

Gender and Climate Change: South Africa Case Study

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Gender equity should not be seen narrowly as a women's' issue..., it is an issue that requires men and women to work together in search of solutions that are both practical and based on principle. Increasingly, those solutions will be neither acceptable nor sustainable if the equal rights, dignity and worth of men and women are not respected."

- Koïchiro Matsuura, Director-General of UNESCO

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Executive Summary

The climate change discourse has engendered considerable international debates that have dominated the environmental agenda since the mid-1980s. Currently addressing the threat of climate change is a global priority. In the context of the significant attention to climate change at global level, debates regarding identification of gender perspectives and the involvement of women in addressing climate change have arisen. It is believed that men and women will be faced with different vulnerabilities to climate change impacts due to existing inequalities such as, their role and position in society, access to resources and power relations that may affect the ability to respond to the effects of climate change (WEDO, 2007; Commission on the Status of Women 2008; Carvajal et al. 2008; BRIDGE, 2008).

Currently there is insufficient knowledge regarding gender differentiated impacts of climate change. As a result policy and decision-makers are not aware of the need for gender differentiated policies. It has therefore become important to understand the interrelations between climate change and gender so as to design effective climate change polices.

With particular attention to South Africa, this study aims to examine the interrelations between climate change and gender so as to make a contribution to the existing information gap on the gender differentiated impacts of climate change. The study will also aim to create awareness amongst policy and decision-makers about the need for gender differentiated adaptation policies.

The study was conducted in rural areas located in uMzinyathi and uMhlathuze district municipalities. UMzinyathi and UMhlathuze are among the municipalities situated in Kwazulu-Natal. Kwazulu-Natal is a province of South Africa that forms the east coast of the country. It is South Africa's most populous province with a population of 9426017 million people. Apart from being South

Africa's most populous province, KwaZulu-Natal has the biggest poverty gap of R 18 billion with 61% of the population living in poverty (HSRC, 2004).

Methodology

The study makes use of qualitative research techniques guided by a combination of gender analysis tools. The techniques include participatory rural appraisal in the form of focus group discussions, role play, life histories and key informant interviews. Through these techniques, primary data was collected to understanding the differences in gender roles, activities, needs, and opportunities in the context of climate change.

Limitations

The results of this study cannot be used to generalise South Africa as each community is unique and will differ in culture and values. However, the findings are an important step in unveiling the dynamics and realities of gender differentiated impacts of climate change including climate variability.

In addition, with a wide scope of analysis and the time constraints this report cannot claim to be exhaustive, nevertheless every effort has been made to ensure that key emerging issues are highlighted.

Gender issues

In trying to understand gender and climate change in the context of South Africa, it is important to appreciate gender and gender relations in the country. In this context the contemporary position of women in South Africa cannot be fully appreciated without an understanding of the ways in which colonialism, capitalism and apartheid have organised social relations and fractured society along racial, class and gender lines (Baden, et al., 1998). South Africa therefore presents a unique situation from a political perspective, particularly with reference to apartheid.

Since the establishment of the democratic government in 1994, various significant developments have occurred to set the pace towards building gender equality in South Africa. Having recognised that gender is dynamic and that gender roles are neither natural nor sacred, a number of progressive policies and legislation have been put in place to set the context for gender transformation. This is to encourage a situation in which women and men can make real choices about their own lives and other issues.

In spite of the major gains, there still remain enormous disparities and inequalities between men and women. The most important challenges are faced by women in rural areas who are still living in poverty with limited resources to ensure sustainable livelihoods.

Some key findings

Given that the men and women in both study areas are poverty stricken with dependency on agriculture and natural resource for their livelihoods, climate change poses a risk for them. Gender differentiated impacts of climate variability were manifested in the unequal distribution of roles and responsibilities of men and women in both study areas. Results reveal that through socially constructed roles and responsibilities, women seem to bear the most burdens resulting from climate variability impacts. Women's burdens were more evident in their response to the impacts of climate variability. Women were found to have extra workloads when faced with climatic stressors as they made efforts to cope with them. Working longer hours than men affected them not only physically but emotionally drained them as they constantly have to worry about the well being of their household members, especially children and the youth who depend on them.

Although the men's work load is lighter than that of women they are also impacted by climate variability. Men's impacts are more psychological than physical. Their psychological effects are further compounded by unemployment resulting in negative coping mechanisms. There is therefore no

doubt that climate change will impact differently on rural men and women.

The results also show that gender roles are undergoing change due to climate related impacts which are further heightened by factors such as unemployment, HIV/AIDS and poverty which forces men and women to engage in different activities leading to new roles. With more women diversifying their livelihoods, gender roles are also being impacted. There is a change in gender roles to accommodate responses to the impacts of climate variability. In this study it was evident that women are now are involved in activities that generate earnings, thus reshaping relationships between men and women. The income generated by women through trade is used to sustain the household. Women generating an income also have more opportunities and power to decide what the income can be used for.

The shift is also driven by the country's constitution, gender legislations in the KwaZulu Natal province, the need for women to provide for their families and women's determination to see change that will improve their position in society. Women have also come to realise that it will take more than the constitution and decent laws to end gender inequalities. They strongly believe that in addition to the constitution and the laws, men need to accept the changing role of women in post-apartheid society. Women are aware that the constitution and the laws simply provide an enabling environment and a platform, from which women can voice their concerns. The rest depends on their determination to make the laws and the constitution work to for them.

The study shows that women are very knowledgeable and innovative with regards to coping with the impacts of the changing climate. Lessons can be drawn from their knowledge on how women can be better assisted to adapt to climate change. Results confirm that women play an important role in supporting households and communities to cope and adapt to climate variability.

Some recommendations

The study strongly recommends that to effectively address issues of gender and climate change, focus

must not only be on negative gender experiences but also assess and acknowledge progress that has been made in addressing gender issues and social changes that have taken place and lead to changes in gender relations. Lessons from positive experiences can be used to guide the way forward in achieve gender equality.

Mainstreaming gender into climate change is

very critical and requires a holistic approach. While addressing issues relating to gender inequality it is also vital to look beyond gender inequality and assess the different needs and choices that men and women make that eventually impact on their way of life and the way they respond to climate related impacts.

1. Background to the study

1.1 Introduction

This chapter sets the context of the study and presents the aim and objectives. South Africa's country profile and a brief description of the report structure are also provided. The study was commissioned and funded by Heinrich Böll Foundation South Africa.

1.2 Background to the Study

The climate change discourse has engendered considerable international debates that have dominated the environmental agenda since the mid-1980s. Addressing the threat of climate change has emerged as a global priority. In this context debates regarding identification of gender perspectives and the involvement of women in addressing climate change have arisen (Dankelman 2002; Denton 2002; Dennison 2003; Duddy 2005; WEDO 2007; Parikh 2007; Commission on the Status of Women, 2008; Carvajal et al. 2008; BRIDGE, 2008). The impacts of climate change will not be homogeneous as the poorest countries and communities will be more vulnerable to the impacts of climate change (IPCC, 2007), it is believed that men and women will be differently impacted and vulnerable to climate change. The anticipated gender differential impacts are attributed to existing inequalities such as unequal access to resources, gendered divisions of labour and decision-making power which may affect the ability to respond to the effects of climate change (WEDO 2007; Parikh 2007; UNFCCC 2007, Commission on the Status of Women, 2008; BRIDGE, 2008).

Women are expected to be more vulnerable than men to the impacts of climate change as they are reported to be the majority amongst the poorest and most disadvantaged groups in society (Denton 2001; UN, 2003; Banda 2005; WEDO 2007; Brody et

al. 2008; United Nations Commission on the Status of Women 2008; see also http://www.woman.ch/women/2-introduction.ph). Women are therefore known to have a weaker socio- economic status with limited capacity to enable them to cope and adapt to climate change. It has also been noted that basic needs such as food, water, health and energy which are mainly affected by climate change, are the basis of women's livelihoods (IUCN, 2007).

