosesvoorstel die volle deelname impliseer van alle belanghebbendes in alle sake rakende omgewingsbestuur teen die hange van die berg, dat dit spesifiek die deelname van die plaaslike gemeenskap moet behels, en dat voortgaande debatvoering, herhalende dialoë, inligtingsversameling, en die hersiening van doelwitte, wat almal belangrike aspekte is van 'n proses-etiek, tot die kern hiervan behoort. Kortom: ek ontwikkel 'n voorstel vir 'n omgewingsetiek waarin 'n proses van volle deelname in omgewingsbestuur, waarby die plaaslike gemeenskap ingesluit is, sentraal staan, met as doelwit dat 'n gevoel van trots op en eienaarskap van die berg en sy woude, en gevolglik ook 'n sin vir plekwaardes, herstel kan word onder die mense wat teen die hange van Berg Kilimanjaro woon.

DEDICATION

I dedicate this work to my beloved father, Mwalimu Felisian Emanuel Mrema, my beloved brother, Joseph Felisian Mrema and Prof. Sirkku Helsten, my second supervisor, who all passed on during the course of my study.

Financial assistance from the Partnership for Africa's Next Generation of Academics (PANGeA), the Graduate School of the Faculty of Arts and Social Sciences of the University of Stellenbosch, and the University of Dar es Salaam is acknowledged. The opinions and conclusions expressed in this study are those of the author entirely and do not necessarily reflect those of the institutions that made the study possible through their financial support.

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In addition, I thank my colleagues at the Department of Philosophy and Religious Studies at the University of Dar es Salaam for accepting to take over my academic duties during my long absence from the department. Many thanks are also due to TANAPA, KINAPA, and the Kilimanjaro Regional Government and the District Councils of Rombo, Moshi Rural, and Hai for their cooperation during my fieldwork in their respective areas of jurisdiction.

Special thanks to my mother, mama Yusta Mrema; my wife, Lightness; and my children, Amoratia, Naturanza and Finirata. They all have been the reason for me to move forwards regardless of the unfortunate events and difficulties I experienced in the course of my study.

Lastly, I wish to express my gratitude to the leadership of the University of Dar es Salaam, for allowing me to pursue doctoral studies, and most especially for financing the fieldwork component of my study.

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LIST OF ABBREVIATIONS AND ACRONYMS

CEDE	Community Economic Development and Empowerment
DDT	Diclorodiphenyltrichloroethane
HMFS	Half Mile Forestry Strip
KEDA	Kilimanjaro Environmental Development Association
KINAPA	Kilimanjaro National Park Authority
SCCs	Small Christian Communities
TANAPA	Tanzania National Parks Authority
UKIMANAHO	Umoja wa Kina mama National Housing
WCC	World Council of Churches
WEECE	Women Education and Economic Centre

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CHAPTER ONE

INTRODUCTION AND METHODOLOGY

1.1 Background to the study and problem statement

In this section, I first give a brief description of the state of environmental degradation on and around Mount Kilimanjaro. Then, the problem statement, and specific research questions to address the research problem will follow.

1.1.1 Background to the study

Mount Kilimanjaro and its surrounding slopes present one of the iconic places in the world. The elegance and beauty of Mount Kilimanjaro is not just in its being the highest free-standing mountain in Africa, but also because of its snow-capped peak. The presence of snow on a mountain located in the tropics is what makes this mountain particularly unique and this has attracted much attention and interest from all over the world. It has been noted that “Not since Hemingway has the biggest isolated mountain in Africa been so talked about” (Sébastien, 2010). It also is one of the areas investigated by environmentalists and scientists to study climate change, especially by observing the changes in the snowfields on the mountain peak. It, furthermore, is a site of exceptional biodiversity. The mountain and the surrounding environment thus comprise a very important area worldwide, country wide and also for the local people. This most probably explains why it was granted the status of a World Heritage Site by UNESCO in 1989. Mount Kilimanjaro attracts a lot of tourists and is the leading National Park with regard to generating revenue from tourism, overtaking all National Parks in Tanzania. The melting glaciers used to feed countless springs and rivers in the mountain forests. The forests of Mount Kilimanjaro serve as a water catchment area for the Pangani River basin which also extends to parts of neighbouring Kenya. The Pangani river basin is critical for hydroelectric power production in Tanzania and for agriculture (Sébastien, 2010), while the local people’s livelihoods are highly dependent on the presence of the mountain and its surrounding forests. Activities related to tourism, farming, bee keeping, livestock keeping, etc. are highly dependent on the mountain ecosystem. All of the above makes protecting the mountain and its environs critically important.

However, the current state and future prospects of the mountain slopes are not very promising. It was estimated in 2000 that the volume of the snow cap had decreased by 82 percent since it was first measured in 1912, and it is likely to disappear by 2020 if things remain as they are (Boko, *et al.*, 2007). There is still no consensus among scientists about the reasons for the continual decrease of the snow cap. However, apart from climate change – which has usually been assumed to be the main cause of environmental changes on the mountain –, local processes such as fire, changes in vegetation and human modifications are currently being recognised as having a bigger role for the deteriorating state of the mountain and its slopes (Hemp, 2005). In fact, Professor Pius Yanda, a renowned scholar in climate change from the University of Dar es Salaam, has challenged the earlier assumption, saying that the decreasing ice cap is more a result of deforestation and land use changes on the mountain slopes than of climate change/global warming. In other words, while climate change certainly has a role in the current state of the mountain, the changes in land use or human activities on the mountain slopes have played a bigger role in contributing to the declining icecap on the mountain and the general environmental degradation of the mountain slopes.



Figure 1: Ice-cap or snow on Mount Kilimanjaro in 1970s and in 2017 respectively

Source: National Geographic (2017)

Industry logging and the rapid increase in clearance of forests for cultivation together with other human activities such as collecting honey, hunting, grass burning, and collection of fodder have transformed the altitude ecosystem on the mountain slopes (Sébastien, 2010). These activities have resulted in extensive expansion of the ‘degraded forest cover’ from 1,606 ha in 1973 to

5,170 ha in 2000.¹ Furthermore, some perennial rivers and streams formerly fed by the melting glaciers are now dry for part of the year, and other seasonal streams have dried up completely (Chuwa, 2008; Sébastien, 2010). As a result, agricultural activities all over the mountain slopes have been affected badly, hence driving people into extreme poverty which in turn has created more dependence on natural resources, and hence more degradation of the environment – a vicious circle of sorts.

In 2012, the environmental situation on the mountain slopes had deteriorated to the extent that the Regional Government issued a Circular on the Priority of Environmental Conservation, and declared the Kilimanjaro environmental decline a disaster (Temba, 2012). This was followed by very strict measures including restricting the people living on the slopes of Mount Kilimanjaro from accessing the Half Mile Forestry Strip (HMFS)² and imposing a ban on harvesting trees on the mountain slopes. Rampant harvesting of trees was also restricted, and intensive campaigns of reforestation have been ongoing. On the other hand, these environmental policies and management practices have not helped to support the goals of environmental protection; instead they have frustrated people, and jeopardised their livelihoods. They also created numerous governance problems.

So, the Regional Government and the Kilimanjaro National Park (KINAPA) are faced with a real two-fold problem, namely how to arrest the deteriorating environmental condition of the mountain slopes; and how to do that without pushing the adjacent communities who depend on the mountain's resources for their livelihood into abject poverty.

In this dissertation, I attempt to show what environmental ethics can contribute to addressing such environmental concerns on the slopes of Mount Kilimanjaro.

¹ Unfortunately no current data on the extent of the degraded forest cover is available. However, judging from the urgency with which the government of Tanzania views the deterioration of the environment around the mountain slopes, it is obvious that the forest cover has been degraded even more than is evident from formal studies.

² The Half-Mile Forestry Strip (HMFS) was a social forest 0.8 km wide (area of 87.69 square kilometers) which acted as a buffer zone between the forest reserve and the adjacent densely populated villages (up to 650 people per square kilometer) (see, Sébastien, 2010). In this area the villagers were allowed to collect firewood, fodder, building poles, wood and non-wood products (Newark, 1991).

1.1.2 Problem statement

Many efforts and extensive research have been undertaken to address the environmental situation on the slopes of Mount Kilimanjaro (see, for example, Newmark & Leonard, 1991; Mbonile, 1999; Yanda & Shishira, 2001; Mbonile, Misana & Sokoni, 2003; Soini, 2005; Chuwa, 2008; and Sébastien, 2010). However, conflict and complaints involving the adjacent villages versus KINAPA and the Regional Government continue to date.

I argue that one of the causes of the continued conflict and complaining is that most of these studies see the environmental problems on the mountain slopes as a failure of economic, physical environmental and technological systems, and thus address these problems with the use of a purely technical template. However, many scholars today increasingly acknowledge that environmental problems are also a result of the failure of our current moral and spiritual systems (see, for example, Dudley *et al.*, 2006; Watling, 2009; Gambril, 2011). Thus, the use of a purely technical template to address environmental problems can risk overlooking the values that underlie human behaviour. This implies that environmental problems have an ethical or moral, as well as a spiritual, dimension that needs to be taken into account when contemplating solutions to problems or challenges.

In this dissertation, I thus argue that environmental ethics could contribute to addressing environmental problems around Mount Kilimanjaro. I do that by revisiting different approaches to environmental ethics so as to determine which approach is more appropriate for the task. I take issue with mainstream approaches to environmental ethics, however, by arguing that, since mainstream environmental ethics emerged in western, mostly Anglo-Saxon countries, and western values accordingly seem to have dominated it, such environmental ethics is not likely to be effective in addressing environmental problems in an African context with different sets of values and different environmental problems. As a response to this shortcoming, I show that some environmental philosophers, especially from Africa, have tried to develop alternative African environmental ethics approaches different from the west and with African roots.

I also take issue with these alternative African approaches by arguing that they cannot adequately address present-day environmental challenges in Africa, and particularly on the slopes of Mount Kilimanjaro. This, as I will show, is because most approaches to traditional African environmental ethics rest on a false assumption of a “pristine” or an eco-golden African past

where Africans lived in complete peace and harmony with nature and that traditional African beliefs and values engendered a greater sense of ecological awareness that the current generation need to emulate. I argue that these romantic ideas about pre-colonial Africa have not been able to provide us with practical guidance to address real and concrete environmental concerns and challenges like those experienced on the slopes of Mount Kilimanjaro. I show also that these alternative African approaches, like the western approaches, basically remain within the ambit of theoretical and academic debates with little practical insight on what to do to resolve concrete environmental challenges in Africa.

So, as a way to address the inadequacies of these previous approaches, I defend environmental pragmatism, in particular Bryan Norton's adaptive management principles of experimentalism, multi-scalar analysis and localism. Using these principles and the process guidelines they imply, I show how this approach could make a contribution in resolving some concrete environmental challenges and management problems around Mount Kilimanjaro.

1.2 Objectives of the study

The main purpose of this study was to answer the following major research question: What environmental ethics approach is appropriate to address environmental problems around Mount Kilimanjaro; and how can it help to resolve environmental problems there?

To address the main research question, I attempted to answer the following specific questions:

1. What is the problem with mainstream western environmental ethics? Here, I show the inherent problematic of mainstream approaches to environmental ethics when applied to an African context. I introduce environmental pragmatism and adaptive management as an alternative approach by examining what this approach entails and why it is useful in an African context. All of these form Chapter 2 of my dissertation.
2. What is the nature of the response from Africa? Here, I briefly examine the alternative indigenous African environmental ethics, focusing on its foundations, strengths and its limitations in addressing the current environmental problems in Africa. Here, I consider, at some length, two approaches to African environmental ethics as propounded by Workineh Kelbessa and Felix Murove and show why they

- fail in principle to address the environmental problems in Africa today. This forms Chapter 3 of my dissertation.
3. Moving from theoretical discussion of the western and African environmental ethics, I ask: in which way a case study of the Chagga living on the slopes of Kilimanjaro can help to overcome the theoretical issues as well as the practical issues articulated in the main research question? Alternatively, what happens when we use the same methodologies of Kelbessa and Murove in the case of the people living on the slopes of Mount Kilimanjaro? What emerges from that and what are the shortcomings thereof? In this chapter, I demonstrate what happens when we use the same ethnographic methodology, or else, what happens when we use Kelbessa's and Murove's models in the case of the Chagga context. My assumption is that these models fail to capture the present realities and experiences of the people living on the slopes of Mount Kilimanjaro, the Chagga. This forms Chapter 4 of this dissertation.
 4. What are the actual experiences of the environmental problems of the people living on the slopes of Mount Kilimanjaro that we really need to take into account in order to arrive at a proposal for a new environmental ethics approach? Here, I try to address the present realities of the Chagga and what needs to be addressed. Alternatively, I ask: what needs to be done to persuade people on the slopes of Mount Kilimanjaro to actually protect the natural environment? This forms Chapter 5 of my dissertation.
 5. What would be the implications of all of the above in order to formulate an outline of an effective environmental ethics that could persuade the people living on the slopes of Mount Kilimanjaro to protect nature? This outline is summarised in Chapter 6, while the relevant policy implications are also discussed.

1.3 Methods and research framework

In this study, I made use of mixed methodology to answer the specific research questions presented above. Aspects of this mixed methodology concerned theoretical and conceptual issues which are covered in Chapters 1, 2 and 3. The second aspect of my methodology was a case study that is mostly covered in Chapters 4 and 5. But all these actually were a very integrated discussion in which environmental ethics theory informed practice, in that the discussion of the

case study and its practical implications and the discussion of context informed some theoretical insights which are formulated in Chapter 6.

1.3.1 The study area and the rationale for its selection

The case study was conducted among the villagers living adjacent to the Kilimanjaro National Park (KINAPA) which hosts Mount Kilimanjaro. KINAPA is one of the 15 parks in Tanzania under the umbrella of the Tanzania National Park Authority (TANAPA). The attention that is being directed at the area by both international, national and local governments, and the increasing environmental problems and measures being taken to address the problems make this area a perfect site for studying the local people's current perceptions, values, attitudes and concerns towards the natural environment. The fact that the villagers grapple with issues of access to the mountain forests and forest resources, water, problems of land for agriculture, and the problem of wild animals on a daily basis also made it conducive to understanding how the villagers relate to the natural environment, and thus what kind of an environmental ethic approach may be relevant for their environmental concerns. The area furthermore was deemed appropriate for this study as the peasants are trapped in a challenging environment and environmental policies that have set them between the wider international and national demand for environmental protection and conservation (in the form of Tanzanian national parks), modern and traditional ways of living, and new challenges brought about by the effects of climate change. As a further reason, I decided to do this study in this area because I come from the area; I grew up there, so I know the place. I did my secondary and high studies school there, thus I know the problems facing the area.

The case study was conducted in Ngarony village in the Siha District; Ng'uni village in the Hai District; Mweka, Maua and Lyasongoro villages in Moshi Rural District; and Mengwe Juu and Maharo villages in Rombo District. All these villages represent the main ecological and sub-cultures of the people living on the slopes of Mount Kilimanjaro that stretch from the western part (Siha District) through the central part (Moshi Rural District) to the eastern part (Rombo) (see the attached map below).

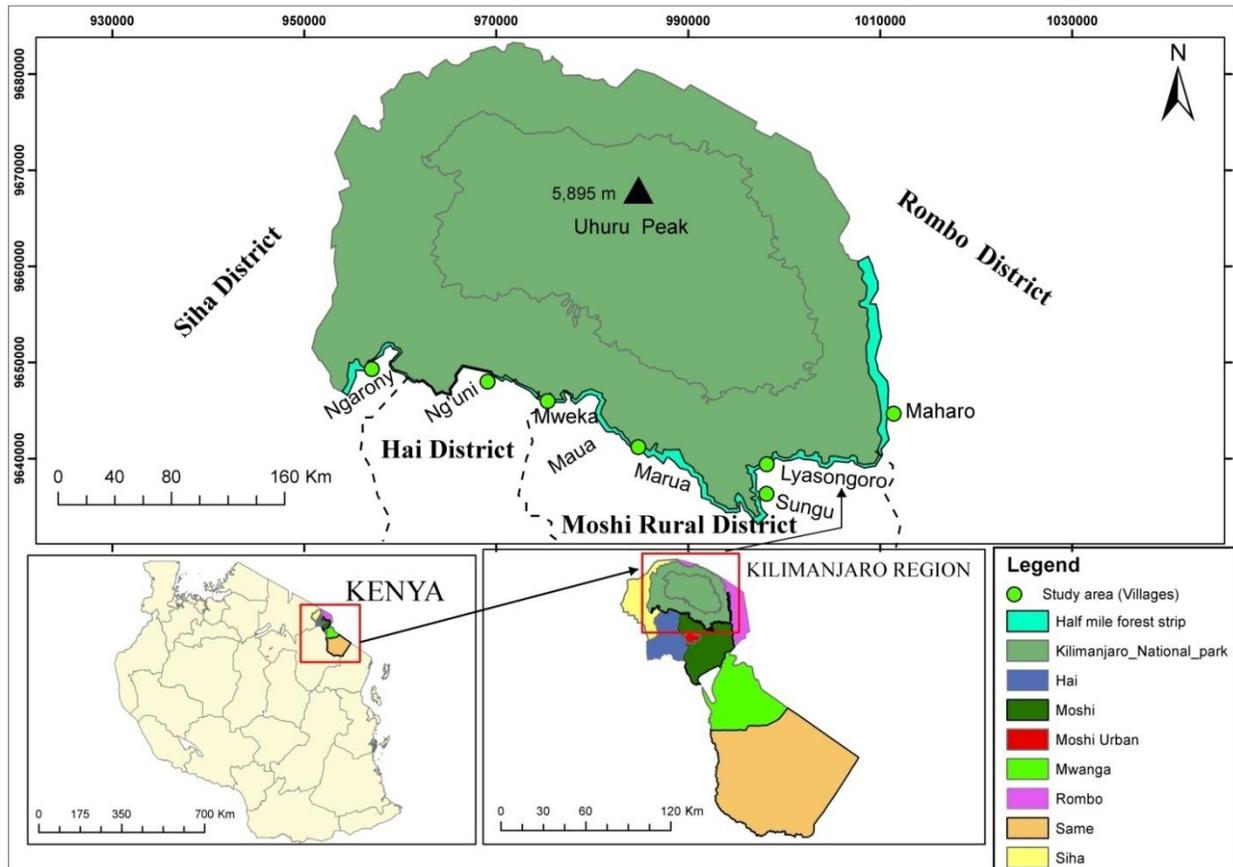


Figure 2: Location of study villages and the Half Mile Forestry Strip

Source: GIS Laboratory, UDSM (2018).

1.3.2 Data collection and analysis

It is established that “a subject such as human versus nature relationship lends itself well to open or semi-structured interviews as the core research method” (De Groot, Drenthen & De Groot, 2011). For this reason, I employed both open-ended and semi-structured qualitative interviews of one to two hours in length, which were conducted in Kiswahili, a language understood by the majority of the interviewees. Individual interviews and casual conversations or informal discussions were held with villagers and various other stakeholders in the respective areas to understand people’s beliefs, attitudes and values with respect to the natural environment. Focus group discussions with six to eight people were also held in each village and participant observation was employed to supplement the interviews. The aim of the interviews and conversations included, among other things, to learn from the critical dialogues already occurring in the community and make it explicit, especially by listening closely to the stories told by the

villagers with a view to understand their current beliefs, values and attitudes towards nature, and empathetically questioning these values and assumptions (Forester, 1999:20).

The interviews and methods for data collection were designed following an environmental pragmatist methodology in that they were formulated in such a way as to allow the inhabitants of Mount Kilimanjaro to speak for themselves. They were aimed in particular to create a space within which the silenced and marginalised in these two societies could acquire a voice and articulate their experiences, their values and their beliefs on their own terms and in their own language. In doing this, the sources and history of struggles and contestations in the societies of the inhabitants of Mount Kilimanjaro, in particular struggles with the powerful in society, as well as struggles with local, regional and national government structures were studied. The assumption was that these struggles and the directions in which they develop, are highly valuable indicators of values, beliefs and practices (of the powerful) that are experienced as threatening, but also of values, beliefs and practices (of the weak)³ that are put under threat and perhaps require a certain space (or re-interpretation) to promote and enhance healthy interaction between human beings and nature.

This is in line with those approaches that emphasise that an environmental ethics that speaks to people needs to begin with the daily encounters of people with their immediate environment in acknowledging the plurality of values and motives that drive people to relate to the natural environment in the way they do (Brown, 2004; O'Neill, Holland & Light, 2008). Many scholars today propose that environmental ethics should leave the university walls and be practical as the only way to become relevant and persuasive to the common people (Norton, 1984; Light, 2002; Brown, 2004; Kelbessa, 2014). For example, Brown emphasizes the importance of environmental ethics becoming more practical by observing that, "...we need an environmental ethics literature that is much more applied to particular issues than it has been so far" (Brown 2004, as quoted in Kelbessa, 2014:52). As I see it, this is the only way we can capture what some scholars call 'the broad human scale of values' which gives us a wider spectrum for understanding the myriad reasons and motivations that drive people to interact and relate with nature the way they do. In other words, the methodology I followed in this case study was

³ I am aware of the fact that societal struggles cannot be reconstructed neatly in simple, dichotomous terms, but are complex and multi-layered; and often entail a number of stakeholders with a wide variety of relationships among one another. This was duly taken into consideration in my study, as outlined in my methodology.

pragmatic because it sought to uncover, not what the philosophers (both the advocates of western and of African approaches) say we should find, but what is actually there in experience – the local people’s concrete environmental concerns and what really could persuade them to protect the natural environment.

To achieve this end, the interviewees were purposively selected, and the following groups were targeted: the *elderly* (village and clan elders/the sages), to sift from them past and current values and beliefs; *peasants*, to understand their concerns regarding their daily interactions with the natural environment (the land, forests, water, livestock, wild animals, etc.); *women*, to get a gender perspective on their perceptions and attitudes towards nature, as well as division of benefits and burdens in the community; *the youth*, to get the current generation’s attitudes towards nature; *local government officials*, for a government’s perspective; *conservationists*, for a professional’s perspective; *NGOs*, for an activists’ perspective; *religious institutions*, for a spiritual perspective; *business people*, for a user’s or developer’s perspective; *(petty)traders*, for an understanding of how their activities bear on the environment; *(local) academics*, to sift from them how they see things now and what should be done; and *the marginalised*, that is, the very poor, the very old and the disabled, to understand the challenges they face in their interactions with the natural environment, especially concerning access to and use of the natural environment (resources).

My focus in the interviews was more on appropriate data sources than on the number of participants, which is why the participants were purposively selected (Fetterman, 2010). A total of 40 people participated in the interviews and informal discussions. Discussions and interviews with five focus groups were also held. These included a focus group of ward councillors, village leaders, district environmental and game officers, a group of women, and a group of traditional leaders. The selection of the number of participants in this study naturally was not arbitrary, but was informed by an observation that most related qualitative studies like this one use an average of thirty to fifty participants (Guest, Bunce & Johnson, 2006).

The criteria used for selecting the people to be interviewed and have conversations with depended on the kind of information I wanted and was also dictated by the kind of responses I received from previous interviews or discussions. For example, some responses needed follow up for confirmation from other sources. Thus, the interviews and conversations continued until I

was satisfied that the information gathered “had paid sufficient attention” to the issues being raised and discussed, and that they answered my research objectives fully (Press, 2005:157). In other words, the criterion I used to determine whether the interviews and conversation had paid sufficient attention to the issues being raised required reaching a “saturation point”, i.e. when no new information emerged from the interviews.

A notebook was used to record data from the interviews and conversations. A sound recorder was also used whenever permission was granted to make a recording, and all sound recordings were later transcribed. Data analysis was done simultaneously, right from the data collection stage in the field. Themes and patterns were identified from the data and put into coherent categories that corresponded to the objectives of the study. Where appropriate, verbatim quotations or illustrative quotes were used to support claims made under each theme.

1.3.3 Assumptions and points of departure

This study was guided by the following assumptions: Firstly, western environmental ethics has over-emphasised the notion of intrinsic value and nature protection for its own sake. The notion of the intrinsic value of nature was conceived under one reading, namely, nature should be left totally alone. Environmental philosophers believed that, if the intrinsic value of nature could be established, the moral justification for leaving nature totally alone could have been found. I argue that the notion of intrinsic value of nature thus construed may not be relevant to developing countries, and to the African context in particular, where most people’s livelihood and survival needs depend entirely on the use of forest resources (Guha, 1989). It is estimated that 90 percent of the world’s poorest people, most of who are in Africa, rely on forest resources for part of their survival (Greig, Hulme & Turner, 2007). So, for reasons that will become even more apparent in the rest of the dissertation, I argue that an ethic that denies the local people access to their immediate natural resources cannot succeed to persuade them to protect the resources.

Secondly, the current scholarship on African environmental ethics has taken a mistaken direction, namely, too much exhortation of a pristine or ideal (African) past at the expense of the current realities and experiences in Africa. The African alternative approach may be said to be an attempt to re-appropriate the past in the present (Fleming, 2007; Ojomo, 2011). This approach emphasises reviving traditional beliefs and practices as a solution to current environmental problems in Africa. The approach has been too idealistic and romantic, thereby largely divorcing

it from the current realities and the poor people's actual daily practical environmental concerns and challenges. I argue in this dissertation that a more practical approach that is responsive to the current African context and environmental problems such as those on the slopes of mountain Kilimanjaro might help raise people's awareness about nature protection and hence persuade them to protect it.

Thirdly, contrary to the claim that pre-colonial Africans and in particular those living on the slopes of Mount Kilimanjaro possessed an environmental ethics that helped to protect the environment, I assumed that the pre-colonial Chagga did not possess an environmental awareness or ethics of the kind being advocated by many eastern and African environmental philosophers. Thus environmental ethics needs to be nurtured or inculcated among them, just like among everybody else in the world. This is to say that our African cultural beliefs and values need to be "environmentalised" or rather be re-directed towards environmental concerns instead of romanticising them. In other words, people need to be made environmentally conscious, instead of assuming that they were already so in pre-colonial Africa, as some Africanist scholars seem to maintain.

Fourthly, unlike Rolston (1996) who sees humanity today as faced with two options, namely either saving the little remaining wild nature or feeding the hungry, in which case he prefers as a last resort saving nature first,⁴ following Robin Attfield (1998) and Andrew Brennan (1998), I argue that the question perhaps should not be an either/or issue, but rather finding ways that may enable people to feed themselves and protect nature at the same time.

Lastly, I assumed that environmental pragmatism – especially because of its emphasis on paying attention to context, real life experiences and pluralism, that is, by being sensitive to the multitude of values that drive people's motives for nature protection – could contribute to building an approach that might be more appropriate to a context like that on the slopes of Mount Kilimanjaro. Carefully articulated, this approach, which is more of a proposal for an iterative process than prescribing a specific "content" for an environmental ethic, could help to inform

⁴ Rolston argues that nature should not be sacrificed while keeping in place all of the unwise decisions driving people up against the fences protecting wild nature in the first place. He in fact argues that, despite the fact there are millions of people who go hungry throughout the world, many people still give priority to less significant things, for example building huge state-of-the-art Olympic stadiums. So he would argue that it is not always actually true that people will give priority to feeding the hungry (see, Rolston 1996 and 1998). Nonetheless, Rolston casts the problem as a simple dichotomy, which I challenge in this study.

better environmental management and conservation practices and policies that might allow the flourishing of both humans and nature; unlike the current approaches that focus more on divorcing or distancing humans from the natural environment and resources on the slopes of Mount Kilimanjaro.

1.2 Ethical Issues

This study was classified as posing a medium ethical risk since it involved human ‘subjects’⁵ and thus was subjected to a full ethical clearance procedure (see, the attached ethical clearance letter, and the “Informed Consent Form” in the appendix). Major ethical research questions that this could evoke include how to approach the poor and the marginalised; how to handle sensitive information such as rape, corruption, and harassment (which in fact emerged as themes in my interviews and focus group discussions); and also, how to protect and conceal the identity of some of the participants. However, these ethical risks could easily be mitigated by implementing appropriate measures. For example, before the interviews, I explained the purpose of the research clearly to the interviewees and thus sought their consent to participate in the study. Because of the sensitivity of some information in this study, anonymity and confidentiality was guaranteed to the participants and they were thus encouraged to express themselves freely. Furthermore, since the interviews involved the very poor people and the marginalized, I took care to approach and treat them with empathy and in a sensitive manner.

To follow from this introductory chapter, I now turn to addressing the research questions. In the following chapter, I address the first research question of this study, which entails examining the inherent problematic of mainstream environmental ethics in relation to the African context. I also examine the alternatives given, with particular focus on environmental pragmatism and adaptive management.

⁵ I am aware that the use of the term human subjects in research is discouraged in the social sciences and humanities today because it creates the impression of a researcher as an active person who asks the questions and mines the information, and the interviewee (which is also discouraged) as the passive person, the receiver, the respondent, the subject who is experimented upon. So the ‘interviewee’ is not a subject nor an informant, but a participant in the research process. I use the term ‘subject’ here only for the sake of convenience.

CHAPTER TWO

EXAMINING MAINSTREAM ENVIRONMENTAL ETHICS IN RELATION TO THE AFRICAN CONTEXT

2.1 Introduction

In this chapter, I introduce the mainstream approaches to environmental ethics and their historical context. I support the argument that mainstream environmental ethics approaches have focused too much on academic debates on anthropocentric and non-anthropocentric values in nature with little focus on real environmental problems. I argue that this focus on abstract academic debates has caused environmental ethics to fail to win over the common people, not just in Africa but worldwide. Not only that, but I also show that mainstream environmental ethics has remained culturally embedded and hence less applicable to a non-western context. I argue that all of the above have resulted in environmental ethics lacking the persuasive power needed to motivate people to act in environmentally sustainable ways, especially in Africa. Africa faces many environmental problems that directly affect the wellbeing of the people, which may require a more urgent and practical response. I support those who argue that we need to look beyond the polarised debates between anthropocentrism and non-anthropocentrism in environmental ethics and find a more pragmatic approach that can help us to address real environmental problems.

In this chapter, therefore, after the brief introduction of the emergence, historical context and the main trends of environmental ethics, and their problematic, I defend an environmental pragmatist approach as a more suitable approach to addressing environmental problems in Africa today. In the rest of the dissertation, I show through my case study, how this environmental pragmatic approach could help to resolve environmental challenges around Mount Kilimanjaro.

2.2 The emergence of environmental ethics

Retracing how environmental ethics emerged and factors that led to its emergence will give us the gist of why mainstream environmental ethics, despite its claim of universality, is embedded in the western worldview and value systems just like all other ethical systems originating from the west, and thus ignores the wider global context and other culturally embedded value systems. All of this makes mainstream environmental ethics less applicable, especially in an African environment. I will argue further that the conditions such as the Industrial Revolution with its

attendant pollution, mining, massive forest clearance, and land drainage (Taliafero, 2003) within which environmental ethics that created environmental awareness among the western population emerged cannot be paralleled in Africa because such conditions have never been present in Africa. The talk of environmental ethics in Africa should therefore be different. It should be motivated by different reasons. In other words, I argue that arguments to support environmental preservation in Africa should be different from the conventional arguments that are usually advanced in mainstream environmental ethics.

2.2.1 A brief historical background

Various writers as far back as the time of the pre-Socratics have philosophised about nature. However, as earlier alluded to, serious concerns about the natural environment, or rather, normative reflection on the relations between human beings and their environment has only been undertaken in recent times. As mentioned earlier “philosophers have been more pre-occupied with moral, political and social philosophy of the social environment rather than the natural environment” for a long time (see Robin Attfield & Andrew Belsey, 1994:1). Typically, moral thinking has been restricted to the realm of humanity only, excluding everything else. Dominant conventional moral theories such as virtue-based, utilitarian, and contractarian or rights-based theories have been more concerned with relations among human beings. This tendency is also referred to as normative anthropocentrism, which refers to restricting our moral estimations to the realm of humanity only. Let us see, in some more detail, how anthropocentrism came to be a dominant worldview, especially in the West, and why environmental philosophers challenge this worldview.

Most philosophers throughout the ages, notably since the earlier Roman and Greek civilizations, have emphasised the central role and the unique status of humanity in the universe. It is worthwhile noting that, although many of the earlier Greek and Roman gods were nature deities, or else, that Greek and Roman religions were animistic, scholars note that the Greeks and Romans did not pay sufficient attention to nature or the implications of their animistic religions in relation to nature. It has been noted, for example, that “deforestation took place on a major scale, first in Italy, then in outer provinces. Wildlife, exotic animals especially, were killed, in part to fuel the famous Roman circuses” (Ferkiss, 1993:9) since the time of the Romans. So, over

this time, nature and its integrity were taken for granted. Nature seem to have had no function other than serving human interests/wants and desires.

Philosophers like Aristotle emphasised the special place of humans in the hierarchy of being in what came to be called the “Great Chain of Being” or the “ladder of nature” roughly ranging from the bottom of the ladder in this order: matter, plants, animals, humans, angels, and God at the apex. For Aristotle, the irrational (matter, plants, animals) existed for the rational, that is human beings. So rationality only belonged to human beings and higher beings such as Angels and God, of course. In *Politics*, as quoted in VanDeVeer & Pierce (2003: 32), Aristotle asserted that:

Plants are for the sake of animals, and ... the other animals are for the sake of human beings, domestic ones both for using and eating, and most but not all wild ones for food and other kind of support, so that clothes and other tools may be got from them. If then nature makes nothing incomplete or pointless, it must have made all of them for the sake of human beings.

However, Aristotle’s assertion that everything that is in the world (under human beings in the ladder/hierarchy of nature) was made for the sake of human beings does not mean that humanity has an unlimited moral right to use nature as they wish, in spite of him arguing that human beings by possession of rationality are far superior to animals, plants and other beings down the great chain of being. However, by positing that humans are superior to the rest of nature by virtue of their rationality, Aristotle could have pioneered the destructive anthropocentric thinking and human arrogance with regard to nature that came to pervade the western society for centuries.

Likewise, the Judeo-Christian tradition, which traces its origin from Greek and Roman tradition and philosophy, has also been seen as emphasising the supremacy of human beings over nature. Going one step further in his assessment, Lynn White (1994) claimed that Judeo-Christian tradition fostered or reinforced human arrogance toward nature. He argued that the modern period in the western world which was characterised by high advances in science and technology that, in turn, led to massive exploitation of nature, was largely facilitated by the Christian attitude towards nature. Passmore supports these claims by observing that, in the traditional Christian and Greek cosmology, “there was no risk of sacrilege in felling a tree or killing an animal” (Passmore, 1995:132). In supporting White, other scholars have noted that Christianity itself forbids its followers to identify God, the Creator with his creation, “since God is transcendent, he

cannot be said to dwell in any spot on earth in an ontological sense” (Hughes & Swan, 1998:164). Such doctrine was supposedly aimed at discouraging animistic beliefs in nature deities, and pantheistic beliefs, but with unfavourable implications for the natural environment. Thus construed, Judeo Christian tradition is, therefore, considered to foster unfavourable attitudes towards the environment. It will be noted later that modern environmental ethics celebrates the pre-industrial attitudes of being close to nature through seeing nature as an embodiment of spirits and deities. So, in some way, it would seem that environmental ethics is at loggerheads with traditional Christianity.

However, it cannot be claimed that western attitudes towards the non-human world, particularly those of the Judeo-Christian tradition, were completely anthropocentric in the sense that they were devoid of any ecological orientation or consciousness. Scholars such as Jeanne Kay (1998) and Robin Attfield (2001) have shown that the Judeo-Christian tradition itself, despite the criticism advanced by Lynn White (1967), has some ecological orientation. For example, it has been pointed out that “the manifestation of God in a variety of natural settings in the Bible suggests a more nature oriented Bible” (Kay, 1998: 215). Some people have also interpreted man’s role in the world as assigned by God in *Genesis* as one of stewardship. Man is seen as the caretaker of the world or the Viceroy of God, who must then “order creation and use it with sobriety, moderation and thankfulness” (Attfield, 2001:105). Lloyd H. Steffen (1992), Peter Harrison (1999) and Robin Attfield (2001), have also emphasised the role of man as a Viceroy of God to take care of His creation by noting that God’s directive to man to have dominion over nature does not imply that man should dominate nature, but rather that man should see himself as a steward or a caretaker of the world. Stewardship has thus emerged as a leading trend in Christian environmental ethics (see also Glacken, 1967).

So, an ecologically enlightened Christianity, as mentioned above in relation to stewardship, could be of much help if given appropriate emphasis in areas with similar conditions like those on the slopes of Mount Kilimanjaro where Christian traditions are entrenched. I come back to this proposal in the last chapter of this dissertation.

Apart from the Judeo-Christian tradition, the superiority of humans over nature is further said to have been cemented in people’s worldviews during the time of the Enlightenment (Taliaferro, 2003). This was marked by the Scientific Revolution in the sixteenth century which is said to

have been responsible for shaping people's view of the world and consequently their relationship with nature. The Scientific Revolution had a profound impact on western thought or philosophy. The discoveries made in astronomy, physics and medicine led people to believe that nature in principle was fully knowable and could therefore be tamed for the benefit of humankind (Taliaferro, 2003). In this period, there was a complete change in the worldview; from understanding nature in mythical, religious and superstitious terms in ancient and medieval times to a secular, human-centred perspective. It was a shift that led to a scientific, materialistic, and atomistic understanding of nature (Matthews & Pratt, 2001). Man and nature were seen as separate entities, with nature conceived, as Newton observed, of a collection of discrete parts (atoms) interacting with one another in a law-like manner that can be discovered by science and described in mathematical language (Taliaferro, 2003). A dichotomous, objectivist, and mechanistic view of reality thus came to be the dominant worldview.

To use the words of the well-known African philosopher Geoffrey Tangwa, the mechanistic view of the world was associated with the assumption that "all knowledge was unqualifiedly good, that nature is in principle at least, completely knowable and controllable and that the universe was something that ought to be explored, subdued, dominated and exploited" (Tangwa, 2004:390). Nature was seen as a machine, a passive object separate from man that is open for unlimited exploitation as far as human technological capacities may allow (Taliaferro, 2003). Such, essentially, is what is referred to as a mechanistic, dichotomous and objectivist conception of nature that characterised much of the western worldview for a long time, culminating into what has been termed the Baconian-Cartesian-Newtonian worldview (Callicott, 1996).

Francis Bacon (1561-1626), one of the prominent figures in this time period, for example, advocated the use of science and technology to transform nature and control it for human interests. René Descartes, another prominent figure, for his part, likewise saw everything apart from the human mind as mere machines that could be manipulated for human interests. He stressed the rational capacity of man to transform nature through science and technology. This arose from Descartes' understanding of reality in dichotomous terms: mind (the immaterial thing) and body (the material thing) that is mindless. For him, nature was a mere object (material thing) which had to be subdued and mastered by science and technology. This thinking has

dominated western science for a long time resulting in both good and devastating effects on the environment (Passmore, 1995).

However, in the Age of Reason or the Enlightenment period, a philosophical trend that opposed to the values of the Enlightenment and generally known as Romanticism developed (see Matthews & Pratt, 2001:461-477). Beginning Europe in late the 18th century, Romanticism was a broad socio-cultural and intellectual (philosophical) movement that swept across the western world, emphasising paying attention to feelings, emotions and subjectivity and the primacy of the individual (Matthews & Pratt, 2001). It essentially was an artistic, literary, musical and intellectual movement. In reaction to Rationalism and Classism and, in general, the socio-political values of the Age of Enlightenment, particularly the scientific rationalisation of nature, Romanticism glorified everything that was unbounded and untamed (Matthews & Pratt, 2001:461). Romanticism's reverence for nature was also motivated by a desire to escape from the effects of the Industrial Revolution, which had devastating consequences for the physical and natural environment, especially in the countryside in Europe.

Jean Jacques Rousseau (1712-1778), a nature lover born in Switzerland, is considered the father of romanticism or Romantic's patron saint. He glorified that which was natural, immediate and close to the senses. Rousseau enjoyed taking a walk in unspoiled nature or wilderness. That is why he is considered a romantic primitivist because he advocated a simple lifestyle, a return to and living in harmony with nature (VanDeVeer & Pierce, 2003).

The Romantics thus objected to the primacy given to reason and science in understanding the mystery of nature. For the Romantics, humans should not try to conquer nature but should cooperate with it in the process of evolving, enjoying her wonders and the sublime (Passmore, 1974:34). The Romantics saw nature "as home, as mother, as healer and as teacher and inspiration; nature was alive and not passive" (Kelbessa, 2011:51).

In general one may say the Romantics' attitude towards nature was reminiscent of the ancient or pre-industrial animistic attitudes towards nature. It also foresaw the postmodern worldview which presupposes some pre-industrial attitudes towards nature, namely living close to and in harmony with nature. Romanticism, however, never became the mainstream or dominant worldview driving modernity forward towards the industrialised, globalised society that it led to.

Romanticism, on the contrary, rather continued in the margins of modernising western society, offering fundamental critique on it as it developed, and in this sense prefiguring and in some cases becoming an inspiration for what later emerged as environmental ethics.

With this said, the emergence of environmental ethics can thus be seen as part of a wider intellectual movement in which the earlier dominant western worldview “the modernist worldview” (that is the Baconian-Cartesian-Newtonian scientific worldview), which has been blamed for the current environmental crisis, is being replaced by a new worldview, “the postmodernist worldview” pioneered by people like Aldo Leopold, Albert Einstein and Charles Darwin (see Callicott, 1996:8). This new worldview has challenged the former worldview by arguing that nature should not be seen as static, deterministic, atomistic and mechanistic, as previously thought, but rather should be construed as being more organismic, dynamic, and constantly evolving, and that all its aspects are thus interconnected, interrelated and integrated in a complex whole. Taken to its full implications, this new worldview will emphasise that uncertainties, complexity and flux are the norm (Cilliers & Spurrett 1999); which means that nature is much more resistant to control, domination and management contrary to the belief of most modernists. According to Callicott (1996:9), this new worldview might be referred to as the Darwinian-Einsteinian-Leopoldian worldview. Environmental ethics emerged from within this worldview, which is basically an attempt to correct the ecologically insensitive Baconian-Cartesian-Newtonian legacy. This new worldview emphasises that humans should see themselves as part of nature, and not as above or master of nature. Alternatively, environmental ethics claim that we do not live apart from nature, and that we are not superior to nature, but rather that we co-evolve with nature and depend on it for our continued survival. Accordingly, we should see nature as our companion without which we cannot continue in the life process. It is us (humans) who depend on nature, and not vice versa. And as such we must respect nature.

To conclude this sub-section: The Darwinian-Einsteinian-Leopoldian worldview or the organismic worldview is actually what environmental ethics is attempting to advocate. It has comprised an attempt to find ways to persuade humans that we are part of nature and not masters of nature or superior to nature. That is why concepts such as the intrinsic value of nature formed a large part of the academic debates on environmental ethics.

However, as I mentioned earlier, these efforts, important and valid as they are, have been overly embedded in western cultural perspectives and concerns. Non-western perspectives and concerns do not seem to have been given much attention. As a consequence, mainstream environmental ethics has lacked global appeal. In what follows, I show in some detail why mainstream environmental ethics has failed to appeal to wider global environmental concerns, particularly in Africa. I do that by showing how environmental ethics emerged and the factors behind its emergence. This will further substantiate the claim that mainstream environmental ethics has been too embedded in the cultural perspectives and concerns of western society.

2.2.2 The beginning of academic scholarship in environmental ethics

I hinted earlier that, prior to the emergence of environmental ethics, it was a common practice to conceptualise environmental problems in solely political, economic and technological terms or, alternatively, from, “a technical template approach” (Dudley, Higgins-Zogib & Mansourian, 2006). However, some philosophers came to see the environmental crisis as essentially a result of a crisis of worldview and values (Eckersley, 1992). It became apparent, therefore, that “a purely technical template approach to environmental challenges can overlook the attitudes and values that underlie human behaviour, ultimately resulting in environmental degradation” (Dudley *et al.*, 2006). That is to say, philosophers came to see the environmental crisis as a moral issue. Since then, philosophers have seen it as the first and foremost task to establish justification for granting moral status to the non-human world as a way to challenge what was seen as an environmentally unfavourable anthropocentric worldview.

Environmental ethics emerged from within this context as a new sub-discipline of ethics in the early 1970s. This is also the time when serious academic scholarship involved with environmental ethics began. Increasing environmental awareness and movements in the 1960s, however, have been singled out as among the forces that led to the emergence of environmental ethics (McShane, 2009).⁶ The environmental ethics scholarship wheel began to roll when papers

⁶ In fact environmental awareness and these movements received mass support, for example, in America, because the American society was very politically active at the time. There was much activism and political movement to challenge the status quo. These included civil rights movements fighting for equal rights for all (Martin Luther King, one of the famous civil rights activists of all times, emerged here). Others include the counter-establishment movement of the Hippies that included protests against the Vietnam War, the transformation of universities, black consciousness, a “return to nature/flower power”, women’s movements, and gay rights movements. It is,

and journals specifically dedicated to environmental ethics began to appear. Among these journals is included *Environmental Ethics*. This journal is based in the USA and it was first published in 1979. Later on, in 1992, another journal dedicated to environmental ethics, namely *Environmental Values* was launched. This journal was the first British-based journal in this field.

The emergence of scholarship on environmental ethics is said to have been further driven by some individual works of some people, such as Rachel Carson's *Silent Spring*, first published in 1962, and Paul Ehrlich's *The Population Bomb*, published in 1968. The *Silent Spring* warned of the devastating effects that pesticides such as DDT were having on living organisms and the environment in general. The *Population Bomb*, as the title suggests, warned of the dangers of the spiralling human population to the planet's dwindling resources. These works commanded widespread readership among academia and the public and thus helped a great deal in raising environmental consciousness among the general public in the West. Two very influential papers that presented academic discussions on environmental problems in the West and beyond also appeared. These papers include Gareth Hardin's "The Tragedy of the Commons" (1968), and "The Historical Roots of our Ecological Crisis" the famous article by Lynn White (1967), in which he blames Judeo-Christian traditions for contributing to the current ecological crisis. Meanwhile, an essay by Aldo Leopold in his *A Sand County Almanac*, called "The Land Ethic" (1949) was also gaining wide currency. There were also events that spearheaded the birth of environmental ethics such as "Earth Day" in 1970. Earth Day was an initiative founded by U.S Senator from Wisconsin, Gaylord Nelson. He was concerned about the massive oil spill in Santa Barbara, and also moved by a student anti-war movement, in 1969. Nelson felt that these events were a perfect platform to launch an environmental public awareness campaign (see, Dunlap & Mertig, 1992). So, it is easy to see why it was not difficult for the environmental movement to gain public support; the citizenry were already sensitised to the importance of challenging the traditional/conventional practices and ways of life, let alone the fact that people by that time were experiencing massive pollution and severe environmental degradation together with wilderness and species loss due to intensive industrial activities (Nash, 1990; Dunlap & Mertig, 1992).

therefore, within all these movements that environmentalism kicked in. (For more on this, see, for example, Nash, 1990; and Dunlap & Mertig, 1992.)

The philosophical aspects of environmental problems were highlighted in all such scholarship and events, thus setting the stage for a philosophical search for answers to the environmental crisis.⁷ Thus, articulating an ethic of the environment was seen as an important tool that could help to influence peoples' attitudes and values towards environmental protection, because conventional ethical systems did not extend beyond the human world.

Now, when we examine the way environmental ethics emerged and the direction it has taken, one may discover two main hidden underlying forces and motivations that characterised its early days. The first one was to avert the threat of pollution caused by accelerating population growth and industrial activities, and the second one was to avert or thwart the threat of the rapid disappearance of wild areas, or the wilderness areas and the wild animals inhabiting them, and areas of natural beauty. If we examine the works that spearheaded the emergence of environmental ethics mentioned above, for example, the *Tragedy of the Commons* (1968), *The Population Bomb* (1968), and later works such as Rolston's article "Feeding People versus Saving Nature?" (1996), we see clearly that the authors mourn the loss of wilderness areas or diminishing wild places on the planet because of rapid population growth, especially in developing countries. So, from the beginning, environmental ethics was more concerned with, as Brennan (1998:307) puts it, "the celebration of wilderness and the enumeration of reasons for its preservation".

As I demonstrate in the rest of this chapter, and for that matter also in the rest of this dissertation, an environmental ethic that has to seek justification for the protection of the wilderness as its core mission is a narrow, western, cultural and philosophical concern; and, if confined to these concerns, it results in environmental ethics lacking relevance in African and other non-western contexts. As I also argue, that this is partly because the African concept of wilderness, for example, is quite different from that of the west (see, Burnett & Wa Kang'ethe, 1994; Guha, 1989). From an African perspective, therefore, an environmental ethics that focuses on saving

⁷ It must be remembered here that, prior to the climax of environmental awareness movements in 1960s, John Muir (1838-1914), a naturalist and a preservationist also known as 'the patron saint' of American environmentalists had already contributed immensely to environmentalism through his numerous publications and activities geared towards environmental preservation. Another naturalist and philosopher who contributed to the environmental awareness movement was Hendry David Thoreau (1817-1862) who actually was a philosopher of nature. His work, unlike that of Muir, was academic more than activism but had a strong influence on the environmental movement and environmental philosophy (see, for example, Reynolds, 2011).

nature and wilderness areas for their own sake has weak persuasive power outside its original western academic context.

It thus may be argued that much of the work on environmental ethics has focused on finding justification for the preservation of wild areas and other natural creatures around the world, and as I show below, this mission took the form of establishing the intrinsic value of nature, or a non-anthropocentric ethic. As such, mainstream environmental ethics generally understood the intrinsic value of nature as the value that nature has in and of itself, regardless of any value nature could have for humans. Accordingly, and again speaking generally, this led to an ethics of leaving nature totally alone. As such, environmental ethics conventionally emerged as an ethic of non-interference in natural or wild places. This, in turn, ushered in a heated and protracted academic debate on whether environmental ethics should be anthropocentric or non-anthropocentric. This narrow theoretical focus left out much that could have been of great practical relevance to the world and the African context. As alluded to earlier, much of these debates did not take into account non-western perspectives and concerns. The anthropocentric vs. the non-anthropocentric debate, furthermore, polarises the views and misses the approaches that could build the bridge between these two, almost opposite, positions.

One may argue, however, that the non-western views were ignored because there were not enough voices in the field of environmental ethics from other cultural contexts, including Africa. My response to this argument would be that the whole approach to environmental ethics was culturally exclusive, and this was caused by the western universalism that claims to be global but fails to recognise its own cultural “embeddedness”.

A brief general discussion below of some aspects of mainstream environmental ethics shows why much of its policy implications, such as non-interference in nature or leaving nature totally alone, create problems if “applied” to the lives and environmental concerns of African people today.