Though women may be the most vulnerable it has also been acknowledged that they function as agents of change in community natural resource management, innovation, farming and care giving. They therefore hold the key to adaptation to climate change (UNDP, 2009). For centuries, women have passed on their skills in water management, forest management and the management of biodiversity, among others. It is through these experiences that women have gained valuable knowledge that will allow them to contribute positively to the identification of appropriate adaptation and mitigation techniques given the opportunity (Ibid).

Views emerging from the gender and climate change debate lead to the conclusion that, any action to reduce the impacts of climate change including climate variability, can only be effective with an understanding of gender differentiated impacts and vulnerabilities, so as to address the specific needs of women and men. Mainstreaming gender into climate change policies has therefore become a matter of urgency.

Currently there is insufficient knowledge regarding gender differentiated impacts of climate change. As a result, policy and decision-makers are not well informed about the need for gender differentiated policies. In support of mainstreaming gender into climate change policies, Heinrich Böll Foundation commissioned research on gender and climate change in Southern Africa intended to contribute

to the much needed knowledge so as to enable effective policies and actions that will benefit both men and women in Southern Africa.

This study presents the South African case study on gender and climate change. As indicated in Figure 1, South Africa is located on the continent's southern tip with a population of 44.8 million. It shares borders with Namibia in the northwest, Zimbabwe and Botswana in the north, and Mozambique and Swaziland in the northeast.

South Africa has the largest economy in Africa due to its strong financial and manufacturing sectors. It is a leading exporter of minerals and tourism is a key source of foreign exchange. Despite being economically successful, many South Africans remain poor, with approximately 57% of the population living below the poverty datum line and a high unemployment rate (HSRC, 2004).

On the basis that impacts and vulnerabilities are differentiated across regions, communities, generations, age classes, income groups, occupations and between women and men, results yielded from the study cannot be used for generalisation of all communities in South Africa. In addition, South Africa comprises of various communities with different cultural backgrounds, beliefs, norms and values which influence gender relations.

Fieldwork was based on men and women's past and current experiences with climate variability which could worsen with future climate change. By understanding past and current experiences one can then project gender differentiated impacts and vulnerabilities to future climate change. The impacts of already experienced climatic events can provide very useful analogy for thinking about future climate change given that they are not hypothetical, but are already real and known (Bohle et



Figure 1: Location of South Africa (source: http://www.reliefweb.int)

al.1994; Ribot et al, 1996; and Burton, 1997). For example, current experiences and existing knowledge has already shown that the impacts of climate change will not be equally distributed. Drawing on knowledge based on experiences with climate variability is therefore an important asset for this research as it provides more useful reliable data that will enable development of new, as well as improve on existing coping and adaptation strategies that could potentially reduce vulnerability of men and men to future climate change.

With reference to the outcomes of two major meetings on climate change: the 'United Nations Framework Convention on Climate Change' and the 'Kyoto Protocol' it is assumed that climate change will impact on men and women the same way. The current framework in which the threats of climate change are being addressed neglects gender perspectives which are crucial for successful adaptation and mitigation (Dankelman 2002; Dennison 2003; Parikh 2007 Duddy 2005; Carvajal et al. 2008; BRIDGE 2008; Canadian International Development Agency). As a result decisions regarding climate change have neglected a gendered perspective, leading to unfavourable gender-biased outcomes.

It has therefore become important to understand the interrelations between climate change and gender so as to design effective climate change polices that are responsive to the different needs of men and women.

1.3 The objective of the study

This study on South Africa aims to examine the interrelations between climate change and gender, so as to make a contribution to the existing information gap on the gender differentiated impacts of climate change. The study also aims to create

awareness amongst policy and decision-makers about the need for gender differentiated adaptation policies. It addresses the following key questions;

- Are women and men in differently impacted by Climate Change?
- How women and men are differently impacted?
- What are the physiological, political, economic and societal causes for the differences experienced, if any?
- What are the current coping and adaptation strategies and capacities?
- How can the capacity of women and men be strengthened to better adapt to climate change and climate variability?

1.4 Report Structure

The general organisation of the report is as follows:

Chapter One sets the context and provides the general background to the study. The aim and objectives, rationale, key research questions and background to the study sites are also resented.

Chapter Two presents the conceptual framework and describes various methodological components adopted to achieve the objectives of the study. The choice of methods was influenced by the nature of the problem and by the availability of time. The methods include both primary and secondary methods of data collection.

Chapter three focuses on relevant literature surrounding climate change, gender and gender and climate in the context of South Africa.

In Chapter four, focus is shifted to the findings of the study which includes community profiles of participants. The results are presented in the order of the research questions. Finally conclusion and recommendations are presented in chapter eight.

2. Description of the study area

The research was conducted in two municipalities (uMzinyathi and uMhlathuze) located in Kwazulu-Natal. Kwazulu-Natal is a province of South Africa that forms the east coast of the country (*Figure 2*).

The Province stretches from Port Edward in the south to the Mozambique border and has three different geographic areas known as the subtropical coastal lowland region along the Indian Ocean, sweeping savannah plains in central KwaZulu-Natal (Natal Midlands), and two mountainous areas, the Drakensberg Mountains in the west and the Lebombo Mountains in the north.

2.1 Location

uMzinyathi District has a total area of 8 079 square kilometres and is located in the north central areas

of KwaZulu Natal (Figure 3). The District is made up of four local municipalities known as Endumeni, Msinga, Nquthu, and Umvoti Municipalities. The rural area (**Thelaphi**) in which the study was conducted is located in Endumeni local Municipality.

2.2 Physical Environmental Setting of UMzinyathi and UMhlathuze

UMhlathuze Municipality is located within the borders of the broader District Municipality of UThungulu (Figure 3). It is one of the six local municipalities that fall within the jurisdiction of the UThungulu District Municipality (Municipal Demarcation Board, 2002; Hill and Siyamisana, 2005). The municipality is 796 km² in size and consists of a mix of settlement types and land uses. The area comprises urban settlement, rural settle-



Figure 2: Location of Kwazulu Natal



Figure 3: Local Municipalities of UMzinyathi District and UMhlathuze Municipality within Kwazulu Natal

ments, rural areas, farms and nature reserves. The majority of rural settlements are located within Tribal Authority areas. In this municipality, participants came from two rural areas known as Dube and Mkhwanazi tribal authorities.

2.2.1 Climate and Topography

KwaZulu-Natal has a varied climate due to the diverse and complex topography. The cost is generally subtropical with the inland regions becoming progressively colder. Temperatures drop towards the hinterland with the Drakensberg experiencing heavy winter snow and occasional light snow on the highest peak in summer. The Zululand north coast has the warmest climate and highest humidity.

In general UMzinyathi District has a temperate climate with a mean annual temperature of 17°C and a mean daily maximum temperature of 24°C

and a minimum of 9.6°C. Frost occurs in some parts of the District in winter. Rainfall varies throughout the District, from 836 mm to less than 400 mm. In the case of UMhlathuze, the climate is sub-tropical with an average temperature of 28.4°C in summer and 14.5°C in winter. The area is characterised by humid summers and hot winters. Unlike UMzinyathi frost seldom occurs in UMhlathuze (Vuka Town and Regional Planners, 2002).

Population

Kwazulu-Natal is South Africa's most populous province with a population of 9426017 million people. According to the mid-2007 estimates, the population of Kwazulu natal had grown to just over 10-million people, accounting for 20.9% (Figure 4) of the South Africa's total population.

Population by Province

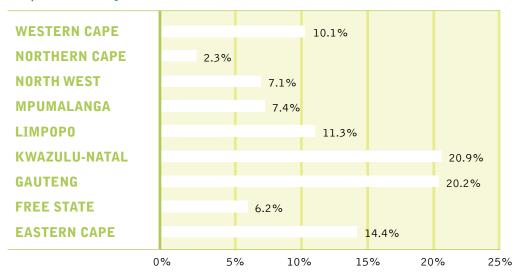


Figure 4: Population by Province

KwaZulu-Natal Province is the most populous and has the biggest poverty gap with 61% of the population living in poverty (Table 1) (HSRC, 2004).