2.3 Major views in mainstream environmental ethics

In the initial phases of the emergence of environmental ethics, articulating a non-anthropocentric ethic was seen as the only way the interests of nature could be taken care of fully. Environmental philosophers thus began to seek justification for attributing intrinsic value, i.e. moral status, to

the non-human world. The philosophical bone of contention here concerned what the appropriate criterion for extending moral status to the non-human world should be. Different views were advanced in this regard. Some maintained that sentience (i.e. consciousness or the ability to feel pain or pleasure) is the appropriate criterion, while others found it in "being a subject of a life", "the mere fact of being alive". Others argued that "life as a whole, including the whole set of ecological relationships and conditions forming the preconditions and life support system of life in general" should be the criterion for moral considerability. The following is a brief overview of some of those debates/views. (For a more detailed discussion of these views, see also, DesJardins, 2001).

2.3.1 Sentientism as a criterion for a non-anthropocentric ethic

One of the first attempts to articulate non-anthropocentric ethics was to extend the conventional ethical theories to cover nonhuman animals or sentient beings. Terms such as pathocentrism, which comes from the Greek word *pathos*, meaning pain or suffering, have variably been used. However, the term sentientism, which involves the capacity to experience pain or pleasure, is commonly used.

Classical Utilitarianism pioneered by Jeremy Bentham (1748-1832) and John Stuart Mill (1806-1873) seems to have set the stage for extending moral status to non-human animals. In criticising Kant's moral theory for restricting moral status to rational human beings only, Utilitarianism argued that strict application of the Kantian moral theory may also exclude some humans, for example, those who, for one reason or another, can no longer exercise their rationality, such as those who are mentally challenged or those in a coma or even infants. Instead, utilitarianism extends moral considerability to any sentient (conscious) being, that is, any being that is capable of experiencing pain/suffering or pleasure. According to Jeremy Bentham (1789:17.283, as quoted in O'Neill *et al.*, 2008:96), "the question is not, can they reason or can they talk? But, can they suffer?" Meaning that pleasure is good and pain is bad regardless of what being is experiencing it (O'Neill *et al.*, 2008). So, for the classical utilitarian, the capacity to experience pleasure or pain was seen as the appropriate criterion for ascribing moral status. Utilitarians claim that there are many human beings or persons who are no longer rational but it would be considered immoral to treat them as mere things. Thus construed, utilitarianism offers us an egalitarian principle at the level of sentience as the criterion for moral considerability. All

creatures that are capable of experiencing pleasure or pain should therefore be accorded moral status.

Peter Singer, an ardent defender of animal liberation, took utilitarian principles a step further by arguing that “a being deserves moral consideration if and only if it can meaningfully be said to have interests of its own” and that “[a] moral agent is one who gives equal consideration to the interests of all affected by some action” (O’Neill, *et al.*, 2008:97). By equal consideration of interests, it does not mean that sentient beings should be treated equally, but rather their same interests should be considered equally (Singer, 1986). For example, since a pig, just like a human being, has an interest in avoiding suffering, the interests of both in avoiding suffering or pain should be considered equally. Thus, according to Singer, only humans and nonhuman animals or sentient beings can have interests of their own. This means that non-sentient beings like trees, stones, etc. are not morally considerable because they cannot be said to have interests or a good of their own. Singer’s theory is based on two assumptions: the first one is that the interests of sentient beings should be equally considered; and the second one, which is based on the utilitarian principle, is that we are obliged to bring about the maximum possible degree of interest-satisfaction. In other words, for Singer, it might be justified to sacrifice the interests of some individuals if that will bring about maximum interest-satisfaction for others.

Singer’s theory, and classical utilitarianism (which basically are consequentialist) in general, have been counter-criticised by Tom Regan and Kantians on the ground that utilitarianism allows or gives room for the possibility of “the treatment of beings as means to some greater total good such as increasing total welfare” (O’Neill, *et al.*, 2008: 98). They argue, to the contrary, that Kantian moral theory, if extended to non-human entities, has a far greater potential for the protection of the non-human entities than utilitarianism, especially because Kant’s moral theory is deontological or rights based. Thus, once it can be established that living entities other than humans have inherent value and hence have certain rights, it becomes wrong to inflict intentional suffering on them, even if that leads to total greater welfare or maximisation of interests (O’Neill, *et al.*, 2008).

Tom Regan thus argues from a deontological perspective or a rights view that moral considerability should be accorded to “all beings that are ‘subject-of-a life’, that is, those beings with beliefs, desires, perception, memory, emotions, a sense of future and the ability to initiate

action, and psychological identity overtime” (see Regan, 1983/2004, Ch. 7). Regan gives a more expansive account of personhood in indicating that what makes a being a person is that they are “experiencing subjects of a life, that is, they are conscious creatures that have individual welfare that is important to them regardless of their usefulness to others” (Engel, 2008). Alternatively, unlike Singer, Regan argues that there are moral limits to what we can do to an experiencing subject of a life. The implication of this is that a consistent application of the categorical Kantian imperative requires that people respect all experiencing subjects of a life, whether they are human or nonhuman, as inherently valuable, and never treat them as mere means. Thus, Regan’s theory is superior to Singer’s in that his approach imposes moral limits on the treatment of entities regardless of the overall consequences, while Singer’s theory may allow for the sacrifice of the interests of some individuals for the greater interests-satisfaction of others (Cochrane, 2008).

However, an ethics based on sentience has been accused of being too biased to animals, completely leaving out the plant kingdom. They are also charged of being overly individualistic when it comes to practical policy issues of protecting or preserving species and wilderness/habitats and ecosystems. There are instances where certain animals become so numerous that they become a threat to the integrity of the ecosystems, in which case, prudence dictates to kill some of these animals. Sentientism will not allow this because all sentient beings have equal moral worth. Some scholars have even questioned whether sentientism/animal ethics is an environmental ethics at all because of its narrow focus on animals (Callicott, 1980; Sagoff, 1984). Furthermore, others scholars, like VanDeVeer & Pierce (2003) have noted that the implications of animal ethics may interfere with natural processes; for example, the prey-predator relationship, because strict application of the principle implies that we ought to save a deer, for instance, from being preyed upon by a lion or a mouse from being eaten by a cat.

Now, the very fact that environmental ethics began from a pre-occupation with granting moral status to animals is one of the indications of its western cultural bias. Concern for the rights of animals presupposes some higher level of altruistic thinking where most people no longer worry about basic survival needs. Further, sentientism, particularly animal ethics, implies that killing animals for human consumption is unethical. Looked at from an African perspective if put into practice, animals ethics thus construed would deny most poor Africans their major source of

protein or food, unlike their western counterparts most of whom may have the luxury of options. Africans use both domestic and wild animals for food. Therefore, this type of ethic would be unlikely to find support among Africans, in particular peasants who are directly dependent on nature for their survival and wellbeing. Furthermore, the talk of animal rights or animal liberation is something that may be difficult to understand among most Africans who in most cases see animals (wild animals particularly) as a threat to their lives and wellbeing (Songorwa, 1999; Mhlana, 2001; Sifuna, 2010). I understand that other societies, even in the west, have the same problem with dangerous wild animals threatening people's security and property (viz. wolves and bears), but the difference regarding Africa is that western societies have more financial and technological capacity to deal with these problem animals than their African counterparts. In fact, in some African societies, as is evident later in the case study, many people believe that it is they who need to be liberated from the threat of wild animals rather than the animals being protected from humans. Indeed, in many parts of Africa, wild animals do still have the power to wreak havoc on people's lives and property because many people in Africa live close to wildlife areas with very rudimentary self defense tools.⁸

2.3.2 Biocentrism as a criterion of non-anthropocentric ethics

Another attempt to articulate a non-anthropocentric ethic was to extend moral status beyond animals to all living organisms. This is called bio-centric ethics. One of the very first scholars who attempted to do this was Albert Schweitzer. Schweitzer (1923) sought to extend Kantian ethics to all living organisms. This is also referred to as an ethic of reverence-for-life. Dwelling on the post-Kantian metaphysics of Arthur Schopenhauer, Schweitzer (1923) argued that all living things have a 'will to live' and that this 'will to live' should not be extinguished. Schweitzer is known for his famous phrase: "I am life that desires to live as part and parcel of life which desires to live" (Schweitzer, 1956, as quoted in Msafiri, 2007:73). According to Schweitzer, close examination of animals and how they strive to protect their young ones and themselves, gives one that deep feeling or insight that animals, just like human persons, also have a will to live. For Schweitzer, this led to the conclusion that all life, not just human life,

⁸ It is usually assumed that human technological capacity has shifted the power from being powerless before dangerous wild animals, such as elephants and lions, to having the capacity to protect ourselves from these animals and even manipulate them as we like. But this is only true for some highly developed countries. Most other countries, especially in the developing world, have very little capacity to deal with problem wild animals, as the case study of the Chagga testifies (Lotter, 2008).

should be respected. In other words, Schweitzer argues that all life should be respected and revered because everything that has life strives to survive. It has been observed, however, that, while living organisms strive to survive, it is another question whether they 'will' to live, because 'to will' something presupposes some form of consciousness, which is absent in most living things (Cochrane, 2008).

Another scholar who advocated a bio-centric ethics is Paul Taylor. Arguing from a Kantian deontological perspective, Taylor developed an egalitarian bio-centric ethics or a life-centred environmental ethics in the attempt to synthesise Singer and Schweitzer's positions. Taylor (1986) avers that all living things are "teleological centres of life", that is, they have a good of their own that they strive to fulfil. All living things have an interest in their own survival and wellbeing whether they are aware of it or not. They all strive to flourish. Thus, according to Taylor, if all living things have a good of their own, they possess inherent worth (i.e. worth regardless of whether humans value them in any way or not), and thus deserve equal moral consideration. Taylor's theory, it has been observed, thus commits us to species impartiality. Taylor renders the Kantian rational autonomy and the natural autonomy of all living things analogous by pointing out that, just as we respect the rational autonomy of persons, we should also respect the natural autonomy of all living entities (Elliot, 2003:186).

As Taylor anticipates possible conflict in the application of his strong egalitarian moral theory in real life situations, he develops rules and principles to be adjudicated in situations of conflict of interests between humans and nonhuman entities. These principles call upon us to consider basic and non-basic needs of human and non-human entities where the basic interests of whichever entity should be given priority, all things being equal; except in matters of human self-defence. However, Taylor's principles are said to be contradictory and they fail in certain situations in real life. For example, it has been observed that "in situations in real life where some non-basic human interests outweigh some basic non-human interests, Taylor's principles break down" (French, 1995:57). For example, there are certain things that have become a part and parcel of human culture without which people cannot live their normal lives, yet in Taylor's view, they could be considered non-basic. These include electricity, roads, furniture, vehicles, etc. All these amenities cause substantial damage to living things in the process of acquiring them. Further, what may be considered a basic human interest to a western community may be considered to be

a non-basic interest or a luxury to an African community. To address this problem, as I argue later in this chapter, a bottom up, case by case approach that is sensitive to the particularities of a place may be more appropriate.

In addition many view Taylor's and other bio-centric theories as deficient because they seem to place excessive burdens and self-sacrifice on human beings, so much so that humans could not live their lives if these theories were actually put into practice. Taylor's position has indeed been characterised as "misanthropic". Nevertheless, in the attempt to avoid this problem, Taylor introduced a principle of self-defence "to allow that human interests can over-ride the interests of other living things where significant human goods are at stake" (Taylor, 1986:70).⁹ However, some people question whether privileging human beings over other non-humans in certain situations is not tantamount to going back to the anthropocentrism that biocentrism seeks to avoid.

Furthermore, the problem I see with these principles is that these principles become less useful, for example, in areas where there is so much poverty and people depend entirely on the natural environment for their survival and livelihood needs, as in most parts of Africa. This is because, with so much poverty in the context of Africa, the survival needs of many people might in many instances outweigh the interests of other living things, regardless of how significant those interests may be. In other words, these principles do not make much sense among the majority of the people in Africa who do not have the luxury of options. Taylor's biocentric ethics presupposes a society that has proceeded beyond the stage of preoccupation with basic survival needs, and one that has the luxury of options, which is not the case in most African countries. Taylor's theory and his principles therefore are not of much use in the African context where poverty, which is a daily reality, pushes people to do whatever they can do to survive.

Taylor's approach has been criticised, in general, for privileging individuals over ecological wholes. It has been argued that this arises from "the piecemeal extensions of the dominant [conventional] individualistic approaches to ethics" (Engel, 2008). These conventional ethical theories were not meant to be stretched beyond the realm of humans in the first place. To address

⁹ Other priority principles to resolve conflicting interests between humans and nonhumans fairly, according to Taylor, include the principle of proportionality, the principle of minimum wrong, the principle of distributive justice and the principle of restitutive justice. For a more detailed account of these principles, see, Taylor, 1986: 68-78.

this problem and other weaknesses of biocentrism or life centred ethics, an ethic that considers species, ecosystems and life support systems or holistic ethics was formulated. This approach is also termed eco-centric ethics or environmental holism. The extent to which eco-centric ethics thus succeeds or not as an effective environmental ethics will be discussed below.

2.3.3 Eco-centric ethics

Eco-centric ethics may be understood as the “view that the biosphere as an interconnected whole has moral standing” (VanDeVeer & Pierce, 2003:178). As such, eco-centric ethics extends moral status to collective entities or ecosystems such as species and wilderness areas rather than to individual entities. Eco-centric ethics thus advocates some form of ethical holism (O’Neill, *et al.*, 2008). Proponents of this school of thought notably include Aldo Leopold, Holmes Rolston III, and J. Baird Callicott. Aldo Leopold, who is considered the pioneer of eco-centric ethics, summarises his ethics in the following famous and oft-quoted phrase:

A thing is right when it tends to preserve the integrity, stability, and the beauty of the biotic community. It is wrong when it tends otherwise. (Leopold, 1949:224)

The notion of community is central to Leopold’s ethic and he defines it as including “the soils, waters, plants and animals or collectively: the land” (Leopold, 1949:203). His Land Ethic was largely taken up and elaborated on by Callicott; particularly in one of his famous works *The Conceptual Foundations of the Land Ethic* emphasising the holistic and non-anthropocentric nature of Leopold’s Land Ethic. Callicott sees the land ethic as new and radical compared to conventional ethical theories because “[t]he standard model of ethical theory provides no possibility whatever for the moral consideration of the wholes – of threatened populations of animals and plants, or of biotic communities, or most expansively, of the biosphere in its totality” (Callicott, 1987:197).

Holmes Rolston also defends some form of ethical holism. For Rolston (1989) collective entities are themselves direct objects of moral or ethical consideration, so Rolston advocates for an ethic “that cares for the species above the individual and for the ecosystem above the species, noting that the species is a bigger event than the individual, and the ecosystem is a bigger event than the species” (O’Neill, *et al.*, 2008: 105). Rolston does not mean that the individual is not significant, but his logic is that to preserve the species is to preserve the individual and to preserve the ecosystem is to preserve the species within the ecosystem. So the whole is more important than

the individual or the parts that comprise the system. Thus, Rolston and some other advocates of eco-centrism would apparently allow sacrificing individuals for the health of the ecosystem if need arises.¹⁰

O'Neill, *et al.* (2008) contend, for example, that the move to extend moral status to 'wholes' or ecosystems, provides reasonable ground for addressing conflicting interests within environmental policy. For example, eco-centric ethics is seen as being superior to individualistic approaches because it gives room for the preservation of some rare species even at the cost of the destruction of individual entities. That is, if the whole is given moral priority over individual entities, then it may be justified to cull/kill some animals such as rabbits that may be a threat to the health of an ecosystem, whereas the advocates of individualistic approaches such as biocentrism and animal ethics claim that it would be morally wrong to sacrifice the interest of individuals in favour of the interests of ecosystems or species. Therefore, even if an ecosystem is in danger of being destroyed because of overpopulation of, say, elephants, one would not be justified in culling some elephants to rescue the collapse of the entire ecosystem because individual elephants are morally considerable. That is why eco-centric ethics, granting moral status to wholes such as species, ecosystems, populations and land over individual organisms/entities is seen to be more meaningful when it comes to practical issues in conservation policy than individualistic approaches (see O'Neill, *et al.*, 2008:100-102).

However, Regan (1983) cautioned that environmental holism or eco-centric ethics taken to its logical conclusion may lead to 'environmental fascism'. Or, as O'Neill, *et al.*, (2008: 105) put it, "[holism] appears to justify human diebacks for the sake of the "*summum bonum*" – the highest good of the biotic community". This implies that, if the human population, for example, seems to endanger the health of the Planet then, according to eco-centric ethics, it may be justified to kill or just allow some human beings to die for the sake of the health and integrity of the planet Earth. Rolston himself said explicitly that in a situation where there is a choice between feeding the hungry or saving nature, priority should be given to saving nature. Rolston avers that "feeding people may be feeding a kind of cancer" (Rolston, 1996:256).¹¹ Andrew Brennan

¹⁰ This is what Rolston (1996) seems to imply in his infamous article, "Feeding People versus Saving Nature?"

¹¹ Here, of course, Rolston is trying to show the importance of arresting the rate of population growth especially in Third World countries to save the little remaining natural resources although the cancer metaphor is clearly very harsh, especially when used in reference to poor people. He is also actually accusing the rich nations for their

blames Rolston though, for failing to recognise that environmental destruction is driven by forces other than poverty, notably by “the politics of international relations, corporations, agencies, economic systems which simultaneously drive human impoverishment, disease and environmental destruction” (Brennan, 1998:324). Robin Attfield, for his part, says that the problem is not about whether to feed people or save nature, but rather about instituting policies that “encourage people to both save nature and feed themselves” (Attfield, 1998:299). Rolston’s position has also been blamed for being misanthropic, for example when he accuses uncontrolled population growth in developing countries as something that should be discouraged by doing away with all aid to the poor, which acts as incentive to unbridled breeding. For Rolston, the poor will always be with us and thus doing things that encourage their continued reproduction is like feeding a cancer.

Further misanthropic implications that may result from eco-centric ethics include, for example, justifying letting HIV decimate the population of the poor countries even if the world today has the capacity to find a cure and manufacturing or creating deadly viruses such as Ebola or Zika to help reduce the population of poor countries. Even the apparent lack of serious efforts by developed countries to help to eradicate world hunger and poverty raises eyebrows as to whether this is not a plot to reduce the population of developing countries because their rate of growth is a threat to the integrity of the global environment and hence the current lavish lifestyle enjoyed by people in the West.¹²

Those reservations notwithstanding, this type of holistic environmental ethics might be difficult to implement or find support in Africa. This is because, first of all, it was conceptualised from within a general intellectual framework of 'hands off nature' (i.e. the framework of the intrinsic value of nature. Secondly, because, if such a holistic ethics were to be implemented without refinement, it would be the people in Africa who would suffer the most (from being excluded from the very resources they depend upon for their livelihoods). In fact, environmental policies informed by this type of environmental ethics would have a devastating impact on those dependent on their immediate natural environment for earning a living, therefore it would likely

hypocrisy where they actually put a lot of resources in things that are of less significance compared to giving priority to those things that can protect the environment.

¹² I understand that many ills in developing countries cannot always be attributed to developed countries. Many of the problems of developing countries, African in particular, are also caused by internal structural and governance problems such as corruption, mismanagement of resources by the political elite and their allied business people.

be vigorously resisted in Africa. Studies abound that provide us with a myriad examples of peasants in Africa and elsewhere protesting environmental policies (e.g., total conservation policies) that tend to deprive or divorce them from their sources of livelihood, which usually derive from their immediate environments and natural resources such as forests, animals, land, etc. (see, for example, Sifuna, 2010; Macura, Zorondo-Rodrigues, Grau-Satorras, Demps, Laval, Garcia, & Reyes-Garcia, 2011; Vedeld, Jumane, Wapalila & Songorwa, 2012).¹³

To conclude this section, I have to reiterate that all of the different non-anthropocentric approaches discussed above ascribe intrinsic value to the environment, albeit for different reasons. Some argue that sentientism (the capacity to experience pain or pleasure) provides enough justification for granting moral status, others argue that just being alive provides an adequate justification, whereas others argue for extending moral considerability to ecosystems and species or wholes rather than to individual entities. The question, however, is: to what extent can these approaches be depended upon to resolve practical environmental problems in Africa? Alternatively, could these approaches provide practical guidance on how to resolve environmental management conflicts that are prevalent in many African countries today?

What seems apparent, even among western societies, is that the arguments for the intrinsic value of nature or non-anthropocentrism are not winning over the common people even in the west (Light, 2002; O'Neill, *et al.*, 2008). Thus, if the non-anthropocentric arguments for nature protection in their western cultural mantle are not winning the conviction of people even in the west, they are not likely to win the conviction of people in Africa either. This means that we cannot appeal to them to effectively resolve practical environmental challenges in Africa.

2.4 A general summary of the weaknesses of mainstream environmental ethics

In this section, I discuss, in general terms, the major weaknesses or problems of mainstream environmental ethics showing further why these problems make it less suitable to non-western

¹³ Such policies could probably also be resisted by the rich as they also benefit from exploiting nature via business, illegal use/smuggling of natural resources, etc. It is not only that the lifestyles of the rich are often much more environmentally consuming than those of the poor, but the poor are the ones to experience the first impact of environmental problems and environmental policies (see, Hattingh, 2011); but the rich as well as the middle classes similarly often resist some policies – say the ban on use of private cars, for example; or saving energy by turning off all the air conditioners.

concerns. I discuss in some more detail here the problems of western “embeddedness”, abstractness, and the problems of deductionism and foundationalism.

2.4.1 The problem of western “embeddedness”

I indicated earlier that mainstream environmental ethics has been blamed for being biased towards western perspectives and cultural influences. This bias has made earlier articulations of environmental ethics more suited to a western context. In other words, I argue that environmental ethics has been formulated in such a manner that it cannot adequately address the environmental problems experienced by people living in Africa. This is because the cultural circumstances within which environmental ethics emerged in the west was mainly influenced by post-industrial and post-materialist values that put more emphasis on higher quality of life issues, such as protecting the environment for its aesthetic and recreational values, and also for its spiritual values or inspiration, as well as for posterity, or simply for its own sake. Kelbessa (2014: 55) observes:

[It] is important to recognize that environmental ethics, as conceived in the ‘developed’ world, is often not relevant to peasant farmers and pastoralists in developing countries because they do not face the ethical problems discussed in more affluent nations, where people and government have more choices.

Western environmental ethics has been more pre-occupied with things like preservation of wilderness, species extinction and animal rights for a long time. These altruistic concerns about nature are said to have developed among the western societies because of increasing affluence which made people less worried about basic survival needs. The industrial revolution and its effects on the countryside also played a significant part. Thus the major concerns of environmental ethics seem to have been those that resonate more with the needs of the affluent. As Andrew Brennan observes, “[t]he majority of early writers [on environmental ethics] were concerned mainly with the diminishing number of wild places of the planet, and environmental ethics was conceived largely as a celebration of wilderness and the enumeration of reasons for its preservation” (Brennan, 1998:307). This tendency has largely defined the field even to the present, with the result that non-western environmental concerns have been sidelined. Conceived thus, we should not be surprised to hear people such as Amin (2010:18) say that environmental ethics and related calls for nature protection is a new imperialist plot by the West to try and “limit access to the planet's resources for their own exclusive benefit”. It is important, then, that

environmental ethics rid itself of this suspicion so that it can find support among those in a non-western context such as Africa and elsewhere by addressing their practical environmental concerns, including their livelihood needs, more directly.

As indicated earlier, mainstream environmental ethics has also been more dominated by theoretical debates about what the basis for the justification of nature protection should be; debates that have had little impact on and relevance for common people (Light, 2002). Western environmental ethics approaches seem to have been efforts towards putting nature first at the expense of humans, or to protect nature from human interference. Holmes Rolston says explicitly that we may need to sacrifice human interests for the sake of the little remaining natural places (Rolston, 1998). He, in other words, proposes an ethics of non-intervention in wild nature, but as Brennan (1998: 306) writes:

[This ethic which implies that] the poor should be kept out of areas of natural variety and richness, draws support from an implicit Puritanism which can underwrite an elitist approach to the conservation of biodiversity. The combination of ignoring the structures of power while remaining enmeshed in Puritan values is particularly dangerous.

I have already noted how policies that result from this type of ethic of the environment could impact negatively on the lives of poor people; for instance by being forcefully displaced from their natural homes to make room for National Parks that do not even benefit them (the poor) significantly. Thus construed, much in western mainstream environmental ethics approaches has been of less relevance to non-western contexts, particularly to the people in Africa. Albeit genuine and important, most of the environmental concerns of western societies, as mentioned above, are not a priority in most African societies. The priority of most African people, especially south of the Sahara, the majority of whom live in abject poverty, is to fulfil their basic existential or survival needs, first and foremost through exploiting their immediate natural environments. The preoccupation of most of these Africans is with how to find the next day's meal and not with the protection of the environment as such. In other words, preservation of the environment for aesthetic and/or recreational purposes, for its own sake or for posterity, which is a concern of those with "full stomachs", i.e. the affluent, does not have much appeal among the poor in Africa.¹⁴

¹⁴ By making that claim I do not mean, in any way, that African experiences are homogeneous, but that there are trends in Africa, especially south of the Sahara that may allow a rough generalization.

This means that environmental ethicists may need to find reasons to justify environmental preservation that are also more accommodating of the experiences of people living in non-western contexts like Africa. That is why I, building on the main tenets of environmental pragmatism in this dissertation, examine the contexts and lived experiences of local people through a case study of the people living on the slopes of Mount Kilimanjaro, in order to articulate an approach to environmental ethics that reflects the local people's current concerns and perspectives, and hence an approach that is more persuasive and relevant in addressing their environmental concerns.

2.4.2 The problem of abstractness, lack of practical relevance and persuasiveness

Many scholars today propose that environmental ethics should leave the university walls and become practical by shaking off its abstract mantle so as to make itself more relevant to the common people, and also be able to influence public policy (Norton, 1984; Light, 2002; Kelbessa, 2003; Brown, 2004). Mainstream environmental ethics has been seen as an exchange mainly between environmental ethicists at the academic level; it has to a large extent remained some kind of theoretical hobby to a small group of academics. Because it remains abstract and purely academic, mainstream environmental ethics is accused of even failing to appeal to her most important ally, the world of natural-resource management. This is partly due to an overemphasis on the abstract metaphysical intrinsic value of nature (Light, 2002). In natural resource management circles, decision makers are more concerned with the anthropocentric user value of nature than its intrinsic value; planning and policy issues accordingly are made around that understanding. The argument here is that, if the appeal to anthropocentric values of nature can lead to its protection, then let it be. At the end of the day the aim of all environmentalists is to protect nature regardless of the path one chooses, provided such a path is within the acceptable legal and moral norms of the community in question (see also, Hattingh, 1999).

Light (2002:436) writes that the mainstream western environmental ethical theories “appear to be more concerned with overcoming human interests than redirecting them toward environmental concern”. He further avers that environmental ethics as described above has not “lived up to its promise as a field of philosophy attempting to help resolve environmental problems. It is instead evolving mostly as a field of intramural philosophical debate” (*ibid.*). Thus Light (*ibid.*) argues that environmental ethics should address itself more to practical resolution of environmental

issues, rather than their philosophical resolution. In the same vein, environmental pragmatist Bryan Norton also argues that environmental ethics should move from being an applied philosophy to being a practical philosophy. According to Norton (2003: 50):

[practical philosophy] is more problem-oriented ... It works towards theoretical principles by struggling with real cases, appealing to less sweeping rules of thumb that can be argued to be appropriate in particular contexts, rather than establishing a universal theory and “applying it” to real cases. Practice is prior to theory in the sense that principles are ultimately generated from practice, not vice versa.

Most of the environmental problems experienced in Africa need a more practical approach indeed. For example, practical issues of access and use of natural resources are among real environmental problems that require specific bottom-up techniques to address them. These problems are the major sources of environmental degradation and conflict in Africa that current environmental ethics might have a role on addressing (Adams & McShane, 1996; Songorwa, 1999; Mariki, 2013). As most Africans need the natural environment for their survival and daily livelihood needs, *a priori* ethical theories or principles may, in most cases, lead to policies that have implications for limiting access of people to the natural environment leading further to conflicts, hence making these policies difficult to implement.

In fact, the major task of environmental ethics should ultimately be one of persuasion (see, for example, Birch & Cobb, 1990; Soper, 2005; Prozesky, 2009). This is more of a practical task that needs to begin with the community. So, because of the pressing nature of environmental problems like those experienced on the slopes of Mount Kilimanjaro, finding ways to motivate people to act may be more important than remaining locked in protracted *a priori* arguments to establish the intrinsic value of nature. That is why scholars today call for a literature on environmental ethics that is more practical, relevant to public policy and able to motivate people to act (see, for example, Minter & Manning, 1999; Cafaro, 2001; Light, 2002; Brown, 2004; Cafaro, 2011; Minter, 2011; Kelbessa, 2014). Accordingly, as I show later in this dissertation, this objective (of finding ways to motivate people to act) could be achieved better through a concrete case study based on a pragmatic environmental approach.

2.4.3 The problem of deduction and foundationalism

Another major basic problem of the mainstream environmental ethics approaches discussed above is that they are deductive and foundational in nature because they are based on the wrong

assumption, namely that “rational ethical reflection should be modelled on the ideal of a scientific or logical theory with ethical imperatives and basic theoretical postulates from which specific moral injunctions can be derived” (O’Neil *et al.*, 2008:108). It has been argued that this deductive approach “loses sight of what moves environmental concern”, and that “it distorts and impoverishes our moral language and everyday responses to the world” (O’Neill, *et al.*, 2008:108). This means that this approach restricts and narrows the scope of the rich vocabulary we use daily in our moral valuations. The point being made here is that people, in real life, do have many different reasons and motivations for valuing the environment that cannot be captured in one deductive value theory, i.e., a non-anthropocentric value theory.

The thin descriptions employed by the mainstream environmental ethical theories thus fail to accommodate the multiple ethical responses that we may owe to different beings at different times and in different contexts, and this, in turn, leads to the “thinning and flattening of the moral landscape”. O’Neill, *et al.*, (2008), further note:

... a defensible approach to environmental ethics has to start from a human scale of values and from the rich normative vocabulary that has been bequeathed to us through our human engagements with the various environments we inhabit ... and not from some generalized and underspecified concept of ‘moral concern’.

This means that we need to appreciate the complexity and plurality of relations within particular contexts instead of narrowing and hence impoverishing the multiple and different ways and reasons people may have for valuing nature. This is to say, to be able to capture the experiences of people living in a non-western context, environmental ethics should recognise the fact that humans will have different reasons and motivations to protect nature because of the different meanings and importance a particular environment may have for them at a particular time and place; and this is where ethical reflection should begin (O’Neill *et al.*, 2008:123-124). Nothing is better suited to do this, I argue, than an environmental pragmatic methodology, especially the adaptive management approach that Norton endorses. Environmental pragmatism and adaptive management emphasises lived experiences as the point of departure for resolving environmental problems. It is this very conviction that motivated me to conduct a case study of the people living on the slopes of Mount Kilimanjaro to be able to capture the diversity of values and experiences in Africa regarding the environment.

The following therefore is a brief discussion of environmental pragmatism and its operational tool, that is, adaptive management, as proposed by Bryan Norton.

2.5 Environmental pragmatism

Environmental pragmatism is one among different alternative approaches that have been proposed to correct the earlier mainstream approaches to environmental ethics that were found wanting. The other approaches include social ecology and eco-feminism. Social ecology and eco-feminism resonate well with the African context, especially because of their emphasis on giving a voice to those that are marginalised and oppressed.¹⁵ Their emphasis on rooting out all forms of domination, subordination and social exclusion as a true remedy of our environmental problems in the world is of particular appeal to the people of Africa. However, social ecology and eco-feminism as alternative approaches to environmental ethics lack a clear and concrete methodology for their implementation. I argue that environmental pragmatism and adaptive management approach, not only provide us with a methodology to concretise the ideas advanced by some social ecologists and eco-feminists, but also incorporate those ideas in their approaches. Thus construed, environmental pragmatism is superior to eco-feminism and social ecology.

2.5.1 A brief overview of philosophical pragmatism

Environmental pragmatism derives from the philosophy of pragmatism which emphasises the practical function of philosophy. To pragmatists, the usefulness of a particular philosophy is determined by the extent to which it succeeds in resolving real life problems, or else the “problems of men” as followers of Dewey would put it. Pragmatism may be said to have its foundations in the works of Charles S. Pierce, William James, John Dewey, George Herbert Mead, and Alfred North Whitehead. These philosophers, who may also be called “process” and “relational” thinkers, set the stage for the development of pragmatism as a philosophy of action. Process thinking, an important implication of philosophical pragmatism, lies well within contemporary theories such as field theory, relativity physics, quantum mechanics and

¹⁵ For detailed works on eco-feminism, see, for example, Val Plumwood’s article, “Nature, Self and Gender ...” appearing in various journals; Karen Warren’s “The Power of Ecological Feminism” (1990); Ariel Kay Salleh’s work, “Deeper than Deep Ecology... (1984); and Vandana Shiva’s “Development as a New Project of Western Patriarchy...” (1990). Murray Bookchin, on the other hand, is an authority in social ecology. Some of his works on this subject matter include, *The Ecology of Freedom*, published in 1982; and an article “What is Social Ecology?” that appears in various journals including the *Journal of Environmental Ethics*. See references for bibliographic details of these works.

Darwinism. As such, process thinking calls us “to think in terms of events rather than in terms of substances or objects”, that is, reality should be conceived as a continuum rather than discrete (Birch & Cobb, 1990:86). Pragmatism accordingly sees reality as a continuum, a process dynamically and continuously unfolding as opposed to a conception of reality as static, discrete and objective (Parker, 1996). Pragmatism acknowledges the constructed nature of reality and morality. Further, Pragmatists sees reality as a complex process of interacting and interconnected events that affect each other as opposed to the modernist atomistic conception of reality as objective, self-contained, self-sufficient and static (Birch & Cobb, 1990).

This understanding of reality centres on the pragmatists' conception of truth. Generally speaking, pragmatism is built on an epistemology that sees truth as an emergent probability, in that truth is not absolute, it is not there to be discovered, but rather emerges in the process of inquiry. People co-create truth and meaning in the process of open inquiry. This is emphasised by William James in his essays on pragmatism when he writes: “Truth *happens* to an idea. It *becomes* true, is *made* true by events. Its verity is in fact an event, a process: the process namely of its verifying itself, its *verifi-cation*. Its validity is the process of *valid-ation*” (James, 1997:114). So truth happens, truth is made, it is not discovered. Pragmatists emphasise that truth is that which works in a particular context at a particular time; and also that which prevails in the long run (Parker, 1996, Norton, 2005). For pragmatists, there is no such a thing as absolute truth; we can never attain absolute truth. Pragmatists rather believe that we can always have the best explanation for something which is always open to refinement or revision as better explanations and data become available. Reality is in constant flux and hence is continuously changing. New realities with new problems continuously come into being and this requires that we continuously revisit or revise our theories to match new realities. Truth is dynamic and thus tentative.

So, for pragmatists, truth is tentative and context dependent. Truth or knowledge is an open-ended process of inquiry which is iterative, and self-correcting. That is, truth never is a static phenomenon. That is why pragmatists define truth as that which prevails in the long run yet is open to revision as new sets of contrary evidence become available. That is to say that what is true today and in a particular context may turn out to be false tomorrow upon the rigorous test of accumulated experience. Parker (1996:22) puts it thus: “Experience can however at any time expose our settled beliefs as false, or reveal an unsatisfactory vagueness or confusion in our

concepts. Knowing is therefore an open-ended quest for certainty in our understanding.” Pragmatism thus entails a forward-looking philosophy. As such, pragmatists’ understanding of truth complements the search for the definition of sustainability, which is an important concept in modern environmentalism. Bryan Norton professes that he knows no better justification for environmental ethics than that found in the principle of sustainability. He thus writes: “In our search for an environmental ethic we will never, I submit, find any environmental values or goals more defensible than the sustainability principle” (Norton, 2003:63). Norton clarifies his definition of his sustainability principle asserting:

... policies should be devised to protect as much of nature as possible for the use and enjoyment of humans for as long into the future as possible regardless of whether those values are counted on one ethical framework or the other.

Pragmatists are also committed to pluralism. By pluralism is meant that there are multiple ways of interpreting and knowing the world depending on the dictates of context and experience. It is the recognition that our world consists of a multitude of values and different ways of making sense of those values. Here pluralists are quick to clarify that pluralism does not entail an “anything goes” type of an approach. Light (2002), for example, argues that commitment to pluralism does not mean jumping from one theory to another according to the problem at hand or the context, it rather is all about appealing to the multiple ways or the multiplicity of perspectives in the process of finding a solution to a problem (Light, 2003). Alternatively, it means that pluralism goes further than simply saying that different situations call for different interpretations but rather maintaining that one and the same problematic situation could be viewed in many different ways (also see Brennan, 1992). Alternatively, pluralism stands for the conviction that “diverse perspectives grasp the richness of reality in different ways, but must be judged in terms of workability” (Parker, 1996:40). This is not relativism either, but rather knowledge and truth contextually co-constructed with others.

Pragmatism also emphasises the relational nature of beings or the radical interconnectedness of human beings with their environment. It sees entities as being constituted and affected by the environments surrounding them. Human beings and their environments affect each other. They are inter-relationally connected at all points to each other. Organisms and the world surrounding them evolve together and they are integrally connected. Dewey, (1997: 210), for example writes:

... the doctrine of organic development means that the living creature is a part of the world, sharing its vicissitudes and fortunes, making itself secure in its precarious dependence only as it intellectually identifies itself with the things about it, and, forecasting the future consequences of what is going on, shapes its own activities accordingly. If the living, experiencing being is an intimate participant in the activities of the world to which it belongs, then knowledge is a mode of participation, valuable in the degree in which it is effective. It cannot be the idle view of an unconcerned spectator.

With this pragmatist understanding of reality and truth as contextual, processual, relational, dynamic, transactional, and emergent, flows the pragmatic understanding of ethics and values. Pragmatism holds that all value emerges in experience. That is to say, the individual organism's interaction with the environment is the birthplace of value. Thus "the good" is what is experienced as good when the organism interacts with the world (Parker, 1996: 25). In pragmatic ethics, the rightness or wrongness of an action accordingly is system-dependent, so nothing is good or bad in and of itself without reference to its relationships.

Pragmatic ethics criticises the objective, atomistic conception of intrinsic value, that is, value of an entity solely in and of itself without reference to the multiple relationships in which it stands to other entities. According to Niebuhr, "value exists only in the context of relationships between beings and has no existence apart from relationships. Value is the good-for-ness of beings for others in reciprocity, animosity, and mutual aid" (Scoville, 1995:107). Antony Weston makes the same point when he asserts that "values must be viewed in their contexts and relations with others rather than in isolation" (Weston, 1992:330).

Pragmatic ethics furthermore rejects a foundationalist understanding of value in that "no set of theories of value, no list of virtues, no list of right and duties, no table of laws, no account of the good should be expected to serve in every possible situation that we confront" (Parker, 1996:26). This is because the world and humans in-the-world are constantly co-evolving and new complex realities accordingly come into being continuously along with new moral situations that call for the need to develop new ways to comprehend what is right in particular contexts. As such, pragmatism has far-reaching implications for environmental ethics, a subject to which I now turn.

2.5.2 The relevance of philosophical pragmatism to environmental ethics

Environmental pragmatism, as already hinted, "... is a philosophy of action that begins with real-world problems, not abstract theory-dependent questions regarding what kind of value nature

has” (Norton, 2005:10). Environmental pragmatism aims to dissolve the unnecessary dichotomy and tension between anthropocentrism and non-anthropocentrism which, according to Norton (1992:219) “makes most environmentalists to remain broadly Cartesian in their worldview”. Cartesian dualistic thinking is the realist meta-ethical notion of value which is advocated by some non-anthropocentrists who seek to attribute objective intrinsic value to non-human entities independent of any other relationships these entities may have with the rest of nature, including human beings (O’Neill, 2001).

Pragmatists also attempt to solve the problem of whether values should be attributed to individuals or the whole system, or to species. According to Parker (1996:46),

In pragmatism sometimes the system is more important sometimes the individual depending on context in which meaningful moral situations emerge and the conflicting claims at stake. Neither the individual nor the whole systems are bearers of value but rather value emerges in the interactions of individuals. ...the value of an individual cannot be understood in isolation from the relationships which constitute their ongoing development.

Individuals accordingly cannot be defined outside their relationship with the rest of the environment surrounding them. To exist is to be in relationship. And these relationships among organisms and the environment should be understood within the different contexts in which they are embedded.

Acknowledging the idea that different contexts call for different ways of interpreting them requires us to embrace the idea of moral pluralism. Environmental pragmatists reject the notion of moral monism, that is, the search for a grand ethical theory that can apply to all contexts and situations and at all times, to address the global environmental crisis; they adopt a pluralist stance towards value. Pragmatists maintain that nature has multiple values that cannot all be captured in one theory of environmental ethics (Light & Katz, 1996).

According to Norton (2005b), we acknowledge that nature has multiple values by committing to moral pluralism, and also that humans value nature in multiple ways. That is, nature comprises a continuum of values that ranges from use or instrumental values to non-use values such as aesthetic and spiritual values. Thus construed, our main question in environmental ethics changes from what type of value nature has to how we can protect “as many of the values of nature as possible, for the enjoyment of humans for as long into the future as possible regardless of

whether those values preserved are counted in one theoretical framework or another” (Norton, 2005b:364). Here, we see the principle of sustainability indirectly invoked, just to show how the concept of sustainability is integral in environmental pragmatism. But again, according to Norton (2005b), the many values nature has can only be captured in particular contexts as they emerge in the course of democratic, open ended and iterative processes of inquiry.

Now, to make environmental ethics more practical in the sense of being able to provide practical guidance to resolve environmental problems when called upon, Bryan Norton proposes a pragmatic, adaptive management approach. I briefly outline the three principles of adaptive management below. These principles underlie a process approach that may prove a useful tool for addressing practical environmental problems like those experienced on the slopes of Mount Kilimanjaro.

2.5.3 Adaptive management as an operational tool of environmental pragmatism

I should mention at the outset that the concept of adaptive management is not new. It has a long history that traces back to the philosophical ideas of American pragmatists represented by Charles Sanders Peirce (1839-1914) and William James (1842-1910), as well as Aldo Leopold (1887-1948). However, the specific idea of using the adaptive management approach in resource management is owed to the seminal works of C.S.Holling (1978), C.J. Walters (1986), and K. Lee (1993).

Traditionally adaptive management has been conceived as the mere monitoring of activities and occasionally changing them. It was conceived as the process of “tracking and changing management direction in the face of failed policies”. It was also conceived as simply a “trial and error” process (Lee, 1993). To the contrary, adaptive management is a systematic learning while doing or learning by doing with the aim of improving management decisions by reducing uncertainty at the next decision point (Lee, 1993). It is an active learning process where there is constant improvement of process itself through iterative dialogues, changing assumptions and strategies. It is an on-going process of monitoring progress and revision of goals while giving room for a feedback mechanism where new information gained through experience and social learning is fed back to the process for better management outcomes (see also, Salasfsky, Margoluis & Redford, 2001).

Bryan Norton identifies three pillars or operational tools of adaptive management (see, Norton 2003, and Norton, 2005a). These are learning from experience or experimentalism; identifying multiple scales or multi-scalar analysis; and being contextual or localism, that is sensitivity to place-based values. These three aspects form the core of Norton's environmental philosophy that culminates in his ethical "method" of Adaptive Management. This "method" is more a strategy or approach that enables one to make practical environmental management decisions in particular cases while avoiding imposing ideas on others, because it, as a "method", is iterative, processual and sensitive to particular contexts while remaining open ended and self-corrective with community or stakeholder participation as its central operational tool.

As such adaptive management facilitates social learning through a participatory experimental approach. It must be noted that Norton emphasises that his approach to environmental pragmatism does not prescribe a substantive set of metaphysical principles, but only a methodology that is capable of bringing environmental ethics down to earth by helping us to learn "our way out of uncertainty in particular situations" (Norton, 2005b:364). It is an approach of learning by doing. The methodology provides us with decision-making tools to resolve difficult environmental challenges in particular contexts. Below is a brief consideration of each one of those pillars or principles.

The first one is experimentalism. This is a commitment to learning our way out of uncertainty through experience. It will be recalled that, in pragmatism, all values and knowledge systems should be brought under the test of experience to ascertain their viability and workability (Norton, 2003). Testing hypotheses with experience is what is referred to as experimentalism or the experimental method (Dewey, 1997). Experimentalism is about trial and error reasoning. So, learning from experience is seen as vital in any attempt to resolve environmental challenges or in devising tools to make difficult environmental management decisions without compromising people's ability to connect with nature. It is a commitment to pursue social learning by testing various possible actions and policies in a particular context, i.e., it is a pursuit of social learning through experimental adaptation (Norton, 2003). So, through experiencing the real-world environmental challenges and devising appropriate ways to address them through experimental adaptation, environmental problems could be resolved even if only tentatively. The reader may recall that there is no absolute solution to problems but a continuous process of experiential

learning which is iterative and open ended in pragmatism. That is why pragmatists pay attention to “what is there in experience, and not what this or that philosophy suggests we should find” (Parker, 1996:25).

The second pillar of adaptive management is multi-scalar analysis. By multi-scalar analysis Norton (2005a) means that one should not only consider how the consequences of choices develop on individual, immediate time scales, but also on wider scales of decades and generations, because nature is a complex multi-scalar interaction of parts that change in scale over time. According to Norton (2005b), value exists on multiple levels and unfolds over different temporal and spatial horizons because they are enmeshed in different dynamics. We must learn to “think like a mountain”, Norton maintains, using Aldo Leopold’s metaphor,¹⁶ when emphasising the need to assess the consequences of an action or a policy in ever widening time and spatial scales.

Summarising the importance of multi-scalar analysis in adaptive management. Norton (2003: 72) writes:

We humans will understand our moral responsibilities only if we understand the consequences of our actions as they unfold on multiple scales; and the human community will survive to further evolve and adapt only if we learn to achieve individual welfare and justice in the present in ways that are less disruptive of the processes, evolving on larger spatio-temporal scales, essential to human ecological communities.

Thus, according to Norton, multi-scalar analysis gives us a way to understand the importance of connecting the short-term and the long-term impacts of our actions on the environment. It is a

¹⁶ Aldo Leopold's metaphor of “Thinking like a mountain”, according to Norton (2005: 93), is viewing ourselves and our relationship within nature in a higher perspective, i.e. in the long-range perspective of geological time. It is also about being able to see our deep interconnectedness with nature. It is to be able to recognize that our actions have far reaching consequences on the ecosystem in different time scales, short term, medium term, and long term (the geological timeframe). It is to be able to recognize that the ecosystem is synergistic. Every entity in an ecosystem benefits one another. It is being able to think systemically and holistically rather than individually and egoistically about nature. All of these insights are succinctly captured in Aldo Leopold's *mea culpa* in his essay "Thinking like a mountain" entailing a sketch of himself as a young man participating in the folly of the "scientific management" of a wilderness area based on a perception of it as a static, mechanistic system the elements of which could be "managed" like atoms in isolation from one another. In this essay Leopold relates how he helped to exterminate wolves and mountain lions under the assumption that there would be more deer to hunt as a result without recognizing the impact that action would have on the entire dynamics of the ecosystem of the mountain over an extended period of time, including the decimation of a whole deer population after it increased disproportionately to the grazing available on the mountain slopes. Leopold says that he committed that foul because he had not learnt yet to think like a mountain. That is, he had not yet learnt to see the bigger picture of the workings of nature like the mountain that has lived long enough to know the deep secrets of nature.

commitment to a method of systems analysis by “examining the systematic consequences of our actions within the environment as they play out on different time scales” (Seeliger, 2009:80). Multi-scalar analysis therefore helps us to find ways to link short-term needs at a particular time to longer-term outcomes over an extended time period (Norton, 2003), thereby enabling us to bring a multiplicity of values to converge on a common social goal, that of nature protection.

The third pillar of adaptive management is contextualism or localism, that is, place sensitivity. By contextualism or localism is meant a commitment to examine each problem in its biophysical or social context (Norton, 2003). Being contextual requires that we examine the connection between values and the actual state of affairs on the ground to find out whether there is compatibility. So, contextualism is about finding local solutions to local problems. It is the recognition that how people value nature will be dependent on context, time and space. This sounds like leading to some form of relativism. However, it has been argued that contextualism or localism does not lead to relativism but rather helps to “consistently look for multiple ways of describing the value of any bit of nature that we want to preserve or restore so as to appeal to a range of interests both anthropocentric and non-anthropocentric alike” (Light, 2003:234). In contextualism, emphasis is put on examining the “ways in which people currently perceive their situation in particular contexts as a starting point and then working towards common social goals” (Norton, 2005a:272). That is why Norton further emphasises that truth is always locally based or contextual. In other words, our obligation as environmental philosophers should not be about finding the ultimate truth for all times and places, but about developing practices and institutions that are sustainable in a particular place (Norton, 2005b). It is true that global and regional systems may influence what happens locally, but these impacts occur in a particular place with specific consequences. That is why localism or contextualism requires the involvement of all local stakeholders in resolving environmental problems in a particular locality through taking reversible actions in the process of negotiating out of uncertainties (Norton, 2005a).

2.5.4 The process implications of environmental pragmatism

One of the most important process implications of environmental pragmatism, according to Norton (2005b), is that experience should be the point of departure when environmental policy and management practices are to be formulated and implemented. Thus any society or authority

needs to take concrete experience into consideration because concrete experience is located within a very specific context. It is through experience that we will be able to change or correct or readjust our earlier decisions and value commitments to be in line with our objectives and the current values of the community. Norton (2005a) argues that experiential learning is the only response to uncertainty in science and with regard to disagreements in value. Through experiential learning one will be able to determine whether a course of action is yielding the desired results or not. If not, a different path or course of action is sought (Norton, 2005b:365). All this is done through conversation and dialogue with each other until consensus is reached about the best way for pursuing a certain environmental protection goal. This is not the end. The consensus that is reached must be tested by experience, through trial and error. This is what is called learning from policy experiments (see Norton 2005a:92).

Secondly, in order to take that experience seriously, members of the society need to be in conversation with one another; environmental managers, policy makers and the community need to be in re-iterative dialogue with one another (Norton, 2003). The details of that dialogue will include, for example, what policies and what management practices are needed to protect the environment and to allow the environment as well as humans to flourish?