Based on the 2001 national census, UMzinyathi has about 456 454 people, with 93% of the population residing in rural area and 7% in urban areas.

The highest number of the population is found in Endumeni which has approximately 178500 people. UMhlathuze is estimated to have a have a population of 333860 people with 40% of the population residing in rural areas (Vuka Town and Regional Planners, 2002; Department of Community Facilitation and Marketing, 2006).

Table 1: Poverty Indicators by Province

PROVINCE	NO. OF POOR PERSONS (MILLION)	% OF POPULATION IN POVERTY	POVERTY GAP (R BILLION)	SHARE OF POVERTY GAP
EASTERN CAPE	4.6	72%	14.8	18.2%
FREE STATE	1.8	68%	5.9	7.2%
GAUTENG	3.7	42%	12.1	14.9%
KWAZULU-NATAL	5.7	61%	18.3	22.5%
LIMP0P0	4.1	77%	11.5	14.1%
MPUMALANGA	1.8	57%	7.1	8.7%
NORTH WEST	1.9	52%	6.1	7.5%
NORTHERN CAPE	0.5	61%	1.5	1.8%
WESTERN CAPE	1.4	32%	4.1	5.0%
SOUTH AFRICA	25.7	57%	81.3	100.0%

2.3 Socio-economic Setting

UMzinyathi has some of the poorest and most underdeveloped rural areas of KwaZulu Natal, with very high unemployment levels. 80% of households earning less than R1600 a month and the largest proportion of poor households are located within the rural municipalities. The districts' is therefore highly dependent on provincial and national grant funding for financial support.

UMhlathuze on the other hand is characterized by highly developed urban areas yet surrounded by poor and undeveloped rural areas. The municipality experiences various social challenges resulting from the distorted development of the area. Like UMzinyathi, UMhlathuze is faced with widespread poverty and high levels of unemployment in the rural areas. This has been attributed to poor basic services and limited access to social services and employment opportunities, further worsened by the impacts of HIV/AIDS (IDP 2002; Hill and Siyamisana, 2005).

2.3.1 Livelihoods

Most industry in UMzinyathi District is associated with agriculture or hand work (carpets, bead work) by trained artisans. The District's extensive grasslands in the north support the primary agricultural sector which is based on cattle ranching for beef, small scale sheep, mixed farming and maize cultivation. Other crops include sugar cane and small scale fruit farming of avocado and kiwi fruit. UMzinyathi District has high potential for growth in agricultural crop production (maize, soybean and sugar cane). Farming in Endumeni is important as it comprises 10% of the economic activities.

Mining of coal and metal ores which previously formed the economic base of the area has declined substantially. The local economy has therefore moved away from a dependence on mining to a more diversified economy, dominated by social services and trade sectors. These two sectors make up over a third of the local economy (35%). Other important sectors include domestic workers (13%), farming (10%) and manufacturing (7%). Tourism is another emerging sector given the rich history and

the strong traditional culture prevalent in the District particularly in Endumeni. The cultural sites provide support mechanisms for the communities, as well as the living custodians of the culture.

In UMhlathuze Municipal area, most of the industrial and commercial development is focused in Richards Bay and Empangeni. These two towns dominate the Municipal area as prime sources of employment for the rural areas. Richards Bay functions mainly as an industrial hub and port, while Empangeni is the commercial, shopping and services centre of the area. Although the demarcation of the Richards Bay/Empangeni Spatial Development Initiative has brought about increased investment and employment opportunities to the Municipal area the majority of the population remains impoverished and unable to find work. According to the 2001 census unemployment rate stood at 40%, 46% of all households survived on an income of less than R800 per month and with approximately 54% of the population having no income. The unemployment and poverty rates therefore remain alarmingly high despite the development and investment that has taken place in the area. (UMhlathuze Municipality 2002; Hill and Siyamisana, 2005).

Similar to UMzinyathi District, agriculture is the largest employer in UMhlathuze. Agricultural developments are dominated by the cultivation of sugarcane and forestation. Agriculture is seen to have significant potential for growth and has as a result become a focus of the District in terms of promoting pro-poor development.

2.4 Health

The AIDS pandemic is very serious in both UMz-inyathi District and UMhlathuze. The effects of HIV/AIDS are being felt dramatically in the whole of the Province. The AIDS pandemic in KwaZulu-Natal, and more specifically in the Endumeni Local Authority areas, presents the greatest challenges for the Integrated Development of the area, as the pandemic will affect every aspect of development (TRP Commission Report on Impact of HIV/AIDS 2000).

3. Literature Review

3.1 Introduction

This chapter presents the relevant literature and theoretical underpinnings surrounding the discourse of gender and climate change. The literature and the theoretical background provide useful conceptual links, which were used in constructing the methodologies of this study. The chapter begins with a conceptual framework highlighting theories and concepts emerging from gender and climate change. The concept of gender, climate change and other related concepts such as vulnerability and adaptation are explored. This is followed by the link between gender and climate change, bringing about the concepts of gender differentiated impact and vulnerability to climate change. Having presented the conceptual framework, focus is shifted to gender and climate change in the context of South Africa (Figure 3).

3.2 Conceptual Framework

Gender

Reflected in *Figure 5* is the term gender which was first adopted by John Money in 1955 to refer to sexual attributes of people (Money 1973). Since then, the term gender has been widely defined to refer to the socially constructed differences between men and women and the unequal power relationships that result. The gender differences between men and women are therefore not essential or inevitable products of biological sex differences (Money 1973; International Federation of Red Cross and Red Crescent Societies, 1999; Commission on Gender Equality 2000; UN 2002; UNESCO 2003; Annecke 2005; Rothchild 2007).

This study adopts the widely accepted definition of gender as stated above. It also acknowledges that because gender is socially constructed, the gender

roles and expectations are learned and can change over time. Gender is therefore dynamic meaning the learned gender roles and expectations are neither biologically predetermined nor fixed. It is accepted that the roles and expectations vary within and between cultures and can be modified by systems of social differentiation such as political status, class, ethnicity, physical and mental disability, as well as age (UNESCO 2003). Gender is also known to intersect with many other multiple layers of identity, inequality, privilege and dislocation (including race, culture, class and geographical location, amongst others) (Commission for Gender Equality 2008).

Climate Change

In line with the Intergovernmental Panel on Climate Change (IPCC) this study defines climate change as any change in climate over time, whether due to natural variability or as a result of human activity. This definition differs from the one adopted by the United Nations Framework Convention on Climate Change (UNFCCC), which defines climate change as a change of climate attributed directly or indirectly to human activities that alter the composition of the global atmosphere and which is in addition to natural climate variability observed over comparable time periods (IPCC 2007; UNDP 2009).

Though climate is a natural phenomenon that has always been dynamic and varies at a global scale of time and space (Ribot *et al.* 1996), current concern for changes in climate have arisen because of the unprecedented human industrial and development activities of the past two centuries that have caused changes over and above natural variation (IPCC 2001). Climate change is now a scientifically proven phenomenon that poses serious consequences for humans and ecosystems (IPCC 2001). For this reason climate change has not only engendered considerable international debate

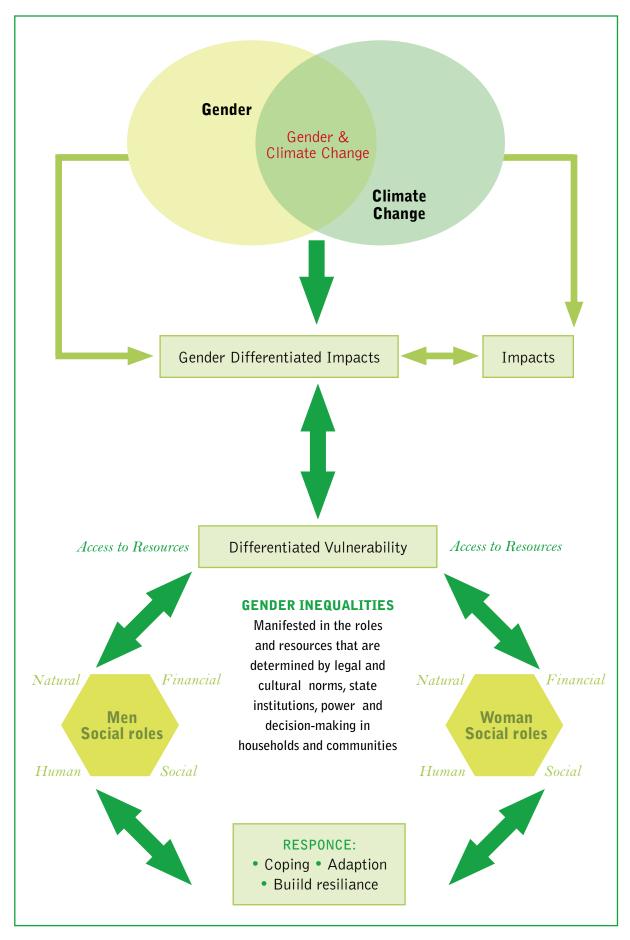


Figure 5: Conceptual Framework

but has also dominated the environmental agenda since the mid-1980s (Miller 1996; Middleton 1999; Acosta *et al.* 1999; UNEP 2000; UNFCCC 2000; IPCC 2001; UCS 2003; WWF 2004).

Climate Change Impacts

The impacts of climate change are well documented by IPCC and organisations such as The World Health Organisation (WHO), the World Meteorological Organisation (WMO), United Nations Environment Programme (UNEP), Unites Nations Development Programme and United Nations Educational Scientific and Cultural Organisation (UNESCO). As highlighted in the climate change literature, the key impacts of climate change are associated with sea level rise, changes in the intensity, timing and spatial distribution of precipitation, changes in temperature and the frequency, intensity and duration of extreme climate events such as droughts, floods, and tropical storms (IPCC, 2001; IPCC, 2007; USAID, 2009; UNDP 2009).

While climate change is viewed to be global in nature, its impacts are not expected to be globally homogeneous but rather differentiated across regions, generations, age classes, income groups, occupations and between women and men. The consequences of climate change are predicated to be potentially more significant for the poor in developing countries than for those living in more prosperous nations (Olmos 2001; IPCC, 2007; USAID, 2007; UNDP, 2009; USAID, 2009).

Africa being a home to many of the world's poorest nations, has already demonstrated its vulnerability to the effects of current climate variability (e.g. effects of events such as droughts and floods). Climate variability according to (IPCC, 2007) refers to variations in the mean state and other statistics (such as standard deviations, statistics of extremes, etc.) of the climate on all temporal and spatial scales beyond that of individual weather events. Based on knowledge generated from studies on impacts and vulnerability to climate variability, societies that are most vulnerable are usually those deprived of mechanisms and resources to prepare for and adapt to climate variation (Nobre et al. 1992; Burton, 1997;

Handmer et al 1999; IPCC, 2000; Babugura, 2005).

The continent not only faces the challenge of dealing with the possible consequences of future climate change but it is also exposed to multiple stressors (socio-economic, health, political and environmental factors), which serve to exacerbate climate stress events (O'Brien and Leichenko 2000; Kunfaa et al. 2002; Khogali 2002; Drinkwater 2003; Frankenberger et al. 2003; UNAIDS 2003; Babugura, 2005). These stressors affect ability to anticipate, prepare for and respond to current climate variability and may further heighten vulnerability to future climate change. Addressing the threat of climate change has therefore become a global priority.

Gender and Climate Change

Having established from the climate change literature, that climate change impacts will not be uniform, recent debates have also emerged indicating that climate change is not gender neutral. Poor women and men, especially in developing countries, are expected to be disproportionately affected by climate change (Dankelman 2002; Parikh 2007; WEDO 2007; Commission on the Status of Women 2008; BRIDGE 2008). The study therefore acknowledges that linking gender to climate change is imperative for the development of effective climate change policies that are gender responsive.

Linking the concepts of gender and climate change creates a complex analysis given that the two concepts are diverse. Despite the complexity, identification of gender perspectives and the involvement of women in addressing climate change are urgent, as climate change adaptation and mitigation measures cannot be gender neutral. Linking gender and climate change therefore implies understanding how to locate men and women with in the climate change discourse.

Gender differentiated impacts and vulnerability

Linked to gender and climate change is the concept of gender differentiated impacts, traditionally used in the context of poverty and disaster studies (Buvinic *et al* 1983; Haddad 1991; Lloyd and Brandon 1991; Quisumbing et al 1995; Enarson and Marrow 1998; Fordham 1999; Enarson 2000; Masika 2002; Ariyabandu and Wickramasinghe 2003; Bradshaw 2004) to identify and address factors that constrain the development of gender responsive policies and strategies. The gender differentiated impacts in poverty and disaster studies have been attributed to gender inequalities, women's status, their activities and socioeconomic vulnerabilities in general. In the climate change discourse the same rationalization is used to justify gender differentiated impacts of climate change (Commission on the Status of Women 2008; Dennison 2003; Dankelman 2002; Denton 2002)¹.

Gender differentiated impacts in the context of climate changes are linked to differentiated vulnerabilities. The term vulnerability can be traced back to the analysis of famine, hazards and entitlement (Sen, 1981; Burton et al. 1993; Blaikie et al. 1994). Over the years, the concept has become more prominent in the studies of global environmental change (Dow 1992; Downing and Watts 1994; Dow and Downing 1995; Watson et al. 1996; Adger 1999; IPCC 2001). Although there has been more than a decade's worth of research experience regarding the concept of vulnerability, capturing the meaning of the concept remains difficult. Several attempts have been made to define the concept of vulnerability (e.g. see Sen, 1981; Timmerman 1981; Susman et al., 1984; Mitchel 1989; Liverman 1990; Smith 1992; Cutter 1993; Blaikie et al. 1994; Dow and Downing 1995; Ribot 1996; Adger and Kelly 1999; IPCC 2001) drawing variations in meaning as a result of different epistemological orientations and subsequent methodological practices (Cutter 1996).

IPCC (2001) presents vulnerability as the degree to which a system is susceptible to, or unable to cope with adverse effects of climate change, including climate variability and extremes. As indicated in

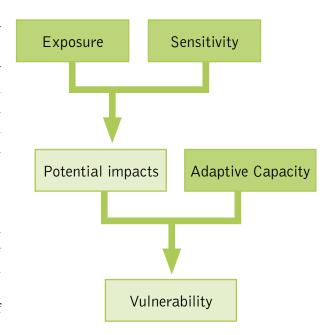


Figure 6: Conceptualisation of Vulnerability to Climate Change (Source: Lonescu *et al.*, 2005)

Figure 6, vulnerability is seen to comprise of three components. These are exposure, sensitivity and adaptive capacity. **Exposure** refers to the presence of a climate hazard; **sensitivity** refers to responsiveness of a system to the climate hazard and **adaptive capacity** refers to the ability of a system to change in a way that makes it better equipped to manage its exposure and sensitivity to climate hazards and or cope with adverse impacts (IPCC 2001; USAID 2007).

The vulnerability of men and women to the impacts of climate change would therefore imply examining their exposure to climate change which includes climate variability and extremes, the different sensitivities to these direct effects which lead to different impacts and their adaptive capacity (the ability to adjust to the changing climate so as to moderate potential damages, to take advantage of opportu-

 $^{^{1}}$ For additional information see also http://www.gencc.interconnection.org/resources.htm and http://www.genanet.de).

nities or to cope with the consequences).

Vulnerability in this study is defined as the ability or inability of individuals or social groups to respond to, cope with, recover from or adapt to, any external stress placed on their livelihoods and well-being (Chambers 1989; Kelly and Adger 2000). The definition takes into account a combination of social, economic, ecological and political factors that shape the ability or inability of individuals, households and social groups within a community to cope and adapt to any external stress. On the basis of this definition, the study recognises that the level of vulnerability to climate change for men and women will depend on their ability to cope with, recover from or adapt to climate change including climate variability.