Emphasis is placed on flourishing rather than mere survival because, as many examples from Africa can bear out,¹⁷ survival is an ugly mode of existence. Survival ethics (see Safit, 2013; Verharen, *et al.*, 2014) is about ‘me first’ when it comes to the use of limited resources, and ‘I will do everything in my power to prevent anybody else from accessing the same’. So the desired ethics of the environment that is intended here is not survival ethics only, but rather an ethics of flourishing. As I understand it, an ethics of flourishing is a sophisticated but enlightened ethics in which we as humans take into account what we need as resources, but also discuss with one another what the reasonable limits of consumption could be; where the thresholds of irreversible

¹⁷ From my own experience in Tanzania, especially in the study area, I can witness that many people will exploit whatever opportunity comes their way in order to survive because of the uncertainty many people have about getting the next day’s meal, or simply because of poverty and hence the lack of reliable sources of income, and also because of mismanagement of the little resources there are by those in power and in relatively advantageous positions socially, politically and economically; be it in exploiting natural resources such as unlawful overharvesting of forest resources or over cultivation around water sources. People do anything lawful or unlawful just to survive. Of course some do this out of greed and others out of sheer necessity (see also Ongungbemi, 2004). But a great deal of conflict involving human versus wild animal, local people versus national park authorities, and local people versus investors also occurs. All these conflicts represent struggles by the local people to access natural resources for their livelihood (see, for example, Mabaruka (1996); Songorwa (1999); and Vedeld *et al.* (2012)).

damage should be located; and what should be accepted as safety margins and safe minimum standards. This brings us to the third point in process ethics, namely determining the thresholds of irreversible damage and safe minimum standards.

What these thresholds of irreversible damage, safety margins and safe minimum standards are can only be determined in context by those involved and affected by those thresholds, margins and standards. In the determination of those thresholds, any sound rational management approach will leave room for safety (Norton, 2005a). To illustrate, when we make policy proposals and eventually choose, say proposal A to implement, it should, according to Norton (2005a), be a choice between different possibilities that we arrive at in conversation with the community and the goals it wishes to achieve. Whatever we choose must make sense to the community participants. So, going along the path of the policy we choose, let us say policy A, we determine in dialogue with one another what the targets are that we want to achieve, but we also need to identify what the indicators that those targets have been achieved would be. And since these targets can only be achieved through a process, and this process has incremental milestones in it, they cannot be formulated in theory; they can only be formulated within the context of a dialogue with everyone else (see Norton, 2003 and 2005a).

Another important process implication of environmental pragmatism is community participation. Because Norton's adaptive management ethics calls for communication and cooperation in the quest for social learning (Norton, 2005b:31), community participation, which is a crucial element in Norton's understanding of adaptive management, comes into play (see Norton & Steinmann, 2003; and Norton, 2005a). Community participation does not mean the episodic exchange of information between managers and the community at one stage of the process, but rather means full community participation throughout the entire process. From identifying the problem to decision making to implementation of decisions and development paths agreed to, as well as re-examining, or revisiting and readjusting goals to see to it that the intended results of environmental protection are being achieved (Norton & Steinmann, 2003). Social learning will only happen through genuine community participation.

Community dialogue also requires cooperative interaction of the public and experts in debating about the goals and methods of environmental protection. To make this argument more concrete,

Norton and Steinmann (2003:533) propose that such a dialogue be facilitated by citizen's advisory committees, thus they write:

The committee should be inclusive in membership, encouraging participation of representatives from all stakeholder groups, including scientists, representatives of government agencies, and so forth. What are required of the committee are regular participation and an honest effort to understand and solve problems. It is also helpful if the representative stakeholders on the advisory committee can maintain regular communication with their constituencies.

The most important aspects of such process ethics then comprise groups and forums of dialogue, and spaces and procedures for dialogue. In that dialogue we formulate targets in such a way that we leave room to turn around before we have reached the point of irreversible damage, with safety margins, and safe minimum standards.

To summarise, process ethics requires really taking experiences into account, group dialogues, community dialogues, community definition of thresholds, and choice of policies, together with laying down targets and thresholds within the parameters of the context that is being discussed. It is about defining safety margins, room for safety, room for turning back, timeframes in which monitoring takes place, time frames in which the forum and group dialogues come back again to determine how we stand with regard to experiences that we have had; and to examine whether we are moving towards resolution. We have to retreat from our actions or policy choices if we find that we are taking too much from the resources, and come back and rethink the thresholds and safety margins we previously set. As such, this is an iterative process of monitoring, thinking again about thresholds, targets and safety margins, etc.

All of this means that the preferences of the community are taken into account in a sophisticated, enlightened way, and considered, or rational preferences are used as point of departure and as reference, rather than felt preferences (Norton, 1984). According to Norton (2003:272-274) there are two kinds of preferences: "short term preferences based on individual preference [i.e., felt preferences] and longer term preferences [i.e., considered preferences] or sustainable value that emerges from community process". So, according to Norton, the latter preference should be encouraged because it leads to long-term sustainability. If each and every one takes felt preferences into consideration it could eventually lead to serious problems. If the community considered preferences to be taken into account by the full involvement of the community in the

entire process of deliberations about environmental protection, it may lead to better policies, better environmental governance and better management practices (Norton, 2003).

2.5.5 The relevance of environmental pragmatism to this study in general

Environmental pragmatism emphasises beginning with real-life environmental problems and moving from there to finding a workable solution in a particular context. That is why I found it more appropriate to examine specific environmental problems on the slopes of Mount Kilimanjaro and attempt to look for their resolution using the adaptive management approach. Environmental pragmatism tells us that real solutions to such problems cannot come from applying foundational principles or from deductive environmental ethical theories like those discussed in mainstream environmental ethics. It rather requires analysing problems in their local and biophysical context with the aim of identifying local solutions to such problems. We saw that a top-down approach may miss the many different ways that the local people value their environments and this may lead to imposing our own values on people, which usually does not bring forth the desired results. I therefore expected Norton's process ethics to help shed light on why environmental management practices have been failing on the slopes of Mount Kilimanjaro and what policy and management practices need to change, as well as what new environmental protection approaches in keeping with environmental pragmatism are needed in order to reverse the deteriorating environmental conditions on the mountain slopes. Alternatively, to determine how people can learn to live sustainably within their local context without having to sacrifice too much.

I also hoped to determine how conflict resulting from access and use of resources on the mountain slopes could be addressed so that the needs of both the local people and environmental protection are not compromised. How should social learning and democratic participation be carried out within the area so that these kinds of conflicts and opposing interests could be dealt with without harm to both the local people and the natural environment?

Another important contribution that I expected Norton's pragmatic method to offer in relation to my case study was related to how cultural pride could be restored on the mountain slopes by linking the mountain resources with the local people's culture. That is, how could Norton's method of environmental pragmatism help in restoring that pride by rehabilitating the place-

based values on the mountain slopes that seem to have disappeared because of divorcing or distancing the local people from the mountain and its surroundings.

2.6 Conclusion

This chapter has presented an attempt to examine the scholarship on mainstream environmental ethics and its relevance to Africa. I showed that many of the debates and theorisations on mainstream environmental ethics have largely been embedded in western perspectives and cultural influences, and hence fail to fully accommodate non-western concerns and perspectives. I showed also that mainstream environmental ethics has tended to be too abstract and hence contribute little insight into how to resolve concrete practical environmental problems, especially in an African context. Mainstream environmental ethics has been blamed for being more oriented towards academic debates within the narrow circle of environmental ethicists, hence failing to have an impact on or persuasive power with common people, environmental managers and policy makers alike. I have presented Norton's environmental pragmatism as a possible viable alternative to the mainstream approaches in environmental ethics. It has been my argument that environmental pragmatism could be an appropriate approach to environmental ethics in an African context because it provides a methodology that is capable of bringing about genuine participation of the local community in decisions affecting their environment. In this way, environmental pragmatism and adaptive management approach give room for all voices to be heard; the rich and the poor alike, those with power and those without power, scientists and lay people, men and women alike. It is in this sense that I consider this approach to be superior to all other previous approaches.

In the following chapter, I consider alternatives to environmental ethics coming from African perspectives. I will show that even these African alternatives fail for almost the same reasons as the earlier approaches to environmental ethics in that they remain theoretical with little practical import when called upon to provide guidance on how to resolve current environmental challenges on the slopes of Mount Kilimanjaro. They are also deductive, top-down approaches and are foundational in terms of theory building, which is contrary to the spirit of pragmatism and adaptive management ethics.

CHAPTER THREE

ALTERNATIVE APPROACHES TO ENVIRONMENTAL ETHICS FROM AFRICAN PERSPECTIVES

3.1 Introduction

In the previous chapter, I argued that mainstream environmental ethics is culturally embedded in western perspectives and concerns. As such, mainstream environmental ethics has taken on board little of non-western experiences. On top of that I have argued that much of mainstream environmental ethics has been too abstract and academic and hence contributes little to providing practical guidance on how to address concrete environmental problems, most especially in an African context. However, some scholars have endeavoured to articulate an indigenous African environmental ethics with the intention of bringing African perspectives to environmental ethics and also making it relevant to Africa.

This chapter presents what such an indigenous African environmental ethics could entail and what its strengths and weaknesses are in addressing the concrete real-life environmental problems that Africans experience today. The chapter also presents an attempt to examine the extent to which we can rely on traditional African environmental ethics to provide us with practical guidance on how to resolve environmental problems such as those experienced on the slopes of Mount Kilimanjaro. In this chapter, I particularly focus on the works of two advocates of traditional African environmental ethics, namely Felix Muntaryadzi Murove, a Zimbabwean scholar, and Workineh Kelbessa, an Ethiopian scholar. Both have written what could be considered ground-breaking works on environmental ethics from an African perspective. I discuss the assumptions and argumentation of their approaches to African environmental ethics, but also their shortcomings, especially when considered against a context like that which concerns the slopes of Mount Kilimanjaro. I have selected these two scholars because their arguments represent the arguments of most other advocates of African environmental ethics in that they all appeal to traditional African worldviews as their point of departure and argue that some aspects of these worldviews point to an inherent environmental ethics in traditional African societies. The two scholars also differ in that, while Kelbessa, for example, concentrates on showing how traditional beliefs, practices and governance structures could be appealed to as a

source of an indigenous African environmental ethics, Murove focuses on conceptual analysis of some traditional African concepts such as *Ubuntu* (humanness) and *Ukama* (relatedness) to show that these two concepts could actually form the basis of an African environmental ethics. As mentioned above, most articulations of African environmental ethics fall in either of these two different approaches: one appealing to traditional beliefs and practices, and the other grounded in conceptual analysis. Sometimes, however, these two approaches are blended or overlap. Thus, it sometimes becomes difficult to separate one approach from the other, yet they have important differences.

I do not discuss these approaches exhaustively, however, but mainly focus on their persuasiveness and practical relevance in resolving environmental management and policy issues such as those that emerged in my case study. So, my major question here is: Can these approaches provide us with guidance on how to deal with practical environmental challenges such as those on the slopes of Mount Kilimanjaro? On grounds that are fully demonstrated in the rest of this study, I argue, with special reference to Kilimanjaro, that these approaches to African environmental ethics, even if they have done ground-breaking work in demonstrating alternative ways to think about environmental ethics, still do not help much when it comes to dealing with practical or concrete environmental problems in Africa today.

I begin this chapter with a general overview of what constitutes African environmental ethics focusing on the background, rationale and the general foundations on which much of the African environmental ethics is built. Then, I consider two specific approaches to African environmental ethics, i.e., Murove's and Kelbessa's approaches respectively, and show why they, in spite of their many strengths, still fail to provide us with practical guidance on how to resolve environmental problems such as those encountered on the slopes of Mount Kilimanjaro. Finally, I consider some criticisms to these approaches and indigenous environmental ethics in general, making use in this regard of insights drawn from environmental pragmatism, while making the general point that not only traditional worldviews, but also contemporary experiences and worldviews currently supported in Africa should be taken into account when thinking about an environmental ethics with practical implications that can actually persuade people and influence their behaviour.

3.2 General overview

In this section, I trace the background, rationale and foundations of African environmental ethics. What I present in this section serves as a precursor to my critique of traditional African environmental ethics that follows later in this chapter.

3.2.1 The background and rationale for traditional African environmental ethics

I should start by noting that those who write on traditional African environmental ethics usually use some traditional African worldviews from certain ethnic groups to make a generalisation about the whole of Africa. However, these scholars acknowledge that different African ethnic groups have different beliefs and cultural practices or worldviews, but, as Kelbessa notes, “Although there are many African worldviews, there are commonalities justifying the concept of a generic African worldview” (Kelbessa, 2014:32). Likewise, Behrens (2014: 65) writes:

I use the phrase “African thought” [to mean] ... the philosophical and the religious ideas of the indigenous people of the sub-Saharan Africa ... I do not claim that a single worldview is shared by these peoples, but I believe, with most African Philosophers, that there are common themes to be found.

Despite the caution given by these scholars, there remains a sense in which they think they can generalise their articulations of African environmental ethics, especially when they talk of the presence of common elements in African culture and thought. However, as I showed in Chapter 2, environmental pragmatism usually prefers to take each context in its own right by beginning with concrete lived experiences going up. Although it is true that there are many things that African cultures share in common, their experiences of environmental problems in their particular locales is certainly different. It is in this spirit that I evaluate traditional African environmental ethics in this chapter.

I have mentioned, in Chapter 2, that the necessity for articulating an African environmental ethics or an environmental ethics from African perspectives emerged as an effort to correct what was experienced as a western bias in mainstream environmental ethics. Mainstream environmental ethics was seen as being exclusively informed by western perspectives and cultural influences which made it less relevant to the African context. So, the need to bring African perspectives into mainstream environmental ethics was obvious. Some African scholars

who saw the necessity of articulating a specific African environmental ethics include, among others, Ongungbemi (1994), Tangwa (2006), Kelbessa (2005), Murove (2009), Ojomo (2011) Behrens, (2010), and Kelbessa (2011, 2014, and 2015). In these works, traditional African thinking and worldviews have been employed to explicate or defend what is presented to be a unique African environmental ethics. Thus, most advocates of African environmental ethics have pre-occupied themselves with the task of demonstrating that western perspectives do not have a monopoly of knowledge about nature and the environment in general. As such, African environmental ethics has typically been an attempt to prove that traditional Africans have had an environmental ethics that helped them to co-exist in harmony and peace with nature. At the same time, African environmental ethics has been an attempt to show that traditional African cultures possess an environmental ethics resonant with the kind that is being advocated today, claiming in addition that that ethic is being destroyed by modern development.

Workineh Kelbessa, for example, says that “...modern education, market forces, foreign religions, poverty and government policies have eroded the indigenous environmental ethic in Oromia and other parts of the world” (Kelbessa, 2011:172). He thus emphasises the need to revive or rehabilitate an indigenous environmental ethic. Mogobe Ramose, on the other hand, says that “deep-rooted materialistic culture and the technological advancement continues to re-affirm the need to restore *Ubuntu* because, more than ever before, humanity is faced with the threat of catastrophic ecological disaster” (Ramose, 2009:312). The assumption here is that traditional African cultures possess an environmental ethics that needs to be rehabilitated or restored.

However, on grounds that are fully demonstrated in the rest of my study, I argue that, while pre-colonial African thinking and worldviews led to the protection of some aspects of nature, this did not result from an explicitly articulated environmental consciousness or an ethics present in these cultures, and that the current African context and the corresponding environmental challenges call for a more practical approach that is capable of resolving some environmental challenges now.

3.2.2 Foundations of traditional African environmental ethics

I must mention from the outset, however, that the emergence of African environmental ethics seems to be a continuation of the ‘Africanist project’¹⁸ by which some African scholars have been attempting, quite correctly, to dispel the colonial notion that African thought/culture is devoid of useful ideas to contribute to environmental ethics discourse and development in general. African environmental ethicists to the contrary show that there is implicit environmental ethics in the traditional African worldviews which could be useful to the ongoing debates on environmental ethics. However, this Africanist project, as we shall see, has had an impact on the kind of African environmental ethics that has been formulated and its efficacy in helping to resolve concrete environmental problems in Africa.

As mentioned earlier, most articulations of African environmental ethics are founded on traditional African worldviews or thought. Kelbessa (2014: 39), for example, says;

[D]ifferent cultural groups in African have their own indigenous environmental ethics through which they govern their relationship to the natural environment, [and thus] indigenous environmental ethics is based on the worldview of a particular society and the ethical views of individual thinkers.

In brief, the traditional/indigenous African worldviews are seen to have the following general characteristics: a sense of kinship with nature; the need for supernatural intervention in human affairs; the presence of beings of spiritual forces and power superior to humans; the capacity of human beings to enter into relationship with a benevolent spirit world; an acute sense of the afterlife, usually expressed in a belief in and respect for ancestors; and an absence of a dichotomy between the physical and the spiritual (see Balcomb, 2006:242-243).

¹⁸ The Africanist project or Pan-Africanism which has its roots in the Negritude Movement has been a movement or project that seeks to restore Africa’s past glory or, put simply, a movement that seeks to glorify “Africanness” in the attempt to restore the African cultural pride that was apparently killed or undermined by colonialism. The colonialists corrupted the African person’s mind by glorifying whatever is European and despising whatever is African by using terms such as savage, barbaric, primitive, uncultured, uncouth, pagan, uncivil, superstitious, and other such demeaning labels. European scholars and philosophers such as David Hume, Immanuel Kant, Wilhelm Friedrich Hegel and Levy Bruhl, who are known to have made demeaning remarks about Africa and the rationality of Africans (see, for example, Kelbessa, 2015) have been in the spotlight in much of the works written by Africanist scholars in defense of the African/ Black race. Such Africanist scholars include Cheick Anta Diop with his ground breaking work, *The African Origin of Civilization: Myth or Reality*, published in 1974 that, although predating the Pan Africanist Movement, has become a point of departure or a basis of much scholarly work on the Africanist project. Others include Ali Mazrui with his famous work, *The Africans: A Triple Heritage*, published in 1986. A more recent work that may also be considered a continuation of the Africanist project is the work by Souleymane Bachir Diagne, *Ink of the Scholars: A Reflection on Philosophy in Africa*, published in 2016 by CODESRIA.

It is this African worldview or philosophy that some other scholars such as Godfrey Tangwa describe as one that sets a slim boundary “between plants, animals, and inanimate things, between the sacred and the profane, matter and spirit, the communal and the individual” (Tangwa, 2004:389). It must be noted here that it is usually said that religion and other aspects of life cannot be separated in traditional Africa (Mbiti, 1990). Religion is seen as pervasively linked with every aspect of people’s daily life (Mbiti, 1990; Bediako, 1995; Gyeke, 1997). This means that the African religions and the African “culture” or worldviews are intertwined. That is, religion and other aspects of culture cannot be separated from one another like it is with western religion (Christianity) where there is a clear demarcation between religion and other aspects of people’s lives.

So, for the African (the traditional African at least) it is claimed, the universe is a religious universe. It is further observed that the African does not make a distinction between the physical and the spiritual, the profane and the sacred. According to Magesa (1997:52), “the [African] universe is perceived as an organic whole... [and] humans maintain the bond between the visible and invisible spheres of the universe”. All aspects of life have to do with religion. This means that African life is inconceivable without religion. According to Mbiti (1990:1), “religion permeates into all departments of life so fully that it is not easy or possible always to isolate it”. In other words, it is usually claimed that, in the African context, cosmology and beliefs are intricately intertwined with natural phenomena and the environment to the extent that things like “wind, thunder, rain, lightening, night, day, moon, sun, stars, and so on may become amenable to control through the cosmology of the African people” (Olupona, 2006:261). In Africa, it is believed, for example, that humans can transform into animals or plants or even into forces such as the wind (Tangwa, 2004).

Construed thus, it is claimed, Africans see everything in nature as being united and interconnected and that this way of conceiving reality or the universe leads to “the holistic understanding of reality, namely, that all aspects of the universe such as animals, plants, rivers, and mountains have a religious significance and must be treated with respect” (Beyers, 2010:1). Along these lines it has been further argued that “the spiritual bond between humans, animals and plants may have led some Europeans to designate the African religion as totemistic” (Mbiti, 1990:10). It is for the reasons given above that land, water bodies, animals, and vegetation (trees

and forests) in relation to African religions feature most in discussions of African environmental ethics (see, for example, Burnett & Wa Kang'Ethe, 1994; Gitau, 2000; Mkenda, 2010; Kelbessa, 2011; Sewe-K'Ahenda, Nduku & Weldon, 2014). These aspects of the environment are possibly more regularly discussed in the literature because they are things that people in Africa interact with on a daily basis and they were/are used as mediums to communicate with the supernatural. Also more important is that traditional African religions, especially rituals and observances, are practised around these aspects of the environment. Apart from the natural entities discussed above, most natural phenomena such as rain, wind, floods, drought, earthquakes, locusts, tornadoes, and so on, may also be considered among the constituents of the environment in the African context (Olupona, 2006). And all these aspects are believed to have supernatural powers.

According to Tempels (1959) and Mbiti (1990), traditional Africans see mountains, trees, rivers, and different animals as representations or embodiment of deities or spirits; as such, most of these natural objects are seen as divine, sacred, and are given due reverence (Mbiti, 1990). According to Tempels, nature is permeated with 'vital forces' for Africans (Tempels, 1959). And these vital forces have the power of influencing events for the better or worse in the world. In traditional Africa, it is said, "people hold that the spirits dwell in the woods, bush, forest, rivers, mountains, or just around the villages" (Mbiti, 1990:74). This, in turn, requires that these objects are approached with care. Clobus claims that because of the ontological relationship between traditional Africans and the physical/natural environment, one may indeed say, "the physical surrounding is experienced as an extension of the body" (1992:172). Once again, the aim here is to emphasise the close bond between humans and the non-human world in African worldviews.

Msafiri (2007:83) writes that "African religious traditions and cultures have deep respect for and affection for the whole of creation ... and thus could provide alternative paradigms for the worsening eco-crisis". Furthermore, it is usually claimed that the presence of nature narratives in traditional African religious beliefs, taboos, proverbs, myths and legends makes this African worldview a more favourable ground for nurturing an environmental ethics compared with the western worldview (see, for example, Mutwa, 1996; Tangwa, 2004; Murove, 2009; Chemhuru & Masaka, 2010; Mkenda, 2010; Kelbessa, 2011; Eneji *et al.*, 2012; Sussy *et al.*, 2012). This, it is claimed, results in African cultures and cosmology being closely tied with the natural

environment, more so than in other places, at least in the western world, thus making African worldviews more suited than the western world view in general to help protect the environment.

Now, an inference may be made from the above exposition, as follows: Since traditional African worldviews or religions led to the treatment of some natural objects such as trees, wild animals, mountains, springs, etc. with reverence and respect, and since this reverence led to the preservation and conservation of some aspects of the natural environment, the traditional African worldviews or religions engendered a greater sense of ecological responsibility or an environmental awareness which could be a basis for an African environmental ethics. While this inference is valid, I show later that there is a reason to shed some doubt on some of the premises accepted to support this conclusion, and thus the strength of this conclusion itself is put in question.

In brief then, to summarise this sub-section: the traditional African metaphysical and ontological relationship between humans, the natural world and ancestral spirits forms the basis for most of the arguments for those advocating or defending an African environmental ethics. Many of its defenders see the traditional African environmental ethics as being supported by the claim that traditional Africans maintained a harmonious co-existence between humans, the natural world and the spirit world. In other words, the claim is that traditional Africans do everything that is possible to avoid upsetting this cosmic balance of harmonious co-existence between humans, the natural world and the spiritual world by taking a cautious approach to the non-human world. Thus, many consider the traditional Africans' cautious approach to the natural world and hence their striving to maintain a harmonious relationship between humans, the natural world and the spiritual world as entailing a holistic worldview akin to the one that is being advocated by environmentalists today. Such is the foundation on which African environmental ethics is built.

My concern, though, is as follows: To what extent can indigenous African environmental ethics, thus construed, provide practical guidance on how to resolve current African environmental problems? How relevant and persuasive can this traditional African environmental ethics be for motivating people in Africa to protect nature? Felix Munyaradzi Murove, a Zimbabwean scholar, and Workineh Kelbessa, an Ethiopian scholar, are among the ardent defenders of African environmental ethics. They attempt to answer these questions posed above in their respective versions of African environmental ethics to which I now turn.

3.3 Specific approaches to African environmental ethics

In this section, I briefly present Murove's and Kelbessa's versions of African environmental ethics and examine their strengths and weaknesses from an environmental pragmatist's perspective and examine the extent to which they can be relied upon to help in resolving current African environmental challenges. As I have indicated above, Murove's and Kelbessa's versions of African environmental ethics have been singled out for discussion because they represent two slightly different approaches. Murove's version is more theoretical by focusing on a conceptual analysis of traditional African concepts of *Ubuntu* and *Ukama* to show that they inform an environmental ethic that could help to solve the environmental crisis. Kelbessa, for his part, goes beyond pure theoretical analysis to a little more practical approach by appealing to concrete traditional Oromo governance structures and institutions for providing a basis for an African environmental ethics. However, these two approaches also overlap in many respects depending on the angle from which one looks at them. Nevertheless, I consider these two approaches to be more or less representative of different formulations of African environmental ethics. I intentionally begin with the more theoretical approach and end with the more practical one, as it has been the aim of this study to find a more practical, down-to-earth approach that could respond to the current African environmental problems. However, I show that both these approaches have problems in one way or another in relation to providing practical guidance on how to address current environmental concerns in Africa.

3.3.1 Murove's conceptual basis for an African environmental ethics

Traditional African culture has been touted as having the ingredients or possessing “the roots of an ethical paradigm” based on the Shona concepts of *Ukama* and *Ubuntu* to solve the current environmental crisis (Murove, 2009:315). *Ukama* and *Ubuntu* are seen as affirming an ethics of interdependence among individual human beings, the community and the wider non-human environment. The following is a brief description of the concepts of *Ukama and Ubuntu* and their implications for an environmental ethic.

3.3.1.1 The concept of *Ukama*

The Shona concept *Ukama* means “being related or belonging to the same family” (Murove, 2009:316). However, according to Murove, *Ukama* is not restricted to the human family but extends to the non-human community as well. This should follow logically from the traditional

African belief that, in African thinking, the boundary between the human and the non-human realm is slim or non-existent (Tangwa, 2014). So, *Ukama* signifies the African understanding of reality in terms of relational interdependence (Murove, 2009:316).

Central to the concept of *Ukama* is the belief in ancestors. It is said that the goal of traditional African religion and other practices is to foster *Ukama* between the living and the dead/ancestors. Murove (2009:317) writes, "... it is in *Ukama* between the living and their ancestors, that immortality of values is found". *Ukama* between the living and the ancestors is expressed through anamnestic solidarity when ancestors are remembered through ritual practices, without which it is believed that harm may befall whoever omits these ritual practices (Gelfand, 1981; Bujo, 1998). So, through *Ukama*, the harmony between the past, present and future are actualised. It is in this sense that values are said to be immortal because "they promote harmonious existence in [*sic*] between the past, present and future" (Murove, 2009:319).

As pointed out above, *Ukama* does not end with human beings but extends to the natural environment. According to Murove, this (that is *Ukama* with nature) is made possible through totemic ancestorhood. This suggests that the practice of totemism shows how African people are intimately connected to the natural environment.

Expounding on Murove's concept of totemism in relation to environmental ethics, Le Grange clarifies that "*Ukama* is advanced through totemic ancestorhood and is a connecting thread of the present, past and future and that *Ukama* does not only mean relatedness at the level of humans but also to the natural world" (Le Grange, 2012:333). Phillip Junod (1939: 112) as quoted in Le Grange, 2012) explains totemism thus:

Totemism shows well one characteristic of the Bantu mind: the strong tendency to give a human soul to animals, to plants, to nature as such, a tendency which is at the very root of the most beautiful blossoms of poetry, a feeling that there is a community of substance between the various forms of life.

Thus "totemic ancestorhood justifies that there is insoluble solidarity between humanity and the natural environment", which should make African thought a fertile ground for advancing an environmental ethic (Murove, 2009:3). This also provides the basis for claims made by scholars such as Tangwa (2004) in presenting the traditional African outlook with respect to nature as holistic compared to the traditional dichotomous, atomistic view of reality that has defined the western worldview for a long time.

3.3.1.2 The concept of Ubuntu

Murove argues that, while *Ukama* emphasises interdependence, *Ubuntu* or humanness emphasises relatedness with others. He thus contends that “while the Shona word *Ukama* means relatedness and understanding of reality in terms of interdependence, *Ubuntu* implies that humanness is derived from our relatedness with others” (Murove, 2009:315). That means humanness is a result of being in *Ukama* with others. Murove argues further that the ethical concerns of *Ukama* are articulated in the concept of *Ubuntu*, which advocates that humanness is fully realised within the context of harmonious existence with others in the community (Murove, 2009:330). According to Murove, this harmonious existence with others also implies that human wellbeing in general cannot be fully realised outside relatedness with the natural environment. The implication is that living morally in traditional Africa includes living in harmony with the natural environment. He supports this by saying that, in traditional African moral teaching (which was normally imparted through stories, myths and taboos); the natural environment plays a central role. He asserts that “the participation of nature in human affairs shows that the essence of being human lies in *Ukama* with nature” (Murove, 2009:324). He thus claims that “humanness (*Ubuntu*) is an expression of interconnectedness between people and between people and the physical world” (Le Grange, 2012:334). *Ubuntu*, in other words, is an expression of *Ukama*. Thus, the concepts of *Ubuntu* and *Ukama* support each other in grounding a basis for an environmental ethic. Thus understood, humanness (*Ubuntu*) then is an expression of the interconnectedness (*Ukama*) between people and between people and the non-human world. This way of conceiving African environmental ethics is widely shared among other advocates of African environmental ethics, including Segun Ongungbemi’s “ethics of nature relatedness” (see Ongungbemi, 1994), Geoffrey Tangwa’s “eco-bio-communitarianism” (see Tangwa, 2004), Kevin Behrens’ “African relational environmentalism” (see Behrens, 2010; 2014) and Fainos Mangena’s “Totemism and spiritualism as the criterion for moral status in the African environments” (see Mangena, 2013). All these scholars, like Murove, emphasise the interconnectedness, the interdependence and the relationality that exists between human beings and the non-human world in the African worldview, which forms the basis for an African environmental ethic.

3.3.1.3 The implications of Ukama and Ubuntu for environmental ethics

We see from the exposition above that *Ubuntu* by itself was considered an insufficient base on which to build an environmental ethics. This is because *Ubuntu* or humanness in essence is a human-centred concept. As we saw above, *Ubuntu* entails that we enhance our humanness through our deeper relations with other human beings or the community. Now, because of the inadequacy of *Ubuntu* as concept to ground an environmental ethic, another broader concept, *Ukama*, which means relatedness, was introduced. *Ukama* is a broader concept and/or complements *Ubuntu* because *Ukama* is not restricted to the human community (past, present and future people), but, according to Murove, extends *Ubuntu* to the entire cosmos. We saw that it is through totemic ancestorhood that we are justified to make that logical move or extension from the human world to the non-human world. So, once the words *Ubuntu* and *Ukama* are compounded, we have promising conceptual resources for an environmental ethic. First, in so far as *Ubuntu* and *Ukama* have some connotation of the future, it implies that we are obliged to protect nature, not just for the good of the present people, but also for future generations. In this way, *Ukama* contributes to the ongoing debates on environmental ethics and future generations. Second, the notion of relatedness as embodied in *Ukama* could be understood as relatedness to the entire cosmos, which implies an obligation to protect the whole of nature. It is in this sense that Murove and others consider *Ubuntu* and *Ukama* to hold promise for an environmental ethic.

To conclude, Murove's aim has been to show theoretically that, unlike some claims that African thinking does not support an environmental ethic, there are concepts or ideas in the traditional African worldview in the form of *Ubuntu* and *Ukama* that promise to serve as a basis for an environmental ethics. While Murove's approach does not actually provide us with practical guidance for resolving specific environmental problems in particular contexts, he does succeed in providing us with a broad theoretical articulation of an environmental ethics from an African perspective. He does not really go beyond that. I must emphasise here that Murove's approach does not lead to an African environmental ethics, but is rather more of an environmental ethics from an African perspective. I consider Kelbessa's approach, on the other hand, to be more of an African indigenous environmental ethics. This is to say that Kelbessa tries to show that traditional African beliefs and practices acted as a sanction against reckless use or treatment of some aspects of the natural environment. This helped to protect the environment and it is what is referred to by Kelbessa as an indigenous Oromo environmental ethic. Kelbessa, furthermore,

argues that this traditional Oromo environmental ethic could actually be revived to help protect the environment today. Murove, on the other hand, attempts to show theoretically or conceptually that the African philosophy of *Ubuntu* and *Ukama* does support environmental ethics. Murove's approach is therefore more abstract and theoretical. Alternatively, one may say that Murove's approach is more an attempt to show that traditional African thought is/was not a blank slate in terms of providing conceptual resources for an environmental ethic, rather than formulating an approach that can persuade people and provide practical guidance on how to address environmental problems in present-day Africa.

In the following section, I present Kelbessa's approach to African environmental ethics to examine the extent to which it can help to persuade people to protect the environment and also help to resolve specific practical environmental problems in Africa. As mentioned earlier, my approach from Chapter 2 onwards has been to begin with the more theoretical and abstract approaches and then continue to the less theoretical and more practical, down-to-earth approaches in the attempt to see whether they succeed in providing practical guidance and a workable approach to resolve particular or specific pressing environmental problems in Africa.¹⁹

3.3.2 Kelbessa's indigenous African environmental ethics

The Ethiopian scholar Workineh Kelbessa,²⁰ is one of those African scholars who have been on the frontline in advocating an indigenous African environmental ethics. I briefly present some key ideas in his approach to African environmental ethics and provide a critical assessment in relation to its capacity to provide practical guidance to resolve current practical environmental

¹⁹ I consider further criticism of both Murove's and Kelbessa's approaches and the notion of a general African/indigenous environmental ethics after presenting Kelbessa's approach hereunder.

²⁰ Kelbessa earlier complained that African perspectives had not been given much space in renowned environmental ethics journals such as *Environmental Ethics* and *Environmental Values* (see Kelbessa, 2005; and Kelbessa, 2011). But Kelbessa did not just complain, he also worked hard to see to it that some more work on African environmental ethics found their way into these journals. His efforts bore fruit and some of his works and other of scholars writing on African environmental ethics began to appear more regularly in *Environmental Ethics* and *Environmental Values*. For example, Kevin Behren's paper "Exploring African Holism with Respect to the Environment" appeared in *Environmental Values*, 2010, volume 19, issue number 4. Kelbessa's work, "Can African environmental ethics contribute to Environmental Policy in Africa?" was published in *Environmental Ethics*, 2014, volume 26, issue number 1, and Kevin Behren's paper, "An African Relational Environmentalism and Moral Considerability", appeared in the same issue. The following year, i.e., 2015, another paper by Kelbessa, "African Environmental Ethics, Indigenous Knowledge and Environmental Challenges" appeared in 2015 in volume 37, issue number 4 of *Environmental Ethics*. So, African perspectives are indeed finding their way in international environmental ethics.

challenges such as those experienced by people living on the slopes of Mount Kilimanjaro and other places with similar conditions.

Kelbessa basically takes J. Baird Callicott's remarks about environmental ethics in Africa as his point of departure or, more specifically, as his object of criticism. In his search for conceptual resources for an environmental ethics in the indigenous cultures around the world, Callicott (1994:158) made the following observation with regard to Africa:

Africa looms a big blank spot on the world map of indigenous environmental ethics ... [because] African thought orbits, seemingly, around human interests. Hence one might expect to distil from it no more than a weak and indirect environmental ethic, similar to [a] type of ecologically enlightened utilitarianism, focused on long-range human welfare.²¹

Workineh Kelbessa, clearly disenchanted with Callicott's observation, accused him of committing the fallacy of hasty generalisation (Kelbessa, 2011). He thinks that, if Callicott had done his homework well, he would have realised that many African ethnic groups possess an environmental ethics. Using the Oromo of Ethiopia, Kelbessa claims that "... contrary to Callicott's assumption as given in the quotation above, the Oromo consider not only the wellbeing of humans but also other nonhuman creatures" (Kelbessa, 2011:210). Kelbessa accordingly set out to prove his case in the rest of his work.

Kelbessa argues that the Oromo worldview has included an environmental ethic that can serve as the basis for a contemporary environmental ethic (Kelbessa, 2011: Preface). Drawing mainly from the traditional religion and governance structures of the Oromo, Kelbessa observes that "the Oromo of Ethiopia maintain perfect balance between nature and culture; and that religious attitudes, values and practices force peasant farmers to revere nature and natural places" (Kelbessa, 2011:26). He further contends that Oromo environmental values are encapsulated and

²¹ J. Baird Callicott made this claim after researching the Yoruba of Nigeria, the San of Southern Africa, and the Balele of the Kongo with the aim of finding conceptual resources for the support for environmental ethics in indigenous or traditional African thought (see Callicott, 1994). Callicott, however, did not feel that these cultures provide adequate support for an environmental ethics. It must be recalled that Callicott was looking for a non-anthropocentric foundation for an environmental ethics in the traditional African cultures to no avail. Callicott's conviction, as I pointed out in Chapter 2, has always been that a genuine environmental ethics must necessarily be non-anthropocentric. This might have narrowed the possibility of him seeing other possible options in the African context that may well help in the efforts to protect nature. This is where environmental pragmatism becomes useful, as I argue in this dissertation.

encoded in beliefs about the Supreme Being, sacred trees and animals, and the *Qaalluu* institution²² (Kelbessa, 2011:86). Kelbessa furthermore emphasises the need for the rehabilitation of indigenous environmental ethics in Africa following the example of the traditional religious beliefs and practices of the Oromo of Ethiopia (Kelbessa, 2005; 2011). As he sees it, this indigenous environmental ethics has been suppressed by cultural changes caused by the expansion of Islam and Christian faiths in these areas. For example, Kelbessa (2011:84) says that Muslims and Christians regarded the *Qaalluu* institution as useless. They even destroyed the sacred *abdaarii* trees saying that these trees belong to the devil. I consider the three aspects within which, according to Kelbessa, the Oromo environmental values are encoded in cultural beliefs and practices, that is, the belief in the Supreme Being (*Waaqa*); sacred trees and animals; and the *Qaalluu* institution.

3.3.2.1 The Belief in the Supreme Being (*Waaqa*)

The belief in *Waaqa* is one of the central notions in Kelbessa's articulation of indigenous African environmental ethics. *Waaqa* is seen as the creator of everything, animate and inanimate. All living things depend on *Waaqa* (the Supreme Being) for their activities and functioning. Among the Oromo, according to Kelbessa, God or *Waaqa* and the Earth are inseparable. *Waaqa* is also associated with the sky. As Kelbessa avers, "... the Oromo view of the world supports the belief that we should see the universe as a single whole – as coherent because *Waaqa* creates everything in the universe" (Kelbessa, 2011:77). Kelbessa also says that the Oromo do not see the universe in a dualistic or dichotomous perspective. He says that the Oromo see everything in existence as bound together by the belief in *Waaqa*. The Oromo are expected to live in accordance with the cosmic order. Violation of the cosmic order is seen as an offence against *Waaqa*, whose punishment may come in the form of misfortune, such as illness, mishaps and bad luck for the offender. In other words, the Oromo worldview is claimed to support a holistic worldview akin to the postmodern Leopoldian-Darwinian-Einsteinian world view that is being advocated by environmentalists today. This view is also shared by Beyers, who says that the close relationship between humans, animals, plants and the non-living world defines the holistic African worldview. He claims that, in the African worldview, "humanity is interconnected to all

²² According to Kelbessa (2011: 79), "The Qaalluu refers to both an institution and leaders who represent the institution. The Qalluu leaders are the most respected and senior persons who are responsible for rituals and blessing." For more on the Qalluu, see 3.3.2(b) below.

living and non-living entities” that is, there is a “universal interdependence” or a reciprocal dependency between humans and the rest of nature and the supernatural (Beyers, 2010:5). Other scholars have also supported Kelbessa’s claims by arguing that environmental ethics as it is being advocated today finds its home in traditional African worldviews (Tangwa, 2004; Murove, 2009; Behrens, 2010; Le Grange, 2012). Tangwa (2004: 389) for example, in his theory of environmental ethics that he refers to as eco-bio-communitarianism, writes:

[In the African worldview] there is recognition and acceptance of interdependence and peaceful co-existence between earth, plants, animals and humans. ... The distinction between plants, animals and inanimate things, between the sacred and the profane, matter and spirit, the communal and the individual is a slim and a flexible one.

So, the belief in *Waaqa* or the Supreme Being is the foundation on which the holistic view of nature among the Oromo is built. This belief plays an important role in the way the Oromo relate to nature. Since everything, human beings, non-human beings and supernatural beings are believed to be bound together with *Waaqa* in a harmonious relationship, the Oromo are obliged to promote this cosmic harmony by avoiding those things that may disrupt this harmony, including breaking the taboos and customs of the Oromo society. Therefore, following *Waaqa*’s directives about how to treat plants, animals and other creatures entails an important source of an environmental ethic that could be useful in protecting the environment today among the Oromo.

In the next sub-section, I show how, according to Kelbessa, observing the *Qaalluu* institution also constitutes an important source of environmental ethics among the Oromo.

3.3.2.2 The *Qaalluu* institution

According to Kelbessa (2011:84), the *Qaalluu* are the religious leaders of the Oromo society. The *Qaalluu* institution comprises religious leaders who are the custodians of all the institutions of the Oromo. The *Qaalluu* leaders bestow blessings because of their closeness to *Waaqa*. They are seniors in ritual activities. They also arbitrate in cases of conflicting clans. According to Kelbessa, the *Qaalluu* follow a strict code of conduct. They are not allowed to curse, but only bless. They do not kill any living thing. Kelbessa sees the *Qaalluu* institution as having had a positive impact on the environment. He, for example, says that the taboo that forbids the *Qaalluu* leaders to eat the meat of certain wild animals enhances the preservation of wild animal species (Kelbessa, 2011:85). Kelbessa also says that some individuals in the Oromo society have tried to

associate with the *Qaalluu* leaders by performing similar practices such as avoiding the killing of living things and eating certain wild animals (Kelbessa, 2011:84-85). This, according to Kelbessa, has fostered an environmental ethic among the Oromo. However, Kelbessa on the other hand contends that “today, it is hardly possible to find elders, leave alone, the *Qaalluu* leaders who are knowledgeable about the *Qaalluu* institution”. He blames the regime of Haile Selassie and also Christianity and Islam for ‘killing’ the *Qaalluu* institution or the Oromo religion in general (Kelbessa, 2011). Haile Selassie’s regime has been blamed, for example, for their villagisation and resettlement policy, and also relocation of people from Wollo to Illuabera (Kelbessa, 2011:63). The result was that resettled people destroyed sacred trees and forests without fear because many of them did not share the beliefs and practices of their hosts. Some of the policies of the then government of Ethiopia therefore contributed to the “killing” of some of the important traditional institutions of the Oromo.

For Kelbessa, the *Qaalluu* institution and the *Qaalluu* leaders are nevertheless quite important as they are the custodians of the beliefs and practices of the Oromo, some of which are quite environmentally friendly. That is why Kelbessa argues that these traditional institutions should be rehabilitated in one way or another as evidenced in the words in the title of his major work, *The Rehabilitation of Indigenous African Environmental Ethics*, published in 2011.

In the following section, I show how, according to Kelbessa, certain specific beliefs and practices of the Oromo concerning animals and trees amount to an environmental ethic.

3.3.2.3 Animals and trees

Workineh Kelbessa also uses the traditional beliefs and practices of the Oromo with regard to animals and trees to argue for the presence of an indigenous environmental ethics that helped to protect these aspects of nature in this society. I begin with a discussion of his observations about the Oromo's view of and practices around animals and then proceed to a discussion of the same regarding trees.

With regard to animals, Kelbessa argues that the Oromo's traditional religion forces peasant farmers to respect animals. He says that animals found in sacred places were not killed. However, these animals could be killed in places that were not destined as sacred (see Kelbessa, 2011:113). Furthermore, he observes that, in the Oromo belief system, animals such as a dappled

gazelle with a blaze on its forehead, a small white gazelle, animals with one horn, animals which have tufts on their backs and those with hairs on their head could not be killed because they are religious animals. Others that were not killed, according to Kelbessa, include animals with abnormal colour, the colobus monkey, and *canaa* and *arataa* who have no English names. The result was that these animal species were conserved.

Kelbessa furthermore indicates that the Oromo practice some kind of totemism, with some clans considering certain types of animals as their relatives and thus according such animals a special respect. The lion, for example, is said to be a totem for the people of Soboka, of Gadhafa lineage. The people of this clan belong to the family of lions and are called *Aboosaree*. The clan performs rituals and offer sacrifices in respect of their totem, the lion, who they expect to reciprocate by not attacking the people or their animals. However, it must be noted here that the people of this clan make sacrifices of other animals in honour of their totem animal, the lion. This is to say animals are sacrificed in honour of other animals. In clans such as the Gona and Sabbo, the people revere boffa-snakes and puff adders as their respective symbols. These people usually sacrifice a domestic animal and give tallow and butter to the snakes. They revere the snakes as their relatives and the snakes, in turn, do not bite them (see Kelbessa, 2011:114). Kelbessa concludes that “the ethically constrained relations of the Oromo with some animals go beyond purely selfish motives or practical needs and fear of retribution” (2011:115). He further says that the beliefs and practices of the Oromo concerning animals show that they recognise the inherent value of animal species. He thus declares that “Oromo indigenous wildlife management if carefully revived, can promote diversity of species which is in turn essential to maintain biological stability and diversity” (2011:116).

However, some people have pointed out that only certain species of animals were considered sacred and thus preserved, leaving other species free for wanton exploitation in many traditional societies (Taringa, 2006; Burnett & Wa Kang’Ethe, 1994). Taringa (2006) says that, if continued for long enough, these practices of favouring certain species of animals and not others could create some ecological imbalances leading to an abundance of certain species while others go extinct. Further, Burnett and Wa Kang’Ethe observe that “[I]n traditional African societies, when certain animals appeared at the homestead they were tolerated, if not encouraged. ... In the field, they could be killed as readily as any other animals” (1994:157). This means that traditional

African attitudes towards animals were somehow discriminative. That is, beliefs and practices did not guarantee protection of all species of animals, which is contrary to what environmental ethics, and environmentalism in general, advocates.

The same may be said of the custom of totemism. For example, a certain animal may be a totem animal to one clan or an individual person, and a normal animal to another (see Kelbessa, 2011:114). So, while one clan would protect certain species of animals, other clans could exploit them without caring whether they were a totem or not. This is because any one clan or tribe in Africa is not obliged to follow the beliefs and practices of another clan or tribe unless one happens to be in another clan's territory (Bourdillon, 1993). Furthermore, one may argue that the practice of totemism is only found in some clans or ethnic groups, while that custom does not exist in many other African societies.

With regard to trees/forests/vegetation, Kelbessa argues that trees have a special value in the Oromo society because they are associated with *Waaqa* (God). Oromo religious and cultural ceremonies are performed under sacred trees or in groves. Some trees such as the *qolloo* or the *Abdaarii* are believed to be sacred and powerful spirits are believed to dwell in them. There also is a practice of performing prayers and rituals around permanent rivers, big mountains, hills and trees. According to Kelbessa, *qolloo* trees such as *hoomii*, *qilxuu* and *waddeessa*, for example, are well protected by the Oromo because they are places of prayer and they are also believed to be supernatural. These natural objects are revered and respected by the Oromo. Kelbessa contends, however, that "the Oromo are not worshipping the material symbols but the spirits of the symbols represented by the trees" (2011:83). This is an important observation because, as I show later, the trees and other natural objects are not protected because people recognise their ecological value but because they aim at appeasing the ancestral spirits that are believed to reside in those natural objects.

Some other special trees such as the *jiila* or the *korma korbessaa* are identified as places for sacrifice of a bull and a male goat. Sacred or holy trees can never be felled until special rituals and sacrifices are performed. Other extraordinarily big trees such as the red *Qilxuu* (Sycamore) are also respected because they are used for shade for humans and animals. They are not felled anyhow. The Oromo also have a tradition of giving the names of big trees to their children and clan. Names of trees such as *Dambii*, *Dhiqa*, *Fulleli*, *Garse*, and *Harooressa* may be given to

children and clans. These trees thus are protected and cannot be cut without the permission of the clan head. According to Kelbessa, the Oromo believe that cutting sacred trees annoys the spirits and may cause death. Chopping down trees among the Oromo is regulated by *Saffuu*, a traditional code of laws and conduct expected to be adhered to by the Oromo. According to Kelbessa, *Saffuu* imposes a system of ecological checks and balances.

Kelbessa thus concludes that the Oromo traditional beliefs and practices with regard to trees and animals correspond more with what environmental ethicists advocate today than the western traditions (modernity) that see trees and forests as purely valuable as economic objects. He claims that the Oromo admire forests and trees and even some animals aesthetically and thus protect some of these creatures on the grounds of their religious, recreational and aesthetic significance (see Kelbessa, 2011:127). So, according to Kelbessa, the traditional attitudes towards trees, forests and animals among the Oromo should be carefully examined and be revived and promoted as they have the potential of protecting the environment.

The following is a look at the role of the belief in ancestors as an important anchor in Kelbessa's formulation of indigenous African environmental ethics. In particular, I show the link between the belief in ancestors and the protection of some aspects of nature such as trees, animals and sacred groves/places and the role of these beliefs in contemporary Africa.

3.3.2.4 The role of ancestors

Ancestors also play a key role in Kelbessa's articulation of African indigenous environmental ethics. Kelbessa's articulation of African environmental ethics presupposes a strong belief in ancestors. The respect accorded to various aspects of nature such as totem animals, sacred trees and holy places are directly related to veneration of ancestors. African environmental ethics as currently articulated by Kelbessa and Murove therefore cannot stand without a strong belief in ancestors. This belief is seen as the pillar of African religions and worldviews and their corresponding practices (Mbiti, 1990; Stinton, 2004). This is because ancestors are seen as the guardians of the moral and social order of the community. The ancestors are seen as "moral paragons". In other words, observation of the ways of the ancestors and their prohibitions is seen as important in maintaining peace and harmony with the cosmic order (i.e., among human beings, and between human beings and nonhuman entities). Commenting on the indispensability of the belief in ancestors in African morality, Awolalu and Dopamu (1979:27) write:

Belief in ancestors supplies sanction for public morality. They are the guardians of traditional morality. They, therefore, demand a high sense of respect for the traditional law and custom. The living must live as they have lived. It is believed that just as the living parents have power to punish disobedience in the youth or dereliction of filial duties so also the neglected or offended ancestors can punish their offspring for moral offences, and they can bring disaster upon the whole family.

Further, highlighting the importance of the belief in ancestors in African ethics, Benezet Bujo and Felix Murove argue that anamnestic solidarity between the living and the ancestors provides the basis for an African ethics. Bujo & Murove (2009: 319) thus writes:

African ethics are articulated in the framework of anamnesis, which involves remembering one's ancestors. ... Ethical behaviour in the Black African context always involves re-establishing the presence of one's ancestors; for one who takes anamnesis seriously is challenged to confront the ethical rules drawn by the ancestors

In extension, belief in ancestors is seen to be critical in facilitating the protection of the natural environment because the natural environment is the medium for communication with the ancestral spirits, and it is also the home of ancestral spirits and gods.