Some of the climate change literature (e.g. Denton 2002; Skutsch, 2002) reveals that women will be more vulnerable than men to the effects of climate change because of unequal power relations, limited access to resources(financial, natural, social, human) and economic opportunities. In addition, their subordinate positions and roles in society as well as injustices in the cultural norms that govern their lives limit their choices.

Other factors include women's direct dependence on natural resources. A more prominent example is their dependence on the agricultural sector in Africa, where women are reported to constitute a majority (over 70%) of the workforce. It is expected that changes in the weather patterns and extreme weather events will affect traditional growing and harvesting cycle in turn negatively impacting on women's ability to provide for the subsistence needs of their families. In addition, studies on the victims of climate related disasters have already shown that women are more vulnerable as they make up the majority of the economically and socially weaker groups that tend to suffer most (Neumayer and Plümper, 2007, UNEP and NWMLE, 2009).

Given the gender differentiated impacts and vulnerabilities, men and women will also have different priorities and responses to climate change in terms of coping and adaptation so as to build

resilience. Adaptation is a key to the enhancement of resilience of vulnerable systems (Stakhiv, 1993; Bohle *et al.* 1994; Burton 1997; Smit *et al.* 2000; IPCC 2001). Resilience is defined as;

The amount of change a system can undergo and still retain the same control on function and structure; the degree to which the system is capable of self-organisation; and the degree to which the system expresses capacity for learning and adaptation (Walker 2003: 12).

According to Chambers and Conway (1992), resilience in a social context depends on people's capabilities to adapt to internal and external shocks and stresses. This means that when change such as climate change occurs, resilience provides the mechanisms for restoration and reorganization which are critical for adaptation (Gunderson and Holling 2002, Berkes *et al.* 2002). Resilience is basically the opposite of vulnerability. Less resilient systems will therefore become increasingly vulnerable to disturbances that were previously within the coping limits of the system (Quinlan 2003).

One of the key attributes of resilience lie in the variety of functional groups and the accumulated experience and memory that provides for reorganisation following disturbances. It is therefore vital to understand the actions taken by men and women to help them moderate, cope with, or take advantage of actual or expected changes in climate conditions. For coping and adaptation to be successful (resulting in resilience), resources (figure 2.1?? check??) that would enhance men and women's capacity to adapt to climate variability and change need to be equally accessible. These include access to land, credit, agricultural inputs, decision-making bodies, and technology and training services, education, natural resources, mobility, access to equal economic opportunities, information and communication systems. With appropriate resources, women and men have the ability to develop complex adaptive strategies, differentiated by gender so as to build resilience to climate variability and change. The following sections will now focus on gender and climate change in the context of South Africa.

3.3 Climate Change in the Context of South Africa

The profile and significance of climate change issues has gained momentum in South Africa over the last few years (National Climate Change Response Policy 2009). Given that Africa is predicted to be the most vulnerable to climate change (IPCC 2007) South Africa is faced with the same vulnerabilities as the rest of the African continent which are exacerbated by the continents development challenges and adaptive capacities. The challenges include poverty; limited institutional capacity; limited access to capital, markets, infrastructure and technology; ecosystem degradation; low levels of resilience to disasters and resource based conflicts (National Climate Change Response Policy 2009).

South Africa is committed to playing its part as a global citizen to take necessary action to respond to the challenge of climate change, having acknowledged the grave risks posed by climate change and finding itself in a situation in which it is a high emitter of greenhouse gases. As a starting point, South Africa in addition to being a signatory in both United Nations Framework Convention on Climate Change (UNFCCC) and the Kyoto Protocol has undertaken a substantial amount of work to meet its commitments in terms of the Convention and the Protocol (National Climate Change Response Policy, 2009). For example, it has developed a Greenhouse Gas Inventory, it has produced a first National Communication that was submitted to the UNFCCC and actively participates in the Clean Development Mechanism (DNA) (National Climate Change Response, Policy 2009).

3.4 Anticipated Climate Change impacts for South Africa

The projections of the IPCC Working Group I predict that Africa's warming trend will be $1\frac{1}{2}$ times more than the global trend and that Southern Africa will be about $3^{\circ}-4^{\circ}$ C warmer by the close of this century (Christensen *et al*, 2007). In South Africa, temperature increases are likely to be in the order of 1° to 3° ,

and are likely to be felt across the country (Midgley *et al*, 2007). The interior of the country will experience the highest increases including strong increases in daily minimum temperatures, particularly in the arid and semi-arid regions towards the western interior while in coastal areas, temperature increases will be tempered by the nearness of the ocean (Ibid).

Though the projected changes in the intensity and frequency of precipitation events remain uncertain, the IPCC projects that much of Southern African will experience a large scale drying trend in the winter season while the summer season will experience more rainfall (Christensen et al, 2007). This drying trend is predicted to be more pronounced in the south western parts of the region. As a result, the south western parts of South Africa are expected to become drier during the winter months and a shortening of the winter rainfall season is predicted (Ibid). While the northern and eastern parts of the country are expected to experience an overall increase in rainfall during the summer months, the precipitation will occur in short, sharp events which will likely result in flooding (Christensen et al, 2007). The incidence of droughts is expected to increase throughout the

In addition several South African key sectors are expected to be impacted by climate change. These sectors include; water, agriculture, forestry, biodiversity and ecosystems, human health, urban environment and rural livelihoods (Midgley et al. 2007). One of the major concerns is the impact climate change and climate variability will have on agricultural production and food security. It is reported that generally several African countries are already faced with climatic conditions (e.g. semi-arid conditions) that make agriculture challenging. It is projected that climate change will worsen these conditions by reducing the length of growing seasons and force large regions of marginal agriculture out of production. This adversely threatens food security in the continent (National Climate Change Response Policy, 2009).

3.4.1 Social Vulnerability

Based on the impacts of climate related events that are already being experienced on a human level, it is predicted that it is those who are already the most vulnerable and marginalised who will experience the greatest impacts of climate change (Brody et al., 2008; Davis, 2008; IPCC, 2007). The poor will be especially vulnerable to the impacts of climate change as they lack the capacity (e.g. financial, technical, human and institutional resources) to cope and adapt (Brody et al., 2008; Scott, 2008; IPCC, 2007). Early signs of climate change manifested in current climate variability (e.g. droughts, unpredictable rainfall patterns and floods) are already threatening their lives, livelihoods, health and well-being. For example, the poor who rely on subsistence agriculture, the impacts of climate shocks and stresses are likely to have negative implications for their food and livelihood security, human capital and welfare (Davis, 2008).

57% of South Africa's population who are said to be poor (HSRC 2004) are at risk of being negatively impacted by climate change. Droughts are expected to increase both in frequency and intensity as a result of climate change and these are already impacting negatively on South Africa's rural poor who rely on rain fed agriculture (Shewmake, 2008; National Climate Change Response Policy, 2009). As indicated in the National Climate Change Response Policy (2009), adapting to climate change at the rural livelihood scale is critically important for South Africa. It is suggested that particular focus be given to the most vulnerable groups, so that their livelihoods are not eroded by climate events but rather to facilitate resilience to the expected changes in climate. Without any capacity to build resilience to climate change, South Africa's poor population will therefore be vulnerable.

3.5 Gender and Climate Change in South Africa

Though the profile and significance of climate change issues have gained momentum in South Africa, gender is still overlooked in climate change

policies that address adaptation. This is evident in the discussion documents on climate change (national climate change response policy, A Climate Change R&D Strategy for South Africa and South African Country Study on Climate Change Vulnerability & Adaptation Assessment). Apart from studies such as Banda (2005) and Sterrett (2007) very little gender analysis based research has been undertaken to understand the different impacts of climate change on men and women.

Despite the lack of hard evidence not only in South Africa, it is now widely acknowledged that climate change is not a gender-neutral phenomenon (UN, 2008), implying that men and women will be differently impacted by climate change. As already indicated in the conceptual framework, gender inequalities and the acknowledgement that women constitute the largest percentage of the world's poorest people are used to justify gender differentiated impacts. Due social inequalities and ascribed social and economic roles that are manifested in differences in property rights, access to information, lack of employment and unequal access to resources, are seen to limit women's adaptive capacities therefore making them more vulnerable than men (Masika, 2002; WEDO, 2003; Hemmati, 2005; Gender CC Network, 2007; Brody, 2008).

In trying to understand gender and climate change in the context of South Africa, it is important to appreciate gender and gender relations in South Africa. Thus the next section provides an overview of gender and gender relations in South Africa.

3.6 Gender and Gender Relations in South Africa

Though South Africa has made little progress on matters concerning gender and climate change the country has a vision to bring about gender equality (see, Commission on Gender Equality Act No 39 of 1996; Commission on Gender Equality, 2000). As one of the country's priorities, South Africa is committed to gender equality and addressing a number of gendered issues which are of concern in the climate change discourse.

With regards to gender issues South Africa presents a unique situation for political reasons which emanate from its history of apartheid. The contemporary position of women in South Africa cannot be fully appreciated without an understanding of the ways in which colonialism, capitalism and apartheid have organised social relations and fractured society along racial, class and gender lines (Baden et al., 1998). To better understand gender relations in South Africa the Commission on Gender Equality (2000) goes further to make a comparison between apartheid and patriarchy. For instance, in terms of land, patriarchal systems denies women ownership just as the apartheid system similarly denied blacks ownership of land; on the economic front apartheid confined blacks to the lowest paid jobs as patriarchy does to women (see Appendix 2 for more details).

Seeing patriarchy as a reflection of apartheid, women in the struggle against apartheid also had a vision that the victory for democracy in South Africa would also be a victory over sexism. They understood that the focus of the struggle was on eliminating a racist system but with the achievement of democracy it would be broader in the sense all citizens (men and women) will be equal in a democracy (Commission on Gender Equality, 2000; Meer 1998)

With the transformation of South Africa the hope was that there will be total redistribution of power and resources. This would result in all South Africans benefiting given that they would live in a just society. The hope is for everyone to have the opportunity to develop his or her full potential and contribute to the common good implying equal rights for men and women. The vision is for both women and men to have a wider choice and more freedom, however this was not been the case. Women do not have the same access to resources and decisionmaking processes as men do because of the gender roles society puts on them. As a result women have failed to fully develop and use their talents and skills not only for their benefit but for the benefit of the societies in which they live in (Commission on Gender Equality, 2000).

Furthermore, the commission on Gender Equality notes that almost half the South African population lives in the rural areas with the majority being women, mostly poorer than their urban counterparts. The commission on Gender Equality points out numerous concerns of these rural women. These include a limited access to land, credit, lack information, running water, decision-making and other structures of power and authority (Baden et al., 1998; Commission on Gender Equality, 2000). Due to these concerns gender polices in South Africa have paid more attention to empowering women. The aim is not to disempowering men but to bring women out of their subordinate situations in the home, in their communities and in public life therefore allowing them to participate in shaping the transformation of South Africa equally with men (Commission on Gender Equality, 2000).

3.6.1 Progress made since 1994

Various significant developments have occurred to set the pace towards building gender equality in South Africa since 1994 (Meer, 1998). Having recognised that gender is dynamic and that gender roles are neither natural nor sacred, a number of progressive policies and legislation have been put in place to set the context for gender transformation. The agenda for transformation encourages a situation in which women and men have choices about their own lives and other issues. This is not only true for South Africa but for societies around the world. Some traditional and cultural practices that are no longer compatible with the modern way of life have already been changed. Every year South Africa celebrates women's day indicating South Africa's is commitment to transforming relations between women and men. Some of the milestones as noted by the Commission on Gender and Equality (2000) include the following;

 The South African constitution adopted in 1996 clearly entrenches the principle of equality between the sexes. In addition the constitution provides for affirmative action where necessary to address imbalances of the past, freedom and security of person, socioeconomic rights which

are key for most women, and that the constitution takes precedence above all laws.

- Some religious institutions are reinterpreting their texts and allowing women to take up leadership roles. From these positions women are in a better position to influence the interpretation of religious texts and rituals.
- In 1998 three crucial pieces of legislation were passed. The Domestic Violence Act No 116 of 1998, the Maintenance Act No 99 of 1998, the Recognition of Customary Marriages Act No 120 of 1998.
- The Women's Charter for Effective Equality (launched in 1994) represents South African women's quest to directly take responsibility for gender equality.
- In 1995 South Africa ratified the Convention on the Elimination of All Forms of Discrimination Against Women, (CEDAW). Although international conventions such as CEDAW do not automatically become part of national law, ratification is an important step. It signifies government's commitment to the principles and actions specified. Lawyers, women's groups and policy makers can use the provisions of CEDAW to make demands of the government and remind it of the commitment that it made at international level.
- At the sub-regional level, South Africa as a member of the Southern African Development Community (SADC), agreed to the SADC declaration on Gender and Development as well as the addendum on the Prevention and Eradication of Violence Against Women and Children. This was adopted by SADC heads of government in 1997.
- At the national level, the Office on the Status of Women is still in the process of finalising a national gender policy. Some government departments have developed gender policies in line with their functions.

According to the Commission on Gender Equality (2000), this means that there is a national and international policy context in which gender equality has been defined as a priority for South Africa. These policies, agreements and declarations

signify not only the government's commitment and priorities, but go further to indicate how all sectors of society should be involved.

3.6.2 Politics and decision making

Due to socialization and cultural barriers, negative stereotyping reinforces the belief that decision-making belongs to men. The South African government has made efforts to discard this belief. As indicated by Baden et al., (1998), at the opening of the first democratically elected Parliament, President Nelson Mandela singled out the importance of gender equality by stating the following,

"Freedom cannot be achieved unless women have been emancipated from all forms of oppression. All of us must take this on board, that the objectives of the Reconstruction and Development Programme (RDP) will not have been realised unless we see in visible and practical terms that the condition of the women of our country has radically changed for the better, and that they have been empowered to intervene in all aspects of life as equals with any other member of society".

With reference to the political struggle there is now belief that women's equal participation in politics plays a key role in the general process of advancing women. South Africa is now among the top ten countries in the world with high numbers of women in Parliament. At the local government level, though not satisfactory women are also represented. It is acknowledged that the political struggle of women against apartheid, as well as the inclusion of women and women's concerns in the liberation movements has had a major impact. Baden et al., (1998) notes that, through these struggles a strong women's leadership emerged, and was able to articulate the demands of women during the multi-party negotiations process. This has resulted in a high level of political representation of women in the post-apartheid government, with a history of activism and links outside Parliament that provides strong leadership on gender issues.

Baden et al., (1998) also indicates that the strong intervention by women's organisations and rep-

resentatives in political parties during the negotiations for the new South Africa has left two key lasting gains for women. The first one being that, the constitution guarantees the equality of women and the second being a comprehensive institutional package that has been created to ensure that gender issues are addressed by government as well as the private sector. The women's struggles to transform unequal and exploitative gender relations are further enhanced by the ethos of human rights. The way in which socio-economic rights have been framed in the constitution also provides the opportunity for women to make specific contributions about redistribution and poverty reduction policies.

In spite of the major gains, there still remain enormous disparities and inequalities among men and women. For example in the justice system the biggest challenge that women face is the culture that surrounds the law and its administration and implementation. Though South Africa has one of the most progressive constitutions in the world, and some of the best laws on paper, implementation has been a challenge.

Despite the challenges being experienced, various NGOs, women's organizations and the South African government continue to be committed to promoting gender equality (Baden *et al.*, 1998). It is now widely accepted that achieving gender equality and empowering women will enable conditions for creating healthier, peaceful, better educated and more successful societies. It is through this achievement that other major challenges linked to gender inequality (such as poverty, HIV/AIDS and various social vulnerabilities) can be effectively addressed which in turn will reduce if not eliminate vulnerability to climate variability and change.

4. Methodology

4.1 Introduction

In this chapter various methodological components adopted to achieve the objectives of the study are outlined. Both primary and secondary data collection methods were employed. The choice of methods was influenced by the nature of the study and the constraints of time.