Supporting the appeal to ancestors in articulating African environmental ethics, Kevin Behrens (2012) claims that the belief in ancestors is still relevant to Africans and that these beliefs can provide us with a basis for protecting the environment as our moral obligation towards the future generations. Behrens (2012:181) thus writes:

When considering the obligations to future generations in African thought a key factor is the pervasive belief that the ancestors continue to exert an influence over the lives of their living descendants, guiding their behaviour, and even punishing and rewarding them. These beliefs still play an important role in African life, across all strata of society.

So, when some defenders of African environmental ethics refer to the role of ancestors in protecting the environment, they not only refer to the distant pre-colonial past, but actually mean that, even today, we can appeal to the ancestors in our quest to protect the African environment.

However, some scholars point out that too much attention to and fear of ancestors has crippled the African person in terms of being creative and autonomous, and this cannot help to address the challenges that face Africa today (see Wiredu, 1980; and Gyeke, 1997). This is why Gyeke (1997: 168) counsels rather poignantly that:

The post-colonial problems of Africa clearly show that the [belief in] ancestors can no longer be helpful. The greatest reverence we, the descendants of the ancestors, can show to them is to let them rest in peace.

For his part, Wiredu goes further in discouraging undue attention paid to the ancestors by claiming that the belief in “ancestral spirits and in many other traditional African institutions and cultural practices are based on superstition” (Wiredu, 1980). By superstition, Wiredu means, “... a rationally unsupported belief in entities of any sort” (Wiredu, 1980:41).²³ Wiredu says that even some western philosophers could be said to have held superstitious beliefs, for example, Plato’s world of forms and Kant’s noumenal world are equally superstitious because they are beliefs that cannot be verified. They are believed only to satisfy imagination. So, there should be no offence in saying that some traditional African beliefs and practices were based on superstition; in fact, this type of superstition has been a common phenomenon in almost all primal/tribal or pre-industrial societies throughout the world.

3.3.3 Conclusion

In this section, I have been presenting Kelbessa’s version of African environmental ethics. I showed that the belief in a Supreme Being (*Waaqa*); the belief in the *Qaalluu* institution (‘a council’ of senior elders and traditional religious leaders); the taboos and totemic beliefs about trees and animals; and the belief in the supernatural power of ancestors with the corresponding cultural and ritual practices properly articulated constitute an environmental ethics. I argued that, although Kelbessa’s approach is not too theoretical because he focuses on concrete traditional practices and beliefs of the Oromo that are favourable to the environment, his overemphasis or reliance on traditional institutions and governance structures which are actually not functional today, renders the practical import of his approach in the current African context questionable.

The way I see it, Kelbessa has been doing two things. The first one is to show (which he does successfully, at least at the theoretical level just like Murove) that traditional African beliefs and cultural practices could be an important source of an environmental ethics and that it is not correct to claim that African thought and philosophy has nothing to offer to the theoretical

²³It must be noted here that, for Wiredu, the belief in abstract entities among western philosophers, content wise, could be considered just as superstitious as the African beliefs in ancestral spirits; what makes western beliefs or ‘philosophies’ less superstitious is only that their proponents provide reasoned arguments for their beliefs, unlike their African counterparts in traditional African societies (Wiredu, 1980).

debates on environmental ethics. The second thing that Kelbessa does is to go a step further and show the practical relevance of his approach to environmental ethics. He does this by arguing that we can appeal to traditional African beliefs and cultural practices to actually protect the environment today. This is where questions arise as to the practicality and relevance of traditional African beliefs and institutions in addressing our current environmental problems. Some scholars have in fact questioned the “environmentalness” of the indigenous African thought or philosophy, doubting whether indigenous African environmental ethics is an environmental ethics at all. That is why I join those who say that indigenous traditional environmental ethics was not a self-conscious or deliberate environmental ethics. The question following from this, a question also acknowledged by Kelbessa, is: Could this latent indigenous environmental ethics be made a self-conscious or deliberate environmental ethics? And if so, how? As I indicate later, the answer to this question is that it may be difficult to do that, unless we change the way we think of environmental ethics, especially in relation to Africa. But before I do that I consider some of the important criticisms regarding indigenous African environmental ethics.

3.4 Some general criticisms on indigenous African environmental ethics

Before I present these criticisms, I must point out that Murove’s and Kelbessa’s work on African environmental ethics could be said to be ground-breaking. I say this because they managed to bring African perspectives to international environmental ethics in a way that not many people had attempted to do before. Their works are now becoming points of reference for many of those writing on African environmental ethics or environmental ethics from African perspectives. They succeeded to dispel the notion that African thought has nothing to contribute to the current discourse on African environmental ethics for the first time. Because of their works, which have now found their way into renowned international environmental ethics journals such as *Environmental Ethics* and *Environmental Values* and other International journals, the earlier complaints that African perspectives had been sidelined on the international stage of environmental ethics are no longer relevant.

However, as I have been arguing throughout this chapter, Murove and Kelbessa only succeeded at the theoretical level. They succeeded in contributing insights from African thought and worldviews to theoretical environmental ethics, but when it comes to the practical usefulness,

and especially as a guide for taking action, these approaches are found wanting. In fact, what Murove and Kelbessa have been doing is not very different from what mainstream environmental ethicists have been doing, namely to establish an overarching theoretical approach to environmental ethics that could be used as a guideline to address the environmental crisis around the globe. The only difference is that, in their case, Murove and Kelbessa are doing that from an African perspective. As I showed in Chapter 2, though, foundationalist deductive approaches to environmental ethics have also not borne the expected fruits, especially at the practical policy level from a philosophical pragmatists' point of view.

A number of other criticisms (apart from the one just mentioned above) have been raised in connection with Murove's and Kelbessa's approaches and indigenous African environmental ethics in general. The first one concerns whether the philosophy of *Ubuntu/Ukama* and its associated values such as communality and sociality of Africans really do support an environmental ethics; the second one entails questions regarding the "environmentalness" of the indigenous African beliefs and practices, in other words, this criticism is based on the question whether what is presented as indigenous African environmental ethics is really an environmental ethic. The third criticism is based on the problem of misinterpretation of traditions, and the last one that I would like to discuss is based on the problem of discordance between belief/ideology and practice/environmental behaviour. I now consider one criticism after the other.

3.4.1 On *Ubuntu* and *Ukama* as sources of African environmental ethics

One of the criticisms that have been advanced against the philosophy of *Ubuntu* and *Ukama* as founding concepts of an African environmental ethic includes the argument by a South African scholar and animal rights activist, Kai Horsthemke, that:

Suggestions that *Ubuntu* requires respect for the environment are fundamentally flawed, since *Ubuntu* is anthropocentric by definition. Thus any attempt to expand *Ubuntu* to embrace respect for environment would have to ground concern for nature in terms of its usefulness to humans. (Horsthemke, n.d.:5-6)

This criticism has been countered by the argument that *Ubuntu*, in essence, is a concrete expression of *Ukama*, and *Ukama* logically implies relatedness with the physical world (Murove, 2009). It has also been noted that the African values of *Ubuntu* and *Ukama* should not be reduced to the category of anthropocentric and non-anthropocentric distinction (Le Grange, 2012). This is because, it has been argued, "the self, the community and nature are inextricably

bound up with one another ... [as such] nurturing the self or caring for other human beings is not antagonistic towards caring for other non-human nature” (Grange, 2012:335).

Other scholars such as Enslin and Horsthemke (2005) see a contradiction or an inherent weakness in the principle of *Ubuntu and Ukama*. Thus they observe that *Ubuntu/Ukama* is contradicted by the many ills, such as corruption, dictatorships and autocratic rule, xenophobia and environmental degradation that are rampant on the continent of Africa (Enslin &Horsthemke, 2005:67). They are asking, in other words: Where is humanness (*Ubuntu*) amidst all these ills. A further pertinent question that they pose is: has *Ubuntu* helped to protect the African environment in anyway? The answer seems to be negative. Many advocates of African environmental ethics (see, for example, Tangwa, 2004; Ramose, 2009; Chemhuru &Masaka, 2010; Kelbessa, 2011; Ikuenobe, 2014) usually put the blame on colonialism and its effects such as capitalism, and foreign religions as the reason for the killing of the spirit of *Ubuntu* and hence the consequent ills mentioned above, coupled with the despoliation of the African environments. However, other scholars have shown that even before the advent of colonialism, some African traditional practices were not as environmentally friendly as it is claimed and that Africans degraded their environments even in pre-colonial times (see, for example, Wiredu, 1994: Ongugbemi, 1996; Adams &McShane, 1996). I expound on this a little later.

Further, Mamphela Ramphele, commenting on these celebrated notions of *Ubuntu/Ukama* among Southern African scholars, Ramphele (1995: 15) thus cautions:

Ubuntu is not unique. It is conceptually and practically associated with a long and profound tradition of humanist concern, caring and compassion also prominent in western thought. We have to have the humility to acknowledge that we are not inventing unique problems in this country, nor are we likely to invent entirely new solutions.

Moreover, the concept of *Ubuntu* and its related values such as communality, sociality and humanness are viewed as exaggerations of the reality of Africa and the African person. Thus, Nyasani (2010:84) observes:

... it cannot anymore be difficult to detect the fact that Africa’s sociality, mutual compassion and tolerance may after all be nothing more than sweet, misplaced and hastily fabricated concepts supposedly ascribed to Africans either to please them or simply to remind them that they are racially distinct and different from the mainstream mankind. ... Africans, like all human beings

anywhere, are also ruled and governed by the ordinary animal instinct of self-preservation, self-regard, selfishness and self-survival first and foremost.

According to Nyasani, therefore, there is nothing extraordinary about *Ubuntu* and communal living in traditional African societies because they just could not help but live that kind of life. Circumstances of the time dictated it and these values are not unique to Africa. Elaborating further on this, Nyasani (*ibid.*) avers that “the philosophy of sociality or communality was always fostered and nurtured more by the ubiquitous physical dangers and the inability of man to manage and safeguard his own fate single-handedly and without resorting to the corporate or communal intervention”. This observation has been claimed to be true in Africa as it has been in all traditional rural or tribal cultures all over the world (see, for example, Wiredu, 1980).

Gaspar Schweigman, a critic of Nyerere’s socialist experiment in Tanzania, particularly the *villagization* project,²⁴ corroborates the above claim by noting:

Under very specific environmental, social, political and economic conditions [where] people are isolated and no formal systems of security exist, it is not surprising that people have to rely on the family or neighbourhoods for social security. Solidarity between people exists, not because they are African, but because they live in very specific conditions. If conditions change, the characteristics of human behaviour may change as well. (Schweigman, 2001: 120).

Schweigman further claims that this sense of *Ubuntu* and *Ukama* or community and solidarity among Africans existed, and exists even today in some societies, only mainly among close relatives within a family or extended family, and not between different households of families in a village, or with other villages or clans (Schweigman, 2001).

Sogolo (1990) makes more or less the same observation when he observes that it was this feeling of *Ubuntu* or family-hood or closeness among those who were related by blood, and not a feeling for the human race that made African communalism work in traditional Africa. He furthermore claims that this feeling of family or closeness among members of the same family or clan became possible because “people worked all their lives in the same locale and among the same close relatives” (Sogolo, 1990:167). It has been said therefore that these societies changed through the introduction of a money economy, urbanisation, intermarriages and population

²⁴ For a detailed treatment of the socialist experiment in Tanzania, and in particular the impact of the villagization policy on the environment, see, Hyden, 1980; Legum, 1988; Havnevik, 1993; Kikula, 1997.

increase. Life became more complex and heterogeneous (multicultural), and the importance and necessity of communal living and hence *Ubuntu* diminished (Sogolo, 1990; Bourdillon, 1993).

Wiredu (1980:29), for his part, says that the “traditional codes of conduct [including the communitarian ethos] evolved in the context of less complex societies, in which extensive family and neighbourhood connections facilitated the development of a sense of communal fellowship and responsibility. ... A milieu which is no more”. Thus it has been observed that although certain values, practices and belief systems have been known to work perfectly well in traditional Africa, it does not necessarily mean that they can be applicable to contemporary Africa (Nyasani, 2010).

In an article in a newspaper, Thabelsi Hoeane warns rather poignantly that:

Shrouding our problems in romantic idealism wastes much-needed energy on controversial concepts like "Ubuntu", the affirmation of humanity that is supposedly a panacea for Africa's problems. In reality, it reflects only a developmental stage of human society under communalism. (Hoeane, 2003)

The spirit of *Ubuntu* and *Ukama* which facilitated communal living among close relatives in traditional Africa is said to be motivated by the universal goals of wellbeing that every human aspires for, rather than being a unique African trait. Thus Schweigman (2001:120) maintains:

If there are basic unchangeable features at the root of a society ... such as universal goals of physical wellbeing and social wellbeing ..., then they are not specifically African but human. All other characteristics such as solidarity, humanness and sense of community are the results of these universal goals.

To substantiate the claims that communal living was not a specifically African phenomenon, Wiredu (1994) observes that even agrarian societies in medieval and ancient rural Europe exhibited a sense of *Ubuntu* or a communal mode of living akin to the African one. Charles Dundas emphasises the same point when he observes:

A history of primitive England might run much the same course [as African history], and we should peruse it with interest. But what we cannot reconstruct from our own remote past we may see a reflection of in the lives and histories of other peoples whose days of primitive existence are not so remote. (Dundas, 1968:106)

To conclude, the criticisms above caution us on two basic points. The first one is to remind us that what we consider to be a uniquely African way of doing things or African values is not

unique to Africa as such. Values such as *Ubuntu* and communality are common to all pre-industrial societies. If they did not help, strictly speaking, to protect the environment then, why should they do so today? So, we should not be too optimistic about these ideas giving us something new to address our current environmental problems. The challenge we face today in Africa is, in part, rather to understand how changed circumstances and contemporary social-political-economic trends put pressure on communities and the livelihoods of families in rural and urban areas alike, thereby fundamentally influencing their interactions with, and relatedness to their immediate environments.

The second point is that the presence of *Ubuntu/Ukama* in our traditional societies did not help to salvage the environment as is usually claimed. That is, the “environmentalness” or the broader ecological import of *Ubuntu/Ukama* and other traditional African beliefs and practices as an environmental ethics are questionable. Below, I present the second category in which criticisms of indigenous African environmental ethics is based, namely, the “environmentalness” of the traditional beliefs and practices.

3.4.2 The “environmentalness” of traditional African beliefs and practices

I show, below, that some scholars question the extent to which traditional/indigenous African beliefs and practices or worldviews constitute an environmental ethics at all. Alternatively, they question the extent to which traditional African beliefs and practices actually lead to an environmental ethics. They question the environmental consciousness of traditional African societies. They question the extent to which the pre-colonial African societies’ ways of life were environmentally benign; and whether their religious beliefs and cultural practices engendered an ecological awareness among these societies that, in turn, led them to co-exist in peace and harmony with nature, as is being claimed.

These scholars question claims such as those made by Kelbessa who writes that “the Oromo of Ethiopia maintain perfect balance between nature and culture and that religious attitudes, values and practices force peasant farmers to revere nature and natural places” (Kelbessa, 2011:26). They also question the practicality of the calls that are being made to rehabilitate the indigenous environmental ethics in Africa based on the traditional religious beliefs and practices of the African ethnic groups as in the example of the Oromo of Ethiopia (Kelbessa, 2005; 2011). Some scholars likewise question Murove’s assumption that the loss of *Ubuntu* and *Ukama* among

Africans is the reason for the current environmental problems in Africa and that these values need to be restored (Murove, 2009; Ramose, 2009). Let me now present those cautions one after another.

It has been pointed out that, although traditional religious beliefs, attitudes and cultural practices had some environmental benefits, they were nonetheless not environmentally motivated in the first place (Adams & McShane, 1996; Kretch III, 1999; Lowe & Paavola, 2005). Thus we are cautioned not to assume that indigenous or traditional societies treaded lightly on the earth, and that they were some sort of ‘ecological saints’. It has been claimed therefore that indigenous or traditional societies all over the world altered the environment, even beyond its capacity to regenerate, so as to meet their needs of the time (Adams & McShane, 1996). In *The Ecological Indian*, Kretch III (1999: 98), for example, argues:

The Industrial Revolution far outpaced what came before and left unprecedented demographic, technological, and environmental changes in its wake. In recent years that pace has sped up so greatly and the impacts have become so extensive that we tend to forget that pre-industrial societies also had environmental effects, and their success in living within a region’s capacity might have had more to do with accident than design. As David Lowenthal, a cultural geographer remarked, “the acceleration of environmental transformations blinds us to their antiquity”.

In what could have been a response to the claims made by Kelbessa and other advocates of indigenous African environmental ethics that the Oromo (African) traditional religion and worldview made people co-exist in perfect balance and harmony with nature, in the *Myth of Wild Africa*, Adams & McShane (1996: 34) likewise contend:

It is tempting, in fact, to romanticize Africans as living in complete harmony with their environment, and enforcing cultural sanctions to prevent the overuse of natural resources. But such an attitude – reminiscent of the “noble savage” living in a state of nature – goes too far. Rural Africans like any people dependent on their immediate environment for their survival, alter the environment to meet their needs.

It has also been claimed that there is evidence to the effect that humans, “since the times of hunters and gatherers, caused extinctions of large mammals and widespread changes in various parts of the world, Africa included” (Lowe & Paavola, 2005:5).

Further, Soper (2005: 54) argued:

... It would be a mistake and anachronistic to suppose that pre-modern culture was greener or more ecologically concerned in any contemporary sense with the protection and conservation of

the environment. ... Even if we find any evidence of particular individuals or groups expressing ecological ideas that chime with those of environmentalists today we need to be wary of imputing those to their culture at large. These societies were certainly less damaging environmentally (largely by reason of their less developed technological capacities).

Harris (1995:181) likewise cautions that it is an “anachronism” to claim that pre-modern societies were ecologically benign and aware in the modern sense. Philip W. Sutton, a sociologist, puts it more blatantly as he writes:

The idea that people in the previous types of societies lived bucolic lives in happy harmony with their natural environment is patently false and bears more than a passing resemblance to the biblical story of the human species’ fall from grace. Such a view leads to the equally misleading idea that the modern industrial societies are artificial constructions by comparison. The danger of this line of thinking is that it might lead us to believe that a return to some previous type of social organization would solve all our environmental problems (Sutton, 2007:70).

This caution serves to call into question the belief among some environmentalists that there existed an eco-golden age of peaceful co-existence between humans and nature that current people need to emulate.

It is noted also that, while it is true that traditional African societies developed some quite effective indigenous knowledge on how to manage their environment and resources that we might envy today, this again cannot be attributed to their having an environmental awareness or ethic. To support the notion that traditional ecological knowledge should not be idealised, R. E. Johanness gives a specific example of the Pacific Islanders as he says:

... Although [their] marine environmental knowledge and practices can be exceptionally valuable, this is only to be expected of people who have depended so heavily for centuries on their marine resources. Moreover, Islanders are not, and never were paragons of environmental wisdom and virtue (Johanness, 2003:111).

According to Johanness, many indigenous peoples have a bad environmental record just like many other cultures around the world, the difference being only in their technological capacities with which to exploit nature; meaning that low technological endowment implies low impact on nature.

It is true, of course, that some beliefs and practices and the worldview of the traditional Africans in general had some ecological or environmental benefits. However, the ostensible beneficial impact of some of the African traditional beliefs and practices regarding the environment were an “unintended by-product of an institution designed for other purposes”, and not for conserving

nature as such (Adams & McShane, 1996: 102). This implies that their effects on nature conservation happened only as “a consequence rather than an objective” (Kideghesho, 2009). The main purpose of these beliefs and practices, as has been pointed out, was to maintain a harmonious relationship between human beings and the ancestral world which was believed to be essential for the day-to-day welfare of communities. So, the purpose of these beliefs and practices was more sociological than environmental (see, for example, Wiredu, 1994; Taringa, 2006; Momen, 2009).

Now, I give all of the many quotations above as an emphasis to caution against the emerging body of literature in African environmental ethics that tends to uncritically glorify the pre-colonial African values and beliefs in relation to the natural environment. All of these cautions and criticisms serve to show that traditional African values, beliefs and practices cannot be a panacea for our environmental problems as it is assumed. They further give support to the argument that holding environmentally favourable ideologies and philosophies does not necessarily translate into environmental awareness and behaviour. It is my argument therefore that, to protect our African environments, we need to look seriously into the actual beliefs and practices of people today and build from there, rather than rely on some *a priori* approach that seems to result in ideas that are not applicable in addressing our current environmental concerns.

As Momen (2009:356) points out, “seeing nature as organic and spiritual and seeing humans holistically interconnected with nature can at times be a Western interpolated interpretation of African Religion and worldviews”. In the following sub-section, I justify this claim by considering, in some detail, the problem of misinterpretation of traditions as another thing that may pose difficulties when talking about traditional African environmental ethics.

3.4.3 The problem of misinterpretation of traditions

Scholars like Guha (1989), Harris (1995), Sinha, Gururani and Greenberg (1997) and Tomalin (2002) argue that traditional/indigenous cultures are misread and misinterpreted in most instances, sometimes on purpose to support environmentalists’ goals. According to these scholars, however, this may not provide a sustainable solution to the current environmental crisis, especially in developing countries. Harris (1995: 181), quoting Huber, warns, for example, that “we should, as scholars, be careful not to distort the historical and ethnographic record of those [pre-modern] societies in order to strengthen our case”. As such, this warning is applicable

to both western environmental ethics and most efforts to construct an indigenous African environmental ethics in so far as they appeal to the beliefs and practices of traditional societies. I showed earlier in Chapter 2 that western environmentalists usually picture the indigenous or traditional societies and their ways of life as being environmentally benign, and thus they urge western societies and others to emulate the non-western environmental values. Most African scholars writing on environmental ethics have also been caught in the same trap; the trap of romanticising the beliefs and practices of traditional societies with regard to the environment.

Expanding on the foregoing caution, Tomalin (2002:15) sees the assumption that pre-modern people were ecologically benign or aware as simply an *interpretation of tradition*. He argues that this leads to the distortion of the original meaning and purpose of certain beliefs and practices in a culture. Interpretation of tradition, Tomalin argues, is about giving meanings to certain beliefs and practices to satisfy a certain cause. This has also been referred to as “mining the traditions for what you want from it” (Kaza, 2006:201). *Traditional interpretation*, on the contrary, usually maintains or preserves the original meanings and purpose of certain beliefs and practices in a culture (Tomalin, 2002). Tomalin and others thus point out that most western environmentalists have been giving an interpretation of the traditions of indigenous or traditional societies’ worldviews, and hence, attributing to these traditional societies an environmental consciousness or an ethic that is/was actually not there. The same applies to the growing African environmental discourse that idealises or glorifies the past (Adams & McShane, 1996; Tomalin, 2002; Taringa, 2006).

Further, according to Johanness (2003), the interpretation of traditions in most cases amounts to a selective reading of the evidence or selective use of information by picking only what supports one’s cause and disregarding all evidence to the contrary. According to Johanness (2003:110), this is some form of “intellectual dishonesty”. The following is a good example of a misinterpretation of traditions to fit the environmentalist cause.

In one of his works, Baird Callicott wrongly claimed that the Chipko²⁵ Movement depicts “the foundational ideas in Hindu Philosophy” (see Callicott 1997:218), in the sense that it is the

²⁵ The Chipko or Hug the Tree Movement was a peasant movement against deforestation on the Himalayan foothills. This movement resisted the unsustainable demand for timber placed on their land by the growing cities and industry (see Guha, 1989; also Guha & Martinez-Alier, 1997).

ecological orientation in Hindu Philosophy or religion that led people to protest against the butchering of trees by hugging (*Chipko*) them. And thus, the Chipko Movement has wrongly been viewed as “a popular initiative to repudiate modernity and recover tradition” (Sinha, *et al.*, 1997:67). To the contrary, Sinha (1997) argues that the movement, is basically “a fight for basic subsistence that has been denied to them by institutions and policies of the state” and not otherwise. It can be concluded therefore that the Chipko Movement carries with it pragmatic and symbolic motives more than philosophical and religious motives.

Another problem that may result from misinterpreting traditions and cultures, or interpreting non-western beliefs and practices within the western conception of environmentalism and environmental ethics, is that it may result in ideas that are completely strange or alien to the receiving culture. According to Kalland (2000: 327):

The interpretations of non-western cultures in western environmentalists’ lenses has produced environmentalist and animal rights discourses which are quite alien to the donor cosmologies. Not only has animal rights discourse—and to a lesser extent the environmentalist discourse—turned respect for game animals into ‘intrinsic value’, but also their missionary zeal stands in sharp contrast to the contextual approaches of many local peoples. Ironically, then, the environmentalist and animal rights discourses at times pose a threat to the life-styles of local people who depend on the utilization of animal resources.

The foregoing argument implies that the respect some traditional people showed for game animals, for example, is very different from the kind of respect that is being advocated today by environmentalists. Confusing the two, therefore, might result in an environmental ethics that is foreign to the people concerned, and which may be unlikely to have the persuasive power needed to influence a change of attitude with regard to nature protection among the local people. Thus it seems that imposing interpretations on traditions and cultures to fit environmentalists’ goals might not help to address current environmental problems because, after all, the beliefs and values and customs inherent in these traditions and cultures did not, strictly speaking, prevent people from degrading the environment in the past. The reason is simple: these beliefs and practices were not intended to protect nature. That is why Wiredu (1994:36) correctly maintains that, “Historically, neither conventional morality nor even an ethic of reverence for nature ... has proved to be a panacea for environmental degradation”.

All the above reservations again point to the need for articulating a down-to-earth environmental ethics relevant to contemporary Africa while avoiding being too romantic about the environmental merits of traditional African worldviews. The problem of putting too much faith in the traditional African beliefs and practices as a panacea for our current environmental problems may have also arisen from confusing ideology and practice. This criticism alludes to what may be called the discordance between ideology/belief and practice, which I discuss in the following section, while reiterating my earlier argument that holding a particular favourable philosophy about nature does not automatically lead to favourable environmental behaviour.

3.4.4 Discordance between ideology/belief and practice

To expound on the claim that there often is discordance in beliefs about nature firmly held by people (their worldview or ideology) and their actual environmental behaviour (their actual environmental ethic), I begin by giving the following specific examples from Oriental traditions which show that “nature worship” does not necessarily lead to the protection of nature; or put differently, that treating some aspects of nature as sacred among Oriental cultures did not automatically translate into environmental behaviour among the adherents of that culture. Bryan Norton, for example, points out that Hindus took care not to kill insects and other creatures, and that this behaviour thus seemed as if it was motivated by an environmental awareness, i.e. that the Hindu recognised the intrinsic value of the insects. However, according to Norton (1984), as quoted in Kalof and Satterfield (2005:84), “The Hindus and Jains, in proscribing the killing of insects, etc., show concern for their own spiritual development rather than for the actual lives of those insects”. Now, this is not an environmental ethic in the strict sense of the term (of holding a view that is aimed explicitly and directly towards protection of the insects), although, in the process, certain insect species are saved as a consequence of a belief held about the spiritual development of human beings.

Another example is that of the sacred river in India called the Ganges. It was assumed by some environmentalists that, since the Ganges was considered sacred, people would treat it with reverence and avoid acts that may pollute it. As Tomalin (2002:25) to the contrary observes, “the belief in the sacredness of goddess Ganga actually seemed to lead people to the conclusion that she could look after herself, that there was nothing they could do to either enhance or sully her ritual purity”. Research among the *pandas* (pilgrim priests) along the banks of river Ganges

showed that they were not concerned with the physical pollution of the Ganges, as such, but rather with her ritual purity (Tomalin, 2002). So, the *pandas* would not mind throwing rubbish and dirt into the river when performing religious rites at the river. This is because they were more concerned with avoiding spiritual pollution and not physical pollution. This is another instance that shows that holding some aspects of the environment as sacred did not automatically translate into nature protection or environmental consciousness, as some environmentalists seem to have assumed.

Moreover, it has been observed that, despite the long tradition of a philosophy or a worldview allegedly favourable towards the natural environment among the Chinese (say, Confucianism, Taoism and Buddhism), it did not prevent the Chinese from degrading their environment. Wiredu reveals that, despite their alleged pro-environmental culture or philosophy, “the Chinese used their technological capacity with vim to build large cities (large by modern standards as far back as [the] seventeenth century) and manufacture other amenities at a huge cost to [their] forests and land” (Wiredu, 1994:34). A recent study conducted in China further concludes that most Chinese, just like Africans and Indians, have very limited concern today for the natural environment beyond its utility for human health or economic prosperity (Harris, 2005).

As mentioned earlier, some western environmentalists did actually misinterpret indigenous people’s beliefs and practices to support their own cause. The articulations of African environmental ethics, particularly as formulated and motivated by Kelbessa and Murove, have also moved in the same direction, i.e., depicting African traditional beliefs and cultural practices as leading to an environmental awareness or ethic among the people. The problem with these interpretations is that they create a distorted or false belief that traditional Africans had some kind of a special environmental wisdom that the current generation needs to emulate. According to Ali Mazrui, this tendency of longing for a “glorious” and “pristine” past is some kind of a nostalgia, or a “cultural myth making” and “false memory” which includes inventing or “believing in a past that never was” (Mazrui, 2000:89). This tendency is prevalent among ‘Africanist’ scholars, as mentioned at the beginning of this chapter.

My argument in this regard is that many of the traditional beliefs and practices on which African environmental ethics is based were not, strictly speaking, environmentally motivated. The conservational benefits of some of these traditional beliefs and practices were only accidental, or

one may say, they were unintended consequences of something designed for other purposes. The observation of some of these beliefs and practices also led to the conservation or protection of only certain aspects of nature, leaving others open for wanton use. Taboos and the practice of totemism led to the protection of certain aspects of nature only. Now, if by an environmental ethics we mean any belief and/or practice that, consciously or not, may lead to the protection of only some aspects of the environment, then traditional African beliefs and practices constitute an environmental ethics. However, if by environmental ethics we mean looking for ways to provide a protective canopy over the whole of nature, and not just some aspects of it, then indigenous traditional African beliefs and practices (or the traditional African worldviews) do not, strictly speaking, constitute an environmental ethics. The only thing we could say about these traditional African worldviews is that they have some elements that resemble what modern environmental ethicists and environmentalists advocate, such as being close to nature, and a holistic view of the world. But, as mentioned earlier, these traditional African worldviews did not lead to an overall and explicitly held environmental consciousness or an ethic.

This means that, for the traditional African worldviews to qualify as a real environmental ethics, we shall have to find a way of making those traditional beliefs and practices, including taboos and the belief in and practice of totemism, not only protect some species of animals and trees or forests but all trees and animal species, bearing in mind the livelihoods of people directly or indirectly dependent on them. I believe this is difficult to achieve in practice, though, if not impossible; which is why I argue that now we need to shift our focus to finding an approach to environmental ethics that is capable of addressing the current environmental concerns of the people of Africa in practice instead of focusing too much on proving (in theory) the ecological worth of traditional African worldviews. So, I argue that it is high time that we reduced the talk of an African environmental ethics anchored in African metaphysics and ontology and begin to talk about an environmental ethics relevant to the current African context; let us talk of an environmental ethics approach that really does work or has practical relevance under the current African circumstances.

I think this change of focus is important because an overemphasis of African environmental ethics anchored in traditional African worldviews has the danger of making us end up with ideas that are purported to be African but finding that these ideas are actually alien to Africans

themselves. This is because traditional African worldviews, as I showed earlier, are sometimes interpreted in a manner that fits western environmentalists' framework with the result of attributing meanings to African beliefs and practices not actually originally intended in those beliefs and practices. The type of environmental ethics that results from this kind of approach can therefore be detached from the daily realities and concerns of people at times. It is my conviction, as I argued in Chapter 2, that an environmental ethic relevant to the current African context can be achieved if we adopt an enlightened approach to environmental ethics in the form of a pragmatic environmental approach.

In the following section, I attempt to show that perspectives may emerge that can help us to construct the practical environmental ethics that we require to respond in policy and in practice to the concrete environmental problems experienced in Africa by many people, including those living on the slopes of Mount Kilimanjaro, if we understand the current African worldview from a pragmatic point of view as a mixture of different worldviews functioning in a multiplicity of contexts.

3.5 Current African worldviews in a pragmatic perspective

I mentioned in the foregoing section that one important thing that we note from the different formulations of African environmental ethics, notably by Murove and Kelbessa, is an overemphasis on the traditional African thought or worldview. Yet, we find a mixture of different worldviews in contemporary Africa. That is why some scholars have questioned the tendency to conceive the African worldview in exclusively traditional terms, disregarding the changes that have taken place in Africa (Wiredu, 1980; Taringa, 2006). There has been a tendency among some scholars to describe African worldviews in terms of folk or pre-colonial African thought, disregarding the current realities in Africa (Wiredu, 1980). For example, when some scholars like Murove and Kelbessa talk of African perspectives they usually overemphasise the traditional perspectives. It has been counselled, however, that new refined cultures/worldviews emerge because values, beliefs and attitudes (a worldview) are dynamic, and continuously evolve, adapt and accommodate new values, beliefs and practices in complex ways (Field, 1967; Oladipo, 1995) and "no community should be restricted to beliefs and practices of a certain time and place" (Du Toit, 1998:15). The question is why should African environmental ethics be restricted exclusively to pre-colonial African beliefs and practices or

worldviews? Will this help to adequately capture the complexity of the current African experiences and hence help to resolve the current practical environmental problems? I think not, as I will duly demonstrate by the argument that I am developing, supported by the case study that I discuss briefly in the next chapters.

Wiredu (1980:39), for example, cautions that:

... instead of seeing the basic non-scientific characteristics of African traditional thought as typifying traditional thought in general, [most scholars] have mistakenly tended to take them as defining a peculiarly African way of thinking, with unfortunate effects.

By referring to non-scientific or pre-scientific thought, Wiredu infers the tendency of ascribing the agency of gods and spirits to natural events and phenomena (Wiredu, 1980:39). According to Wiredu, Africa finds herself in mixed worldviews from which an appropriate contemporary African worldview needs to be discerned.

This is why Wiredu highlights the urgent need to fashion African philosophies [worldviews] on the basis of the plurality and many-sidedness of the contemporary African experience because the “traditional conception of things just cannot provide an adequate basis for a contemporary African [worldview] philosophy” (Wiredu, 1980:36). Likewise, it follows that the traditional African worldviews alone cannot provide an adequate basis for an environmental ethics relevant to a diversity of multifaceted, complex and quickly changing contemporary African experiences.

Wiredu sees the many-sidedness or facets of the contemporary African worldview to be “a product of interplay between traditional modes of life, Christian and Islamic customs and ideas along with the impact of modern science, technology and industrialization” (Wiredu, 1992:35). Wiredu’s foregoing observation is supported more or less by C. W. Du Toit and Karl G. Jechoute. Du Toit (1998:15), for example, observes that Africans live simultaneously in more than one worldview. He thus maintains that, “Africa can be typified as simultaneously pre-modern, modern and post-modern. It is simultaneously pre-scientific (traditional), scientific (mainly western) and post-scientific (critical, integrating many worlds)”. Jechoute (2004:15) seems to, more or less, vindicate the multifaceted nature of the contemporary African reality when he observes, “[a] worldview that simultaneously embraces secular science, institutional religion, traditional spirituality and magic can become the perfect mental platform for understanding and enabling the human development process in all its complexity and with all its

contradictions [in Africa]”. It is in the same vein that Ali Mazrui developed the notion of a triple African heritage, which is a combination of an indigenous heritage, Eurocentric heritage and Islamic heritage (Mazrui, 1986). This implies that multiple worldviews are experienced by an African person.

The foregoing observations point to the importance of avoiding restricting or reducing the complex contemporary African experience/reality to a solely traditional framework from the past. For example, the impact of Christianity, Islam and modern education and technology on the contemporary African person should not be taken for granted. We have seen above that the articulations of African environmental ethics by Murove and Kelbessa overemphasise the traditional African worldviews while ignoring, to a great extent, influences from modern science and technology, religions like Christianity and Islam, with their sister modern education. They write as if it were possible to separate the African person from the influence of the other influences. I argue that this way of articulating environmental ethics is not likely to help to resolve the current practical environmental problems in an Africa that subscribes to multiple worldviews. Environmental ethics is about persuasion and for this persuasion to succeed, the multiple experiences of peoples in contemporary Africa should be appealed to. It is true that traditional African worldviews and cultural achievements have, for a long time, been disregarded in the global development process; however, we should not romanticise them, particularly in the search for solutions to the current complex of environmental problems in Africa. The traditional African worldviews are only one aspect of the current multiple and plural African experience. Bennaars (1993:26) argues, for example, that:

Morality in Africa today is highly complex and also highly problematic, as it attempts to cope with individual and social needs, with traditional and modern values, with religious and secular worldviews, with dogmatism and pluralism, all in one.

The above quotation further underlines my argument about the plurality or the many sidedness of the current African experience that calls for contextualist approaches to address it. So, the tendency that is evident in Kelbessa’s and Murove’s works on African environmental ethics of overemphasizing traditional African values at the expense of the reality of the current multiple and plural African experiences might overlook important aspects of the contemporary African worldviews which might be quite helpful in resolving some of our environmental problems. I do not intend to mean that the articulation of African environmental ethics on the basis of traditional

African worldviews is not important, but my argument is we should avoid romanticising the traditional African values and worldviews, and that these values and worldviews should be understood as only one aspect of the multiplicity of African experiences. So, an approach that allows room for multiple African experiences and values to manifest and evolve is indispensable in contemporary Africa. Now, in my view, since multiple worldviews and experiences imply multiple values and that all these multiple contemporary African values and experiences must be considered in any effective approach to environmental ethics, a pluralist approach to environmental ethics is inevitable. In fact, pluralism is precisely what pragmatic philosophy, and environmental pragmatism in particular, advocate. That is why I argue that a persuasive environmental ethics relevant to Africa must go beyond the experiences of the traditional African past to accommodate contemporary African values and experiences. The resulting environmental ethics must speak to the people's current daily experiences in the current setup of Africa. As I already said before, environmental pragmatism, and in particular Norton's methodology of Adaptive Management as explained in Chapter 2 is capable of providing us with practical guidance on how to resolve urgent African environmental problems as experienced on the slopes of Mount Kilimanjaro.

3.6 Summary and Conclusion

I have shown in this chapter that, generally speaking, those who advocate for an African environmental ethics usually base their arguments on traditional African religions and worldviews which are claimed to be pro-ecological. According to Kelbessa and Murove, these worldviews are said to be supported by traditional African values such as communal life, *Ubuntu* and *Ukama*, sociality, care and generosity; traditional religious beliefs and ritual practices, including reverence of spirits and gods through natural objects such as forests, mountains, trees, etc. They are also based on the practices of totemism, veneration of ancestors, observance of taboos and other ritual practices that are said to have an environmental import. All these African beliefs, values and practices are used to articulate an African environmental ethics that is taken to be an alternative to the western mainstream approaches that do not seem to speak to the African context.

I have presented and discussed the cautions that have been advanced against romanticising and idealising traditional African worldviews. I showed that some traditional beliefs and customs

were very discriminative, favouring certain aspects of nature while leaving others open for exploitation. I showed also that there is a selective reading, or even a misinterpretation of traditional beliefs and cultural practices so as to support an environmental ethics or environmentalists' cause. I argued that this might result in ideas that are alien to the receiving culture.

I have argued, furthermore, that the conservational benefits of some of the traditional African beliefs and cultural practices do not necessarily imply that these societies were environmentally or ecologically conscious, because the motives behind these practices were other than environmental. I argue that this confusion has been the source of the "romanticisation" of traditional African beliefs and cultural practices with regard to the environment, which in turn has resulted in approaches to African environmental ethics that are quite removed from the real concrete environmental concerns of the people. My argument is that environmental ethics relevant to Africa should go beyond mere theoretical reconstruction of traditional African worldviews or romanticising the traditional African past, and rather adopt approaches that can really persuade people to protect nature and address the practical environmental challenges and concerns in the current African context; a context which is a mixture of different worldviews and a multiplicity of experiences and hence supports different and sometimes opposing values.

At the best reading, Murove and Kelbessa's works are just like mainstream environmental ethics, referring to overarching metaphysical principles, or another value set of being close to nature. But can that value set of being closer to nature really be revived by going back to traditional beliefs and practices? My answer to this question would be no, because Murove's and Kelbessa's works are based on the assumption of a pristine, unspoiled, and ideal Africa, which really did not and does not exist.

Then what do we learn from Murove's and Kelbessa's approaches? They challenge us not only to take the concrete experiences of people seriously, but also to take the values that people are living by seriously. Although there are still aspects of traditional African beliefs and practices in some African societies, these beliefs and practices are not dominant any longer; their supporting structures such as chiefs and the governance and legal systems associated with chiefs have dwindled. All these make Murove's and Kelbessa's and other similar approaches to African

environmental ethics less useful when called upon to provide practical guidance on resolving practical environmental challenges.

In the following chapter, I start to examine a concrete specific case study of the people living on the slopes of Mount Kilimanjaro to illustrate how Kelbessa's and Murove's approaches to African environmental ethics fall short of adequately addressing such a context, and hence that there is a need for a more accommodating approach. The two-fold question that led me in the research for the following chapter is this: (a) What could the elements of the traditional culture of the Wachagga living on the slopes of Kilimanjaro be that, according to Kelbessa and Murove, could form the basis of an environmental ethic of the Wachagga, and (b) would this 'environmental ethic', if it could be explicated, be persuasive and effective to inspire the Wachagga to protect their environment to an extent that goes way beyond the degradation and exploitation that are currently experienced in the area. In Chapter 5, following the next, I go into more depth regarding the environmental context and realities of the Wachagga, and then I turn to my final chapter in which I employ some aspects of environmental pragmatism to show how an environmental ethic that is not only practical, but also can help to address environmental problems experienced in a context like that of people living on the slopes of Mount Kilimanjaro can be articulated.

CHAPTER FOUR

APPLYING AFRICAN ENVIRONMENTAL ETHICS APPROACHES IN THE CHAGGA CONTEXT

4.1 Introduction

Against the background of the previous two chapters consisting of a literature review discussing and assessing theoretical positions in environmental ethics, the aim of this chapter is to determine whether the approach of Murove and Kelbessa to constructing an African environmental ethics based on traditional beliefs and practices observed by Africans could also be followed in the context of the Chagga, or generally the people living on the slopes of Mount Kilimanjaro. Formulated differently, the question posed in this chapter concerns what the environmental ethics of the Chagga would look like if we applied Murove's and Kelbessa's ethnographic model to the traditional beliefs and practices of the Chagga? Would the traditional beliefs and practices of the Chagga give us some guidance on how to resolve the environmental problems experienced on the slopes of Mount Kilimanjaro today? My contention in this regard is that, if you apply Murove's and Kelbessa's approaches to the Chagga case, you miss the reality of what is actually believed and experienced by the Chagga today; you miss the context in which they have to engage with their environmental problems; as well as the time frame in which they have to do so. You miss the fact that most Chagga have moved away from strictly traditional ways of living and that people now live with mixed worldviews and hence possess new hybrid values. All these realities require an approach that is able to take all of them into account.

Several assumptions inherent in the approaches of Murove and Kelbessa, and also in much of traditional African environmental ethics approaches were tested against the Chagga case to illustrate the inadequacy of these ethnographic approaches when applied to the context of people living on the slopes of Mount Kilimanjaro. The assumption tested in this chapter is that the belief in taboos and totems, the belief in ancestors, the belief in sacred trees and animals, the power of religious leaders and traditional institutions, and an appeal to traditional African values such as *Ukama* and *Ubuntu*, could be a solution for the environmental problems in Africa, and hence for the environmental challenges experienced on the slopes of Mount Kilimanjaro as well.

I do this by (a) demonstrating what the results will be (i.e. what the basic environmental ethic is that emerges) if the basic assumptions of an African environmental ethics as espoused by Murove and Kelbessa are "applied" to what could be described as the traditional beliefs of the Wachagga as they exist today, and (b) testing whether this environmental ethic could be persuasive and effective in mobilising the Wachagga to address the environmental problems in their living context in a robust manner. For the purpose of the (a)-part of this task, I show what the traditional beliefs of the Wachagga are with regard to taboos and totems, ancestors, sacred trees and animals, the power of religious leaders and traditional institutions, and if and how they appeal to traditional African values such as *Ukama* and *Ubuntu*, and how this, in theory, could be linked to a possible environmental ethic of nature conservation. For the (b)-part of this task I will pose the question whether this purported environmental ethic will be credible to the Wachagga, given their concrete lived experiences today (as discussed in more depth in Chapter 5), and thus whether this environmental ethic would ever be able to do the "work" it is supposed to do, which is to provide a persuasive basis for effectively addressing real-life environmental issues as they are experienced by the Wachagga.

However, I must emphasise here again that my aim is not so much to compare the Wachagga and the Oromo or Shona traditions and practices in relation to the natural environment, I rather only take a different case study in order to critique a position, namely Murove's and Kelbessa's implicit universalist and foundationalist stance in their approaches to African environmental ethics.

I begin this chapter with a brief description of the case study area. In particular, I present a historical overview of the area, the pre-colonial socio-political situation of the Chagga, and their general worldview. I then examine traditional Chagga beliefs and attitudes toward nature focusing on their attitudes and perceptions towards land, the Mountain, vegetation (trees and forests), water and water bodies, and animals.

The information in this chapter was obtained through conversations with the elderly and clan leaders from different villages on the slopes of Mount Kilimanjaro. Secondary sources like ethnological and anthropological works on the Chagga of Kilimanjaro also contributed much to the material in this chapter. My own observations and experiences for the four months of field

work in the study area also contributed greatly to the enrichment of the information contained in this chapter.

4.2 Location of the Mountain slopes and a brief historical overview of the Chagga

Mount Kilimanjaro is located on the North-eastern part of Tanzania along the Kenyan boarder. Kilimanjaro is the highest mountain in Africa. It is famous for the snow- capped peak despite being only three degrees from the equator. Kilimanjaro Mountain has two peaks: the magnificent ice-capped Kibo which is the highest point with an approximate height of 5903 meters, and the jagged Mawenzi peak, with a double crater, with an approximate height of 5320 meters. Only Kibo summit is climbable. Mawenzi is difficult to climb because of its sharp points. The imposing splendour and beauty of the mountain, especially the ice-capped Kibo peak, testifies to why the inhabitants of the mountain slope revered it in traditional times. For them, Kibo was the manifestation of *Ruwa*, the Chagga name for God. I discuss Kibo more extensively later in this chapter.

The inhabitants of the slopes of Mount Kilimanjaro are normally referred to as the Wachagga or the Chagga. The Chagga, strictly speaking, are not indigenous to the mountain slopes. They are immigrants from different areas. Some sources indicate that the mountain slopes were first inhabited by sparse groups of indigenous people called Wangasa and Wakonyigo or Wadarimba, a dwarf people, who seem to have been harassed away or absorbed by the immigrants through interbreeding (Dundas, 1968; Moore & Puritt, 1977). This is perhaps because people who live on the slopes of Mount Kilimanjaro arrived there at different times from different areas. It is estimated that the different groups that constitute the present day Chagga people began to migrate to the mountain slopes between the tenth and twelfth century in the Common Era (Moore & Puritt, 1977; Munson, 2013). The Chagga therefore do not have a single ancestry because they descend from various tribes. This is exemplified by the presence of different dialects from one sub-ethnic group to the other. Chagga are said to be the descendants of Kamba, Taita, Shambaa, Masai, Pare, etc. Charles Dundas²⁶ (1968:44) approximated the clans or

²⁶ Charles Dundas was a colonial administrator in the Chagga country who was sent there by the British colonial government immediately after WWI. Dundas was very popular and much loved among the Chagga because of, his backing for Chagga coffee interests against strong opposition of settlers, among other things (see Moore, 1977: 17). Dundas' account of the traditional Chagga worldviews in his book, *Kilimanjaro and its People*, represents one

tribes that formed the majority of the people who were living on the slopes of Mount Kilimanjaro (the Chagga) at the time as follows. Those of Kamba origin were said to comprise 113 clans; those of Taita origin, 106 clans; of Masai origin, 101 clans; of Pare origin, 31 clans; of Shambaa origin, 22 clans; of Kahe and Arusha origin, 16 clans; of Kuafi origin, 6 clans; and of Dorobbo origin, 2 clans. The Chagga of Kamba, Taita, and Masai origins constitute the largest percentage of the total Chagga population and are closer in language and sub-culture than the remaining groups. This diversity of origin among the Chagga implies that they lacked a common and original ancestral spiritual foundation. That is why Dundas correctly observed that “the history and meaning of the tribe has more of a political or national foundation than a spiritual significance” (Dundas, 1968:49). One may argue, therefore, that there is no such a tribe as the Chagga because of the lack of common ethnic rootedness. However, common beliefs and customs have developed among these different tribes or clans so that those people living on the slopes of Mount Kilimanjaro can qualify as one ethnic group, the Chagga. The diversity of origin, lack of ethnic rootedness or indigenoussness in the land of Kilimanjaro, and hence lack of a common and original spiritual ancestry, have had a significant impact on the ability of the Chagga to develop specific nature gods and nature spirits and their corresponding elaborate cultural ritual practices as present in some other ethnic groups (Dundas, 1968). This has made them significantly different from other ethnic groups or tribes in terms of their approach and treatment of the natural environment, as I elaborate later on.

4.3 Socio-cultural and political organization at a glance

The Chagga may be said to have been agriculturalists cum cattle keepers. Their home garden or *kihamba* (the banana grove) was the primary production unit. Here the Chagga cultivated bananas, sweet potatoes, yams, cassava, sugarcane, papaws, pumpkins, squashes and tobacco (Moore & Puritt, 1977). Coffee (Arabica) was introduced to the Chagga in the 1890s by missionaries (*ibid.*), and it came to be their main cash crop, responsible for the high level of socio-economic development witnessed today among the Chagga. Bananas provided an important crop among the Chagga because it was their staple food. It was also used to make the local brew, *mbege*, which was very important, also for rituals. *Mbege* and sour milk were among the most important elements used in sacrificial rituals. The Chagga houses or huts were built at

of the anthropological works that show a deep understanding, and an authentic and empathic interpretation of the traditional ways of life among the Chagga.

the centre of the banana grove such that the manure that was obtained from the stall-fed animals that were usually kept in the huts could be used easily to renew the banana grove. The Chagga also used to defecate in the banana grove, which also helped to add to the renewal of the soil through human manure. It must be noted that the banana grove or the home garden, *kihamba*, was permanently cultivated. Land tenure among the Chagga was through inheritance along lineage arrangements. The Chagga were patrilineal, so the land was basically parcelled out to male members of the family through customary inheritance. According to Chagga custom, the father has the duty and responsibility to provide his matured sons with a plot of land. The *kihamba* system of land tenure has thus been blamed for the land degradation and fragmentation (Soini, 2005). The head of the household was required by the traditional customs to make sure that his sons, when they married, were apportioned a plot from the *kihamba* to build a house and start their own families. This practice led the Chagga to constantly expand their settlements towards formerly uninhabited mountain and hill forests, for the purpose of acquiring more land. This led to reduction of the mountain forest and a number of wild animal species living in it (Moore & Puritt, 1977). Today, most of the wild animals that used to be seen on the slopes of Mount Kilimanjaro, such as monkeys, elephants, buffaloes, wild pig, buck, squirrel, leopard, and hyena have largely disappeared. Only some species of apes/primates, small animals like squirrels, and a few elephants²⁷ can be seen today.