4.2 Data Collection

Initially data was collected over a period of 20 days. The visit to each site lasted 10 days. On request for additional data, more data was collected over a period of 8 days, adding to a total number of 28 days for data collection. The study utilised both secondary and primary data. Secondary data was obtained by means of desk top research. It involved a comprehensive review and analysis of existing published and non-published literature relevant to the study. Data collected from secondary sources was used to complement primary data.

4.2.1: Primary data

Primary data was obtained using qualitative research techniques guided by a combination of gender analysis tools indicated below as outlined by March (1999). These include;

- Activity profile
- Access & control profile
- Influencing factors
- Gender analysis matrix
- Capacities & vulnerabilities analysis
- Needs assessment
- Impact assessment
- Institutional analysis
- Social relations profile

The qualitative research techniques employed were participatory rural appraisal in the form of focus

group discussions, role play, life histories and key informant interviews.

4.1.2 Participatory Rural Appraisal

Participatory rural appraisal is a qualitative research method (Conway 1987; Baro, 1998; Chambers 1992). The methodology is designed to allow local involvement in the collection and analysis of information by outside researchers. The qualitative characteristic of the method enables the researcher to probe the context in which a particular problem occurs. It is known to be an effective way to collect information as the researcher is able to seek out local knowledge and interact with local people. Data collected using this method allows for development plans to take into consideration the knowledge and rights of the people they claim to help.

4.1.2.1 Focus groups

Focus group discussions were also used to collect data. Semi-structured questions designed based on the various gender analysis tools listed above then used to guide the focus group discussions.

Before undertaking the interviews, the rural communities were informed through community leaders. Motives and intentions were made clear to eliminate mistrust and suspicion. As a result attendance and cooperation was high and the communities showed a great interest in the study. To make communication more effective interpreters were used to translate between Zulu and English. Through focus group discussions, men and women were given the opportunity to voice their experiences and concerns regarding past and current climatic events. Both men and women provided knowledge that enhanced the capacity to understand how men and women are currently affected by climate and how future climate change is likely to affect them.

Before establishing the groups, participants were asked whether they preferred to be divided in groups of male and female. To the researcher's surprise, men and women wanted to be together in the groups. Their reason for this was that both women and men and woman were interested in each other's views on the subject of climate change. They said it was an opportunity for them to share views, experiences and fears. The discussions were a success and very informative. In the mixed male and female groups there was fear of men dominating the discussions and women not being able to express themselves. This was not the case. In both study areas women were very vocal and freely voiced their views. They spoke with confidence in the presence of men. This was a very interesting observation an indication that women have the freedom to speak.

Apart from mixed groups, focus group discussions were also held with women only and men separately. There were also focus group discussions with the youth, female farmers, and male farmers, women heading households, women from male headed households and single fathers. Household interviews were also conducted to collect additional data. Below figures 7 and 8 shows some of the participants.

Given that the participants needed to have specific characteristics, purposive sampling was used to select participants for the focus groups. The aim was to make sure that different social groups comprising of men and women are represented. The different social groups represented included elderly men and women, men and women with formal and





Figure 7: Participants of the Workshop from Mhlathuze





Figure 8: Participants from UMzinyathi

informal employment, male and female farmers, women from female headed- households, women from male-headed households, young women and men, single fathers and female and male leaders.

4.1.2.2 Life histories

Life histories were also used to collect data. These entail a systematic collection of living people's testimony about their own experiences. The process involves an interviewee recalling an event for an interviewer who records the recollections and creates a historical record as shown in Figure 9 below.

Within the gender analysis and vulnerability framework, life histories were undertaken to collect historical data about past climate conditions, men and women's experiences and coping mechanisms and various changes that have occurred over time that affect coping and adaptation to climate change. The life histories were conducted with elderly members of the community (over 50 years). Men and women were selected to partake in the life history interviews. A total number of 8 life histories were collected. Two elderly men and two elderly women were selected from each study area. These participants were selected using convenience sampling. The information was recorded by means of taking notes by hand.

4.1.2.3 Interviews with key informants

Interviews were conducted with key informants, so as to collect specialised data. These individuals consisted of farmers and community leaders. Additional data was also collected from individual members of gender activist groups and members of the traditional council. Information obtained from these individuals was used to compliment data collected from focus groups, life histories and secondary sources.

4.2 Data Analysis

Analysis and interpretation of data were undertaken after completion of the fieldwork. Qualitative data analysis was employed to formulate results from which conclusions were drawn.

4.3 Limitations and Challenges in the field

The results of this study cannot be used to generalise South Africa as each community is unique and will differ in culture and values. Although this research cannot be considered as representative of South Africa, the findings are an important step in unveiling the dynamics and realities of gender differentiated impacts of climate change including climate variability. Below is a summary of the key limitations of the study;

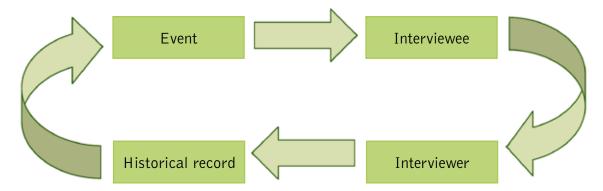


Figure 9: Life History Process

- With a wide scope of analysis and the time constraints this report cannot claim to be exhaustive.
 However every effort has been made to highlight emerging issues. With changes taking place all the time some of the information and findings will inevitably become out of date.
- Gaining access to the communities involved getting permission from community authorities.
 It was a challenge to meet with the authorities.
- Once permission was obtained the challenge was to get the trust of the people. We constantly
- had to explain ourselves to convince the people that we were only there to carry out research and nothing else. There was fear among the people as they were really not sure whether our intensions were genuine.
- There were also people who thought we had come to solve their problems. As a result people were constantly asking how we were going to help them after conducting the study. After carefully explaining our reason for being there and the purpose of the research they were cooperative.

5. Main findings of the study

5.1 Introduction

This chapter presents the results of the fieldwork and begins by providing an overview of the community profile by providing background information on the communities in which the study was undertaken. Section 5.3 provides participants understanding of climate change. The remaining sections of the chapter focus on the specific research question.

5.2 Community profile

In general Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) are typical poverty stricken rural communities. They are underdeveloped with limited basic services. In addition to poverty, high levels of unemployment and low educational levels characterize these rural communities. As shown in Figures 10 and 11 majorities of their homes are typical rural houses made of mud.

For the new generation, education features as a high priority amongst households. The older gen-

eration indicated that their low educational levels are due to previous historical disadvantages. They now strongly encourage the younger generation to get a good education so as to have better lives.

5.2.1: Household characteristics

The rural communities comprise of female-headed households (which are the majority), male-headed households, single father households, child-headed households and grandparent- headed households.

5.2.2: Livelihoods

In all the communities, due to high unemployment rate people rely on agriculture for household food security. All households cultivate home gardens. Some of the gardens are located at the back of the houses and others are within the proximity of the household. They are involved in mixed farming comprising of different types of vegetables, root crops, maize, and plant crops. There is potential to develop agriculture for marketing purposes which would in turn provide incomes for households to purchase food in times of harsh climatic events.

In Dube and Mkhwanazi (UMhlathuze Munici-



Figure 10: Mud House in Mkhwanazi Rural Community



Figure 11: Mud House in Thelaphi Rural Community

pality) a small number of people are formally employed in the public sector (includes teachers, community health workers, policemen and short-term contractors), and private sector (includes forestry, commercial farms and sugar cane plantations). The majority of the people mostly women are self employed in microenterprises or involved in subsistence activities (includes piece jobs on farms, informal trading, and selling surplus vegetables in times of good harvest). Most households in these communities are dependent on government social grants (e.g. child support grants, pension grants, and disability grants).

Among the communities studied, Thelaphi suffers the highest rate of unemployment with most households dependent on social grants for survival. Some people also take part in casual labour undertaken within the community (mainly working in gardens). The households that receive all three grants (child support grants, pension grants, and disability grants) are better off as they have more purchasing power. The community of Thelaphi is very isolated and far from services. Lack of health and transport services are some of the challenges they are faced with.