Politically, the Chagga originally were divided into small chiefdoms. The Chagga chiefdoms did not evolve into kingdoms, but several chiefdoms were annexed at the beginning of the 20th century to form a big chiefdom under Mangi Marealle, the paramount Chief of the Chagga. The Chagga originally used to call their chief *Shaamombe*, meaning, he who is blessed with many cattle. Later, when the chiefdoms were annexed under one paramount chief, this was changed to Mangi, literally, the owner of the country, *uruka*. One important point to note about the Chagga is that the pre-colonial Chagga rarely enjoyed a long period of peace in their country. There were constant wars between one chiefdom and another, and there were also constant wars among different clans. As Dundas noted, "One can hardly imagine that there really was a time on Kilimanjaro [before the coming of colonialists] when bloodshed was unknown" (1968:54). There

²⁷ It must be noted that most of the elephants that trouble peasants on the slopes of Mount Kilimanjaro today do usually are not from the mountain forests but rather from the plains. In fact, most of them cross borders from the Kenyan game reserve of Amboseli, especially during the dry months. I address the problem of elephants in the next chapter.

were hostilities and rivalry among the chiefs to the extent that even those who were kinsmen killed one another. One of the reasons for this incessant unrest among the Chagga chiefdoms was the desire among the chiefs to expand their territories and spheres of influence. Ingenious defensive structures such as ditches, some stone walls and large subterranean chambers, where a number of families, cattle and food could be kept for months or years, could still be found in some places on the slopes of Mount Kilimanjaro. It is interesting to note that wars with neighbouring tribes such as the Pare and the Masai were not as frequent as internal wars among Chagga chiefdoms themselves. In fact, some chiefs sought assistance from neighbouring clans to fight their fellow Chagga chiefs (Dundas, 1968). The motive behind all these wars was to strengthen their economic and political power. Even those clans in kinship ties waged war among themselves. As Dundas (1968: 49) narrates:

If two warriors engaged in the general fight became aware that they were clansmen, they immediately broke away with expressions of remorse to fight others with whom they had no kinship ties. As against this we may compare the conduct of Chiefs who made war on their own kith and kin. Thus Chief Rongoma did not hesitate to conquer Marangu and put to death his young kinsman Silawe. The struggle for power simply outweighed the sacred ties of clanships.

Now, at this point of the discussion, it already can be observed that the state of political affairs among the Chagga seems to contradict the claims made by some scholars, as we saw in Chapter 3, that pre-colonial Africans lived in peace and harmony with themselves and with nature. The state of affairs among the then traditional Chagga sheds some doubt on the purported unique spirit of *Ubuntu* and *Ukama* among traditional Africans. Instead, it supports the argument that the traditional Chagga were preoccupied with the selfish economic and political interests of their individual clans and tribes to the extent that even sacred covenants or pacts which were considered very serious by the Chagga themselves²⁸ were nevertheless not observed or respected. So, solidarity and care for one another did not go beyond the clan or those related by blood. This lends support to Schweigman's argument (in Chapter 3). The Chagga did not give the same status to non-Chagga. They would not marry somebody from another tribe. They only strove to protect the individual clans' land and the individual customs and beliefs of the clan at any cost. So the spirit of *Ubuntu* (humanness) and *Ukama* (relatedness) among the Chagga did not go beyond kith and kin. The further conclusion that I draw from this observation is that it is

²⁸ These are very serious covenants among warring chiefs, for example, they would make a covenant to stop invading each other which, in some cases, involved burying alive a girl and a boy at the border between the chiefdoms (see Dundas, 1968: 70).

unrealistic and impractical to extend the concepts of *Ubuntu* and *Ukama* to the natural environment as far as the Chagga context is concerned.

4.4 The socio-economic and religious characteristics of the people

The Chagga people form one of the most industrious tribes found in Tanzania and the area surrounding the mountain slopes is one of the most developed parts in Tanzania. Coffee which was introduced in the Kilimanjaro region by Christian Missionaries in 19th century is responsible for the region's relative wealth. This region at one time had the highest number of secondary schools in the country, so the Chagga are among the most educated ethnic groups in Tanzania. The Chagga are also known all over the country as business people and entrepreneurs. They are seen as a people who are hungry for success. Most of the Chagga people today are scattered throughout the country working in government or private organizations or in self-employment. Shortage of land and the collapse of coffee prices have been singled out as the reason for most of the youth and middle-aged Chagga to migrate to towns and other areas. It is interesting, however, that most of the Chagga must return home at Christmas time or for other festivities to re-unite with their relatives and ancestors because of their attachment to their territories. Even if they permanently settled outside Kilimanjaro, most Chagga, will have a good modern block house back home to which they often return for a re-union with their ancestors through sacrificial rituals and it is in this time of Christian festivities that most relatives who have not seen each other for a long time meet and social issues such as conflict in the family are resolved. Because of their attachment to the ancestral lands, it is also unusual for a deceased Chagga to be buried away from their ancestral lands. Most Chagga will transport the bodies of their deceased relatives back home to be laid to rest in the ancestral banana grove. So, some Chagga even today have great attachment to the banana grove. When things do not go well they will always return from wherever they are to their home village to seek blessing from their parents and ancestors.

As indicated earlier, the slopes of Mount Kilimanjaro present one of the most densely populated areas in Tanzania. The highlands, at an altitude of around 2000m, have an average population density of 600 people per square kilometre whereas the intermediate zone (altitude of around 1500m or less) has an average population density of 250 people per square kilometre. The mountain slopes receives an average rainfall of 1500-2000mm per annum, whereas the lowlands

receive around 500mm per annum. Temperatures range from 15 to 30 degrees centigrade in the mountainous area whereas it ranges from 30 to 40 degrees centigrade in the lowlands/plains.

Of the total area on the mountain slopes only 48.7 percent comprises arable land. On average most people who live on the highlands own only 0.5 ha of land (the *kihamba*). Here, coffee and bananas are intercropped with trees to provide the shade necessary for the thriving of coffee. However, some of the plots have been subdivided among the family's sons to the extent that most of them are only big enough for a house and a few banana plants. On the plains, the average size of land per household is 1.5 ha and it is called *shamba*. When you visit some parts of the Chagga land, like Rombo, an administrative district on the eastern side part of the mountain slopes, you see women²⁹ carrying hoes and baskets walking from their banana groves from the highland to their *shambas* on the plains every morning and coming back carrying either firewood or grass or grains on their heads in the evening. The distance to the *shambas* on the lowlands ranges from three to six kilometres. It is on the plains (lowlands) that people cultivate seasonal crops such as maize, beans, sunflower, groundnuts, and millet. These crops are cultivated using the hand hoe, mostly for subsistence. This subsistence farming is mostly rain-dependent with the exception of a few areas in Marangu and Kibosho where traditional gravity-fed irrigation, *mfongo* is used, but on a very small scale because of shortage of water for irrigation due to drying up of rivers and springs. Much water is also directed to big coffee and horticulture plantations run by foreign investors, which deny those villagers living downstream enough water for irrigation. The Chagga continue to keep livestock and a household will keep at least three to four goats and a cow, on average. Almost every family also keeps some chickens. All these are used as a form of insurance to be sold for cash in times of crisis, such as sickness. As I hinted earlier, the collapse of the coffee crop, which resulted from, among other things, low prices, lack of incentives and subsidies in the form of farm inputs due to the implementation of IMF/World

²⁹ In some places in Kilimanjaro, especially in the Rombo District, women are the ones who go to the fields, *shambas*, to cultivate while men remain at home, either doing some casual labor or tending the livestock, after which they go to the local bars to drink or just wander around idly, waiting for their wives to come back from the fields to prepare food for them. In short most Chagga women are like laborers for their husbands and family. The burden of work that a village Chagga woman carries on her shoulders for the family is unimaginable. She wakes up very early in the morning, prepares breakfast for the husband and children, prepares fodder for the cattle and goats, and then walks to the field, almost 3 kilometers away, to work on the farm. In the evening she comes back carrying either a load of firewood or grass for the cattle or goats, and then prepares food for the children and her husband. Sometimes she also has to fetch water, at a distance from home. Some men are changing nowadays and they might help their wives, but much still has to be done to change past habit, especially the belief that men do not do work seen as a women's responsibility, as enumerated above.

Bank-imposed Structural Adjustment Policies (SAPs), and the effects of climate change, has condemned people who never knew poverty to abject poverty. The result was that they resorted to environmentally destructive activities such as clearing the forest for more land to cultivate, hence deforestation, and over cultivation on their small plots of land, hence land degradation. Many have also resorted to selling trees from their plots and even from the common forest in order to make ends meet. All of these changes were a survival strategy or coping mechanism.

In terms of religious beliefs, more than 90 percent of the Chagga are Christians. The rest are Muslims and traditionalists. Christianity was first brought to the Chagga land by European Missionaries in early 1890s, the Chagga being one of the very first tribes in Tanzania to be christened. Accordingly, Christianity is deeply entrenched in the Chagga way of life. It is said that missionaries preferred to settle in Kilimanjaro because of, among other things, its relative good cold weather and arable land. This was after many of them died in the coastal regions of Zanzibar and Bagamoyo because of malaria. Kilimanjaro was a malaria free zone by then.

Christianity on the mountain slopes mainly comprises Catholic and Protestant (Lutherans and some born again sects) denominations. Some western (Machame) and central parts (Marangu and Mwika) of the mountain slopes are mostly Lutheran, whereas the eastern part (Rombo) is largely Catholic. This division came about because Catholic and Lutheran Missionaries happened to arrive on the Mountain slopes more or less at the same time, i.e. in 1890 and 1893, respectively; so they decided to allocate separate areas as exclusive domains for either of them to avoid interference and unnecessary conflict. Generally speaking, then, Christianity and modern education has resulted in diminishing a great deal of the traditional religious beliefs and where traditional religions are observed, especially in Rombo, they are usually observed privately at family level and not at clan (communal) level anymore. This has also led to the ‘desacralisation’ of the communal (clan) sacred groves, especially the large sacred trees under which these sacrifices were performed. These developments as such shed doubt on prospects of relying on the traditional religious beliefs and practices as a foundation for a persuasive environmental ethic for the Chagga, as is demonstrated in more detail in the rest of this chapter.

After having briefly looked at the historical, socio-economic and political background of the Chagga as a way of putting things in perspective, I now go back to the main argument of this

chapter, that is, what happens when the approaches of Murove and Kelbessa are applied in the Chagga context?

4.5 How the approaches of Murove and Kelbessa fare in the Chagga context

In this section, I examine how the approaches of Murove and Kelbessa fare when applied to the Chagga context. Alternatively, I seek to examine the type of environmental ethics that would emerge if the model promoted by Kelbessa and Murove would be applied to the Chagga context. It will also help us to see whether the type of environmental ethic that emerges could persuade the Chagga to protect the environment today. I examine the themes that appear in Kelbessa's and Murove's articulation of African environmental ethics as they are conceived among the traditional Chagga. Thus I focus on the belief in the Supreme Being, the appeal to traditional institutions and religious leaders, the appeal to sacred animals and trees, the appeal to ancestors and the appeal to other aspects of nature such as the mountain and the land.

4.5.1 The belief in the Supreme Being

The traditional Chagga, like the Oromo of Ethiopia, had the concept of a supreme being, although largely vague. He was referred to as *Ruwa*. *Ruwa* is also the name for the Sun. However, *Ruwa* was not likely to be God himself because Kibo, the ice-capped peak of Mount Kilimanjaro, was also seen as symbolising God. It seems that it was the extraordinary qualities of these two entities, the sun and the mountain peak Kibo, which made people see them as signs of God, or *Ruwa*. The Chagga also use the word *Ruwa* to refer to the sky. Nevertheless, among the Chagga, the concept of *Ruwa* was vague and this Supreme Being seemed to be remote and hence had little to do with people's daily affairs. Sacrifices were offered directly to *Ruwa* in very rare circumstances, like in times of extreme distress. When circumstances thus dictated, a special animal sacrifice was offered to *Ruwa* at noon, because the Chagga believed that *Ruwa* (the sun) was closer to them at midday than at any other time of the day, so it was easy for him to receive the sacrifice. It must be noted that only those problems that affected the entire community/clan or tribe, such as a prolonged severe drought or an epidemic, warranted *Ruwa's* intervention through the offering of a public sacrifice. It is also interesting to note that the Chagga did not believe that the universe was created by *Ruwa*. They seemed to believe that some aspects of the physical universe were always there, while others like the stars and the moon are the children and wife of

Ruwa respectively. Regarding the origin of people, the Chagga believe that they were liberated or burst out from a mysterious vessel. Other Chagga myths relate that *Ruwa* burst out people from the elephant's stomach (Dundas, 1968).

The traditional Chagga gave the following attributes to *Ruwa*, some of which involve aspects of nature. They call him, *Ruwa matengera*, the one who leads and cares for all his people; *Ruwa funvu lya mku*, meaning 'God, the mountain of ages', meaning, *Ruwa* does not age like the mountain; *Ruwa molunga soka na mndo*, meaning *Ruwa*, the one who joins different sexes to bring about life, the one who is the cause of procreation among humans and animals (Dundas, 1968). So, although God *Ruwa* does not usually mingle with the day-to-day affairs of the Chagga, he is nevertheless associated with some aspects of nature that are of extra-ordinary stature like Mount Kilimanjaro, the sun, and the sky, lightning and thunder.

Although the Chagga's concept of God is not as elaborate as that of the Oromo of Ethiopia, the Chagga have some kind of holistic view of the universe, in seeing everything as held together by God, *Ruwa*. However, people whom I interviewed did not seem to make a direct connection between their belief in *Ruwa* and environmental or nature protection. In one of my interviews, a Chagga sage revealed that the Chagga would pray to God to protect them from the devils that were believed to dwell in the frightening dark and huge unending forests, underlining in particular terms that there is no direct, self-conscious link between the beliefs in *Ruwa* and protecting nature among the Chagga. As it is clear from this, it is rather the fear associated with getting closer to huge forests that traditionally helped to protect natural areas. So, though it has some potential, the extent to which the belief in the Supreme Being among the Chagga could be translated into a persuasive tool for environmental protection today is difficult to determine, firstly because of the weak conceptual link (if any) among the Chagga between their religious beliefs and environmental protection and secondly, because of the peripheral role that traditional religions play in the lives of the Chagga community today, as I further argue below.

My contention is thus that, even if there could be a strong conceptual link among the Oromo between their religious world-view and environmental protection, as Kelbessa argues, this link does not exist among the Chagga of Kilimanjaro. Accordingly, I cannot support the claim that the tendency among some African ethnic groups to view the universe as a single whole and in

non-dichotomous terms leads to an ecological awareness that could be construed as a self-consciously articulated environmental ethic.³⁰

4.5.2 Appeal to traditional institutions and traditional religious leaders

I showed in the previous chapter that Kelbessa also bases his arguments for an indigenous environmental ethics on the power of the traditional institutions and religious leaders of the Oromo to enforce beliefs and practices that helped to conserve some aspects of nature. In this section, I describe the state of traditional institutions and the influence of traditional religious leaders among the Chagga to see whether they could be relied upon to help in protecting the natural environment on the slopes of Mount Kilimanjaro.

My interviews with clan leaders revealed that traditional religious leaders among the Chagga were indeed the custodians of all beliefs and practices of the community. The Chagga maintained a hierarchical relationship with the ancestors through the living, the dead and those to be born. So, there was the family head, the clan leaders and the chief. The oldest person in the family was also the priest who could make sacrifices to the ancestors. However, the power of sacredness pertaining to each individual depended on his relative position to the ancestors. Thus, the chief was the most sacred because he was closer to the ancestors than anyone else in his chiefdom, then the clan leaders followed, and so on. Of course, the chief was most sacred because he directly inherited the position of the founder of the tribe. The interviews further show that the elderly were also believed to be closer to the ancestors than other people in the family, and thus they were the ones who were consulted first in case of any problem in the immediate family because they were believed to have wisdom and knowledge of their traditions and culture. Care was taken by the elders and the chief to ensure that the customs and traditions of the society were strictly followed by young and old, so as not to anger the ancestors and thus live happy and peaceful lives. The religious leaders were the moral custodians of the Chagga community. They kept an eye on everything that happened in the family and community and thus rewarded or punished an individual, family or clan accordingly. Living a moral life among the Chagga therefore consisted in avoiding any acts that may disrupt or upset the cosmic balance or the harmony between the living and ancestors. So the Chagga religious leaders and elders made sure

³⁰ Momen (2009: 256) emphasises that the traditional African worldviews had a more sociological rather than environmental and ecological significance. Other significances attached to these worldviews are simply imposed interpretations (see Momen, 2009: 356).

that beliefs and taboos, for example with regard to sacred places such as the family shrine that was usually located in the banana grove, *Mbuonyi*, or communal clan worship of ancestors that took place at the clan temple which was usually under a gigantic fig tree, *Itemboni* or *Kyangeni*, were respected. The same applied to tabooed animals such as snakes, the owl, and some wild animals found at the homesteads that were not supposed to be killed. In a way, the traditional institutions and traditional leaders therefore helped to protect some aspects of nature. The question, however, is: can these institutions (the authority of traditional leaders and traditional institutions) be appealed to today, as Kelbessa claims, to help protect the environment on the slopes of Mount Kilimanjaro?

My interviews with people living on the slopes of Mount Kilimanjaro indicated that their current commitment to traditional beliefs and customs has waned to a great extent and that they do not show much interest in them. In fact, my interviews showed that traditional religious leaders and their corresponding institutions have played an increasingly peripheral role in the daily life of people, unlike in the past.

In an interview with a middle-aged female village leader in Marangu, she indicated that it is a bit difficult to say today that we can use past traditional beliefs and customs to protect the natural environment. She gave several reasons for this. The first one was that it was easy for people to follow their traditions and customs in the past because people were born and raised in the same locale, so it was easier to impart the traditional values and beliefs to the children. Secondly, she said that there was not much interaction with other tribes and movements like today. The mixing of people and movements has killed that loyalty to the traditional beliefs and customs. Many people have moved from their original homes to other places. This is because of the shortage of land and for economic reasons. So, she thinks it is difficult to adhere to the traditional beliefs and customs today. She further added:

You will find that your neighbour is a stranger, so there is no way s/he can participate in observing beliefs and practices that s/he does not feel obliged to follow. In short, families and clans are now fragmented that is why observing these traditional beliefs and customs has remained at not just the family level, but also at individual level. You may find that some people in the same family observe the rituals and others do not. There is no more common authority to enforce them. People no longer find it fashionable to drink the traditional local brew, *mbege*. They now drink modern bottled beers. Drinking *mbege* today is seen as a sign of poverty and backwardness. Furthermore, our children today go to schools far away from home and they come back changed completely. They mix up with children from other parts of the country.

It therefore appears that most villagers no longer regard their traditional religious leaders and the traditional institutions highly. According to an environmental expert in the Kilimanjaro region, the call to protect some aspects of the natural environment using the traditional beliefs and cultural practices would mean, for example, to restore the traditional institutions that helped to protect the trees and forests. He continued, arguing that these institutions functioned because of the power of the Chiefs to enforce them in the past. According to him, restoring these institutions, even in a reconstructed way, would be difficult because we no longer even have the chiefdoms. Chiefdoms have been abolished in Tanzania since 1961, immediately after independence. Thus the chiefs are also no longer in existence or recognised even in their own communities. He argued further that the chiefs, even if their authority were still recognised, would not have much power to enforce adherence to traditions and cultural beliefs and customs because their authority, which was usually associated with their closeness to the ancestors (founders of the clan/chiefdoms), has, to a large extent, been replaced with modern government structures in cases of secular matters such as law and order, and with Christianity in spiritual matters. Accordingly, it would not make sense to try to base an environmental ethic for the Wachagga on beliefs or institutions that are not largely supported, or not in existence any more.

In the next section, I focus on traditional beliefs among the Wachagga regarding sacred trees and animals, and my question will be whether such beliefs provide us with anything different.

4.5.3 Appeal to sacred trees and animals

Kelbessa also uses the attitude of reverence or respect directed at certain trees and animals, as presented in the previous chapter, to support his arguments for an indigenous African environmental ethics. In this section I investigate whether this approach to constructing an indigenous environmental ethics would be viable among the people living on the slopes of Mount Kilimanjaro.

4.5.3.1 Appeal to sacred trees

Just like the Oromo of Ethiopia, the Chagga revealed certain traditional attitudes of reverence towards certain species of trees or vegetation. One of the very important sacred plants among the Chagga is the dracaena plant (*masale*). The leaves are a symbol of peace and forgiveness and are used in many other rituals (Dundas, 1968:78). The Dracæna was planted around the place on which the skulls of the ancestors were buried. This place was thus considered a family shrine and

it is here that sacrifices were often offered. This plant was also used for other purposes. It was used, for example, as a warning to signify a no-go area. Two dracaena stems with leaves tied together planted at the entrance of a hut showed that the place was restricted for entrance by unauthorised people (Dundas, 1968:180). Dracaena stems were also used in certain rituals, such as in the exhumation of bodies. It was taboo to strike someone with dracaena stem for it was used in burial ceremonies to send people to the spirits. So, this plant was conserved in some way because of its religious importance. However, because this tree only grows to the size of a matured sugarcane plant (in fact being similar to a sugarcane plant in many respects) it may not have much ecological value apart from its religious significance. Thus no conservative initiatives were taken to protect the *Masale* trees. They grew everywhere in abundance.

Although it is true that dracaena plants (*masale*) were sacred plants, their sacredness furthermore was only relative. They attained sacredness only when used to perform certain sacred rituals. Outside of that context they were just plants like other plants. That is why they were also used as fences or hedges to mark the boundaries between one family's banana grove and those of the neighbours. They were also used to make the walls of outdoor goat stalls. More still, the stems were later used for building pit latrines, especially to support the sand slab that covers the pit. These are quite mundane functions. So, this plant had both sacred and mundane functions depending on the occasion. I did not learn of any explicit taboos or prohibitions against using the dracaena plants for mundane purposes during my interviews. I make this observation because some scholars use these plants as an example of a practice that helped to conserve the environment without acknowledging their other mundane functions (see, for example, Msafiri, 2007; Mkenda, 2010). In addition to that, these types of trees are very insignificant ecologically because they usually do not grow into big trees compared to other ecologically significant trees that are not sacred, and hence wantonly exploited.

My interviews with some clan leaders revealed that the reason why dracaena plants were preferred for rituals over other plants was because the leaves of these plants are naturally evergreen and these plants thrive wherever they are grown; even a stem thrown on the ground sprouts and grows without needing much care. Its stem is also very hard, so it was usually used to make wooden spears. According to the elders, these special characteristics led people to believe that the plant had supernatural powers, hence the reason why it was more used than other

plants in traditional rituals. The sacredness of the dracaena plant therefore did not mean that it was not cut down or used for other less sacred purposes.

So, while it is true that it was a very important religious tree among the Chagga, this does not give us sufficient reason to use it as a ground for arguing for an environmental ethic, or an important element of such an environmental ethic among the Chagga. In fact, even if all *masale* plants were left intact to this date, their impact on the environment would have been very insignificant, because the plants themselves are small and thus have little environmental significance compared to many other far more important trees that were not considered sacred and hence are exploited freely.



Figure 3: A dracaena (sale/masale) plant

Source: Researcher, 2014

Further examination of the beliefs and practices of the Chagga people concerning trees and vegetation, may also come across mystical performances related to trees. One of these performances concerns a species called *Mringa* which was commonly used for making beehives. Dundas (1968: 276) narrates this performance thus:

This tree, which is always the private property of someone and may not be felled by him, is spoken of as “man’s sister”, and its felling is treated as giving away of a bride. The owner brings offerings of milk, beer, honey, Eleusine and beans. These he formally presents to the tree as a dowry on the occasion of its marriage and takes his leave after giving his blessing as to a daughter. On the following day the tree is felled, the owner leaves his village and is represented by a relative delegated to “hand over the sister”. After addressing the tree with comforting words like addressing a bride two axes are used. The first axe is laid on the tree by the leader, who asks pardon for what he does; representing that poverty has driven him thereto. Next he implores the tree to bring him good fortune and exhorts the bees of such and such strangers to leave their home and come to his hive.

On examining the above ritual, we see that there is a sense in which the harvesting of the tree is approached with care and concern. However, the deeper meaning of this ritual was not really intended to show respect or reverence to the tree as such; it rather seems to be a ritual whose appropriate performance was essential for attracting bees. No wonder – at the end of the day, the tree was cut down anyway. But of course there is the sense of caution with which the tree is treated. But again, cautious treatment should not be the reason for romanticising this practice, and it also does not provide grounds for the preservation of the tree. To the contrary, it is a practice that may lead to environmental destruction in the long run.

There are other instances that reveal a mixed attitude towards vegetation. Chief Rengwa of Machame who conquered Kibosho is said, for example, to have felled all the bananas plants and trees in Kibosho leaving only a huge tree called *Murk we Rengwa*, one of the largest in Kibosho (Dundas, 1968:77). This was one of those sacred big trees in Kibosho that was used for communal sacrifices and rituals, and only a few of this type of huge tree can still be seen in the Chagga country.

Among features a person visiting the slopes of Mount Kilimanjaro may see even today are some gigantic trees found in some areas (see Figure 4, below). The old people say that some of these trees were planted to mark boundaries between one chiefdom and another or one clan and another. As we saw in the previous chapter, since these trees were unique because of their size, they were respected and thus used as temples or sacred groves for traditional public rituals and sacrifices. Public sacrifices were offered under these trees. They were like the temples for the clan.

Thus these trees were treated with reverence, as shown in the previous chapter, and many myths and rituals were associated with these trees. To cut any branch from them was strictly forbidden. In the event that a branch fell from the tree, no one was allowed to pick it up for firewood or other purposes. These dry branches would be gathered under the tree and would only be used for cooking or roasting meat during the clan's sacrificial rites of slaughtering. There also was a belief that it symbolized death when a branch broke from the tree. In such a case, a person from one of the families in the direction in which the branch fell would die. To avert this bad omen, a sacrifice would have to be offered at the tree immediately. In addition, in the past, it was taboo for a man and a woman coming from opposite sides to go past each other under these trees. One would stop until the other passed as a show of respect to the spirits that dwell in these trees.



Figure 4: One of the huge religious trees (*Trichilia Roka*) found in Kilimanjaro

Source: Researcher, 2014.

Today most of these trees have lost their religious and cultural significance. They are treated just like any other tree. Today, very few people would observe this taboo. A few people, especially the old, still see these trees as sacred. Most of the local people no longer award special treatment or reverence to these trees apart from believing that they help to bring rain. When asked why

they stopped revering these trees, some people point to Christianity as the reason. The reason that is usually given is that the church discourages belief in ancestors or *mizimu*.

Unlike with the Oromo of Ethiopia, my interviews showed that the villagers now see the trees and forests as having economic more than spiritual functions. They do speak of trees as playing a role in regulating weather. The villagers associate problems like drought, water shortage, and abnormally high temperatures with the reckless harvesting of trees and deforestation. Most of the villagers no longer link the trees and forests to supernatural beings. This change of attitude may possibly be attributed to the government's intensive tree planting campaigns and the emphasis on economic and weather regulation benefits of trees and forests by some NGOs. Most of the villagers who were interviewed showed an awareness of one or two NGOs who worked on environmental issues in their villages. Responding to a question on their involvement in environmental activities, for example, some women from Sungu Village in Mweka, Kibosho, said:

...we plant trees because they help to bring about coldness ... trees make the weather cold ... they bring rain also. We have groups for planting trees. We are given seedlings by the Government or NGOs, we nurture them and we plant them for ourselves or sell them to other villagers to plant in their own plots thus earning some income for the group and ourselves. When the trees mature we also prune their branches for firewood. Also we harvest poles from these trees for building our houses or cattle stalls.

They also say that people have been cutting trees without planting new ones hence almost turning the village into a desert. They further noted that their grandfathers formerly used to plant big trees like avocados to shade the coffee plants. But following the collapse of the coffee crop, most of these trees have been cut down and sold as firewood or timber, thus contributing to the current state of affairs. With regard to forests, the people did not seem to recall any special or sacred forests still existing today. They also do not see the role of the forests as serving cultural or spiritual functions. When people are asked about the importance of the forests, they usually mention things such as provision of firewood, timber, grass or fodder, honey and water (or springs). Thus, these interviews clearly showed that people who live on the slopes of Mount Kilimanjaro at present think very differently about the role of forests and trees in their lives, unlike the pre-colonial Chagga who saw forests and trees as also having cultural and spiritual functions.

In brief, it can be said that, true enough, the reverence towards certain aspects of the environment such as sacred trees, as Kelbessa claims, has helped to preserve/conservate them, and some of them in fact have remained intact to the present day. However, other trees and plants could be butchered wantonly (refer to the example of Chief Rengwa above), which gives support to the argument that the cautious approach with which the traditional people treated certain trees and vegetation does not imply that they were environmentally conscious. So, in the absence of a holistic attitude of respect for trees and forests or vegetation in general, a consistent, explicit and coherent environmental ethic that could be used to address environmental issues on the slopes of Mount Kilimanjaro in the present context becomes hard to articulate on the basis of the traditional Chagga attitudes towards trees and vegetation.

4.5.3.2 Appeal to sacred animals

Another aspect that Kelbessa uses in his articulation of an indigenous African environmental ethics is the argument that the respect or reverence that the Oromo and some other African societies show towards certain animals could contribute in building an environmental ethics to address the current environmental problems, not just in Ethiopia but also in the rest of Africa. In this section, as in the previous one, I examine the extent to which the traditional beliefs and attitudes of the people living on the slopes of Mount Kilimanjaro towards animals could help to inform an environmental ethics to protect these creatures today.

The cultural beliefs and practices of the Chagga reveal a mixed attitude towards wild animals. The animals that feature most in Chagga legends, myths and beliefs are the elephant, the jackal and the baboon. It is narrated that an elephant that was killed by Horombo cursed him before it died, thus: *Woe is you Horombo, and the spears of the great shall take your spirit as you have taken mine*. Furthermore, there was some sort of a belief among the traditional Chagga that humans could be turned into wild animals; and also that some wild animals came out of cursed human beings. There is a legend, for example, that people refused to give heed to a message from *Ruwa* sent through his messenger so that *Ruwa* turned them into elephants, and their cattle were turned into buffaloes and the like, their sheep became pigs and porcupines and their dogs became hyenas and the like (Dundas, 1968:119). In one of the Chagga prayers to *Ruwa*, the name elephant is also attributed to Him. A line from the prayer goes: *You, Ruwa, Chief, the elephant indeed* (Dundas, 1968:146).

In another legend, baboons, monkeys, apes and colobus monkeys are said to have been given birth to by a woman who was cursed by her grandfather. That is why the Chagga used to call baboons and their close kin, such as chimpanzees, “the People of the Forest” or the “Children of the Curse”. This somehow confirms the pervasive belief among Africans that humans could be incarnated in animals.

The jackal was also seen among the Chagga to communicate certain message from the ancestral spirits. So, in the event that a jackal appeared at the homestead, the head of the household would seek a diviner’s interpretation and this would be followed by the offering of a sacrifice. For this reason, a jackal was not readily killed when it appeared at the homestead. It would just be chased away and a diviner’s advice would be sought immediately to ascertain the reason for the appearance of the jackal.

Wild animals were also considered dangerous. For example, during the interviews it became apparent that the reason why the Chagga dreaded to go into the deep forest was not just because they feared evil spirits, they also feared dangerous animals like elephants, the lion and the leopard., People thus used to wear special *Kishongu*³¹ rings so that they could spit on the ring and pray to an ancestor to avert the danger if they met with a dangerous animal.

There also were other specific beliefs related to animals that needed to be observed and performing cleansing ritual without which one would die or meet misfortune. Some examples of such beliefs related to animals include being bitten or struck by a baboon (this is unlucky and may cause death); to seeing a python; being wounded by a leopard; loud barking of a jackal close to the banana grove; and seeing a flying spur fowl. As these occurrences are rare, so it is believed to be a message from the ancestors to indicate that they are not happy with something when they do happen. When these events did happen, a diviners’ interpretation would be sought immediately and a cleansing ritual performed.

A ritual involving animals and birds that is worth narrating here was performed during circumcision. This was performed at the end of the initiation ceremony when the actual act of circumcision had been done and the boys’ wounds had recovered. The ritual was aimed at

³¹ These were rings made from the hides of slaughtered animals that every person who participated in the ritual wore as a symbol of communion with those who offered the sacrifice. This ring was believed to have protective power against evils spirits and dangerous animals.

teaching the boys bravery, especially in hunting. The boys were expected to show their hunting prowess and their ability to fight dangerous animals, so they would go around the bush hunting different animals (although this was only acting, for they would only hunt less dangerous animals and birds that were easy to capture, instead of the more dangerous ones). In some instances a plant was “hunted” instead of an actual animal. The hunt of the elephant was represented by a small dark-colored buck called Sambura, and the hunt of a lion in the form of a gazelle known as Sarigha. When it was caught, it is renamed the great lion. Then there was the hunt of a leopard disguised as a flower and followed by the hunt of a forest chief represented by the Sykes monkey. Lastly, there was the hunt of the king of the bananas, a lemur called Ngagha.

What is interesting in the foregoing ritual is the final ceremony involving some of the captured living creatures. The leader says to Chief, “Take these creatures and liberate them, for these are our brothers with whom we have made a blood bond, wherefore we may not harm them” (Dundas, 1968:221). Then the Chief would liberate the creatures. Interestingly, while these creatures were thus let free unharmed, a spur fowl was killed and the blood licked by all present.

The point here is that, while this ritual may be interpreted as a show of care to wild animals, its deeper aim, again, was to conduct the appropriate procedure for the ritual. The act being performed here was only symbolic. The ritual itself signified that the boys were ready for the task of hunting and protecting the community from dangerous animals (Dundas, 1968). Showing respect to animals thus did not mean that they always avoided killing them. We saw earlier that they would normally seek permission from the animal and slaughter it. Depending on the circumstances and the purpose of the hunt, if the big wild animals like elephants and buffalo in the forests were killed, the most important thing was for the spirit of the animal to be propitiated, although this was not a general rule. Otherwise, no special precaution, as far as my research was able to find, was taken in hunting or killing wild animals among the Chagga. The Chagga were only cautious in the treatment of the wild animals and birds that visited their homestead. Rombo, on the eastern side of the Mountain, was known as an elephant trapping area, for example (Moore, 1977). Here elephants were hunted in large numbers for their ivory. The Chagga traded the Ivory with the Kamba even long before the Arabs and Asians traders from the coast began to be involved in the trade with the Chagga around the seventeenth century (Moore, 1977).

Other animate creatures that were much feared by the Chagga included the owl (*bundi*) and the snake (python). For example, when the owl cried on the roof of the house or in the banana grove at night it marked an occasion for great anxiety in the family because the cry signified that a bad thing (such as death, or other misfortunes) would happen in the family. The owl was a bad omen, and in many cases it was difficult to ascertain exactly what was going to happen and to whom. That is why its appearance at the homestead was followed with immediate consultation of the diviner and constant sacrifices to send away the bad omen. The same applied to the python. The issue here was that these creatures were not killed but were chased away, while uttering some propitiating words, after which the medicine man was called to cleanse the homestead. It is important to note, though, that these creatures were killed without a second thought when encountered in the bush.

Many other instances reveal indifference or wanton killing of both domestic and wild animals. In the following examples, there is no evidence that the animals' souls were propitiated before or after their killing. Chief Horombo of Rombo country on the eastern side of the mountain slopes, for example, received a lot of praise after killing an elephant single-handedly; this act of bravery is one of the things that impressed his clansmen who subsequently decided to make him their chief (Gutmann, 1926; Dundas, 1968). In addition, Chief Salia is said to have wantonly killed the elephants that marauded the Eleusine fields in his territory using his rifle. Furthermore, some animal parts were used to make a special concoction called Yande – a magic medicine used very often for Chagga rituals. These included, among others, the bones of a certain species of rat, elephant and sheep fat, and lizard blood (Dundas, 1968). This means that animals were killed to obtain these elements for medicine. On some occasions, even domestic animals like cattle were wantonly killed for other reasons than sacrifice. Chief Sina of Kibosho, seeing that he was overwhelmed in war, decided to destroy hundreds of his cattle stock so that they would not fall into the enemy's hands (Dundas, 1968:102). Chief Sina, being the custodian of the traditional customs and beliefs of his chieftom, would not have dared to kill the cattle so wantonly if animals were really considered sacred. If they were, they could not be wantonly killed or tortured as they sometimes were.

All these examples show an ambivalent attitude towards animals among the Chagga. Sometimes they are approached with caution and care, and on another occasion they are wantonly killed.

This just explains the reality of the people's attitudes toward animals contrary to the romanticising or exaggerations that are often found in works on African environmental ethics. These examples serve to show that sacredness was sometimes conferred on animals depending on the circumstances and the function that they expected the animals to perform. Thus, some aspects of nature were considered sacred only when they were set apart for a special purpose, namely as an animal for sacrifice or as a place for offering sacrifice. That is why we see that animals under normal circumstances were treated with indifference.

The following account of the killing of a ritual animal among the Chagga furthermore serves to show that the Chagga were not interested in the suffering of the animal per se, but only on observing appropriate prescriptions for killing an animal for sacrifice. The account, as narrated by a clan elder in Rombo, goes:

One of the men hits the cow on the head with a stone to make it collapse, and the men quickly tie the legs, put sticks in the nose, and tie the muzzle with banana fibre so that the animal could not breathe and would suffocate. It is important that the animal does not make a noise, and it is considered a bad sign if it dies quickly.

Another narration relates that the animal took at least fifteen to twenty minutes to die. So the interest of the Chagga 'sacrificer' here is to make sure that the cow does not make a noise. Every effort is made to ensure that the cow is properly suffocated. Thus, what was important to the Chagga was not the pain or suffering of the animal per se, but following the appropriate ritualistic procedures for killing, slaughtering and dispatching it. However, for example, animal ethicists nowadays talk of inflicting as little pain as possible during the slaughtering of animals, because animals are capable of suffering pain, and an animal also is an 'experiencing subject of a life' (see Peter Singer, 1974; Tom Regan, 1983). So, as Singer and Regan see it, it is unethical to make animals suffer unnecessarily, and/or to prolong the duration of suffering and death unnecessarily. These are the values that environmental ethics seeks to cultivate in the current generation, and rightly. This project, however, will only be successful in an African context if we are humble enough to accept that our traditional cultures are equally guilty, in the way they treated some aspects of nature in their own right.

Strictly speaking, the Chagga, furthermore, had no totem³² animals, as in some other ethnic communities in Africa. No wonder, then, that this concept does not exist in their language. It may be recalled here that the presence of totem animals (“totemic ancestorhood”) is among the arguments advanced by Tangwa (2004); Kelbessa (2011); Murove (2009); Behrens (2010) and some other scholars in support of an indigenous African environmental ethics. The lack of totem animals and other specific nature spirits or gods among the Chagga has been attributed to the fact that the “history and meaning of the tribe has more of a political or national foundation than a spiritual significance” (Dundas, 1968:49). This observation is very important because the different types of nature gods and spirits that are found in other African societies, such as the Oromo, are not found among the Chagga. Other African societies report spirits such as river spirits, mountain spirits, forest spirits, land spirits, and water spirits, or gods of rain, gods of fertility, etc. This differentiates the Chagga from some of these other ethnic groups in Africa who have been able to develop complex and elaborate spiritual practices with regard to nature. This does not imply that the Chagga were not spiritual; my argument is rather that their spirituality did not result in complex and elaborate ritual practices in relation to the natural environment as in other ethnic groups in Africa.

The exposition above gives a hint of the Chagga people’s attitude towards animals and other animate creatures. Their attitude is one of indifference to both wild and domestic animals. No totem animals existed among the Chagga. Only a few taboos or restrictions regarding killing certain wild animals existed under certain circumstance. Most wild animals were considered dangerous and a nuisance to both humans and their livestock. Domestic animals were sacred only in so far as they served ritualistic functions and were kept mainly for that purpose. These observations are contrary to Aidan Msafiri’s claim that “[the taboos and myths of the Chagga] and [their] beliefs towards nature promoted an ecologically friendly attitude, particularly towards animals” (Msafiri, 2007: 47). Thus, judging from the exposition above, Msafiri’s general observation that myths and taboos helped Africans develop due respect for plants, animals and all living creatures is an exaggeration. First of all, the Chagga respected only certain plants and animals under certain conditions. Secondly, they respected them because they associated them

³² Totemism may be understood as the practice among some societies of adopting a particular animal species as its progenitor, so much so that it becomes taboo to kill a totem animal or to eat some parts of it (see, for example, Nyajeka, 1996; Taringa, 2006).

with spirits. These two facts reveal a very unbalanced and biased attitude towards nature and cannot be said to constitute a viable environmental ethics that can help to protect nature, in particular on the slopes of Mount Kilimanjaro.

This is why I argue that, contrary to the claims made by Kelbessa and Murove and many other advocates of African environmental ethics such as Geoffrey Tangwa (2004), Credo Mutwa (2006), Msafiri (2007), and Kevin Behrens (2010), the Chagga case shows that not all African traditional beliefs and practices support an environmental ethics or can provide adequate conceptual resources for an environmental ethics. Furthermore, in the instance of the traditional Chagga worldviews seeming to support some kind of environmental protection or nature conservation, that support is found to be very discriminative and ambivalent, protecting some aspects of nature while leaving others free for destruction. In the next section, I argue that the same applies to appeals to other aspects of nature in traditional Chagga beliefs for grounding an environmental ethic.

4.5.4 Appeal to other aspects of nature

Apart from arguing for an indigenous environmental ethics based on the sacredness of some trees and animals, Kelbessa also appeals to the reverence shown to other aspects of nature among the Oromo, such as the land, mountains, etc. In the case of the people living on the slopes of Mount Kilimanjaro, I basically focus on the reverence they showed towards the Mountain. It will be recalled that Kelbessa, and even Murove, claimed that this kind of respect towards some aspects of nature such as mountains and the land could be rehabilitated among Africans and hence help to protect nature – as it allegedly was the case in the past.

4.5.4.1 Appeal to the Mountain

As alluded to earlier, Mount Kilimanjaro, especially the ice-capped summit, Kibo, was the centre of most of the religious activities of the Chagga. There are legends regarding the formation of the Kilimanjaro Mountain and other small hills scattered throughout the region (Dundas, 1968:33-35). The Mountain, especially the Kibo summit, had great spiritual significance for the Chagga. It is believed that the Chagga people never attempted to climb the mountain because of their fear of cold weather and the evil spirits believed to dwell deep in the forest and on the Mountain. It is narrated, for example, that the chief of Machame at one time sent an expedition to investigate the nature of the ice that descended very low above Machame, but only one delegate survived and

the rest were believed to be consumed by the cold weather and evil spirits (Dundas, 1968:35). This, in those days, made people afraid of getting close to the Mountain forests.

Other legends tend to personify Kibo and Mawenzi in an attempt to explain why the two peaks look as they do. The legend goes thus: One day Mawenzi went to Kibo to ask for embers as Mawenzi's fire had gone out. (This was the custom among Chagga neighbours). Fortunately, Kibo had cooked a delicious meal of banana and beans. Mawenzi, having been given embers and a mouthful of the food, then played a trick by throwing away the embers and returned to Kibo for more so that he would be given more of that delicious food. When Mawenzi tried this trick for the third time, Kibo got angry, and vigorously hit Mawenzi on the head with a wooden pestle. That is why, the story goes, Mawenzi is jagged and scarred.

This legend tries to show the significance of the Kibo peak for the people. Mawenzi is given very little attention and hardly mentioned in the Chagga prayers and rituals. Charles Dundas explains this discriminating attitude regarding Mawenzi in favour of Kibo more succinctly in writing "Kibo is to the Chagga people the embodiment of all that is beautiful, eternal and strengthening; it is an ill omen only when reddened [more] than usual by the setting sun, in which case it portends famine" (Dundas, 1968:38). In some occasions, reference to Kibo was used to show honour and to confer blessings on people, especially to chiefs. It constituted a blessing to say, "*endure like Kibo*", or "*as Kibo moves not, so may life not be removed from you*" or "*as Kibo ages not, so may you never be old*" (Dundas, 1968:38).

Medicine men also invoked Kibo in their daily undertakings. The following tribal customs also point to the spiritual significance and reverence for Kibo among the Chagga people I reproduce these customs as narrated by Dundas 1968: 39):

... the dead are buried with face turned towards Kibo; the side of the village facing Kibo is the honourable side, where the house master is buried, and the villagers assemble for feast and councils. He who comes from the direction of Kibo must give greeting first because he comes from the fortune bringing side. Filial affection requires that a son should face Kibo whilst washing, lest it be said that he thrusts his father into the plain. When meeting superior on the road it is customary to pass on the lower side of the road, giving him more honourable side towards Kibo.

The Chagga people furthermore used to perform their prayers facing Kibo and they did this by spitting four times in the direction of Kibo. It is interesting to note that Kibo was not considered

to be *Ruwa* (God); despite the reverence bestowed on Kibo, prayers were directed to Ruwa,³³ but were performed facing Kibo. So, it seems that Kibo was to the Chagga what the altar is for Christians, or the *kiblah* for Moslems, if a rough analogy may be used. That is, Kibo was not Ruwa himself.

Now, what is the point in the narratives about Kibo and Mawenzi? The narration shows that the mountain had a spiritual function among the Chagga. The reverence and respect directed towards Kibo implies that the mountain and its environs were expected to be treated with care and sometimes left intact. Again, though, as the narration shows, this reverence was felt exclusively for Kibo and not for the mountain as a whole. As I noted earlier, Mawenzi was considered less significant, ugly and evil.³⁴ So, if people at that time had access to the mountain at all, it is most probable that they would treat the environment around Mawenzi with little respect compared to Kibo, because of their discrimination against Mawenzi. We see here that one aspect of nature is respected while the rest, almost of the same status, is treated with indifference. This seems to be the defining characteristics of most traditional African attitudes towards nature in that certain beliefs and customs favour the protection of certain aspects of nature but leave others free for exploitation.

In another narration, certain stones called Umbo³⁵ were believed to have supernatural powers. The stone was referred to as the “Soul” of the Mbokom by the Moshi people. (Moshi was the name of a particular clan, and now is the name of the main town on the slopes of Kilimanjaro). The Moshi people thought that they, by digging out this stone, would undermine the power of the Mbokom people and thus conquer them and end the hostilities between the two clans, but were unable to dig to its base. The cases of Kibo and the Umbo stone confirm the pervasive belief among traditional Africans that everything animate or inanimate could be possessed of spiritual or supernatural powers. This, in turn, confirms earlier claims by people like Tangwa (2004) about Africans perceiving a slim boundary between the natural and the supernatural, the physical and the spiritual, and hence forming worldviews conducive to nurturing an environmental ethic.

³³ See Dundas (1968: 146), a special prayer to Ruwa who was only consulted in times of great misfortunes and difficulties that defied all lesser ancestral spirits and diviners.

³⁴ See Dundas (1968: 38).

³⁵ Umbo stones, which are conical in shape, were believed to have been brought to the Mbokom area by the Umbo people who were said to come in great numbers from Usambara. It is believed that the Umbo people planted these stones in some places to mark their camps or as memorials recording their progress (see Dundas, 1924: 41).

However, this holistic relationship, as alluded to in Chapter 3, was more sociological than ecological.

4.5.4.2 Appeal to the land

Like many other tribes in Africa, the Chagga revealed special attachment and relationship to the land. This is most probably because they believed the land to be the medium through which to communicate and pray to the ancestors. The land was sacred. When offering sacrifices, a little milk and local brew, *wari*, was poured on the land to show communion with the ancestors. The ancestors were believed to dwell underneath the land. The land represented the roots of the clan. Prayers and sacrifices to the ancestors could not take place outside of the family land or banana grove, unless they were public prayers, for which there were special sacred community sites. The grove is the family graveyard. The ancestral skulls are assembled where the dracaena³⁶ plants (sacred plants used by the Chagga for various religious rituals) are planted in the banana grove. Family sacrifices were offered here and this spot was considered a family shrine.

As Dundas (1968: 195) correctly observed:

...the Chagga speaks and thinks of his grove as his home, a place of intimate and sacred associations which he cannot be indifferent to. I make no doubt that it is this which in a large measure makes the Chagga more attached to his home and country than is usual among Africans.

Before planting the grove, a local brew offering, *wari wa mbeke*, was made to the spirits of those who were the first cultivators of the land. In fact this sacrifice was made to ask permission from the ancestors or foreign spirits to inhabit or cultivate any new piece of land that was acquired, whether inherited or bought.

Apart from the association of the banana grove with the land, we do not hear of special elaborate taboos or beliefs attached to the land per se. In other instances, the Chagga would offer special sacrifices before planting traditional beans and Eleusine,³⁷ which used on the plains for food and rituals. It is also notable that the Chagga have no special gods or spirits explicitly associated with the land, as among the Oromo of Ethiopia.

³⁶ Dracaena leaves (masale) were a symbol of peace and blessing to the Chagga.

³⁷ Eleusine is a cereal which is used to make gruel for children, nursing mothers and the youth during circumcision, but the most important function of Eleusine is to make *wari*, the traditional brew without which a ceremony, a celebration or a ritual is not complete.

My interviews and conversations revealed that land today, is the most valuable asset for the people living on the slopes of Mount Kilimanjaro. It will be recalled that this is a densely populated area. Land is owned mostly through inheritance, the *kihamba* system. Land is the major resource that people use to earn a living. The Chagga home garden system thus serves as a kind of "supermarket" where most food is grown and obtained, ranging from vegetables, bananas (which is the staple), beans and fruit trees. As I showed earlier, Kilimanjaro is a highly populated area. This puts pressure on the land and natural resources. Because arable land is shrinking in rural Kilimanjaro, most conflicts in these areas are based on the struggle for land ownership. Land therefore is an important aspect that defines the natural environment for the people living on the slopes of Mount Kilimanjaro. Most land conflict in this area occurs among the people who live near the Kilimanjaro National Park. Land conflict in other places, like Kibosho, occurs between villagers and investors in big coffee plantations. Conflicts arise because the government apportions large plots of land to investors, thus leaving very little land for the villagers to cultivate food crops for their subsistence. Furthermore, the villagers are fighting for the right to access the mountain forests to collect firewood and fodder or grass for their livestock, because the plots they own today are too small to cater for these needs.

In the past, land was not sold and it was taboo to do so, but today, just like anywhere else, land on the slopes of Mount Kilimanjaro has become a commodity. The system of land inheritance, the *kihamba*, furthermore has resulted in land fragmentation, which, in turn, has caused soil degradation. The traditions and customs of people living on the slopes of Mount Kilimanjaro makes it the responsibility of the head of the family to ensure that each of his sons (not daughters, of course), regardless of their number, gets a plot of the land by inheritance (*kihamba*) where he can build his own house and start a family. The sons actually have the right to demand this from their father when they reach the age of marriage and this apportionment depends on the sequence of the births of sons. The eldest gets a bigger portion, the second, third or fourth get smaller portions and sometimes these are away from home on the plains. The last born also inherits a bigger portion of land because he is the one who remains on his parents' premises to take care of them in their old age.

This practice has been blamed for causing land fragmentation and degradation, and is also seen as the cause of many instances of land conflict at Kilimanjaro. The land shortage on the

mountain slopes has resulted in people resorting to clearing the forests and trees on hills and thereby causing soil erosion and drought. Current efforts by the government seek to persuade people to move to other areas of the country where land is plentiful.

This strategy has met some setbacks, however. One of the reasons for these setbacks is that people living on the slopes of Mount Kilimanjaro are so attached to their home lands and will not relocate easily. Another setback results from poor or lack of infrastructure at the new places that they are expected to live. A district officer in Moshi revealed that the areas where people are asked to migrate to have no houses, no roads, no dispensaries, no shops, etc. Moving there means starting from scratch. The poor who comprise the target population cannot afford all of these. This means that only people who have the means are able to relocate and the poor remain on the mountain slopes, depending on the dwindling natural resources and hence themselves and the natural environment becoming even poorer. So people today see the land more as a commodity and it is increasingly losing its cultural and spiritual functions because of, among other things, the population pressure that has resulted in land scarcity. This entails that it would not be feasible and practical to base an environmental ethic on the waning traditional Chagga beliefs about land to address the current urgent environmental problems on the mountain slopes because these beliefs lack consistent nature protection motives, and they just cannot keep up with the current scarcity and land pressure on the mountain slopes.

4.5.5 Appeal to ancestors

One important thing that is evident throughout Kelbessa and Murove's articulation of indigenous African environmental ethics is a strong appeal to ancestors. To recall, their argument is that the respect accorded to ancestral spirits believed to be embodied in natural objects such as animals and trees meant that some aspects of nature were conserved. Alternatively, it means that living in peace and harmony with ancestors constitutes living in harmony and peace with fellow human beings and the rest of the non-human world. In this section, I examine whether the appeal to ancestors could be meaningful enough among the Chagga to promote an environmental ethics of protecting nature.

In their daily encounters, the traditional Chagga were ever preoccupied and worried about ancestral spirits. They were careful in everything they did so that they would not upset the cosmic balance hinged on reverence due to the ancestral spirits. The spirits were the most

revered beings among the Chagga. Everything that the traditional Chagga did or experienced, whether planting, building a house, slaughtering, sickness, relations among people, and interactions with everything human or nonhuman, ancestral spirits came into the equation in one way or another. The belief was that the spirits were capable of bringing wealth or inflicting misery upon the family or community, so proper observance of all sacrifices and rituals due to the ancestral spirits was the single most important thing among the Chagga.

Among the traditional Chagga, it was believed that there are family spirits, usually the family ancestors, and also clan or terrestrial or chiefly spirits. The chiefly spirits, usually deceased founders of the clan or their lineage thus are honoured by every clan member on special occasions. When certain spirits wanted sacrifices from humans, they would inflict sickness or misfortune on the family concerned, or the community. The family or community would then consult a diviner to establish the source of the problem and the type of sacrifice being demanded. All activities among the traditional Chagga should therefore be interpreted from the point of view of their desire to maintain relations and power with the ancestral spirits, because all life in the traditional Chagga community was held together and only made sense in relation to the ancestral spirits. Remembering the ancestors through animal sacrifice thus was a very important thing. This is true even up to today among some sections of the Chagga community. All other things associated with that, be it the protection of the sacred trees or of the groves, were only instrumental in attaining the purpose mentioned above.

It should be noted that the Chagga did not feel obliged to sacrifice to strange spirits, that is, other families' spirits. In fact, a spirit from another family or clan could not demand sacrifices from a different family or clan. This point is important vis-à-vis the environment because, while the beliefs and practices of one family or clan could have a positive environmental effect, albeit unintended, the beliefs and activities of another family or clan could be otherwise. For example, while it was a taboo to harvest branches of trees from the sacred tree of one's own clan, somebody from another clan could transgress that taboo without any remorse or fear of retribution from the foreign ancestors. Thus the belief in ancestors did not guarantee the protection of the environment in its entirety.

The following conversation that I had with some women at the Mamsera market in Rombo district shows the extent of the lack of confidence in the role of the ancestors in protecting the environment.

Researcher: How do you relate with your ancestors today?

Respondent: *You mean offering sacrifices to the ancestors? These days, people have abandoned those beliefs. Very few people continue to observe them. It is said that if you are found performing traditional rituals, they will excommunicate you. They are against it.*

Researcher: Who are those who are against it?

Respondent: *The church.*

Researcher: And what do you say about that?

Respondent: *We just follow what they say.*

Researcher: How do you follow what they say?

Respondent 1: *Yes, we have abandoned these beliefs and practices. Even if there were good ones, will you perform them alone my son? Everybody else is not observing them anymore. For example, if I sell the goat that was to be slaughtered for the traditional sacrifice, will I not make some money to pay for my children's school fees? (Another interrupts)... but not everybody has abandoned these beliefs and practices completely. Some continue to observe them.*

Researcher: What about you? Do you offer sacrifices to the ancestors?

Respondent 2: *With whom? (Laughter) If you mention such things to the children especially those of mine who are now trying to earn a living in town, they will stop sending me some remittances. They won't even come to greet me anymore.*

Researcher: Why do you say so?

Respondent: *They (her sons) say that these things are outdated. They make us poor.*

Researcher: Do other people in this village continue to observe the traditional beliefs and practices in relation to the ancestors?

Respondent: *I really don't know. They used to say if you do not sacrifice to the ancestors it will not rain. But how come it rained very well this year as it used to be in the old days? Was there any rituals performed to bring the rain? Only God wished and it rained. What if he does not wish, it will remain just as dry as it has been. I did not hear of any ritual that was performed to ask for the rain!*

Such is the general feeling among most people today on the Kilimanjaro Mountain slopes. This largely is a result of the influence of Christianity and modern education. It is not uncommon to

hear about fundamentalist Christian groups or sects in the area such as the Catholic and Protestant Charismatic Revival Movements urging their followers and even other members of the church to desist engagement in acts to do with veneration of ancestors and traditional sacred places. They even go to the extent of destroying sacred trees and sacred places. They also counsel those who had participated in those acts to ‘repent’ and attend special services to help them ‘break’ what they call “the evil bondages” made with the *mizimu* (ancestral spirits). My observation also shows that some people feel safe in taking refuge in the Charismatic movement, so as to be relieved from the economically burdensome demands of the ancestors. It is important therefore to note here that some villagers would prefer to be relieved of the traditional beliefs and customs that seem burdensome, but have some fear of what the consequences of doing that might be. The charismatic revival preachers take full advantage of that by convincing them that they (the religious leaders) are capable of dissolving the bondage entered into with the *mizimu* (the ancestral spirits).

So, while it is true that belief in ancestors to some extent continues to wield influence among some sections of the people living on the slopes of Mount Kilimanjaro, that influence is not in the direction of protecting the environment because people have abandoned most of the traditional beliefs and practices with conservational impact. Some people continue to revere the ancestors, but this respect is no longer communal but more private. It is also not unusual among the Chagga to find some people within the same family still observing traditional ancestral worship practices and other members completely indifferent. The communal reverence of sacred places has largely diminished and some of those sacred forests and big trees have even disappeared. One therefore cannot appeal to ancestors as a tool to effectively persuade people to protect the environment among the Chagga.

4.6 Conclusion

I conclude this chapter by noting that traditional Chagga beliefs and attitudes towards nature were found to be ambivalent, inconsistent, and contradictory in many respects. At one occasion they seem to support environmental protection, while at a different occasion the same beliefs and practices seem to be inimical to the environment. Thus, these beliefs and practices could be said to provide us with a very weak and indirect theoretical environmental ethic that has little relevance to the current urgent practical environmental problems on the slopes of Mount

Kilimanjaro. This chapter thus serves to show that, in my view, ethnographic approaches to environmental ethics generally result in no more than a weak and fragmented theoretical environmental ethic without much bearing on the real concrete environmental challenges experienced in the areas where these beliefs are, or were held. If this is perhaps not true of the Oromo, it is indeed true of the Chagga.

In the following chapter, I show what the concrete environmental challenges and current realities of the Chagga living on the slopes of Mount Kilimanjaro are in greater depth and indicate, on the basis of these realities, what the requirements are (or could be) for an environmental ethics that, in this context, may be both persuasive and effective. In the last chapter, Chapter 6, I will attempt to propose a way forward towards formulating such an environmental ethic. That is, I will endeavour to articulate what kind of environmental ethics might be appropriate to a context such as the one on the slopes of Mount Kilimanjaro; showing, as I mentioned in Chapter 2, why environmental pragmatism and adaptive management, which underlie a process ethic, provides a better alternative in this particular case.

CHAPTER FIVE

CURRENT REALITY AND ENVIRONMENTAL CHALLENGES ON THE SLOPES OF MOUNT KILIMANJARO

5.1 Introduction

I have examined the traditional beliefs and cultural practices of the Chagga in light of the frameworks proposed by Murove and Kelbessa in Chapter 4. The aim was to see if it was possible to distil an environmental ethic from these beliefs and cultural practices (or generally, worldview) to address the environmental problems on the slopes of Mount Kilimanjaro. I demonstrated that the approaches by Murove and Kelbessa fell short when applied in the Chagga context. When the general methodology of Murove and Kelbessa was used in an effort to distil an environmental ethics from the traditional beliefs and practices of the Chagga, quite a number of problems emerged. In particular, these approaches, when applied to the Chagga situation, miss the dynamics of current realities and the time frame in which the local people have moved away from those traditions. They also miss the current multiplicity of values and experiences of the people living on the slopes of Mount Kilimanjaro.

In this chapter I show that these realities/experiences and time frames include power struggles, conflict over accessing natural resources, exclusions, new forms of natural resources management and their top-down approach, poverty, dependency, Christianity and modernity in general. In my analysis of these realities I focus in particular on the lived experiences, as well as the concrete context and very real power struggles in which these experiences are embedded. I will then use the three pillars of Norton's process ethics, or adaptive management,³⁸ to interpret these experiences, contexts and power struggles with a view to paving the way for my last chapter which is devoted to a proposal for a practical, contextualised environmental ethics that is capable of engaging with the environmental problems of the Chagga as currently manifested. Following this approach I hope to show that Norton's adaptive management and the process ethics that is entailed point to a kind of practical ethics that might be more suited to addressing

³⁸ Norton's environmental pragmatism is discussed in detail in Chapter 2 where the three pillars of adaptive management ethics are discussed. These include commitment to experience and experimentalism, being attentive to multiple scales of place and time, and being sensitive to a particular bio-physical condition and the corresponding specific values upheld in a particular area.

environmental problems on the slopes of Mount Kilimanjaro than the ethno-philosophical approaches proposed by Murove and Kelbessa.

In essence, this chapter presents a shift from what I see as the ethnographic and “universalist” approaches of Murove and Kelbessa to treating specific contexts and time frames as they are actually lived today and continue to evolve on the slopes of Mount Kilimanjaro. This calls for a process of experiential and experimental learning rather than prior learning, which is in keeping with a pragmatist understanding of truth as contextual and dynamic (Norton, 2005). I must emphasise, again, that my aim was not so much to compare the Chagga with the Oromo or Shona on an ethnographic basis, but rather to take an alternative route by conducting a case study in order to move beyond what I understand as Murove’s and Kelbessa’s implicit universalist and foundationalist stance in their approaches to African environmental ethics. To do that, I started by examining the current situation and how people interact with the environment on the slopes of Mount Kilimanjaro so as to unveil the concrete environmental challenges and concerns that the local people experience. As such, the content of this chapter is based on relevant literature, but also on semi-structured interviews that I conducted with key informants about the environmental challenges experienced on the slopes of Kilimanjaro.³⁹

5.2 Interactions with the natural environment on the slopes of Mount Kilimanjaro

Before I delve into the actual interaction of the Chagga with their natural environment to demonstrate how this relationship is being influenced by current government and management practices, economic realities, and human-animal conflicts, I first present the current status of the environment on the mountain slopes as local people and experts see it.

5.2.1 The current state of the environment

My conversations and interviews with environmental officers and experts from various districts on the slopes of Mount Kilimanjaro reveal that the growing human population and deforestation are among the major environmental concerns on the slopes of the mountain. Discussions with environmental experts from the University of Dar es Salaam, notably Prof. Pius Yanda, a climate change expert, also revealed that the disappearance of the ice-fields on Mount Kilimanjaro is more probably due to the growing population, changes in land use, and deforestation on the

³⁹ See Chapter 1, Section 1.3 for a more detailed exposition of the methodology that I followed for this case study.

slopes rather than climate change. Pius Yanda, therefore, believes that re-forestation on the mountain slopes is the most likely solution to the problem. Experts approximate that the ice-fields on Mount Kilimanjaro, which have been the source of numerous springs and rivers on the slopes diminished by 80 percent between 1912 and 2002, and the ice-cap is expected to disappear completely by 2020 if the situation on the mountain slopes remains the same (Boko, *et al.*, 2007). The Kilimanjaro Regional Government describes the environmental situation on the mountain slopes as a crisis. This led to various measures including an official declaration on the environmental degradation on the mountain slopes as a crisis accompanied by a complete restriction of access and use of a Half-Mile Forestry Strip (HMFS). A restriction on the harvesting of forests and trees in other places in the entire Kilimanjaro region was also imposed.

Not only environmental experts and government officials only, but also villagers, the common or lay people, have realised the environmental problems on the mountain slopes. They have their own models or indicators to describe the state of the environment on the mountain slopes. Issues identified by the villagers as indicators of environmental problems on the slopes of Mount Kilimanjaro include abnormally high temperatures; drying up of what used to be permanent rivers; acute water shortage; the appearance of malaria mosquitoes; erratic rainfall; and recurring crop failure.

5.2.1.1 Abnormally high temperatures

There is a general perception among villagers that temperatures have become abnormally high on the slopes of the mountain. An environmental expert in Moshi reported that the temperatures on the slopes of the mountain hit an all-time high at 42°C for the first time in the history of the area in 2012. Normal average temperatures during the hot season range from 25 to 30°C. Local people observed that it was difficult to walk around in Moshi town without a jacket regardless of the season in the former times, but people hardly put on jackets nowadays. One interviewee observed, "...when you stand at the Moshi town bus stand, you feel the heat coming from underground...it is extremely hot. We have never experienced something like this before." An environmental officer from Rombo, one of the Districts on the eastern side of the slopes likened the current temperatures of Moshi town with those of Khartoum, Sudan. A villager in Mweka lamented:

...the snow on the mountain was making this place cool and cold. In those days, when we were young, it was extremely cold during the cold season but these days, it does not get very cold. In other times, it gets unusually hot.

A weather expert in Kilimanjaro seemed to differ, however, noting that “the climate has become dryer, and hotter in summer and colder in winter”. All in all, the most important thing is that the common villager is able to notice that there is something wrong with the weather, and can associate that with environmental problems on the mountain slopes. Both experts and lay people, generally, believe that temperatures on the slopes of Mount Kilimanjaro have increased due to excessive clearing of forests and trees. So, the need for some environmental ethic that can motivate the local people to do something about this state of affairs becomes even more evident.

5.2.1.2 Drying of rivers and springs and acute water shortage

Participants in my study noted that most of the rivers in some places on the slopes of Mount Kilimanjaro have become seasonal and some have dried completely. This has happened mostly on the Eastern side of the mountain slope which mainly covers the Rombo district where most rivers have dried and some only flow briefly during the rainy season. On the western side where some rivers still flow throughout the year, it may be observed that the volume of water in those rivers has decreased drastically. This has made it impossible to continue practicing the traditional *mfongo* (furrow) irrigation system and water from the rivers and springs no longer reach the farms on the plains.

It is common to hear people on the streets complaining about the water shortage. According to the interviewees, this is a result of the rivers drying or a reduction in the water volume in the rivers and springs. Furrows customarily used to channel water from sources on the mountain slopes to home gardens for general purposes are mostly dry. An environmental expert in Rombo noted that, the volume of water slumped from a typical 12,000 cubic litres per day to 6,000 cubic litres per day in 2014 for the first time in the history of the Moshi Municipality. The Municipality, like other parts of the mountain slopes, gets its water from melting glaciers and springs on the mountain slope, so the decrease of the ice fields is a serious threat to people living on the mountain slopes. Some villagers mentioned the excessive cutting of trees around water sources as the reason for the acute water shortage. An elderly villager said, “[I]n the past nobody would dare to get into the forest and cut down trees at the water sources because it was strictly prohibited, but today people do that without remorse.”

5.2.1.3 Erratic rainfall and recurring crop failure

Peasants on the slopes of Mount Kilimanjaro also mentioned drought or erratic rainfall and crop failure as signs indicating environmental problems on the mountain slopes. Farming, the economic mainstay on the mountain slopes, is practiced both on the highlands and on the plains surrounding the mountain. As noted earlier, coffee and bananas are the main crops grown at higher elevations, whereas crops such as maize, beans, millet, groundnuts and sunflowers are grown on the rather dryer plains. Farming on the mountain slopes has to rely on rain because even in areas where traditional irrigation was possible (some western parts of the mountain slope), most of the rivers are dry or have too little water to cater for irrigation and other domestic needs of the growing population. Because of the erratic rainfall, peasants, especially on the eastern side of the mountain slopes, complained that they have been without a substantial yield or harvest from their farms for five or more consecutive seasons. In substantiating villagers' complaints, rainfall data on the mountain slopes show a decreasing trend of between 2.5mm and 12mm per annum over the last 60 to 100 years (Sébastien, 2012). During periods of drought, it is common among the Chagga to pray to God to ask for rain. However, traditional public sacrifices to pray for rains are rare these days, according to Chagga elders who were interviewed.

5.2.1.4 Appearance of malaria mosquitoes

Another indicator of environmental problems on the mountain slopes, according to the villagers, is the appearance of malaria-causing mosquitoes. Malaria mosquitoes have become a problem on the highlands for the first time in the history of the area, and villagers have been forced to sleep under mosquito nets for the first time. I myself witnessed mosquitoes at night in areas where people never knew malaria mosquitoes before. These areas used to be too cold for the mosquitoes to survive, but mosquitoes are a common phenomenon now, especially during the hot season, and sleeping without a mosquito net is difficult, let alone the increase in the number of malaria cases in hospitals. This being something completely new to the people living on the mountain slopes, some people, especially the elderly, say this situation is a result of a curse from God and ancestors because of misbehaviour; others understand that it is a result of environmental degradation, especially because of the clearing of trees and forests.

5.2.1.5 Land degradation and fragmentation

Population growth and the *Kihamba* system of subdividing family land among sons have resulted in degradation and fragmentation of land. Villagers showed me hills that had not been cultivated or inhabited formerly, but are heavily cultivated now and settled by some people. The forests on these hills thus have been systematically cleared, the land has been left bare, and soil erosion has become the norm. Over-cultivation of the small plots of farms on the plains have also rendered them infertile, hence resulting in very low crop yields. This has exacerbated poverty, and made the villagers ‘encroach’ on the protected forest and also overexploiting the natural environment, especially through selling trees from their plots for cash as a coping strategy. A 40-year-old woman interviewee said:

... we are getting nothing from the farms these days, yet we need to eat, the children need to go to school, so we are left with no other option than selling trees from the farms so as to meet those needs, which is why you can see that our farms are depleted of trees.

In a situation like this where poverty is pushing people to engage in acts that are environmentally damaging, persuasion may need to be accompanied with finding alternative ways of survival.

We see from the above that the kind of models or indicators that the local people use to describe their environmental problems suggest that we may need to be more pragmatic than theoretical in our efforts to find appropriate tools to motivate people to protect nature. We see people here talking about environmental problems in both secular and/or quasi-scientific language, and also in religious (traditional and modern) terms. Now, in the sub-section that follows, I look briefly at what the local people see as the causes of and solutions for the problems. I, in particular, examine the nature of causes/reasons and solutions that the local people propose with regard to environmental problems. This will give us further clues to what persuasive tools we may have to use to motivate the local people to protect the environment on the mountain slopes.

5.3 Causes of and solutions for the environmental problems

Regarding the causes or reasons for the environmental problems mentioned above. We may note three categories of answers alluded to by villagers. These are: excessive cutting of trees and forests; punishment from God; and punishment from ancestors. However, these answers seem to overlap in many instances, in that some people would mention all three as the reasons for the environmental problems, but emphasising certain answers/reasons more than others.

Experts and educated people (secondary school and above) typically emphasised excessive cutting of trees and forests as the reason, while less educated people (primary school level) typically emphasised both excessive cutting of trees and forests and punishment from God (many being Christians). Regarding the punishment from God, some people said there is too much immorality in the society today, something that has made God punish humans for their sins through drought and crop failure. In Maharo village, in Rombo District, for example, one of the immoralities that people mentioned was the prevalent behaviour of some young mothers in throwing away or killing their babies on delivery. Some of the local people believe that this has brought a curse on the land from God. Most of the elderly likewise emphasised that people have abandoned the ways of the ancestors and of God, and that is why there is environmental problems today.

It is clear from this that the local people use quasi-scientific terms and religious terms to explain the reasons for the environmental problems. As I mentioned in the previous section, this is a significant departure from talking about the environment in exclusively traditional religious terms to using more mixed terms, which suggests that a mixed or hybrid worldview has become part of the local culture. This is to say, the approaches of Murove and Kelbessa alone cannot be applied adequately in this context. The situation on the slopes of Mount Kilimanjaro calls for approaches that can accommodate the different ways in which the local people conceive the environment. My argument has been that environmental pragmatism, particularly Norton's Adaptive Management ethics, gives us that option, because it is a methodology that allows for the unfolding of the multiplicity of values in a given context.

In the following sub-section, I turn to the concrete challenges that people living on the slopes of Mount Kilimanjaro experience as they interact with the natural environment by focusing on how this interaction is being influenced by current government and management practices, economic realities, and human-animal conflicts. Ultimately, I show how Norton's process ethics, and the three pillars of his adaptive management approach in particular, could help in resolving these challenges.

5.4 Current environmental challenges and concerns of the Chagga

My fieldwork on the slopes of Mount Kilimanjaro revealed that the current environmental challenges and conflicts are related to current management practices, especially regarding access

and use of the natural resources, and also to the distribution of benefits accruing from the mountain resources to the surrounding villages. These concerns and challenges have also been found to affect the local people's attitudes towards the natural environment. These concerns and other environmental problems on the mountain slopes furthermore show that neither the mainstream nor the hitherto alternative traditional African environmental ethics approaches could adequately address them. An examination of these conflicts and concerns is necessary in the effort to remove obstacles that may hinder the work of persuading people to protect nature on these slopes. The nature of these conflicts and concerns embedded in people's daily interactions with nature on the slopes of Mount Kilimanjaro provide further justification for a practical, contextualised approach accounting for a multiplicity of values as more suited to addressing them than an appeal to traditional values and practices only. I hereby consider these conflicts briefly.

5.4.1 Challenges/issues arising from management practices

One of the issues that kept on occurring during interviews with the people living on the slopes of Mount Kilimanjaro with regard to their daily interaction with nature concerned the restriction placed on harvesting and transporting trees and forest products in the Kilimanjaro region, and the restrictions on access to the forest issued by the Regional Government and the KINAPA management.

5.4.1.1 Issues/conflicts between villagers and the Regional Government

My interviews revealed that the strict measures taken by the Regional Government to ban harvesting of trees and forest resources in the entire Kilimanjaro region did not augur well for the local people and even with some environmental experts in the region. As a result, these measures were protested vigorously.

Village leaders and some environmental experts in the region believe that these restrictions were orders that came from a higher authority. The decision to implement the restrictions was reached without the full participation of the villagers, the *wananchi*. Some village leaders claimed that they were summoned by the Regional Commissioner (RC) and found that the decision had already been taken by the Regional Government. My conversations with some village leaders revealed that most villagers believed that their village leaders were bribed, otherwise they would not agree to such a poor decision without consulting the villagers. A villager complained:

I planted the tree myself, I took care of it myself, and now I need to harvest it, you tell me I am not allowed to do that? But, I had a plan with my tree. The government did not help me to plant it. How can they forbid me to harvest it?

Some of the villagers I interviewed were of the opinion that the order was unjust and inhumane because most of them used trees as a source of income, especially since the collapse of the coffee crop. The villagers sell trees from their plots to get cash to pay for their children's school expenses, or buy household needs such as food, or for medical expenses, let alone building or repairing their houses. Complaints by the village leaders indicated that they tried to go back to the Regional Commissioner to seek a review of the decision, but were not afforded that opportunity.



Figure 5: Women and children selling firewood on the slopes of Mount Kilimanjaro

Source: Researcher, 2014.

An interview with an environmental expert in Moshi District revealed that the decision to ban the harvesting of trees and forest products in the region was the wrong approach, and would not help to save the environment from destruction in the long run. He noted that the ban was already having a bad effect on the poor. For example, he revealed that his office was overwhelmed by the number of people seeking permits to harvest trees from their farms, but that his office no

longer had the authority to issue those permits. He cited examples of sick people needing money for medical care, those with problems with paying school fees for their children, and others complaining of hunger. He explained that while all these people felt that selling trees from their farms would relieve their problems, they could not do that because of the ban.

An environmental officer from Moshi District said that the ban had in fact exacerbated environmental destruction and has been a source of bribery. It had become a source of income for some unscrupulous individuals. He narrated thus:

According to a quick research we did recently, the destruction of the environment especially cutting down of trees has intensified. This is because, among other things, there are some voluntary environmental groups that went to the Regional Commissioner to seek contracts to monitor and enforce the order. Some of these groups were given the contracts but ironically they have been the very ones encouraging people to destroy the environment. They go around collecting bribes from villagers who want to harvest trees. Also this order has encouraged corruption at the level of villages and wards. Once people know that even if they come to the district offices they won't get permits, they resort to bribing the leaders at village and ward levels, and go ahead to harvest the trees. So, this order has become a good source of income for some unscrupulous leaders and a few clever individuals. As a consequence village and district councils are no longer receiving revenue from harvesting and transporting trees and forest products. This money is going into the pockets of a few corrupt individuals.

The conflict between the villagers and the Regional Government is an example of the importance of involving people in matters that affect their lives. I show, in Chapter 6, how a case like this should have been handled by using Norton's process proposal and adaptive management to attain a successful ending without much complaining. The following subsection is an example of a more or less similar case but this time involving the villagers and the Kilimanjaro National Park Management (KINAPA). Here, we found an even bigger lesson in the complexities of managing resources among needy people.

5.4.1.2 Conflicts between the local people and the Kilimanjaro National Park Authority

Kilimanjaro National Park Authority (KINAPA) is a semi-autonomous government parastatal that oversees and takes care of Mount Kilimanjaro and the surrounding forests on its slopes. It is one of the constituent authorities under the umbrella of TANAPA (Tanzania National Parks Authority). During the German colonial rule in Tanganyika (now Tanzania) from 1885 to 1919, a Half-Mile Forestry Strip (HMFS) intended to serve as a buffer zone that the villagers surrounding the mountain could access for their daily needs had been established between the protected forest and the local people's settlements. Previously, KINAPA would only manage the

mountain itself from the ice-cape down to the area just before the main forest. The rest of the area from where the main forest begins to the entire area covering the Half-Mile Forestry Strip was managed by the central government through the then Ministry of Tourism and Natural Resources, the Forest and Bees Division. However, the Half-Mile Forestry Strip was later given to the District Council to manage. In this way, the villagers surrounding the forest were given direct control of the forest strip. They thus formed Village Environmental Committees and established by-laws and regulations on how to manage and use the forest strip. In this way, the forest was protected while the villagers benefitted from products such as firewood, grass or fodder for their livestock, medicine, and poles for building houses and supporting their banana plants. According to the Natural Resources Officer in the Moshi District Council, three quarters of the survival needs of people who live on the slopes of Mount Kilimanjaro come from the forests surrounding the mountain slope. Villagers thus claimed that the benefits they were getting from the forests previously made them feel that they really owned the forest and this made them protect it wholeheartedly.

However, the government, through KINAPA, claimed back the Half-Mile Forestry Strip in 2005 for the reason that the District and village councils had failed to manage it well, thereby leading to extreme deforestation. Villagers were thenceforth banned from entering the forest for any reason whatsoever. This has had a negative impact on people's attitude towards the forest and the National Park in general. The following section consists of extracts from in-depth interviews and focus group discussions on this topic, presented here in the form of a conversation. This provides a detailed presentation of the effect of the total conservation approach adopted by KINAPA, famously known as *the fences and fines* approach, on people's perceptions and attitudes towards KINAPA and the forest at large. KINAPA and the Half-Mile Forestry Strip issue were among the dominant themes that emerged in the conversations I had with the people living on the slopes of Mount Kilimanjaro. The Kilimanjaro National Park (KINAPA) issue, which is narrated hereunder, also serves as an illustration of how theories and policies of environmental protection that seek to distance people from access and use of surrounding natural resources are difficult to apply among the poor.

My interviews and experiences on the mountain slopes revealed that the total exclusion of the villagers from accessing and using the forest's resources has engendered an attitude of enmity

between KINAPA and the villagers. The villagers' sense of ownership of the forest and the mountain has waned. As a result, and contrary to the expectations of the government and KINAPA, destruction of the forest has intensified. An interview with a village chairman in Kibosho testified to the same. He said:

One of the biggest challenges we are experiencing in this village is to be denied access to the forest. Most of our needs were coming from the forests. For example, grass for our livestock, firewood, poles for building our houses, herbal medicine etc. But today, we can no longer get these needs from the forest after KINAPA took over the management of the HMFS from the Village and District Councils.

According to the village leader, KINAPA took control of the HMFS because the villagers and District Councils had failed to manage the forest. KINAPA claimed that the destruction of the forest had intensified, and thus they wanted to stop the trend. However, the village chairman claims that the destruction of the forest had not reached as bad a state as portrayed by KINAPA. From my own observations and interpretation of this interview, however, the destruction of the environment has increased rather than decreased, even after KINAPA took over its management.

Interviews and conversations with villagers further showed that the villagers had not received the decision very well. As a result, they did not cooperate with KINAPA in taking care of the forest and the natural environment around the park. They, for example, were not particularly happy with the decision to introduce foreigners from other areas as guards or park rangers. They wondered why KINAPA would entrust something that they had been taking care of to strangers who had no attachment to the land. The villagers believed that they knew more about the importance of the mountain and its value to them than outsiders.

A villager said:

Since they brought people here with weapons and paying them to protect the forest, our weapon will be not to cooperate with them. Since, they have entrusted the forest to those they think are capable of protecting it, we will show them that they are not capable of doing that without our assistance.

For this reason, the villagers began destroying the forest intentionally to show the government/KINAPA that they had taken a wrong decision. The villagers even vowed that they would not take any action even if they saw someone vandalising the forest because they wanted to show KINAPA that they could not succeed in protecting the forest by employing outsiders against the indigenous villagers.

Furthermore, interviews and conversations revealed that villagers were entering the forest and harvested trees unlawfully to meet their daily needs. This was because the KINAPA no longer involved the villagers in managing the forest and the villagers did not benefit from the forests anymore. For example, the village leaders explained that the Village Environmental Committees that used to work hand-in-hand with KINAPA wherein fact able to identify those who were using the forest against the set by-laws and regulations, because they were living with the "transgressors" and knew each other closely.

The decision to exclude villagers from the management of the mountain forests therefore made the villagers feel that the forests and the mountain did not belong to them anymore. As a result, would not care even when they saw people entering the forest unlawfully. In some cases they even set parts of the forest ablaze as a means of getting something from KINAPA. A village leader narrated thus:

...as a show of dissatisfaction with how KINAPA is managing the forest and the Mountain, some villagers would set ablaze parts of the forest. In such instances the KINAPA would usually ask the villagers to help in putting it out, so the villagers would use that chance to demand payment first before they can help. And in most occasions, the KINAPA would succumb to the villagers' demands.

This narration shows that the villagers no longer felt that sense of ownership of the resources on the mountain slopes. This is why I propose in Chapter 6 that an ethic of the environment in such a case must be able to restore the local people's sense of ownership regarding natural resources so as to win support for nature protection.

5.4.2 Human versus animal conflict

The interviews also revealed perennial conflict between humans and wildlife on some parts of the slopes of Mount Kilimanjaro. Human versus animal conflict occurs between villagers and wildlife on the Kilimanjaro Mountain slopes, especially in Rombo District on the eastern side of the mountain. This was also implied in interviews with wildlife officers from Rombo and Moshi Districts who said that their main responsibility was to control and combat problem animals that encroached on fields and settlements. Wild animals that invade villagers' fields and settlements include the elephant, *mbega* (colobus monkey), *nyani* (the baboon), and *kima* (the black monkey). These animals are seen as a nuisance around the mountain slope for they invade the farms of the communities and eat maize and groundnuts. According to a Moshi District Wildlife

Officer who was interviewed, some people kill the baboons and eat their flesh in the belief that eating it would enhance their manhood.

The most pronounced conflict is with marauding elephants coming from the Kenyan Amboseli and Tsavo game reserves. The Rombo District Wildlife Officer claims that they use guns, explosives, and pepper to control or kill the elephants, but these measures are far from adequate because the elephants, in most cases, come in numbers of over 300. As a result, the elephants overwhelm the wildlife teams from the District Council, and thus continue to destroy crops, invade villages, and maim and kill people. He said that his wildlife section managed to kill seven elephants that marauded human settlements and farms in 2012, but they were vigorously condemned by conservationists. Meanwhile the villagers who are affected by the elephants want to hear nothing but that the elephants are killed because, besides their lives and crops being saved, it is also an opportunity for them to get free meat. It is now customary in the area that news goes around at the speed of light when elephants are killed, and a crowd of villagers gather in a flash, each one with a knife so as to have a portion of meat from the fallen elephant. A villager in Rombo district told me that people nearly butchered one another in one instance in the scramble for the elephant meat. One could imagine a group of a hundred villagers scrambling for meat from one fallen elephant.

Human-wildlife confrontations also occur along the areas bordering the mountain forest, but here the conflict is mostly with primates who invade nearby maize farms. While the villagers complain that wild animals are destroying their crops, the Regional Government blames the villagers for invading wildlife corridors (Mariki, 2013). However, wild animals have been a problem on the mountain slopes and the threat they pose to lives and property is real, so something needs to be done to alleviate this problem. Studies show that destruction of life and crops by marauding wildlife results in a negative attitude towards them (Walpole & Goodwin, 2000).

In the Rombo district, which is the area most affected by marauding elephants, people see the government as giving more priority to elephants than to human life and property. A villager remarked, “when an elephant is killed the government makes a lot of noise condemning the 'poachers' but when our crops are raided and people killed we do not see equal efforts to help those affected coming from the government”.

Thus, because of the costs incurred on the villagers by elephants, and since the villagers do not receive any tangible benefit from the presence of these animals in their environments, it is difficult for them to understand things like preservation of animals because of their aesthetic value and their importance for tourism. It would be difficult for villagers to recognise the importance of wild animals besides their use/consumptive value. How could the villagers think positively about an animal that maims or kills them and destroys their crops? In fact, most of the villagers would rejoice and celebrate if they heard that elephants had been annihilated or extinguished, and that they would henceforth live in peace and expect their farms and villages to be free of marauding elephants. The answer I kept receiving from the villagers when I asked them whether they saw it as important or not to protect wild animals and their habitats could be summarised in the following response from a villager from Rombo District:

... how can we protect animals that are destroying our crops and killing us? We would be happier to have an elephant-free Rombo ... we get nothing from these animals apart from the losses [of crops and human life] ... Nobody wants these animals around.

We hereby see that Omond's earlier observation is still very much the case among the Chagga today. The foregoing assertion was also vindicated by one incident regarding the Rombo Member of Parliament who received high praise for telling the villagers that they should kill elephants wherever they saw them because the government had failed to protect them from the elephants. He also vowed to ensure that elephants that invaded his voters' farms were eradicated once and for all. He has become a hero among the people of Rombo and in fact was re-elected in Tanzania's 2015 General Elections. There is reason, therefore, to be concerned that wild animals are increasingly seen as a liability rather than an asset among the Chagga.

Nowadays, people on the slopes of Mount Kilimanjaro kill wild animals that invade human territories without fear of spirits or of transgressing taboos. To make things worse, the tendency of eating the flesh of these wild animals is rapidly increasing on the mountain slopes. A wildlife officer in Rombo district claimed that there is no one animal that the local people living adjacent to the forest do not eat today. Some villagers are already getting used to wild meat as a substitute for expensive beef and pork. Animals that have become a source of food or medicine include the elephant, some species of monkey like the black monkey, and the baboon. The black monkey (*kima*), for example, is hunted mainly for her fat, which is believed to cure certain forms of skin disease in children. Some parts of elephant organs, such as pieces of skin, are believed to have

power to drive off bad spirits when kept in the house. So, the belief that animals are the dwelling places or embodiment of ancestral spirits and that they should be left intact, no longer is held and has been replaced with the belief that some parts of their organs or flesh can be used as protection against evil spirits or witchcraft. The problem is that these habits may exacerbate the killing of these wild animals and hasten their extinction in the long term. If the habit continues, it poses a threat to the long-term survival of these species, so there is a need to articulate a conscious ethic of nature relevant to the Chagga to reverse this trend.

So, concerns or issues that people raise today such as drought, water scarcity and crop failure, conflict over access to resources, and human versus animal conflict show that the environment is increasingly conceived in terms of its immediate use value rather than its long-term non-use value or generally, in pragmatic terms. Thus a more practical approach is needed to address these issues. While I acknowledge the importance of nurturing non-use or non-consumptive spiritual and cultural values towards nature protection among the Chagga, I argue that this could be better achieved by addressing the above concerns based on use value seriously. It is my argument that environmental pragmatism, Norton's version in particular, provides us with the best way to doing just that.

5.5 Using Norton's three pillars in the Chagga context

As shown in Chapter 2, some of the conventional western approaches to environmental ethics fail when applied in an African context because, among other things, they are informed by different worldviews and value frameworks. I also showed in Chapters 3 and 4 that employing the traditional African beliefs and cultural practices (traditional African worldviews and value frameworks) as the sole foundation of an environmental ethic to resolve environmental challenges today (especially, among the Chagga) does not help much.⁴⁰ I showed that things such as the belief in the power of ancestors, totemism, taboos and "superstition" about the natural environment fail the test of time, context and relevance when applied to the current situation on the slopes of Mount Kilimanjaro. This approach, which is employed by both Murove and Kelbessa, is in opposition to a pragmatist's understanding of truth as contextual/local and dynamic. Although one may argue that Murove's and Kelbessa's approaches are local, i.e.

⁴⁰ This is also discussed at length in Chapter 3 where I referred to the weaknesses of Murove's and Kelbessa's approaches to environmental ethics.

contextual, they however remain embedded in the framework of a traditional past at the expense of current realities. These scholars moreover suggest a possibility of universalising their approaches, at least throughout Sub-Saharan Africa, in the sense that the traditional African beliefs and value framework could help resolve environmental problems in Africa because there are common elements in traditional African culture shared across Sub-Saharan Africa. Norton, to the contrary, emphasises beginning with real life experiences of the people and hence dealing with situations as they present themselves in particular contexts instead of looking for *a priori* general or overarching principles or rules to apply to specific situations (Norton, 2003). So, while Murove's and Kelbessa's framework of environmental ethics could, perhaps, work for the Shona and the Oromo respectively, I have shown that it does not work in the case of the Chagga. I showed that the current Chagga situation and the environmental challenges there call for a practical, down to earth, bottom-up approach to resolve them. That is why I defend the pragmatist's approach and hence Norton's process ethics as an alternative way that could help address the concrete environmental challenges faced on the slopes of Mount Kilimanjaro.

I now examine, briefly, the insight that Norton's environmental pragmatism, especially his notion of the three pillars of adaptive management and the process ethics implied, contributes in the quest to find an appropriate approach to address the environmental challenges discussed in the case study above.

5.5.1 Experience/ experimentalism

I explained in Chapter 2 that experimentalism is a central concept in Norton's adaptive management and process ethics. According to Norton, experimentalism is the commitment to use experience to reduce uncertainty with regard to the management of environmental resources and also in the process of the formation of values (Norton, 2005:3). With regard to my case study, experimentalism would mean subjecting all decisions regarding environmental management on the slopes of Mount Kilimanjaro to the test of experience as the more reliable source of truth. This means that decisions about the environment should be set up as a tentative hypothesis rather than as decisions imposed by political authority and experts. Decision outcomes should thus be tested and not assumed, and room (or safety margins) need to be allowed for in which a decision can be reversed if its outcomes do not meet the intended targets. Currently, as I showed earlier in this chapter, environmental management on the slopes of Mount Kilimanjaro still relies on

political authority and experts to dictate how to manage resources on the mountain slopes with little allowance for experience to determine the outcome of decisions about environmental protection. Furthermore, application of environmental policies on the mountain slopes is not designed as an open and tentative process. That is, there is no commitment to use our experience to reduce uncertainty, with the result that environmental decisions and policies have been met with resistance from the local people and most of these decisions and policies consequently failed to bring forth the expected result on the mountain slopes. For example, the ban on harvesting trees and the restriction to accessing the Half-Mile Forestry Strip were imposed decisions that did not result from an open, iterative consultative process. No mechanisms were put in place to constantly revise the decisions and make adjustments when experience required so. As seen in the interviews reported in this chapter, the villagers complained that those measures and decisions were hurting them, and thus not practical, on a number of occasions, but their complaints fell on deaf ears. The politicians and some experts were reluctant to revise their earlier decisions, as adaptive management requires, claiming that the villagers were only interested in exploiting the mountain resources without thinking about the long-term impact of doing so. However, as pointed out earlier in this chapter, the villagers behave as they do, partly because they do not feel that the mountain and its surroundings belong to them anymore. They have been deprived of that sense of ownership of the environment on the mountain slopes because they are not full involved in matters regarding environmental management on the mountain slopes. So, participation and involvement of the villagers in decisions and policies with regard to the environment on the mountain slopes is necessary to restore that sense of ownership for the surrounding villages and so is participation in processes for setting environmental targets that need to be met, and monitoring and assessing practical implementation of policy in order to determine its measure of success or failure. Thus, according to Norton (2005), full involvement of villagers in decisions regarding the environment will result in appropriate and acceptable interventions, but appropriate and acceptable interventions require taking context or local conditions seriously. I now turn to contextualism or localism.

5.5.2 Contextualism or localism

To recapture my explanation in Chapter 2, Norton's localism means sensitivity to a particular biophysical condition or place and the corresponding specific values upheld in a particular area (Norton, 2005). Localism requires that the process of decision making should be a consultative

process. Thus decisions that are reached without going through a community or political validation process have no credibility or reason to be implemented. Community validation processes allow emerging values to be tested to see whether they depict local people's interests adequately. To ignore this important step may lead to interventions and approaches to environmental ethics that are far removed from people's real concerns, as in the case of Murove and Kelbessa when applied on the Chagga context. So, a consultative process that involves the local people, scientists, and other experts will most probably bring results that are acceptable to many. Norton, writing with Steinmann, underlines the importance of an inclusive, consultative process in environmental management by noting:

[It] encourages the articulation of multiple values and goals, coupled with a process of ongoing discussion, debate, information gathering, and revision of goals... [where] citizens and stakeholders should be involved in this ongoing iterative process to build trust and expand database (Norton & Steinmann, 2005:535, 536).

Localism therefore requires some process and structures through which local authorities can generate, monitor and revise decisions regarding the environment. In the case of the Chagga, we see a serious lack of cooperation and trust between the villagers and the National Park authorities, as well as the regional government. The process and structures through which local authorities could generate, monitor and revise decisions on environmental management on the slopes of Mount Kilimanjaro, such as the Village Environmental Committees, are no longer functional, strictly speaking. All decisions regarding the environment today are made by KINAPA and the regional government for the claim that the village committees have failed to protect the environment. But this has resulted in more harm to the environment because the local people have felt more and more sidelined in issues related to the environment on the mountain and its slopes making them lose the sense of care and concern for the environment around the mountain. This is why they see the mountain and its surrounding environment as a liability rather than an asset. I explain in more details how localism could help resolve environmental challenges on the Mountain slopes in Chapter 6.

5.5.3 Multi-scalar analysis or thinking in multiple scales

As discussed in Chapter 2, multi-scalar analysis is the recognition that environmental concerns or problems unfold on multiples scales of time and place (Norton, 2003:93). Norton distinguishes three distinct time periods: a 0 to 5-year time period (in which economic values and processes

unfold), a 5 to 200-year time period (in which socio-political values and processes typically unfold), and a 200-year to indefinite time period (which represents geological time in which ecological values and processes are embedded) (Norton, 2003:68). So, for environmental management plans to have a long-term or sustainable effect, all three time periods should be considered. The environmental problems on the slopes of Mount Kilimanjaro are associated with climate change, forest destruction and soil erosion, all of which manifest themselves, or can have effects over very long time periods, even in the geological time-frame of 200 years to infinity, while their causes are embedded in the shorter time-frames of socio-political or economic processes. However, measures to tackle these problems have been based on short-term plans, that is, 0 to 5 years. They have generally been ad-hoc prohibitions that are not tested, and hence do not result from thoroughly thought-out deliberations over a long period of time. They are only short-term considerations. There have been no long-term sustainable plans on environmental conservation. According to Norton (2003), multi-scalar analysis requires that short-term considerations should be linked to longer-term outcomes over an extended period. It has been the Regional Government and KINAPA's argument that the villagers' interest in the natural resources of the mountain slopes is only based on short-term considerations such as feeding cattle, harvesting trees and food. But, as indicated above, this should be expected because the villagers do not feel that the mountain and its environs belong to them anymore *as a mountain*. They only see it as a resource and use any opportunity that comes their way to exploit the environment. Any short-term and long-term strategies on protecting the environment on the mountain slopes must therefore involve the villagers from the word go, with the understanding that while short-term strategies like policing and bans might succeed in the short term, these measures may be costly and not very effective in helping to change people's behaviour and attitudes towards the environment in the long term. Understanding environmental problems as playing out or unfolding over an extended time period of centuries, may require a change of strategy in environmental governance and in communicating "environmental messages", including addressing motivational issues and working on people's attitudes, rather than the quick-fix solutions of policing and bans.

5.6 Conclusion

This chapter has been about examining the current environmental concerns of the people living on the slopes of Mount Kilimanjaro as they interact with it on a daily basis. As it turns out, the local people's real concerns with the natural environment are quite detached or removed from the issues that preoccupy theoretical environmental ethics (both western and African). Today, people living on the slopes of Mount Kilimanjaro see the natural environment as having a utilitarian or use value more than religious or spiritual value. The Chagga no longer see the mountain as sacred, nor do they usually see the forest as a place of spiritual significance. Instead, the major concerns of the villagers on the mountain slopes now have more to do with the practical issues of access to, and use and distribution of benefits from the natural resources on the slopes for their immediate existential needs. Protecting the natural environment for its own sake or for non-consumptive instrumental values such as aesthetic, recreational, scientific, etc. (i.e., as conceptualised by a western type of environmental ethics), or for its traditional religious and cultural purposes (i.e., as conceptualised by an indigenous type of African environmental ethics) seems to be alien to them. It may be said, therefore, that the kind of environmental problems that the people living on the slopes of Mount Kilimanjaro experience today cannot be resolved adequately by appeals to either the conventional western environmental ethics or the indigenous traditional African environmental ethics, as propounded by people such as Kelbessa and Murove. I have argued that indigenous African environmental ethics as advanced by Murove and Kelbessa is largely biased towards the traditional past, just like the mainstream environmental ethics (intended to be international environmental ethics) is biased towards western perspectives and cultural influences. As a result, indigenous African environmental ethics as currently formulated lacks that persuasive power necessary for influencing the local people to protect their natural environment under the current circumstances.

In the next chapter, which is the final chapter of this dissertation, I show, in some more detail, how Norton's three pillars of environmental pragmatism and the process ethics that it implies could help to address environmental challenges and concerns on the slopes of Mount Kilimanjaro. I will show that, properly applied to the Chagga context, Norton's approach can also address the motivational and attitudinal issues that are evident from the case study. I showed in Chapter 2 that motivational and attitudinal issues are also important aspects in the formation of an environmental ethic in any society.

CHAPTER SIX

ADDRESSING ENVIRONMENTAL PROBLEMS AROUND MOUNT KILIMANJARO USING THE ADAPTIVE MANAGEMENT APPROACH

6.1 Introduction

In this last chapter of the dissertation, I show, by using the principles of adaptive management and the process guidelines they entail, that the environmental challenges faced on the slopes of Mount Kilimanjaro basically are problems of management. I do that by discussing the problems or weaknesses in the management of the natural environment around the mountain slopes. I show that these problems of poor management could be explained by the lack of full involvement or participation of the local people and other stakeholders in decisions regarding the management of the mountain environment. I also argue that the problem of lack of participation has created a further problem of loss of a sense of pride and of ownership of the mountain and its forests, and hence the loss of sense of place values. I argue that addressing these problems of participation and the loss of the sense of pride and ownership of the mountain, especially restoring the sense of place values among the people living on the slopes of Mount Kilimanjaro, is the key to resolving environmental challenges there. I show that environmental pragmatism, in particular, and the adaptive management process guidelines as proposed by Norton and others could help us to address these issues. Let us begin by first discussing how environmental management problems on the mountain slopes are problems of participation.

6.2 Environmental management and the problem of participation

I should mention at the outset that the problem of participation in development issues, and in particular in environmental management issues is not new. It has been researched and talked about for decades (see, for example Chambers, 1983; Havnevik, 1993; Mohan & Stokke, 2000; Cooke & Kothari, 2001). Yet, problems of participation or full involvement of communities in development issues, in particular, environmental management decisions, continue to-date. My concern in this chapter is to show the essence of the problems of participation in environmental management on the slopes of Mount Kilimanjaro, and how Norton's adaptive management approach and process ethics implied give us a new way to understand and address such problems

of participation and other closely related problems such as loss of sense of place values among the people living around the mountain slopes.

I showed in Chapter 5 that many environmental conflicts on the slopes of Mount Kilimanjaro are largely due to management weaknesses. These problems/conflicts could be divided into three aspects. The first one is the problem of access and use of forest resources on the mountain slopes. The second one concerns the problems of fair sharing of benefits/revenue accruing from the tourism industry on the mountain slopes. The third one is the problem of wild animals. The problem of wild animals is important because it is also directly related to conservation and protection of nature on the mountain slopes. I show, below, how all these problems and concerns are problems of participation.

6.2.1 Access and use of resources as problems of participation

I showed in Chapter 5 that people living on the slopes of Mount Kilimanjaro depend almost entirely on the natural environment for their livelihoods. The villagers need to access the forest to obtain immediate needs such as firewood, grass and fodder, poles and timber, and medicinal herbs. We also saw that the villagers sell whole trees from their small plots, or timber, for cash for daily survival needs. On the other hand, the Regional Government and KINAPA have been trying to protect the environment by measures that include keeping the villagers as far away as possible from the mountain forests using different tactics. Bad environmental decisions and the use of draconian rules or orders have made villagers less supportive of environmental protection and care, however. It was noted earlier that scholars have warned severally that environmental protection policies and regulations that ignore the needs of the local people are doomed to failure. In other words, an approach to environmental ethics of nature preservation that does not find a balance between the needs of humans and those of nature can hardly succeed.

The Regional Government's order to ban harvesting of trees on the villagers' own farms and the restriction to access and use of natural resources from the Half-Mile Forestry Strip on the mountain slopes are among the things that show exactly what not to do when you want people to participate and develop consciousness and support for environmental protection. The impact of those decisions shows us that people cannot be persuaded to change their habits and attitudes towards the natural environment by means of coercion. We have seen that the ban in fact resulted in even more destruction of the environment as well as other unethical activities such as

corruption and theft on the mountain slopes. Adams and McShane (1996:15) put it blatantly that “the tendency to ignore the needs of people on the border of national parks betrays a bewildering lack of common sense”.

Adams and McShane (1996: 243) further observed:

Rural Africans rely on their natural surroundings for their livelihood, and they have always been willing to make sacrifices in order to manage it. Ensuring their involvement in taking care of the natural environment, however, means taking their needs seriously.

Villagers on the slopes of Mount Kilimanjaro show readiness to protect the natural environment when they are given alternative sources to meet their needs. Scholars argue that environmental consciousness and support for environmental protection may develop among the poor only if they feel and see that they have a stake in sacrificing to protect nature. That means that villagers around Mount Kilimanjaro will protect the environment if their livelihoods are not compromised by doing so. The environmental gospel, as it is preached today, is meaningless to the rural poor if their immediate needs are not addressed concurrently. As Guha and Martinez-Alier (1997: xx) observed:

...poor countries and poor individuals are not interested in the mere protection of wild species or natural habitats, but do respond to environmental destruction which directly affects their way of life and prospects for survival.

Furthermore, it is argued that to win support for environmental protection among the poor, the survival or livelihoods of the local people should simultaneously be taken on board; short of that environmental protection efforts will be rendered futile (Adams & McShane, 1996; Guha & Martinez-Alier, 1997). The situation on the slopes of Mount Kilimanjaro shows the contrary, namely that environmental protection is given priority and the villagers' livelihood needs are given less consideration. KINAPA protects the environment instead of managing people's interaction with the environment. As a result the local people have been alienated from an environment with which they have been connected for years. They feel that they are being estranged from the natural resource they had been using for their existential needs for years. The ill-treatment they receive from KINAPA guards makes them see the resource around them as a curse, not a blessing. The villagers rightly wonder why the natural environment would be valued over human dignity. In retaliation, they try to destroy and vandalise the forests whenever the opportunity arises. It has been warned that the “lack of attention paid by governments and

authorities overseeing natural resources like forests and wild animals to the surrounding local communities makes them develop a lasting indifference to the natural resources” (Adams & McShane, 1996:xv).

As I showed in Chapter 5, the villagers are not really responsible for much of the destruction on the mountain forest, especially in the Half-Mile Forestry Strip. Business people in collaboration with the local and national political elite, rather, are the real culprits through the logging and timber business. The needs of the villagers are very modest and they do not pose such a big threat to the natural environment. Actions like collecting firewood, grass for fodder, herbal medicine, poles for building, etc. are not likely to deplete the forests at such a fast rate. They have, in fact, been doing this for decades without much serious harm to the natural environment because they had their own regulations and rules that were effective. The fact that poor villagers do not afford modern expensive machines and chainsaws that make it easier to harvest large numbers of trees and timber in a short period of time means that the depletion of trees and forests was made possible by rich, business people, including some local government leaders who run sawmills. Thus, if a few people at the local, national and international level continue to have the privilege to benefit from the natural resources at the expense of the poor we should not blame the poor when they “encroach” on the protected areas for their survival. It has been noted that poor people engage in activities that may degrade the natural environment, not because of ignorance or greed, but out of necessity (Sai, 1984). Therefore, to impose bans and restrictions on the use of trees and forest resources on people whose lives to a large extent depend on those resources without providing them with alternatives is mind boggling.

Other scholars have argued that conflict in protected areas due to resource extraction, strict rules on forest resource use and access, rude behaviour, harassment by park rangers, all generate negative attitudes toward park authorities and the protected area (Ormsby & Kaplin, 2005; Allendorf, 2007; Heinen & Shrivastava, 2009; Shibia, 2010; Infield & Namara, 2001).

In fact, the pace of the destruction of the natural surroundings around Kilimanjaro increased during the implementation of the liberalisation policies in Tanzania, that is, from the late 1980s onwards. It is at this time “when the social forest slowly slipped out of the control of the villagers and was unofficially turned into a commercial forest” (Sébastien, 2010). So, the poor villagers are being unfairly accused and thus punished for a problem for which they are not

largely responsible. Dialogue and deep engagement with the villagers on issues regarding the mountain and the forests would help the responsible authorities to reach a proper and just remedy for the problem.

Now, taking the needs of the people living around the slopes of Mount Kilimanjaro seriously means involving them fully in decisions regarding management and use of resources on the mountain slopes. I mentioned at the beginning of this chapter that environmental ethics is about persuasion. It is about supplying people with reasons to see the need to protect nature. It is about convincing people that nature around the mountain slopes is worth protecting. How could this persuasion be possible if the local people are not fully involved in decisions about management of the natural environment around the mountain slopes? How could persuasion be possible when the local people have been estranged from the mountain and its forests? How could this persuasion be effective among villagers on the slopes of Mount Kilimanjaro if they see the natural environment or resources around them as a curse? It has been established that when people are alienated from the natural environment their ability to understand and connect with it fades (Adams, *et al.*, 2004). The result is that they can destroy and vandalise the natural environment without any sense of guilt or remorse because “after all it belongs to the government”. And what belongs to the government is nobody’s property, as the villagers would say.

To conclude the above discussion, I reiterate that the problems of access to the mountain forests and related complaints are down to lack of full involvement of the local people in decisions regarding to the management and use of the mountain resources. I show later on how this problem of participation could be addressed. However, access to the mountain and its forests is not the only concern of the people living on the slopes of Mount Kilimanjaro, there is also the problem of sharing benefits accruing from tourism on the mountain.

6.2.2 Equitable sharing of benefits/revenue as a problem of participation

Equitable sharing of the income accruing from mountain resources was another important issue that arose in the case study. It was clear that villagers living on the slopes of Mount Kilimanjaro do not feel that they benefit from the presence of the mountain and the forests around it. Although KINAPA claimed that they uphold their “corporate responsibility” through making contributions for social services such as assisting in building hospitals, schools and

roads/bridges, the villagers do not feel that these things are enough. The villagers want their immediately felt needs to be met. The villagers want to see direct and tangible benefits that address their needs such as firewood, income, grass and fodder for their livestock, poles for building, etc. These are things around which many conflicts with KINAPA are based. Thus the villagers feel that the impact that a school or a dispensary might have on them is minimal compared to alternative means to satisfy their immediate livelihood needs instead, for example, through providing them with cheaper sources of energy. On the other hand, KINAPA feels that something like a dispensary is more feasible and hence could have more direct tangible impacts on the villagers. Note the clash of priorities here because of lack of full involvement of the villagers in these kinds of issues.

The importance of equitable sharing of the benefits accruing from natural resources with people living in the proximity of those resources in shaping attitudes and hence finding support for the protection of the resources is widely emphasised by scholars (see, for example, Mundanthra & Ndhlovu 1992; Adams & McShane, 1996; Ormsby & Kaplin, 2005). However, benefit sharing between KINAPA and the surrounding villages leaves a lot to be desired.

Although KINAPA, true enough, make some contributions like assisting in building schools, dispensaries and bridges, most villagers are not happy with these things, and they do not feel that these are their priorities. They want benefits that address their immediate needs directly. They want to be able to collect firewood, grass, and poles from the forest as well. These are the things that matter most to them. So, either the villagers are educated on how to harvest the natural resources around them sustainably to fulfil their immediate needs, or they are provided with alternatives. They should be made to feel that the mountain and the natural resources around it belong to them. Their indifference to the mountain and the forests emphasise that they no longer feel that the forest belongs to them. They do not care much whether the surrounding environments are destroyed because they do not really feel that they benefit from it. For the villagers, to reiterate, the mountain and the surrounding forests have become more of a liability than an asset.

Furthermore, some village leaders said openly that they did not believe that what they receive from KINAPA is commensurate with the revenue earned by KINAPA. They complain of lack of openness and transparency from the KINAPA management in terms of, for example, the criteria

used to support certain villages and not others. Sometimes allocation of funds to the villages is said to be made on political grounds and favouritism. The villages with influential politicians are favoured. And sometimes “who gets what” is solely based on the goodwill of KINAPA officials or “who knows who”. The foregoing claims seem to be supported by the fact that some districts are known to have received more fund allocations than others. Not only that, districts that are far away (more than 60km), from the mountain forests (and thus do not deserve such a privilege) also received funds allocations thanks to the influence of some high profile politicians (Mariki, 2013). This denies villages that are entitled to those funds their share because they do not have the ‘voice and the power’ to demand their deserved share. The Moshi town municipality, which is not among the districts adjacent to the mountain forest, also receives the lion’s share of fund allocations, again depriving the villages in proximity of the forest their deserved share. As a result the villagers destroy the forests and KINAPA invests heavily in policing or patrolling the forest, thereby leaving very little money for the villages in a vicious cycle of some sort.

The problem of giving less consideration to the needs of the villagers surrounding the mountain slopes does not seem to be a problem for one KINAPA official who said:

The main role of KINAPA is conservation, and so the revenue that accrues from the Mountain resources should be used for the same purpose. If we generate excess revenue then we may share it with the local people ... Even if we get a lot of money we use it to maintain the park and the industry’s infrastructure as a whole. Things like advertisements, security, and general management of the park use a lot of money. So we are usually left with very little money to spend on corporate social responsibility.

So, according to the KINAPA official, an ecologist by profession, the local people are not a priority and an integral component of their conservation goals, thus they have to wait for the excess revenue from KINAPA. If there is no excess they should forget about it. The foregoing remark by the KINAPA official shows also that people’s livelihood needs are not a priority of KINAPA. Meanwhile scholars have repeatedly emphasised that conservationists can no longer ignore the needs of the local people if they expect their support for environmental protection; they must fit the local people into their equations or their conservation efforts are doomed (Adams & McShane, 1996). That is why, as I noted earlier, it is emphasised that environmental ethics should be about managing people’s interactions with nature; aligning their attitudes and values to support environmental protection, rather than protecting nature from people’s

interference, as is evident on the slopes of Mount Kilimanjaro. This attitude of keeping people as far away as possible from surrounding natural resources is incompatible with the whole idea of bottom-up decision-making processes that are central in Norton's process ethics. This is because, if people are not a priority in the efforts to protect the environment on the mountain slopes, KINAPA and other authorities will not see the need of full involvement of the villagers in management decisions on the mountain slopes.

I showed in Chapter 5 that most of the revenue from KINAPA goes into paying park rangers and guards with very little going into community services and outreach programmes. It has been established that only one percent of the staff are specialised in Community Conservation Services while sixty-eight percent are in law enforcement (Mariki, 2013). This gives a clue to the degree in which KINAPA sees the villagers as a problem that needs to be overcome instead of as collaborators in solving the conservation problems on the mountain slopes. Under such circumstances, participation of the local community becomes a myth. Infield (1988:45) quite rightly laments that:

If some of the resources spent on policing were used to integrate local communities into the environmental protection programmes through better education programmes, public relations and packaging of the conservation message, a dramatic change in attitudes – and quite likely in the need for such high levels of policing – could be effected.

Besides that, a big chunk of revenue from KINAPA goes to the central government and TANAPA headquarters, leaving an insignificant amount for the surrounding villages and communities. For example, only 7.5 percent of the revenue accruing from all Tanzanian National Parks and protected areas goes into programmes to support social services for the villages surrounding the protected areas (Mariki, 2013). To make things worse, a large part of the revenue from tourist activities on the mountain slopes goes into supporting other parks in the country that are not generating enough income to run on their own. This has denied the villages around Mount Kilimanjaro their fair share of the revenue accruing from the resource. That is why they complain that they do not see the benefit of having the mountain and the surrounding resources.

Further still, the villagers also mention the lack of spill-over or trickle-down benefits from KINAPA. According to the villagers, the KINAPA workers are mostly strangers who no longer

live among the villagers. This means that KINAPA workers no longer contribute to the economy of the surrounding villages, for example, through spending some of their income on renting houses and buying minor domestic needs like vegetables, milk, etc., from the villagers. Some scholars recommend that local people should be employed in the management and running of protected areas, and that the park staff should live among the local people (Mbaruka, 1996). Bringing workers from outside who do not share local attitudes and customs has potential for resistance and negative feelings toward the protected area (Hughes, 2006). This is exactly what has happened on the Kilimanjaro Mountain slopes. It is also contributing much to the villagers' loss of the sense of ownership and pride in their resource. As I mentioned earlier, the problem of loss of pride and ownership of the mountain resources is another important issue that is directly connected to participation. I take this up later on and expound on it in line with Norton's adaptive management ethics and the process guidelines.

Now, whether some of the claims of the villagers discussed above are true or not, the point is that there is a clear problem with lack of full participation of villagers and other stakeholders in matters relating to the management of the mountain resources. The above scenario needs to change if the villagers are to perceive the mountain and the surrounding natural environment at all positively; which is a necessary condition to win their support for the protection of the natural resources/environment. How can this state of affairs change? Again, my argument is that the requisite and genuine change will come through full involvement of the local people and other stakeholders in these matters.

The issue of participation in decisions regarding the management of the natural environment on the mountain slopes does not only relate to the mountain and its forests; the problem of full engagement of the villagers on how to deal with problem animals, elephants in particular, is another concern.

6.2.3 The challenge of wild animals as a problem of participation

I showed in Chapter 5 that there is perennial conflict between humans and wildlife on parts of the slopes of Mount Kilimanjaro. The human versus animal conflict between villagers and wildlife on the mountain slopes, especially in Rombo District to the eastern side of the mountain. Most of this is caused by marauding elephants coming from the Kenyan Amboseli and Tsavo game reserves. Most of the villagers on the highlands have farms in the plains where their crops

such as maize, cassava, millet, groundnuts, sunflower and beans have been targeted by these wild animals for years now (Soini, 2005). Human-wildlife confrontations also occur along the areas bordering the mountain forest, but here it is the primates that invade nearby maize farms. When villagers complain that wild animals are destroying their crops, the authorities shift the blame, saying that the problem is that villagers invade wildlife corridors (Mariki, 2013). However, the most pronounced conflict indicated during interviews is with the marauding elephants on the plains. The destruction of crops by marauding wildlife results in negative attitudes towards animals (Walpole & Goodwin, 2000). That is why Omond (1994:70) asserts that:

Experiences of wildlife problems cause a very permanent feeling, especially where it involves loss of human life or an entire source of livelihood. In communities with subsistence economies even small losses can be of great economic importance and can generate negative attitudes towards wildlife and nature preservation in general.

In Rombo District, which is most affected by the elephants, people see the government as assigning greater priority to elephants than to human life and property. A villager remarked, “when an elephant is killed the government makes a lot of noise condemning the ‘poachers’ but when our crops are raided and people killed we do not see equal efforts to help those affected coming from the government”. Thus, Sifuna (2010:46) correctly observes:

While humans have responsibility for animal welfare, human welfare is paramount and should be given priority. Notably, while states have, pursuant to the doctrine of permanent sovereignty over natural resources, the duty to safeguard wildlife within their territories, they also have a corresponding duty to ensure that these animals do not undermine social life, and economic productivity.

It is difficult for the villagers to understand things like preservation of animals because of their importance for tourism because they do not receive any tangible benefit from the presence of these animals in their environment and because of the costs elephants incur on the villagers. How could they think positively about an animal that maims or kills them and destroys their crops? In fact, most of the villagers would rejoice and celebrate if they heard that elephants have been annihilated or extinguished, and that they will live in peace and expect their farms and villages to be free of marauding elephants. The foregoing assertion is vindicated by the incident of the Rombo Member of Parliament being praised for telling the villagers that they should kill elephants wherever they see them because the government failed to protect them from the

elephants. He also promised his voters that he would make sure that elephants that invaded their farms would be eradicated once and for all.

Among other things, the perennial complaints by the villagers about the problem of elephants are due to local people not being fully involved in finding solutions to the problem of the elephants. The attitude of local people to the elephants and the responsible authorities attest to the lack of full involvement of the villagers in finding a common solution to the problem. While it is true that the District Government through their wildlife officers take some measures to address the problem, such as the use of explosives, firearms, paper sprays, etc., these measures are very ineffective and thus do not provide a long-term solution to the problem. As mentioned earlier, the local people have not been fully involved in finding a long-term solution to this problem. My argument is that full involvement of the villagers and other stakeholders for tackling the problem of elephants may lead to a permanent solution to this problem, and even be one of the contributing factors to restore their sense of ownership of the mountain resources.

6.3 The importance of full involvement of the local community

Part of my argument in this chapter has been that there is minimal involvement of the villagers in matters concerning the management and use of natural resources on the Kilimanjaro mountain slopes. This was apparent in how the decisions to ban harvesting of trees on the mountain slopes and the restriction of villagers to access the Half-Mile Forestry Strip (the buffer zone) were reached. The reaction of the villagers to these decisions, which resulted in even more destruction of the natural environment, underlines the importance of full involvement of affected people in making decisions that affect their sources of livelihoods.

It is ironic that, despite the fact that the Tanzanian Natural Resources and Tourism Policy emphasises decentralised approaches to natural resource management through involving the local people in decisions affecting natural resources in their areas, the situation on the ground has been quite contrary to that policy goal (Mariki, 2013). Many scholars emphasise the importance of people's participation in decision making about the use and management of natural resources as a way of winning their confidence and support for environmental protection (see, for example, Berzetti, 1993; Dhar, Rawal, Samant, Airi & Upreti, 1994; Gibson & Marks, 1995; Songorwa, 1999; Hulme & Murphree, 2001).

With regard to the controversial and indiscriminate ban on harvesting trees and forest products in the entire Kilimanjaro Region issued by the Regional Government, it was evident that there was a bigger problem concerning participation by villagers in reaching that decision. It is interesting to note that almost all village leaders were involved in the meeting that passed the decision, but were the same people who began complaining about the decision when it became difficult to implement. However, it was reported that, although there was a turn-out of stakeholders at that meeting, it comprised a lecture more than a discussion. The village leaders did not participate in making the decisions in the wider sense of the term participation. It was a ready-made decision and they were asked to assent to it. It did not come from the village leaders themselves because they were only asked to approve the decision. It is no surprise therefore that the decision became highly unpopular among the people living on the slopes of the mountain.

Not only did village leaders participate only marginally, the villagers' opinions also were not sought before reaching the decision. What happened is that village and cell leaders were sent to communicate the message to the villagers. One villager reported that "they came to warn us to stop harvesting trees from our farms and the forest", giving the clue that the villagers did not feel that they owned the decision. There had been no deliberation among them about the best way to combat the problem of deforestation and the rampant harvesting of trees on their farms; when the Regional and District government officials held meetings with the villagers, it was to explain and clarify the decision that had already been reached. This was top-down decision making par excellence and very much against the spirit of Norton's process ethics that emphasises genuine participation as a dynamic, ongoing process of social learning and communication among individuals that seeks to preserve the plurality of values in an ongoing decision-making process rather than a discrete event or events, and the two-directional episodic information exchanges between decision makers and the public as it has been the case on the slopes of Mount Kilimanjaro (Norton, 2003:519). It is through genuine participation thus understood that the values and concerns of the local community on the slopes of Mount Kilimanjaro will be given room or space to force their way up to inform environmental policy and management decisions.

Environmental management scholars furthermore point out that the attitude of people toward the natural environment is largely determined by how decisions about issues related to the natural environment are made; especially, by whether the local community have the control and makes

its own choices about what will happen to its environment (Adams & McShane, 1996; Hughes, 2006: 105). Hughes, for example, points out that the declining power of local communities over their own environments is one of the prominent issues for the environment in the coming decades, especially in Africa. Studies show that, although the majority of people supported the protection of the natural environment or a park, they developed a very strong negative attitude and resentment towards the authorities when decisions to restrict the use of the forest resources were passed without their full consent (Walpole & Goodwin 2000; Silori, 2007; Sifuna, 2010; Mariki, 2013). Thus, it is evident that the protection of the environment and natural resources will be supported only if people are fully involved in the planning, management and use of the natural resources in their vicinity.

To sum up, the above discussion has been about environmental challenges and concerns on the slopes of Mount Kilimanjaro, why they are problems, and why they need to be addressed. I also established that many of the environmental challenges on the mountain slopes arise because of two related reasons. The first one is lack of full involvement or participation of all stakeholders in decisions regarding the management of the natural environment around the slopes of Mount Kilimanjaro. The second one, which follows from the first reason, is the loss of a sense of pride and ownership of the mountain and its surrounding forests and animals. The one pertinent question that remains is: How do we go about addressing these two related problems; namely, lack of participation or wide involvement of stakeholders in decisions regarding management and use of resources on the mountain slopes, and loss of pride and the sense of ownership of the mountain and its forests? It is my considered position that the solution to these problems is to be found in Norton's adaptive management guidelines which basically underlie a process proposal or method.

6.4 Addressing the problems of participation using Norton's approach

As mentioned earlier, Norton's three pillars of adaptive management and their underlying process ethics give us some guidance on how to go about addressing these kinds of environmental management problems rooted in the problem of participation. When we examine Norton's three guidelines, i.e., experimentalism, multi-scalar analysis and localism or contextualism, and the process guidelines that he proposes, we see clearly that Norton's

approach actually comprises a methodology to bring about true or genuine stakeholder participation in the management and resolution of environmental problems.

6.4.1 Commitment to experimentalism

The first principle of adaptive management is commitment to experimentalism. Quoting Lee (1993), Norton (2003:521) writes: “Adaptive management is management designed to use the experimental method – in juxtaposition with public involvement and stakeholder advocacy – to reduce uncertainty in environmental decision making.” Public involvement or community participation is therefore central to the principle of experimentalism. Experimentalism, furthermore, is about subjecting all environmental management policies and decisions to the test of experience. Experimentalism is experiential learning. It entails an ongoing formulation and reformulation of both management goals and experiments through involvement of affected stakeholders to build trust, which is essential for social learning (Norton, 2003:523). For social learning to occur, it is therefore essential that communities remain sufficiently involved and committed to an ongoing process of participation and in setting management goals and priorities. I should emphasise here that communities should not just participate but should remain sufficiently involved in decisions regarding management and use of resources on the mountain slopes. As shown in Chapter 5, this aspect of Norton’s adaptive management ethics was conspicuously missing in the environmental management on the slopes of Mount Kilimanjaro. I showed that decisions regarding access to natural resources on the slopes of Mount Kilimanjaro were described by the local people as having been imposed by KINAPA and the Regional government authorities. Some village leaders claimed, in fact, that KINAPA and the Regional government colluded or conspired to impose harsh regulations and rules on the villagers. Note the lack of trust here because of the lack of genuine participation by the villagers. KINAPA and the Regional government resorted to protecting the mountain resources through draconian and less democratic rules, which proved a failure. The failure could be attributed, among other things, to the lack of commitment to social learning through experimental adaptation. According to Norton (2003), concrete experience as located within a very specific context should be the point of departure when environmental policy and management practices are to be formulated and implemented. In order to take concrete experience seriously, members of the society need to be in conversation with one another. Environmental managers, policy makers, and the community need to be in reiterative discussion with one another. For all these discussions to be

effective, public and democratic participatory processes and bottom-up approaches in decision making regarding the environment must be upheld. Thus, through democratic participatory processes, all stakeholders – the villagers, the environmentalists including KINAPA, scientists, environmental experts, and the government authorities and politicians, should ultimately come to a common understanding of the problems and how to address them through iterative discussion in spite of having diverse interests and value commitments. This is because adaptive management basically is a participatory democracy, that is, it attempts to take the diverse interests and values of different stakeholders into the environmental decision making process. In this sense, adaptive management is pluralistic in that it seeks to help communities and stakeholder groups with diverse values and interests to articulate, discuss, revise, and reconcile competing values and interests through the participatory process (Norton, 2003:517).

The social learning that is central to adaptive management cannot happen without the full participation of all stakeholders through dialogue and democratic public discussion. Decisions regarding environmental management on the slopes of Mount Kilimanjaro have not been democratic and participatory enough or inclusive of all stakeholders. Further decisions regarding environmental management on the mountain slopes were not subjected to the test of experience; as such, there were no feedback mechanisms to allow learning from mistakes. Lack of participation means that social learning through communication and cooperation, an important aspect of adaptive management, was not given enough space on the slopes of Mount Kilimanjaro. Dialogues and forums of discussions, which are critical in adaptive management, were not given enough space especially on village level to identify the real causes of environmental problems on the mountain slopes and their solutions. As a result, there has been vigorous resistance to the environmental management decisions made by the Regional Government and KINAPA. Even environmental experts at the level of districts have distanced themselves from these decisions. The villagers have simply been passive recipients of directions from top management. Participation has been about information exchanges between the decision makers and the public. This kind of participation, as I noted earlier, implies that sufficient interaction, discussion and hence social learning among community members to allow sufficiently valid “truth” to emerge was lacking.

6.4.2 Identifying multiple scales

Another important guideline of adaptive management is identifying multiple scales. In terms of environmental management on the mountain slopes, multi-scalar analysis would be possible if stakeholders were made aware that environmental problems are played out on different spatial-temporal scales, and thus they need long-term solutions. It is about being able to understand the long-term impact of our decisions and actions on the environment; that the people on the slopes of Mount Kilimanjaro should begin to learn “to think like a mountain”, to use Aldo Leopold’s metaphor. That is to say it is only the mountain that has lived long enough to see the long-term effects of environment changes in the concerned area. That is why Norton proposes three distinct time frames within which environmental problems should be understood. According to Norton (2003), environmental problems should be understood as unfolding over distinct time periods or scales. The 0 to 5-year time period; the 5 to 200 year time period and the 200 year to infinity time period. Thus environmental management policy and decisions should focus further than the usual short-term 0 to 5-year planning to a 5 to 200-year timeframe. That being the case, short-term, quick-fix solutions such as those attempted on the slopes of Mount Kilimanjaro could not lead to a long-term solution to the problem. Environmental protection does not fit in a 0 to 5-year framework, that is, a short-term framework. When we talk of environmental protection or conservation we are referring to the long-term future. Thus long-term or sustainability indicators must be used. This approach is multi-scalar in the sense that these indicators will be used to assess the management decisions made about environmental protection on the mountain slopes in terms of whether the specific set aims are serving longer-term sustainability goals. Measures and environmental management decisions that have been taken on the slopes of Mount Kilimanjaro have been very vague. Currently, of course, the only indicator that is used to track progress of the condition of the mountain in general is the volume of snow on the mountain’s summit. The rapid disappearance of ice fields on the mountain has generally been used to raise the alarm about the graveness of the situation on the slopes. Scientists, for example, had estimated that there would be no ice left on the summit by 2015. This prophecy of doom did not come to fulfilment, though. While there is so much politics and propaganda around the issues of environmental crisis and climate change, some truth concerning the relationship between the melting of the snow cap and environmental destruction around the mountain slopes exists. A point of caution is in order here; that, studies have shown that the disappearance of ice-fields on the mountain cap is contributed

to by many factors, some of which are beyond what happens around the mountain slopes in the form of land use changes.

So, apart from the indicator of the melting of ice-fields, which is usually monitored by the international climate change community rather than the local scientists, there are no other clearly set indicators of progress. For example, what would indicate that the measures taken by the Regional Government and KINAPA are achieving the expected results is not clear. Enthusiasm with environmental protection on the slopes of Mount Kilimanjaro has been largely dependent on the goodwill and interests of the Regional Commissioner, a political figure. So, it may happen that, when he is moved to another area, most of what he has begun (regardless of whether he used the correct approach or not) will collapse. Thus, besides the problem of vagueness of some of the orders and measures to protect the environment on the slopes of Mount Kilimanjaro, there is also the problem of continuity to oversee a long-term sustainability environmental protection framework on the slopes. Most of the measures taken are ad-hoc and thus fail to address environmental problems on the mountain slopes as multi-faceted and multi-scaled in that they unfold on different scales of space and time. The approach also does not link or integrate the short-term and long-term impact of decisions. So, to adopt Norton's guideline of multi-scalar analysis on environmental management on the slopes of Mount Kilimanjaro, many changes will be needed including an explicit longer-term framework of environmental management that represents Norton's 5 to 200-year time period, and would be able to demonstrate the impact of decisions and programmes over the longer term.

6.4.3 Sensitivity to the local context (localism or place sensitivity)

Connected to multi-scalar analysis is the fact that all environmental problems are localised. They are located in a particular place with its geophysical and socio-cultural particularities and peculiarities. So, localism requires being sensitive to local conditions, wisdom and values by which people live. Being contextual with regard to environmental management and decision making on the slopes of Mount Kilimanjaro also includes empowering the local people or villagers through their representative advisory committees to be involved as much as possible in decision making and resource use. As alluded to earlier, the direct involvement of local people and other stakeholders in the identification and alleviation of environmental problems is key to ensuring support and effective implementation of environmental management decisions. It can

be expected that robust information and data that depict the local peoples' values and concerns will be generated through these processes of participation where indicators that represent local values and desirable biophysical conditions are chosen. These proposed indicators and eventual development paths could then be made available for discussion purposes at higher forums such as Village Environmental Committees and Ward Environmental Committees at which villagers are represented.

Such indicators could be obtained through a combination of public participation processes and consultations with scientists and other experts. Norton writing with Steinmann (2003:535, 536) propose a system of evaluating development paths that encourage "the articulation of multiple values and goals, coupled with a process of ongoing discussion, debate, information-gathering, and revision of goals". They suggest that citizens and stakeholders be involved in this "ongoing iterative process" to build "trust" and an "expanding database". The outcomes they hope to generate through these processes are measurable indicators. They describe a process whereby an ongoing advisory committee chooses indicators to guide policy and then reflects on these choices based on the action outcomes. Localism thus requires some democratic participatory processes and structures through which local authorities can generate, monitor and revise sustainability indicators. Paying attention to the local wisdom and the local values does not mean that the local people always know best or that they always act wisely in their interactions with their environments, however, but rather comprises an inclination on the part of adaptive managers to consider seriously and to respect public inputs from local groups and residents, taking their hopes, concerns, and values as a starting point in the search for management goals (Norton, 2003:521).

6.5 Norton's process guidelines as a technique for genuine participation

I should mention, again, that by genuine public or community participation I mean a dynamic process of decision making that allows ongoing social learning and communication among individuals, rather than the traditional one-off, discrete event or events and the two-directional information exchanges between decision makers and the public (Norton, 2003:519). So, adaptive management actually proposes new ways of involving the public or community in environmental decision making. It goes beyond the traditional processes of participation such as environmental impact assessment that have proved to be wanting.

The process guidelines that result from the three core principles of the adaptive management approach are actually techniques or guidelines by which genuine participation of stakeholders in environmental management decisions could be better implemented. Norton uses the three guidelines to develop experimental, iterative, information rich processes that are steeped in a local context but are understood within multiple scales of time and space.

In this process approach, diverse interests and values are expected to emerge through community dialogues and conversation. Norton focuses on preserving these diverse interests and values. By so doing, different development paths are kept open so long as they ultimately lead to the same goal of environmental protection. The emphasis Norton puts on setting up citizen advisory committees that include experts and community members is another technique that he uses to concretely operationalise the concept of participation. Norton also highlights the importance of creating feedback mechanisms that may enable stakeholders to learn by their mistakes and make adjustments accordingly for better outcomes. Finally, Norton emphasises the importance of subjecting all management decisions and indicators of progress to the test of experience. In essence, the bottom-line of all these proposals is community participation – directly or through representatives.

One of the biggest implications of Norton's three guidelines is taking concrete experience seriously. But taking concrete experience seriously includes paying attention to the local context and the values people live by. This, in turn, is only possible through wide involvement; intensive consultation; reiterative dialogue; and discussion among all stakeholders on issues regarding environmental management in the area. This is also tantamount to giving a voice to the marginalised and those under-represented in environmental management and decision making. Once the local people are fully involved in matters regarding management of the mountain and its forests, we can expect this to rekindle their sense of pride and ownership of the mountain and its environs. So, Norton's approach actually gives the concept of participation an expansive operational meaning in terms of how to bring about true and meaningful stakeholder/community participation in making and implementing decisions regarding environmental management on the slopes of Mount Kilimanjaro.

In sum, Norton's process guidelines provide us with methodological strategies and techniques through which the concept of participation could be concretely implemented on the slopes of Mount Kilimanjaro.

Below, I show how genuine participation, through adoption of the three guidelines and their underlying process implications, also has the potential of restoring a sense of ownership of the mountain and its forests and, hence, the sense of place values among the people living on the slopes of Mount Kilimanjaro.

6.6 Restoring the sense of pride and ownership of the mountain and its forests

It is my contention that true or genuine participation or involvement of the local people in matters regarding environmental management and resource use on the slopes of Mount Kilimanjaro requires that the local values and the way of life of the people are taken into consideration seriously. I have already mentioned that all the processes and means that can bring about true participation must pay sincere attention to the local context and hence to the values by which people live. Management practices that did not involve the villagers fully have resulted in the estrangement of the people from the mountain and its forests, which, in turn, has led to the loss of a sense of pride and ownership of the mountain and its forests, consequently resulting in the loss of sense of place values among the people living on the slopes of Mount Kilimanjaro.

These losses have contributed to the despoliation of the mountain environment. I thus emphasise the need to restore the sense of place values or the local people's pride and ownership of the mountain and its environs. Norton (2003:69) underlines the importance of upholding sense of place values by paying attention to the local context as he notes:

According to [a] multi-scalar, contextual view, humans necessarily understand their world from a given local perspective. A preference for localism is really a preference over preferences – a favouring of values that emerge from experience of one's home place. This home place locates the perspective from which one understands and values elements and processes in the natural context of our actions.

I have already noted that the estrangement of people living on slopes of Mount Kilimanjaro from the mountain and its forests has impeded the emergence of values that result from their experience of their home place. It has impaired the ability of the local people to connect with the mountain and its forests. So, there is a need for a remedy.

That is why Norton (2003:69) goes ahead to advocate “many different locally originating sustainability ethics, each of which is anchored to a particular place by a strong sense of history and the future of that place”. Alternatively, a strong sense of the history of a place presupposes a strong sense of pride in one’s place which, in turn, presupposes a strong sense of ownership of one’s place. All of these are lacking among the people living on the slopes of Mount Kilimanjaro.

Emphasising the importance of sense of place values in environmental protection Norton & Hannon (2003: 350) write:

If it is possible for individuals and communities to actively promote a positive sense of place, and if sense of place values in a community encourages protection of their local environments, it becomes an important question whether it is possible to adopt a policy of promoting a sense of local responsibility through strengthening the sense of a place in a community.

I thus strongly maintain that restoring the positive sense of place values among the people living on the slopes of Mount Kilimanjaro will promote a sense of local responsibility for the environment there. That is why, as we attempt to seek a sustainability ethics for the protection of Kilimanjaro, it is imperative that we find ways to restore a strong sense of pride and ownership of the mountain and its surrounding forests. Norton (2003:69) says that restoration of the sense of ownership and pride in the area and hence the sense of place values is tantamount to restoring the power of “local determination and the inclination of citizens to fight and defeat solutions imposed by centralized and authoritarian institutions”. Residents cannot fight imposed decisions effectively if they do not have that strong sense of place and pride in their place. I maintain that adaptive management processes are designed to restore this sense of local determination among the residents of the mountain slopes. KINAPA and the Regional Government have often acted like authoritarian institutions actually colluding with the Regional government to impose environmental policies and management decisions on the local people on the pretext of an environmental crisis on the mountain slopes. Restoring sense of place values is tantamount to restoring power to the local community; the power to determine what will happen to their own environment.

Now, as I noted in Chapter 5, one of the biggest revelations from my case study on the slopes of Mount Kilimanjaro, is that environmental management approaches, notably the total conservation approach that is being practiced there, has completely alienated the villagers from

the mountain and the resources around it. This alienation, as a consequence, has undermined the ability of the villagers to connect with the mountain and its forests in healthy ways. I also noted in Chapter 5 that some of the villagers complain that the presence of the mountain has become more of a liability than an asset, more of a curse than a blessing. I already mentioned that there, for example, is no single cultural (or religious) activity that is carried out by the local people in relation to the mountain and the forests around it any more. This shows how much the local people have been isolated from the mountain and its environs. One would not expect a society that has lived for long – more than 500 years – in an area with such a special feature (the snow-capped mountain) surrounded with forests full of springs and river sources, to fail to establish cultural and religious connections with the mountain and its surrounding forests.

However, as I mentioned earlier, the failure to connect with the mountain is not as much a problem of the local people as it is the result of external forces. I noted in Chapter 4 that traditional cultural practices were carried out in relation to the mountain in pre-colonial times, but after the mountain and its surrounding forests were taken over by the colonial and post-independence government, the local people became completely and systematically estranged from it through being denied direct access to it, even for cultural or religious functions. Thus the local people have completely lost ownership of the mountain and its surrounding forests and now see it and its resources as being the “property of the government”, which they, of course, feel no remorse to misuse or destroy when they have the opportunity. It is my argument that restoring religious and cultural attachment to the mountain is one of the crucial ways to restore the sense of pride and ownership, and hence the protection of the mountain and its surroundings.

I showed in Chapter 5 that traditional religious and cultural practices were not given space to develop among the Chagga, by both the colonialists and the post-independence government. Neither did the new religion (Christianity) and the new governance institutions give room for the local people to have cultural (religious) connections with the mountain and its forests. It is common knowledge that the new religion discouraged their adherents to indulge in anything to do with respecting elements of nature such as mountains, rivers and forests as a way to suppress traditional beliefs and religions dubbed as paganism. It is my considered opinion that these new religions and governance institutions should have provided people with alternatives after they replaced the traditional religions and institutions. They should have propagated their new

religion in ways that gave room for the local people to connect with the mountain in ways that are less destructive to the environment. Despite claims that the local people have caused much destruction of forests around the mountain, I remain convinced that allowing the local people to connect with the mountain in less destructive ways could still be possible today as a way to restore their pride and ownership of the mountain and the forests around it, which is a *sine qua non* for the protection of the same. I say this because I have come to know that the villagers are not that responsible for the destruction that has occurred on the mountain slopes, but that some politicians in collaboration with business people are largely to blame. I therefore consider restoring the bridge between the local people and the mountain and its forests to be one of the best ways to help the local people to develop values that have direct positive bearing on the mountain and its forests.

I have argued that full involvement of the community, which could restore the sense of pride and ownership of the mountain and its forests, is crucial in protecting the environment around the slopes of Mount Kilimanjaro. I do not claim that this project is going to be easy or that it is going to solve all environmental challenges on the mountain slopes, but it is a step in the right direction. In environmental pragmatism we do not look for certainty or perfect solutions to problems but rather focus on what has the potential of giving us best outcomes for the longest possible time. We give primacy to experiential learning. I reiterate, however, that the long-term solution to environmental problems on the mountain slopes can no longer ignore the involvement of the local community in finding those solutions.

Having said all of the above, there remains a need to put in place some mechanisms of how Norton's process proposals, whose bottom-line is full community participation, could actually be concretised in accordance with the local conditions or local prerogatives on the slopes of Mount Kilimanjaro. Below, I propose and discuss some strategies of doing just that by taking the local context on the slopes of Mount Kilimanjaro seriously. These are strategies that will eventually enable forums and groups for discussion and dialogues be conducted more effectively in a democratic bottom-up manner.

6.7 Strategies to implement Norton's process guidelines on the Mountain slopes

To recall, I argued that Norton's process approach requires really taking experience into account in order that social learning may also happen. This involves engagement in group and community dialogue, during which community definitions of thresholds, choice of policy, and laying down of targets, thresholds, and indicators are all deliberated in a democratic participatory manner. Taking experience seriously also involves defining safety margins, room for safety, room for turning back, defining time frames in which monitoring takes place, time frames in which the forum or group dialogue is undertaken again to determine how they stand with regard to the experience they have gained. All of the above processes require spaces and forums within which deliberations could be conducted. Below, I propose such forums and platforms as dictated by the local context on the mountain slopes. These include taking advantage of Christian tradition in the area, appealing to educational institutions, an appeal to informal arrangements, and an appeal to laws and regulations.

6.7.1 Taking advantage of Christian tradition in the area

This strategy could be subdivided into two aspects: Appealing to Christianity as a theological tool to transmit ecological awareness, and appealing to Christianity as a platform through which to convey the environmental awareness message. The second strategy which has to do with the government and non-government institutions could also be subdivided into the following categories: Appealing to educational institutions, both formal and informal, and appealing to laws and regulations.

6.7.1.1 Christian religion as an awareness raising tool

Genuine participation in issues of environment and nature protection on the slopes of Mount Kilimanjaro cannot be effective if the local community does not have the requisite awareness and interest in environment and nature protection issues. It is my argument that the entrenched Christian religion among the Chagga could help to raise awareness and hence induce an interest in environmental management issues on the mountain slopes. It was shown earlier that the Christian tradition of over 150 years has become part and parcel of the culture of people living on the slopes of Mount Kilimanjaro. Genuine involvement of the local community in matters regarding environmental management on the mountain slopes requires taking the local context

seriously. Taking the local context seriously means also taking the influence of the Christian religion on the local community seriously. This is because people's daily activities are structured around Christian traditions. So, appealing to Christian traditions and theology as a means to rehabilitate the values of the local people in the process of seeking their support for nature protection on the Mountain slopes cannot be ignored.

Currently, there is little emphasis on nature protection and the role of Christians in fulfilling that end in most churches on the slopes of Mount Kilimanjaro. Yet there is so much in the scriptures and in Christian traditions that, if emphasised in church, this may influence the local people's perspectives about nature protection. Despite earlier criticism levelled against Christianity by people such as Lynn White Jr (1967) blaming it for being the root cause of the ecological crisis, there is much emphasis in the Bible and in Christian tradition, on the other hand, on the importance of protecting God's creation, and the role of man as a steward or the Viceroy of God in taking care of creation (see also Steffen, 1992; Palmer, 2006). Much as many in Africa would like to cherish what is traditionally ours as opposed to imposed foreign religions, it unfortunately turns out that, it would be wishful thinking to try and sideline the influence of Christianity on the people with the current situation on the slopes of Mount Kilimanjaro. It would, in fact, be counterproductive. Any efforts to try to persuade people to protect nature must, to the contrary, be built on the already present values and worldviews by which the local people live, through emphasising their useful or favourable elements. Christianity as currently practiced is not favourable to the environment because it still retains many traditional elements that see respecting some aspects of nature as sinful or as paganism. That is why I am proposing an ecologically enlightened Christianity. Many scholars (from both Catholic and Protestant traditions) have already written widely about the ecological potential of the Christian tradition or what could be called an ecologically oriented Christianity (see, for example, McDaniel, 1989; Linzey, 1990; McFague, 1993; Gitau, 2000; Attfield, 2001; Msafiri, 2007, among others).

To reach that goal, I propose that efforts should be undertaken to educate religious leaders through seminars and workshops about the importance of making environmental protection an integral part of their teachings. Many religious leaders with whom I have spoken on the slopes of Mount Kilimanjaro are mostly concerned with planting trees around their parishes and keeping the surrounding environment green, but do not recognise that they have a responsibility as

church ministers to stress nature or environmental protection as a God's call to Christians in their daily life.

Thus, I propose special seminars and workshops for religious leaders on how to incorporate the ecological message in their religious teachings in general. An awareness and interest in environmental issues among the religious leaders is important because they are the ones who are able to transmit this environmental awareness message to the rest of their church members. This could also widen forums of discussion and dialogue about environmental management on the mountain slopes, which are critical in Norton's adaptive management approach. I suggest this because some religious leaders and lay people in my interviews acknowledged that issues of nature protection are not usually given priority in the local church's teachings. They do not see environmental issues as integral to their general Christian theology and teachings. That is why I propose that church teachings about ecology should be part of the training of religious leaders and should be mainstreamed and given more emphasis in all churches on the slopes of Mount Kilimanjaro than it has been so far. For example, there is a considerable potential for the people's spirituality to be moulded around contemplating nature and natural objects as a more apparent manifestation of God's presence among the people. In fact, their fore-fathers did this in pre-colonial times when they used to revere Kibo (the ice-caped peak) as symbolising the presence of *Ruwa*, God (see Chapter 4).

One of the things that may capture the interests of Christians for nature protection on the mountain slopes is to try to emphasise the importance of seeing God in creation or in nature. People should be reminded to see the splendour of God in natural structures like Mount Kilimanjaro, forests and big trees. Christians should be reminded that God manifests himself through creation or nature. Destroying nature thus is tantamount to destroying the tool or the instrument that elevates us to God. It means destroying the path that leads to heaven. It will be noted that this is very close to traditional African and Chagga religion, and thus it would not sound too foreign, at least, because there are some who still adhere to the traditional Chagga religion, albeit in modified forms.

Something else that may capture the interests of the local people for nature protection is to try to associate certain religious activities and ceremonies with the mountain. For example, a Christian shrine somewhere in the mountain forests or on the way to the mountain peak could be built for a

yearly pilgrimage. During the pre-colonial times the mountain had all along symbolised the presence of God/Ruwa or it was believed to have supernatural significance. Why did Christian missionaries not exploit this potential to make their religion more relevant to the local people is not very clear. Or was it the conviction (out of ignorance?) that everything that the local people did was pagan and heathen? So, I consider restoring the local people's religious connections with the mountain and its environs as one of the best ways to attract the interest of the local people to participate in environmental issues on the mountain slopes and hence restore the sense of pride and ownership of the same among the Chagga.

Another technique to attract the interests of the local people would be to use outstanding historical religious figures who have been champions of nature protection. For example, adorers or lovers of nature in the Christian tradition like St Francis of Assisi (1882), who is known as the patron saint of environmentalists, should be appealed to as well. Prayers could be offered in a way that extolls the ecological virtues of St Francis of Assisi.⁴¹ Since the cult of saints and devotion to saints is so popular among the people living on the slopes of Mount Kilimanjaro, rekindling Saint Francis' ecological virtues through reciting his life history, especially his admiration for God's natural creation, may help raise environmental awareness and interest among the local people. The *Canticle of the Creatures* may, for example, be of particular appeal to the people living on the slopes of Mount Kilimanjaro. People should be reminded that intentional or unnecessary destruction or killing of living creatures, both animals and plants, is wrong. In fact the Emeritus Pope Benedict XVI declared and thus added environmental destruction to the list of cardinal or mortal sins,⁴² arguing that environmental destruction is tantamount to the destruction of life itself or of God's creation. Pope Francis, for his part, has repeatedly emphasised the same. In his most recent encyclical on the environment that is titled "Laudato Si" (Praise be to You) released in May 2015, he underscores the obligation of humanity to "care for our common home, the environment". He thus calls for "ecological

⁴¹ St Francis of Assisi was born in 1181 or 1182 in Assisi, Italy and died in 1226. Because of his extraordinary love of nature (creation) he was proclaimed the Patron Saint of Ecology by Pope John Paul II. It is narrated that St Francis preached sermons to animals and referred to all creatures in his prayers and praises as brothers and sisters under God.

⁴²In the Catholic tradition, a mortal sin (*peccatum mortale*, in Latin) is a grave and sinful act that is committed willfully and deliberately against fellow human beings [or nature], which, if a perpetrator dies without repenting, leads to eternal damnation. This sin is usually contrasted with venial sin (see the Catechism of the Catholic Church, 1992).

conversion⁴³ of the faithful. The World Council of Churches (WCC) has likewise emphasised and acknowledged the role of Christians as stewards of creation or nature, denouncing the narrow anthropocentric interpretation of the scriptures as giving humans unlimited power to do whatever they like with creation. The WCC reiterated that the directive to have dominion over nature does not imply domination, but care (see, for example, Harrison, 1999; Palmer, 2006).

Thus construed, Christianity has the potential to become a powerful tool in raising awareness and attracting the local people's interest to environmental issues, things which are crucial for genuine and meaningful participation in matters regarding environmental management among those living on the slopes of Mount Kilimanjaro. However, because of lack of awareness or, may be, because issues of environment and nature protection have not been given much priority and emphasis in churches, very few religious leaders have given serious consideration to the documents on nature and environment protection from their respective church hierarchies. My observations on the slopes of Mount Kilimanjaro is that The Vatican and the WCC pronouncements on environment and nature have not been received with the required enthusiasm and, in many cases, have not been given any priority in respective churches. This could be attributed to the fact that environmental issues have not yet been an integral part of church teaching or, put differently, many local Christian religious leaders have not been able to give appropriate attention to environmental protection issues. They have not been able to recognise that genuine Christianity, from a stewardship point of view, must necessarily be ecological. The church pronouncements discussed above have in most cases remained at the level of the higher echelons of the respective churches, with little impact on the local churches at grassroots level.

The above discussion presents one way of taking the local context, and hence the current values people live by, seriously. By so doing, we expect to raise the awareness and interests of the local community to participate in matters regarding environment and nature protection on the mountain slopes. Genuine participation and interest in matters of environment and nature

⁴³ The Pope seems to derive this concept of ecological conversion from Bernard Lonergan's masterpiece, *The Insight*, in which he emphasises that the ultimate end of the activity of knowing is intellectual conversion, which, on deliberate individual efforts, brings about moral conversion which does not end there but also may result in the ultimate experience, i.e. religious conversion. It is here that the Pope adds another level, that is, ecological conversion. And I think ecological conversion should come after moral conversion. So, the order should be: intellectual conversion, moral conversion, ecological conversion, and religious conversion. (For more on this, see Lonergan's *Method in Theology*, first published in 1972, and Lonergan's *Insight*, 1992.)

protection is expected to assist in rebuilding or restoring sense of place values among the people living on the slopes of Mount Kilimanjaro. Linking religious activities and teachings to the mountain and its forests could have the potential of restoring the sense of pride and ownership of the same. So, one way of doing this is to take advantage of their Christian faith and relate it directly to the mountain and its environs. We want the strong Christian values possessed by the Chagga to have a positive impact on how they see and relate with the mountain and forests around it. It may sound as if I am prescribing values here that are contrary to the spirit of environmental pragmatism, but, my proposals above are derived from the actual worldview and values by which people live and the models the local people use in talking about environmental problems on the mountain slopes. As I showed in Chapter 5, an appeal to religion is one of the dominant models used by local people to talk about the environmental challenges on the mountain slopes and solutions to those problems. Furthermore, these are just proposals that may change, depending on the changing values and priorities of the local people and biophysical conditions of the area. And, in my opinion, this is where the strength of environmental pragmatism lies.

I will show in the following section that the Church could also provide forums or platforms for people to hold discussions and deliberate on environmental concerns. In this way many people could be reached making the concept of participation in its wider sense a reality, and thus re-awaken the sense of ownership of the mountain and its forests.

6.7.1.2 The Church as a platform

Christianity may not just be used as a theological tool only, but also as a medium or platform for carrying out environmental awareness campaigns. This is because the only place on the slopes of Mount Kilimanjaro where there is a possibility of reaching many people at the same time is through church gatherings. Not only this, but also the organisational structure of the church (both Catholic and Lutheran) that starts from small units that they call Small Christian Communities (SCCs) comprising at least ten households could make the work of transmitting environmental awareness education even easier. As mentioned earlier, environmental awareness education is critical in bringing about true or genuine and meaningful stakeholder participation in environmental issues on the mountain slopes. So, all important church messages can reach almost all her members through SCCs, regardless of whether they attend church or not. It must

be remembered here that more than 90 percent of the people living on the slopes of Mount Kilimanjaro are Christians.

Furthermore, environmentalists and ecologists, as well as government leaders could use that platform to initiate (and I emphasise, only to initiate or stimulate) discussions on environmental issues, and hence such discussions will be continued by each small Christian community or group in their respective areas. This is an avenue that is yet to be fully exploited on the slopes of Mount Kilimanjaro. As an example, since Small Christian Communities provide good forums for discussion of different issues regarding the environment, and since it is not possible to deploy environmental experts or leaders to facilitate or stimulate discussions in each of those communities, then, for example, an expert could help raise issues that could be taken up to stimulate discussions during church gatherings on Sundays. Alternatively, seminars on environmental or nature protection could be prepared for leaders from each of the Small Christian Communities. These assemblies of SCC leaders could constitute what Norton calls Advisory Committees. These leaders will then help to facilitate dialogue and discussions in their respective SCCs. The focus for discussions and dialogues at the level of the SCCs could centre on the environmental challenges experienced on the mountain slopes and how to resolve them. We expect that diverse values will emerge when representatives from various SCCs meet at higher level stakeholder meetings. However, through sustained discussion and reiterative dialogue we expect consensus on a common goal of environmental protection to emerge, despite the diverse values and interests that different groups of stakeholders may have. Ultimately, we expect an agreement on the most satisfactory course of action to be taken.

What I have proposed above is one of the ways that could facilitate easier implementation of Norton's process proposal on the slopes of Mount Kilimanjaro. Thus construed, appealing to Christianity as a religion and an institution could provide us with a platform and forum where many people could be reached and be brought together to participate fully in deliberating and formulating environmental management policies that will most probably receive wide enough approval among the villagers and other stakeholders. Through this process we expect social learning to occur and thus a new set of values, especially sense of place values, and, in particular, the sense of pride and ownership of the mountain and its forests, to re-emerge.

6.7.2 Educational institutions and NGOs as platforms of discussion

The concern in this chapter has been to find techniques that may facilitate wide and genuine participation of people in matters regarding the environment in keeping with Norton's adaptive management methodology. It has also been an attempt to propose ways to rekindle the sense of pride and ownership of the Mountain and its forests by taking advantage of local conditions. However, appeal to Christianity or the Church is not the only platform where awareness education and hence genuine participation could be effected. Secular institutions, including educational institutions – both formal and informal – and NGOs working on environment-related issues also have the potential to be effective instruments of participation and nurturing of a sense of pride and ownership; which may consequently re-awaken sense of place values among the people living on the slopes of Mount Kilimanjaro.

6.7.2.1 Formal platforms

I also propose to fully utilise the institutions of learning, particularly primary and secondary schools, as platforms to nurture environmental awareness education and pride in the mountain and its forest resources at a young age. Despite the Regional Government declaring environmental degradation on the mountain slopes a disaster, no special strategies have currently been undertaken to inject the environmental awareness message in pupils in institutions of learning, beginning from primary to secondary schools, and even to tertiary institutions.

It will be noted that almost 90 percent of children are enrolled in primary schools and almost 60 percent continue with secondary education, at least to Form Four in the Kilimanjaro region. That is why targeting these institutions of learning as a platform for disseminating the environmental awareness message is crucial. This will enable the students to grow up in an environment where they constantly hear the environment and nature protection message. This should be accompanied with trips, for example, to visit the mountain and forests surrounding it. It is unfortunate to note that currently there is not much enthusiasm for the mountain and its surrounding forests in primary and secondary schools, and even among the local people, despite the place being of considerable national and international significance. Further, currently, with the increased distance between areas of natural beauty and people's settlements and the restrictions on accessing the mountain forests, a desire among the youth for visiting these natural places is growing. This is something that should be taken advantage of. That is why I propose

that the young people should be encouraged to visit areas of natural beauty as a strategy to persuade them to see the need to protect them and to raise or nurture or re-ignite pride in their natural resources. Thus, strategies including ease of access and setting low fees or even allowing free entrance for the young people in primary and secondary schools is important to help them develop the sense of aesthetics and love of nature, and of course nationalist feeling about local resources. At this stage, pupils and students at primary and secondary levels of education are introduced to discussions about environmental issues, particularly concerning the role and significance of the mountain and the need to protect it. Essay competitions, debate, songs, and different activities related to the mountain and its forests could be introduced in a special one-week festival to celebrate Mount Kilimanjaro.

I mentioned earlier that it is rather unusual that the local people do not have any cultural activities that may connect them with the mountain and its forests. Non-use value aspects of the mountain and its forests such as religious and other cultural issues could be nurtured this way. Currently, the local people have nothing in common with the mountain and its forests. The mountain and its forests have come to belong to the government and the tourists. As the villagers would say, “the mountain is for the tourists, not for us”. That is why there is a dire need to change the mind-set and attitude of the people, which might encourage local people to begin to view the mountain and its forests differently. KINAPA and the government have an important role here. They should look into the possibility of instituting something like a Mount Kilimanjaro Cultural Festival in collaboration with the local people or their representatives, where the local people can gather and celebrate the mountain and its forests through different activities that are of interest to them. These activities, for example, could involve climbing the mountain or just touring some sections of it to learn about the importance of its protection, and also raise awareness in the local people regarding how they may benefit from the non-use value aspects of the mountain. So, education and raising awareness are crucial in this regard. And here, I must reiterate that primary and secondary school students must be given priority in terms of education and raising awareness. So, the festival I am proposing could be a weeklong and it could include celebrating the traditional culture of the Chagga, with the mountain and its forests as the point of focus. This, also, should help to restore that pride and sense of ownership of the mountain and its forests. In this way, we expect the sense of place values to develop in direct connection with the mountain and its forests. What happens here in the long term is that the local people may even

begin to develop non-use values and attitudes to the mountain and its forests. That is to say, the local people may begin to see the importance of protecting the mountain and its forests, even if they do not derive direct material benefits such as firewood and fodder from it. I mean that the community may begin to develop environmental values. All these may be possible through experimental adaptation through experiential learning. Through these activities, as Norton says, “it is possible for the community to be able to learn itself into [a] new set of indicators, [a] new set of concerns and a whole new understanding of their place and the space around that place”. Thus, a cultural festival presents a chance to help the people living on the slopes of Mount Kilimanjaro to develop new values and new understanding and attitudes towards the mountain and its forests. This Cultural Festival may also help to rekindle the pride in and restore the sense of ownership of the Mountain and its surrounding environment, as one of the best ways to protect it.

A Cultural Festival represents some form of a platform or a forum for discussions, things that are crucial in Norton’s process approach. In such activities, we expect the young people to be able to articulate their hopes, fears, and expectations from the society with regard to the kind of a mountain environment they would like to inherit. In this way, we expect to inculcate pride in the mountain in these young people as they grow up. This is expected to result in what Norton (2003:69) calls a “strong sense of the history of the past and future of a place”. I mentioned earlier that our intention is to rekindle or rehabilitate the sense of place values which develops with a strong sense of pride in the history of a place, past and future. As I mentioned earlier, the sense of pride and ownership of the mountain and its forests has long been lost because of the reasons I explained earlier, the most important of which being the intentional impairment of the local peoples’ ability to connect with the mountain. We expect that targeting the young people in the manner explained above could be one of the best ways to generate the ability of the young people to connect and identify with the mountain and the surrounding forests.

6.7.2.2 Informal platforms

One may ask: what about those who are not in formal education or in formal institutions of learning? How will they be reached? Despite one of the ways to reach them being through the church, assuming that not everybody goes to church, or not everybody on the mountain slopes is interested in religious matters, forums for informal public awareness education must also be

sought. And here NGOs concerned with environmental issues must be up to this task. Most of these NGOs may have considerable persuasive power owing to the strategies they use to attract people to participate in environmental protection activities on the slopes of Mount Kilimanjaro. Women's informal groups, in particular, have been targeted by some NGOs through which they are helped to start tree nursery projects, in which case they benefit from selling the seedlings and also getting firewood later on when the trees mature. In this way they earn some cash for their families while at the same time contributing to environmental protection. This is why I will emphasise here that incentives, such as being provided with tree seedlings to start small tree-planting projects, and other appropriate incentives that may attract people to participate in public meetings for nature protection are important.

Currently, quite a large number of NGOs deal with environmental issues on the slopes of Mount Kilimanjaro. Examples of these NGOs and Community-based Organisations include the Kilimanjaro Environmental Development Association (KEDA), Community Economic Development and Empowerment (CEDE), Umoja wa Kina Mama National Housing (UKIMANAHO), the Mali Hai Club of Kilimanjaro, and the Woman Education and Economic Centre (WEECE). Thus, if these NGOs re-align their objectives to include advocacy of nature protection in its totality in their environmental awareness campaigns by targeting informal groups and gatherings, for instance in market places, they could have a considerable impact on influencing the local people's attitudes towards nature protection.

All these are set to accomplish two goals simultaneously. The first goal is that of contributing to the resolution of environmental problems on the mountain slopes. The second goal is to restore the sense of ownership of the Mountain through the participation of the local people in addressing those challenges. In this way, we expect long-term and sustainable solutions to the environmental problems on the mountain slopes to be achieved.

6.7.3 Appeal to rules and regulations

The current condition of the environment on the mountain slopes may also require stricter rules and regulations in some areas so as to avoid irreversible damage to the environment. The thresholds of irreversible damage, or rather what may be the safety margins within which the local people could access resources on the mountain slopes without causing irreversible damage to the environment, must be determined in dialogue with the local people. The biggest danger or

irreversible damage on Mount Kilimanjaro, as mentioned in Chapter 1, is the disappearance of the ice-fields or the snow cap. This will pose a serious threat to the livelihoods of the people living around this mountain and even beyond because the ice fields contribute extensively to the springs and rivers that are sources of water for the majority of the residents around Kilimanjaro. Apart from being a source of water, the ice cap is actually what gives the mountain its uniqueness and hence makes it a tourist attraction. So, it is possible that consensus may be reached, by putting all the facts on the table and through reiterative dialogue with all stakeholders about the need to find alternative ways to meet local people's livelihoods needs, which would allow the mountain forests to regenerate. However, such a resolution will require mechanisms to enforce it. This is where stricter rules and regulations become imperative because there will always be trespassers and greedy people among the people living on the slopes of Mount Kilimanjaro.

As I mentioned earlier, nature protection on the slopes of Mount Kilimanjaro can no longer be entrusted to the custodianship of traditional institutions and ancestors only. These traditional institutions could help in some circumstances and not in others. However, because of present greed, selfishness, and the competition for the dwindling resources, we can no longer put much faith in these traditional institutions alone to help protect nature on the slopes of Mount Kilimanjaro. The free market economy and trade liberalisation policies that the country adopted since the 1980s, coupled with competition for scarce resources, land scarcity, corruption and poverty, and Christianity, have systematically eroded the power and capacity of traditional institutions to be effective custodians of nature (at least some aspects of it) on the slopes of Mount Kilimanjaro. So, today, the use of laws and regulations and some minimal level of policing coupled with the other measures mentioned in the previous section cannot be avoided. On this aspect, Norton (2003: 84) writes:

Too often local communities have acted on the basis of short-term interests, only to learn that they have irretrievably deprived their children of something of great value. So, as in the case of the temporarily depressed young adult who seeks to end his or her life, I would suspend the usual right of self-determination of local communities in the hope that a period of regulation and pressure from the centralized government ...will lead the local community to see the value of [protecting the mountain environment]. ... During the period of regulation, agencies of the central government [in this case TANAPA and KINAPA] and national environmental groups can attempt through public education, and perhaps economic incentives, to establish local support [for the protection of nature on the slopes of Mount Kilimanjaro].

However, one may contend that what has been happening on the slopes of Mount Kilimanjaro is actually in accordance with Norton's advice above because the environmental condition there is in crisis. My reply, to the contrary, would first of all be that the local people on the mountain slopes have never had the right of self-determination with regard to the natural resources there. The local people have never had a voice in decisions regarding the management of resources on the mountain slopes. Secondly, government regulation, particularly restrictions on accessing the mountain forests, have never been followed by providing alternative means to the local people for meeting basic needs, let alone public education and economic incentives. So, what has been happening on the slopes of Mount Kilimanjaro is not at all close to what Norton suggests.

It will be recalled that even common villagers on the slopes of Mount Kilimanjaro acknowledge that the current environmental degradation on the mountain slopes calls for more strict measures, including those that may deter greedy business people and selfish individuals, but this is only possible through enforcement of laws and regulations. However, enforcement of laws and regulations should be practised with care not to deprive the poor, whose needs from their immediate natural environment are just modest, such as collecting firewood, grass for their livestock, herbal medicine, and the like. The point here is that careful enforcement of laws and regulations with respect to the way people interact with nature may slowly encourage them to appreciate nature protection when they finally see the benefits of the sacrifices they make.

Thus, the work of enforcing these laws and regulations should involve the local people, including village leaders and Ward Councillors, as much as possible. This would be to create that ownership mentality or feeling among the people. I mentioned in Chapter 5 that the local people have been complaining about outsiders being introduced as guards to protect the KINAPA forests. The villagers see this as a complete show of disrespect to them and this is a vivid proof of the villagers' complete alienation from the mountain and its forests. I have already presented the impact this feeling of alienation among the villagers has had on them, namely the loss of the sense of ownership and pride in their natural resource. The villagers are seen as "the problem" and not as part of the solution. As I have been arguing, if this mentality of seeing the local people as the problem does not change to seeing them as a part of the solution by involving them fully in enforcing rules and regulations against wanton destruction of the mountain forests, no positive result will be achieved. One strategy towards devolving the powers of enforcement of laws and

regulations would be through re-instituting the defunct/passive Village Environmental Management Committees that had the function of seeing to it that rules and regulations set by the villagers themselves about interacting with the mountain forests are observed. The government and KINAPA should provide these committees with the necessary support and capacity building to effectively perform their responsibilities in overseeing the mountain forests. Thus construed, KINAPA and the villagers will work together instead of working against each other. So, the full involvement of the villagers in the work of policing and law enforcement should help to restore their sense of ownership of the mountain and its forests.

I have now discussed different strategies that may help to raise awareness and interest and hence allow wide participation of all stakeholders in deliberations on issues related to the management of the mountain and its forests. The strategies/techniques I proposed above provide an environment that would be conducive to the concretisation of Norton's adaptive methods, which are characterised by experimental, iterative, information-rich processes. These strategies provide the right conditions and an environment where wide involvement of all stakeholders is possible, and this wide involvement as such has potential to rekindle the sense of pride and ownership of the mountain. The sense of pride and ownership of the mountain, in turn, has the potential of triggering the development of strong sense of place values. All of these strategies are necessary for making the task of persuading the local people to protect the environment around the mountain much easier. In the final analysis, we expect that the strategies and processes discussed above will help to generate locally originating and locally supportable norms to guide sustainable environmental management on the slopes of Mount Kilimanjaro.

6.8 Summary and Conclusion

In this section, I give a general summary of the entire dissertation and my conclusion. I give a chapter by chapter summary, and finally pull everything together in the conclusion highlighting the major contribution of this research to resolving real environmental concerns in the study area, and thus adding to the wider environmental ethics literature.

6.8.1 Summary

The aim of this study was to find an environmental ethics approach that could help to address the concrete environmental challenges experienced by the people living on the slopes of Mount Kilimanjaro (the Chagga). This study was motivated by the observation that current

environmental ethics approaches, both western and African, do not sufficiently provide us with guidelines on how to address practical environmental problems such as those experienced on the slopes of Mount Kilimanjaro.

Chapter 1 provided an introduction and the detailed methodology that I followed in this study. I employed a mixed methodology, one aspect of which involved theoretical work mostly covered in Chapters 2 and 3. The other aspect involved a case study covered in Chapters 4 and 5. The two aspects of the methodology were very integrated in that environmental ethics theory was intended to inform practice. The discussion of the case study and its implications was also intended to inform the formulation of some theoretical insights. In brief, the methodology that I followed in this study was informed by a pragmatic environmental approach.

Chapter 2 consisted of an overview of some of the main approaches to western environmental ethics in which I discussed its problems and alternative approaches that have been proposed. I showed that the main problem with western approaches to environmental ethics is that they have been formulated in a different context, with different cultural perspectives and worldviews, and thus with different questions being asked; many of them being ontological questions about the scope of ascribing moral status to beings/entities in the world and why. It is my considered opinion that these questions solicited two responses: the African response which was basically about reviving traditional values and practices; and the other response involving environmental pragmatism, which emphasised learning from experience, context and time scales while discouraging the use or search for a-priori overarching principles because these approaches are not very useful when it comes to resolving practical environmental problems in particular contexts. Environmental pragmatism and Norton's process proposal was partly discussed at the end of Chapter 2 and taken up later in Chapters 5 and 6.

Chapter 3 thus presented a detailed discussion of the African response to western environmental ethics. I focused particularly on two writers on African environmental ethics, Murove and Kelbessa. I argued that the problem with the approaches promoted by Murove and Kelbessa is that they focus too much on the revival of African traditional values and practices, and, as such, tend to romanticise the traditional African past. I further argued that these two approaches to African environmental ethics, at the best reading, also refer to overarching metaphysical principles, or a value set of being closer to nature by going back to traditional African values and

practices. First of all, I argued that looking for overarching metaphysical principles or principles of any sort as the starting point (that is, the top-down approach) of theorising about environmental problems is against the spirit of pragmatic philosophy in which context and experience should inform principles and not vice versa. Secondly, I argued that the project of going back to traditional values and practices is suspicious because it is based on unquestioned assumptions or false beliefs about an unspoiled Africa; the belief that there existed an eco-golden age in Africa in pre-colonial times, and that, pre-scientific societies were “ecological saints”. I showed that these simply were false images or misconceptions constructed by missionaries and continue to be propagated today by modern environmental crusaders or fanatics. I concluded the chapter by emphasising that the shortfalls of traditional African environmental ethics approaches challenge us not only to take the concrete experiences of people seriously, but also the values by which people are living.

In Chapter 4, the main aim was to show more specifically what happens when the approaches promoted by Murove and Kelbessa are applied to the Chagga situation. It was revealed that, while Murove’s and Kelbessa’s approaches helped to reveal many traditional practices and beliefs which informed the life of the Chagga in the past (one could call it “traditional pragmatism”), they do not really give us guidance on what to do when we encounter concrete environmental challenges, for two reasons. Firstly, as I showed, this is so because the pillars or supporting structures on which Murove and Kelbessa propose that we base our African environmental ethics, to a large extent, are not in place or dominant any longer among the Chagga. Things like the traditional governance systems, traditional legal systems, authority of chiefs and religious leaders, etc., have dwindled. Their power and influence on people’s daily lives have waned considerably. Secondly, the application of the approaches suggested by Murove and Kelbessa fail in the Chagga context because they neglect many things; notably, the current realities and experiences of the people. I argued, therefore, that we need to look more deeply into the context and realities of the experience of the Chagga. That is, what the real environmental concerns and problems are that the villagers grapple with from day to day.

In Chapter 5, I therefore delved into examining the present realities of the Chagga relationship with and experience of nature. Chapter 5 revealed issues such as exclusion, top-down management procedures, poverty, dependency, and problems in accessing forests resources,

conflict with wildlife, and conflict with natural resources management authorities, as well as other policy problems. I argued that this is a much deeper insight into the lived experiences of the Chagga today. These experiences further reveal the plurality of values that are currently at play.

In employing Norton's Adaptive Management Approach and the process ethics it implies in Chapter 6, the last Chapter of my dissertation, I have argued that many of the environmental challenges revealed through the case study boil down to two related problems, namely the problem of lack of genuine and democratic participation which has led to a bigger problem but related problem of loss of pride and ownership of the mountain and its forests; which in turn, has led to loss of sense of place-based values. I have argued that addressing these twin problems of participation and the loss of the sense of pride in and ownership of the mountain and its forests will help to address other problems such as conflict regarding management and access of resources on the mountain slopes, and also conflict with wildlife.

6.8.2 Conclusion

The main purpose of this dissertation has been to determine an approach to environmental ethics that could help resolve environmental challenges experienced today by people living on the slopes of Mount Kilimanjaro. This research goal was motivated by the fact that many of the earlier environmental ethics approaches fall short when called upon to provide guidance on how to resolve some of the environmental challenges experienced on these mountain slopes. I showed that Norton's process guidelines, which proceed from environmental pragmatism and the philosophy of adaptive management, provide a clue to how to effectively address these environmental challenges. Using Norton's guidelines, I showed that the challenges identified on the slopes of Mount Kilimanjaro are down to two underlining causes, The first one being the lack of full involvement of the local people in matters regarding environmental management on the mountain slopes and the second one closely related to the first, is the loss of the sense pride and ownership, and hence the loss of sense of place values among the people living on the mountain slopes. I argued that Norton's process proposal is a tool that could help to address these two problems, and thus proposed some context-specific strategies that could help to concretise Norton's process proposal. I argued that proper implementation of Norton's process proposal implies full involvement of all stakeholders in all matters regarding environmental management

on the mountain slopes. Ongoing debates, reiterative dialogues, information gathering, and revision of goals, all of which are important aspects of process ethics cannot be realised without the full involvement of all stakeholders, particularly the local community. Full involvement of all stakeholders, villagers included, in matters regarding environmental management is expected to restore the sense of pride and ownership of the mountain and its forests, and consequently the sense of place values among the people living on the slopes of Mount Kilimanjaro.

Having said all of the above, I do not, however, claim to have provided a comprehensive application of Norton's adaptive management ethics with regard to management of the environment on the slopes of Mount Kilimanjaro. This dissertation has only been a modest attempt to begin to look into the possibility of a more practical approach to environmental ethics that is more responsive to the concrete environmental concerns experienced by the people living on the slopes of Mount Kilimanjaro. Having opened up this possibility, it is my hope that more work and research will be done in this direction with the aim of finding a long-term and sustainable resolution of the environmental challenges on the slopes of Mount Kilimanjaro and other areas with similar conditions.

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APPENDICES

Appendix 1: Interview Schedule

The questions were only tentative interview guides. The interviewer allowed more freedom to the informants to express themselves.

Questions for general exploratory interviews

1. What is your name?
2. How long have lived in this area?
3. What are/were your main economic activities?
4. Do you use the land, forests, water and wild animals as sources of your income?
5. If yes, can you explain more about it please?
6. How do you see the state of the mountain, land, forests, water and wild animals for the last ten years?
7. Are these resources increasing or decreasing? Why?
8. Do you know or have you ever heard or been told of how things were in this area in the distant past, before independence (1961) for example?
9. Were things better or worse? Why?
10. In your opinion what might have caused the change?
11. What is being done to change the situation for the better?
12. Do you think enough is being done?
13. In your opinion what do you think should be done to ameliorate the situation?
14. Are people in this area doing any activities to protect the environment? If Yes, What are those activities?
15. What things do you value most here with regard to the natural environment?
16. What do you think will happen if these things you value are destroyed?
17. Are there aspects of the natural environment towards which you have special reverence? Why?
18. What should be done to prevent the destruction of these values or sacred places?

19. Are there groups in this area that campaign and educate people about environmental protection?
20. What are those (government/nongovernmental/religious etc.
21. Do you think it is helping to change people's attitudes towards nature
22. Do you know of any conflicts over land, water or forest resources in this area?
23. What is the nature of these conflicts?
24. What is being done to address those conflicts?
25. What has been the state of rainfall and farming in this area? Are you getting enough harvest for the family needs?
26. If there has been a change (in rainfall/harvest) what is that change and what might have caused it?
27. How are you coping with the changes?
28. What, in your opinion, should be done to ameliorate the situation?
29. Do you think there are ways that people can use the natural environment without destroying it?
30. Do you think it is possible to preserve the natural environment just for aesthetic and spiritual purposes?
31. Anything else you wish to bring to my attention?

Questions for in-depth interviews

These questions will be put under different themes to reflect the major environmental problems facing Tanzania as follows.

Land

1. What does the land mean to you?
2. Who owns the land?
3. How did you get the land?
4. What do you use the land for?
5. Does the land have any cultural or religious significance to you?
6. If yes, what is it?
7. What was the situation in the past?
8. Did you conduct any special traditional ceremonies associated with the land that are (a) still practiced today? (b) Not practiced today any longer?
9. What were those rituals and practices? Why are some still practiced and others not?
10. Do you have any taboos related to issues of land and soil?
11. What were those?
12. Do you know of any traditional land management strategies that are (a) still practiced today? (b) Not practiced any longer?
13. Why are some are some still practiced and others not?
14. Is there a problem of land degradation in this area?
15. When did you begin to notice it?
16. What do you think are the causes of land degradation?
17. Is there enough land to accommodate the growing number of people in the area and for the coming generation?
18. How are people coping with the problem of shortage of land?
19. Are the coping mechanisms environmentally friendly?

20. If no, what do you think should be done?
21. Are there conflicts over land in this area? How are they resolved?
22. Do you think the government policies and laws about land are favorable to people and environmental friendly?
23. What are the loopholes that need to be addressed?
24. Do the land policy and laws create a conducive environment for an attitude of care towards land among people living on the slopes of this mountain to emerge?
25. If yes how? If no, what should be done to make these policies and laws more conducive?
26. In your opinion, what kind of attitude should people have towards the land to avoid further degradation?
27. Anything else you wish to bring to my attention?

Water

1. What does water mean to you?
2. Where do you get water from?
3. What is the state of water availability in this area compared to the past?
4. Are there any mechanisms to conserve water?
5. Are/were there natural water sources in this area?
6. What happened to them?
7. Who controls water sources in this area?
8. How was it in the past?
9. Were there taboos regarding to water and water sources like springs etc.
10. What are the major reasons for water scarcity in this area? (If any).
11. How are people coping with this problem?
12. If things continue as they are now what do you think might happen in the future?
13. What do you think should be done to rectify the problem?

14. Are there conflicts over water issues in this area?
15. How are they resolved?
16. Are the government policies and laws about water creating a conducive environment for the emergence of an attitude of care towards water and water sources?
17. If not what are the loopholes that need to be addressed?
18. In your opinion in what manner do you think people should treat water and water sources to avoid further destruction?
19. Anything else you wish to bring to my attention?

Vegetation/ Forests

1. What does the forest mean to you?
2. Do you have access to the forest resources?
3. To what extent are you allowed to access the forest resources?
4. How was the situation in the past in terms of accessing the forest?
5. Are/were there taboos linked to the forest?
6. Apart from accessing forest resources, how else did you use the forest (spiritual functions, etc?)
7. Did people in this area fear to enter the deep forest in the past?
8. What is the situation now?
9. Has the fear disappeared? Why?
10. How do you assess the condition of the forests today compared to the past?
11. Is there destruction? Why?
12. What will happen in the future if the situation continues as it is now?
13. What are the major causes of this destruction?
14. What is being done to change the situation?
15. What indeed should be done?

16. Do you think we should keep away from the forests to allow wild animals to thrive and attract more tourists?
17. Is the revival of past traditional values as a strategy to address the situation possible? Should it be done?
18. Are there conflicts over forest resources in this area? What is the nature of the conflicts?
19. Are the current government policies and laws conducive enough to create an attitude of care towards the forest?
20. Are there loopholes that need to be addressed?
21. How indeed should people relate to the forests to avoid further destruction?
22. Anything else you would like to add?

Wildlife and domestic animals in general

1. Are there wild animals in this area?
2. Do you practice totemism or have you ever heard of this practice in the past?
3. Do you hunt wild animals? Which season?
4. Are there certain kinds of wild animals that people do not eat in this community?
5. Are there certain kinds of wild animals that you ate in the past that you do not eat today?
6. Are there conflicts in the community with regard to access to and use of wild animals (for example for hunting, etc?).
7. Was/Are there taboos in your community about animals?
8. Do people show kindness to wild animals?
9. Do you think wild animals need to be protected?
10. Do you think animals have rights?
11. Do you think animals should be treated with respect?
12. Did you live in harmony with animals in the past?
13. What do you do with animals that invade your fields and destroy crops?

14. Are the government policies and laws conducive enough to create an attitude of care towards animals?
15. Do you think animals should be protected for the sake of aesthetic and spiritual needs?
16. What values and attitudes should be cultivated among people in this community so that they protect wild animals for current and future generations?
17. Anything else you would like to add?

Appendix 2: Questions for Focus Group Discussions

Issues to discuss in the Focus Groups were mainly derived from pertinent questions from previous general explorative interviews and in-depth interviews. However, the following questions were asked.

1. How did you relate to the land, forests, mountains, water and animals in the past?
2. What were your beliefs and attitudes towards the land, forests, mountains and animals?
3. What were the social practices, myths, legends, religious rituals, folktales, proverbs, songs and taboos with regard to the land, mountains, forests, and animals?
4. Are these practices still relevant and actually observed today?
5. When were they performed, how and why?
6. When you say you respected certain trees, animals or other creatures, what exactly do you do /not do.
7. Were/Are you free to go into the forest to collect firewood, timber, fruits, game, etc.?
8. Do you think it is possible to re-appropriate traditional values with regard to nature? If no, why? If yes, how exactly?
9. What are those values, practices and beliefs with regard to the land, mountains, forests and water that you cherish and thus you would like them be protected and promoted?
10. How is the community learning from experience? How are the experiences analysed?
11. What are the lessons learnt?
12. Are things the same now as was in the past?
13. Tell me the story of how things have changed.
14. Why have things changed?
15. How do you see the future of the land, mountain, trees, forests and mountains?
16. How do you see the future of people living on this mountain slope?
17. What about the people that will live here in the future?
18. What is going to happen if things continue as they are now? Why do you say so?
19. What should be done to prevent this?
20. What really should be the desirable state of affairs?

21. What should be done to achieve it?
22. Are the government policies and laws with regard to land, forests, mountains, water and animals conducive enough to allow an attitude of care towards these natural entities?
23. What are the loopholes, if any, that must be addressed so as to allow an environmental ethics to develop among the inhabitants of this mountain slope?
24. Anything else you want to bring to my attention?

Appendix 3: Ethical clearance letter



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Approval Notice New Application

06-Sep-
2012
Lyakurw
a,
Michael
MF
Stellenbo
sch, WC

Protocol #: HS858/2012 Title: An environmental ethics relevant to people living on the slopes of Mount Kilimanjaro in Tanzania.

Dear Mr. Michael Lyakurwa,

The New Application received on 23-Aug-2012, was reviewed by Research Ethics Committee: Human Research (Humanities) via Committee Review procedures on 29-Aug-2012 and has been approved. Please note the following information about your approved research protocol:

Protocol Approval Period: 06-Sep-2012 -05-Sep-2013

Present Committee Members:

De Villiers, Mare MRH Theron, Carl CC Somhlaba, Ncebazakhe NZ Viviers, Suzette S Gorgens, Gina G Fouche, Magdalena MG Hansen, Leonard LD Horn, Lynette LM De Villiers-Botha, Tanya T Newmark, Rona R Prozesky, Heidi HE Beukes, Winston WA

Standard provisions

1. The researcher will remain within the procedures and protocols indicated in the proposal, particularly in terms of any undertakings made in terms of the confidentiality of the information gathered.
2. The research will again be submitted for ethical clearance if there is any substantial departure from the existing proposal.
3. The researcher will remain within the parameters of any applicable national legislation, institutional guidelines and scientific standards relevant to the specific field of research.
4. The researcher will consider and implement the foregoing suggestions to lower the ethical risk associated with the research.

You may commence with your research with strict adherence to the abovementioned provisions and stipulations.

Please remember to use your **protocol number** (HS858/2012) on any documents or correspondence with the REC concerning your research protocol.

Please note that the REC has the prerogative and authority to ask further questions, seek additional information, require further modifications, or monitor the conduct of your research and the consent process.

After Ethical Review:

Please note that a progress report should be submitted to the Committee before the approval period has expired if a continuation is required. The Committee will then consider the continuation of the project for a further year (if necessary). Annually a number of projects may be selected randomly for an external audit.

National Health Research Ethics Committee (NHREC) number REC-050411-032.

This committee abides by the ethical norms and principles for research, established by the Declaration of Helsinki, the South African Medical Research Council Guidelines as well as the Guidelines for Ethical Research: Principles Structures and Processes 2004 (Department of Health).

Provincial and City of Cape Town Approval

Please note that for research at a primary or secondary healthcare facility permission must be obtained from the relevant authorities (Western Cape Department of Health and/or City Health) to conduct the research as stated in the protocol. Contact persons are Ms Claudette Abrahams at Western Cape Department of Health (healthres@pgwc.gov.za Tel: +27 21 483 9907) and Dr Helene Visser at City Health (Helene.Visser@capetown.gov.za Tel: +27 21 400 3981). Research that will be conducted at any tertiary academic institution requires approval from the relevant parties. For approvals from the Western Cape Education Department, contact Dr AT Wyngaard (awyngaar@pgwc.gov.za, Tel: 0214769272, Fax: 0865902282, <http://wced.wcape.gov.za>). Institutional permission from academic institutions for students, staff & alumni. This institutional permission should be obtained before submitting an application for ethics clearance to the REC. Please note that informed consent from participants can only be obtained after ethics approval has been granted. It is your responsibility as researcher to keep signed informed consent forms for inspection for the duration of the research.

We wish you the best as you conduct your research. If you have any questions or need further help, please contact the REC office at .

Included Documents:

Interview Schedule DESC App Proposal Interview Schedule Consent Form Summary Of Consent Forms REC App

Sincerely,

Winston Beukes REC Coordinator Research Ethics Committee: Human Research (Humanities)

Appendix 4: Informed consent forms for different categories of participants



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STELLENBOSCH UNIVERSITY CONSENT TO PARTICIPATE IN RESEARCH

A. Consent Form for General Exploratory Interviews

TITLE OF THE STUDY

Towards an approach to environmental ethic responsive to environmental challenges on the slopes of Mounts Kilimanjaro in Tanzania

You are asked to participate in a research study conducted by Michael F. Lyakurwa, a doctoral student in the department of Philosophy at Stellenbosch University, South Africa. The results of this study will contribute to my doctoral thesis. You were selected as a possible participant in this study because of your knowledge of this community especially in matters related to their daily interactions with the natural environment.

1. PURPOSE OF THE STUDY

The purpose of the study is to help articulate an environmental ethic that emerges from your experience in this area and is relevant to the people living on the slopes of this mountain (Kilimanjaro).

2. PROCEDURES

If you volunteer to participate in this study, we would ask you to participate in a **quick exploratory interview** with the aim of learning in a general way how people relate with the natural environment in this community. In this interview, I will ask you exploratory questions about your beliefs and practices with regard to resource use and the natural environment.

A convenient time and place for this general interview will be agreed upon between us. Subject to your permission our conversation will be audio-taped or video-taped to facilitate easy record keeping. Photographs will also be used to capture data but with your permission only. This interview will not take more than half an hour.

3. POTENTIAL RISKS AND DISCOMFORTS

I don't foresee any risks or major discomforts in this conversation. However, it may happen that you may experience pain if you talk about past or present experiences that may have been/or are traumatic to you. If that happens we shall discuss whether to continue the interview or stop it, and resume it at another time. We will then also discuss whether to refer you to a counsellor that can support them. Arrangements will be made beforehand to ensure the availability of such a counsellor if the need for one arises.

4. POTENTIAL BENEFITS TO SUBJECTS AND/OR TO SOCIETY

The findings of this study may help the society to relate more harmoniously with the environment. The findings may also assist the government to re-examine her environmental conservation and management policies so that they are more people centred and environmentally friendly.

5. PAYMENT FOR PARTICIPATION

No payment will be made for your participation in this explorative interview.

6. CONFIDENTIALITY

Any information that is obtained in connection with this study and that can be identified with you will remain confidential and will be disclosed only with your permission or as required by law. Confidentiality will be maintained by means of coding procedures and I will always safely keep the data in places that are only accessible to me, for example in password protected files in my computer, while hard copies of research data will always be stored in a locked cupboard. You are entitled to review the information on transcriptions, the audio tapes, videotapes or photographs during the time of my fieldwork in the area. The tapes and raw data will be used for further research purposes after completion of my doctoral thesis. This data will be stored anonymously on the hard drive of my personal computer protected by passwords only known to me, or in locked cupboards in my office. In this further research, confidentiality will be maintained by means of coding procedures, i.e. your identity will not be revealed in any subsequent research report based on this data.

7. PARTICIPATION AND WITHDRAWAL

You can choose whether to be in this study or not. If you volunteer to be in this study, you may withdraw at any time without consequences of any kind. You may also refuse to answer any questions you don't want to answer and still remain in the study. The investigator may withdraw you from this research if circumstances arise which warrant doing so.

8. IDENTIFICATION OF INVESTIGATORS

If you have any questions or concerns about the research, please feel free to contact me Michael Lyakurwa mobile: +255 755 368 403 or +27 822 262 178. Email: mlyakurwa2011@yahoo.com. My supervisor, Prof. Johan Hattingh is available at +27 218 082 418. Email: jph2@sun.ac.za. My co-supervisor is Dr. Sirkku Hellsten, Email: skhellsten@yahoo.com. You can contact any of us if you have any questions about the research.

9. RIGHTS OF RESEARCH SUBJECTS

You may withdraw your consent at any time and discontinue participation without penalty. You are not waiving any legal claims, rights or remedies because of your participation in this research study. If you have questions regarding your rights as a research participant, contact Ms Maléne Fouché [mfouche@sun.ac.za; +27 21 808 4622] at the Division for Research Development, Stellenbosch University, South Africa.

SIGNATURE OF RESEARCH PARTICIPANT OR LEGAL REPRESENTATIVE

The information above was described to *me* by Michael Lyakurwa in Kiswahili/Kichagga and *I am* in command of this language or it was satisfactorily translated to *me*. *I* was given the opportunity to ask questions and these questions were answered to *my* satisfaction.

		Please initialize the relevant box	
1.	I hereby consent voluntarily to participate in this study	YES	NO
2.	I hereby give permission that the interviews/ Focus Group Discussions can be recorded by audiotape/videotape/photographs	YES	NO
3.	I have been given a copy of this form	YES	NO
4.	I hereby consent voluntarily that the data of this research can be stored anonymously in an archive and may be used by Mr. Michael Lyakurwa for further research in environmental ethics	YES	NO

Name of Participant

Signature of Participant

Date

In case where verbal consent was given

As witness, I declare that verbal consent was given in my presence on the 4 matters listed above, as confirmed by my initials.

Name of Witness

Signature of Witness

Date

SIGNATURE OF RESEARCHER

I declare that I explained the information given in this document to _____ [*name of the participant*]. [*He/she*] was encouraged and given ample time to ask me any questions. This conversation was conducted in Kiswahili/Kichagga [*no translator was used/this conversation was translated into _____ by _____*].

Signature of Researcher

Date



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**STELLENBOSCHUNIVERSITY
CONSENT TO PARTICIPATE IN RESEARCH**

B. Consent Form for In-depth Interviews

TITLE OF THE STUDY

Towards an environmental ethic responsive to environmental challenges on the slopes of Mounts Kilimanjaro in Tanzania

You are asked to participate in a research study conducted by Michael F. Lyakurwa, student in the department of Philosophy at Stellenbosch University, South Africa. Results of this study will contribute towards the writing my PhD thesis. You were selected as a possible participant in this study because you live in this area and/or you are directly involved in activities that bear on the natural environment positively or negatively. Therefore, you are in a better position to know more about human-nature interactions and the values you/they attach to the natural environment.

1. PURPOSE OF THE STUDY

The purpose of the study is to help articulate an environmental ethic that emerges from your experience in this area and is relevant to the people living on the slopes of this mountain (Kilimanjaro).

2. PROCEDURES

If you volunteer to participate in this study, we would ask you to participate in an **in-depth individual interview** where we will engage in a dialogue based on your understanding of various issues related to people's manner of interactions with the natural environment in this particular area. Our conversations will specifically focus on the past, present and future prospects of people's relations with resources and the natural environment in this community. The conversation may take up to one hour.

A convenient place and time for our conversation will be agreed upon between us. Subject to your permission our in-depth interviews or conversations will be audio-taped or videotaped to facilitate easy record keeping. Photographs will also be used to capture data but with your permission only.

3. POTENTIAL RISKS AND DISCOMFORTS

I don't foresee any risks or major discomforts in this conversation. However, it may happen that you may experience pain if you talk about past or present experiences that may have been/or are traumatic to you. If that happens we shall discuss whether to continue the interview or stop it, and resume it at another time. We will then also discuss whether to refer you to a counsellor that can support them. Arrangements will be made beforehand to ensure the availability of such a counsellor if the need for one arises.

4. POTENTIAL BENEFITS TO PARTICIPANTS AND/OR TO SOCIETY

The findings of this study may help the society to relate more harmoniously with the natural environment. The findings may also assist the government to re-examine her environmental conservation and management policies so that they are more people centred and environmentally friendly.

5. PAYMENT FOR PARTICIPATION

No payment will be made for your participation in this study. However, refreshments (soft drinks and bites) will be provided during or after our conversation.

6. CONFIDENTIALITY

Any information that is obtained in connection with this study and that can be identified with you will remain confidential and will be disclosed only with your permission or as required by law. Confidentiality will be maintained by means of coding procedures and I will always safely keep the data in places that are only accessible to me, for example in password protected files in my computer, while hard copies of research data will always be stored in a locked cupboard. You are entitled to review the information on transcriptions, the audio tapes, videotapes or photographs during the time of my fieldwork in the area. The tapes and raw data will be used for further research purposes after completion of my doctoral thesis. These data will be stored anonymously on the hard drive of my personal computer protected by passwords only known to me and in locked cupboards in my office. In this further research, confidentiality will be maintained by means of coding procedures, i.e. your identity will not be revealed in any subsequent research report based on this data.

7. PARTICIPATION AND WITHDRAWAL

You can choose whether to be in this study or not. If you volunteer to be in this study, you may withdraw at any time without consequences of any kind. You may also refuse to answer any questions you don't want to answer and still remain in the study. The investigator may withdraw you from this research if circumstances arise which warrant doing so.

8. IDENTIFICATION OF INVESTIGATORS

If you have any questions or concerns about the research, please feel free to contact me Michael Lyakurwa mobile: +255 755 368 403 or +27 822 262 178. Email: mlyakurwa2011@yahoo.com. My supervisor, Prof. Johan Hattingh is available at +27 218 082 418. Email: jph2@sun.ac.za. My co-supervisor is Dr. Sirkku Hellsten, Email: skhellsten@yahoo.com. You can contact any of us if you have any questions about the research.

9. RIGHTS OF RESEARCH PARTICIPANTS

You may withdraw your consent at any time and discontinue participation without penalty. You are not waiving any legal claims, rights or remedies because of your participation in this research study. If you have questions regarding your rights as a research subject, contact Ms Maléne Fouché [mfouche@sun.ac.za; +27 21 808 4622] at the Division for Research Development.

SIGNATURE OF RESEARCH PARTICIPANT OR LEGAL REPRESENTATIVE

The information above was described to *me* by Michael Lyakurwa in Kiswahili/Kichaggaand *I am* in command of this language or it was satisfactorily translated to *me*. *I* was given the opportunity to ask questions and these questions were answered to *my* satisfaction.

Please initialize the relevant box

1.	I hereby consent voluntarily to participate in this study	YES	NO
2.	I hereby give permission that the interviews/ Focus Group Discussions can be recorded by audiotape/videotape/photographs	YES	NO
3.	I have been given a copy of this form	YES	NO
4.	I hereby consent voluntarily that the data of this research can be stored anonymously in an archive and may be used by Mr. Michael Lyakurwa for further research in environmental ethics	YES	NO

Name of Participant

Signature of Participant

Date

In case where verbal consent was given

As witness, I declare that verbal consent was given in my presence on the 4 matters listed above, as confirmed by my initials.

Name of Witness

Signature of Witness

Date

SIGNATURE OF RESEARCHER

I declare that I explained the information given in this document to _____ [*name of the participant*]. [*He/she*] was encouraged and given ample time to ask me any questions. This conversation was conducted in Kiswahili/Kichagga [*no translator was used/this conversation was translated into _____ by _____*].

Signature of Researcher

Date



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**STELLENBOSCHUNIVERSITY
CONSENT TO PARTICIPATE IN RESEARCH**

C. Consent Form for Focus Group Discussions

TITLE OF THE STUDY

Towards an environmental ethic responsive to environmental challenges on the slopes of Mounts Kilimanjaro in Tanzania

You are asked to participate in a research study conducted by Michael F. Lyakurwa, a doctoral student in the department of Philosophy at Stellenbosch University, South Africa. Results of this study will contribute towards the writing of my PhD thesis. You were selected as a possible participant in this study because you live in this area and you are directly involved in activities that bear on the natural environment positively or negatively. Therefore you are in a better position to know more about people's manner of interactions with the natural environment in this particular area.

1. PURPOSE OF THE STUDY

The purpose of the study is to help articulate an environmental ethic that emerges from your experience in this area and is relevant to the people living on the slopes of this mountain (Kilimanjaro).

2. PROCEDURES

If you volunteer to participate in this study, we would ask you to participate in a **Focus Group Discussion** to deliberate on the past and current values, practices and beliefs of this community towards their natural environment. This group discussion may take at least two hours. A convenient time and venue for this discussion will be arranged between us. Subject to your permission, our Focus Group Discussion will be audio-taped or video-taped to facilitate easy record keeping. Photographs will also be used to capture data, but with your permission only.

3. POTENTIAL RISKS AND DISCOMFORTS

I don't foresee any risks or major discomforts in this conversation. However, it may happen that you may experience pain if you talk about past or present experiences that may have been/or are traumatic to you. If that happens we shall discuss whether to continue the interview or stop it, and resume it at another time. We will then also discuss whether to refer you to a counsellor that can support them. Arrangements will be made beforehand to ensure the availability of such a counsellor if the need for one arises.

4. POTENTIAL BENEFITS TO PARTICIPANTS AND/OR TO SOCIETY

The findings of this study may help the society to relate more harmoniously with the natural environment. The findings may also assist the government to re-examine her environmental conservation and management policies so that they are more people centred and environmentally friendly.

5. PAYMENT FOR PARTICIPATION

No payment will be made for your participation in this study. However, refreshments (soft drinks and bites) will be provided during or after our conversation.

6. CONFIDENTIALITY

Any information that is obtained in connection with this study and that can be identified with you will remain confidential and will be disclosed only with your permission or as required by law. Confidentiality will be maintained by means of coding procedures and I will always safely keep the data in places that are only accessible to me, for example in password protected files in my computer, while hard copies of research data will always be stored in a locked cupboard. You are entitled to review the information on transcriptions, the audio tapes, videotapes or photographs during the time of my fieldwork in the area. The tapes and raw data will be used for further research purposes after completion of my doctoral thesis. This data will be stored anonymously on the hard drive of my personal computer protected by passwords only known to me and in locked cupboards in my office. In this further research, confidentiality will be maintained by means of coding procedures, i.e. your identity will not be revealed in any subsequent research report based on this data.

7. PARTICIPATION AND WITHDRAWAL

You can choose whether to be in this study or not. If you volunteer to be in this study, you may withdraw at any time without consequences of any kind. You may also refuse to answer any questions you don't want to answer and still remain in the study. The investigator may withdraw you from this research if circumstances arise which warrant doing so.

8. IDENTIFICATION OF INVESTIGATORS

If you have any questions or concerns about the research, please feel free to contact me Michael Lyakurwa mobile: +255 755 368 403 or +27 822 262 178. Email: mlyakurwa2011@yahoo.com. My supervisor, Prof. Johan Hattingh is available at +27 218 082 418. Email: jph2@sun.ac.za. My co-supervisor is Dr. Sirkku Hellsten, Email: skhellsten@yahoo.com. You can contact any of us if you have any questions about the research.

9. RIGHTS OF RESEARCH PARTICIPANTS

You may withdraw your consent at any time and discontinue participation without penalty. You are not waiving any legal claims, rights or remedies because of your participation in this research study. If you have questions regarding your rights as a research participant, contact Ms Maléne Fouché [mfouche@sun.ac.za; +27 21 808 4622] at the Division for Research Development, Stellenbosch University, South Africa.

SIGNATURE OF RESEARCH PARTICIPANT OR LEGAL REPRESENTATIVE
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The information above was described to *me* by Michael Lyakurwa in Kiswahili/Kichagga and *I am* in command of this language or it was satisfactorily translated to *me*. *I* was given the opportunity to ask questions and these questions were answered to *my* satisfaction.

		Please initialize the relevant box	
1.	I hereby consent voluntarily to participate in this study	YES	NO
2.	I hereby give permission that the interviews/ Focus Group Discussions can be recorded by audiotape/videotape/photographs	YES	NO
3.	I have been given a copy of this form	YES	NO
4.	I hereby consent voluntarily that the data of this research can be stored anonymously in an archive and may be used by Mr. Michael Lyakurwa for further research in environmental ethics	YES	NO

Name of Participant

Signature of Participant

Date

In case where verbal consent was given

As witness, I declare that verbal consent was given in my presence on the 4 matters listed above, as confirmed by my initials.

Name of Witness

Signature of Witness

Date

SIGNATURE OF RESEARCHER

I declare that I explained the information given in this document to _____ [*name of the participant*]. [*He/she*] was encouraged and given ample time to ask me any questions. This conversation was conducted in Kiswahili/Kichagga/ [*no translator was used/this conversation was translated into* _____ by _____].

Signature of Researcher

Date