HIV/AIDS is a significant threat to the livelihoods of these rural communities. It is very costly for them to care for household members infected with HIV/AIDS. There is a lot of strain on the limited resources that could be used to benefit the wellbeing of the household. HIV/AIDS is a threat to any little progress they make.

5.2.3 Gender and Gender Relations among the Rural Communities

Traditionally in all the communities the role of a man was to look after livestock, provide for and protect the family. The man was also responsible for protecting family assets and making all the decisions. The role of the woman was mainly to manage the household, care for the children and taking care of the home garden. Due to harsh climatic events (mainly droughts) that occurred overtime, the men began to lose their livestock. Without the means to protect the livestock from the harsh climate even-

tually most men could not sustain their livestock. Overtime several changes have occurred and have influenced changes in gender roles and relations. The list below summarises the main reasons given for changing gender roles and relations in the rural communities of Thelaphi, Dube and Mkhwanazi. The initiative for change is driven mainly by women in both communities.

- Unfavourable climatic conditions have forced women and men who were solely dependent on agriculture for their livelihoods to seek alternative livelihood activities.
- Women noted that they had enough of being oppressed and disadvantaged. They now want to enhance their own development and improve their livelihoods for the sake of their children and their own status.
- Women pointed out that they now have an enabling environment for them to fight for their rights. This is provided by the constitution, gender legislations and various gender activist groups.
- Women reported that they are motivated by the need to provide more for their children apart from just caring for them.
- Women indicated that they want to be in a position to meet their own needs which men are usually not concerned with (e.g. independence/self-reliant).
- Women were of the view that with the impact of HIV/AIDS, more women are heading households as a result they have to take on men's roles too. Men were also reported to take up female roles in cases where the woman in the house dies.
- Women voiced out that because they are desperately trying to escape poverty they are motivated to be economically active.
- Some men were reported to be irresponsible

heads of households with majority of them being unemployed, women are now taking the initiative to make decisions and take charge of the household. In addition to high unemployment levels, HIV/AIDS and changes in livelihood strategies household structures are changing.

 Women also pointed out that there has been unwillingness to continue accepting the injustice among the rising number of female-headed households.

5.3 Participants Understanding of Climate Change

Before conducting discussions on gender and climate change, it was important to establish participants understanding of climate variability and change. The views of the participants regarding their understanding of climate variability and change are as follows;

In both areas of study, men and women from Thelaphi, Dube and Mkhwanazi rural communities demonstrated awareness of climate variability and change. Their understanding was mainly based on experience and oral communication. In their own language, they expressed that climate change is associated with abnormal warming of the earth that will lead to changes in the year to year seasonal climate. For example, see bellow some of the responses.

"Our planting seasons are changing. We used to know when the rains will come now we don't know anymore. For us this is not normal. Something is wrong with the climate. We don't know what is causing the climate to change like this. We have more dry and hot days than we used to have. I hear it will get worse. The more hot it gets the less rain we will get." (elderly woman from Thelaphi community).

"When we were growing up there was always plenty to eat in our gardens. We did not worry so much about food. We had ground nuts, maize, beans and all kinds of vegetables. We always had plenty of

rain. These days it is dry and so much wind. For sure the climate is changing. It is hotter these days with little rain. Our gardens are not doing well anymore. My grandson tells me things will get worse so we are worried. He learns about these things at school and when his mother complains about the crops drying, he explains that soon we will not be able to get even the little we are getting. That is something to worry about. Our earth is getting hot and dry than it should be. What are we going to do if it gets worse?" (Elderly man from Mkhwanazi community).

"I don't think we need to be told that something is wrong with the climate. We can see for ourselves that is getting hotter and we get very little rain. We can no longer tell when to expect the rain because it does not come at the time we expect it. We are no longer sure when we should plant or whether we should even plant because we waste seeds and our time if the crops fail. We have been disappointed with the rain so many times and it is painful to see our fields dry when they should be giving us food. So it is obvious that changes are there in the climate." (Female participant from Thelaphi community)

Men and women from Thelaphi, Dube and Mkhwanazi rural areas further indicated that they believe climate change is already happening. The reason for such a belief is that they are experiencing abnormal changes in seasonal climate. Examples of changes in climatic conditions as indicated by both men and women are provided in the Table 2

In addition to the experiences mentioned, one of the participants recalled abnormal extreme weather conditions that took place in June 2007 as reflected in the quote below;

"I remember it was towards the end of June. Natal experienced strong winds it had never experienced before. A few days before, it was very hot. The winds started on a Sunday and continued on Monday the following day. Because of the dry conditions a fire broke out. The strong winds spread the fires out of control. The left so much damage because people's

Table 2: Experiences of Changes in Climate

THELAPHI (UMZINYATHI MUNICIPALITY)

- The climate is drier and we have more droughts.
- We are now having longer winters and having snow when we should not have snow. This year (2008) we are still in winter when we should be in summer.
- We now get strong winds in September when we when we should not be having winds.
- We do not have enough rain and we do not even understand the rain seasons anymore.
- We have experienced floods which destroy our crops and our homes

DUBE AND MKHWANAZI (UMHLATHUZE MUNICIPALITY)

- There are more droughts.
- There is less rain. We used to have seasonal rain, now we even get rain in winter. It rains when it should not be raining and when it should rain it either does not rain or the rain is very little.
- We are now experiencing extreme heat as compared to before. Each year it is different we cannot predict anymore.
- The winds are very strong now.

houses burnt down. After that it started raining and we were happy that rain will kill the fires. It never rains in June but it rained. It ended up raining heavily the whole night. The rain did not stop. On the news they said that was the highest to ever be recorded in June. After the rain it was very cold and the snow started. On the new they also said that this was the heaviest snow ever recorded. In one week we had hot summer then strong winds then heavy rains in winter then heavy snowfalls and then very cold conditions" (story told by female participant).

The above extreme climatic conditions as recalled by one of the participants are events that made a mark in the climate history of South Africa. During this period snow was also experienced in Johannesburg for the first time in 26 years. With such extreme events there was no doubt among the men and women that climate change is already taking place.

Both men and women who took part in the life history interviews expressed the same views as those who were taking part in the focus group discussion. Having lived in their communities for over 40 years, they have seen a lot of changes take place in their communities as a result of climate variability. For example, a 42 year old female had the following to say regarding the changes in climate within her community.

"In the past we used to have plenty of rain. We did a lot of planting and we always had plenty to eat. Our gardens were always filled with different crops. This area we live in was called Mtuzini meaning a place with plenty of shade. We had plenty of vegetation because of rain. We had rain in winter and summer. We could plant crops at any time. Everything was good. Today things are different. We are struggling with food, the rain is not reliable and it has become hotter. So I believe climate change is already happening. How else do you explain these changes we are seeing?"

Based on the above experiences, it can be concluded that to some extent the participants are aware about issues of climate variability and change. Their views are not so detached from what is found in the climate change literature.

When asked how they obtained knowledge regarding climate variability and climate change, they listed a number of sources. These sources included the radio, news papers, and magazines, from community members, and from their relatives and children who have been told at school. In addition to the sources of information they explained that they can also see for themselves that climatic conditions are not the same as before. With reference to the focus group discussions and life history

interviews, it is evident that even without the climate change predictions, the men and women in the rural communities of Dube and Mkhwanazi (UMhlathuze Municipality) and Phelathi (UMzinyathi Municipality) are experiencing a highly variable and unpredictable climate.

Having established the participants understanding and the knowledge they have regarding climate change and current climate variability, discussions were held to address the question on how men and women are impacted by climate variability and how climate change may affect them. Using the impact assessment and gender analysis matrix, the following results were generated.

5.4 Impacts of Climate Variability and Change on Men and Women in Thelaphi, Dube and Mkhwanazi rural communities

Participants (men and women) from Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) rural communities began the discussion with the general impacts of the climatic events they have been exposed to. The climatic events and impacts as outlined by the men and women are presented in Table 3.

Table 3: Climatic Events Men and Women in Thelaphi, Dube and Mkhwanazi Rural Communities Have Been Exposed To

THELAPHI (UMZINYATHI MUNICIPALITY)		DUBE AND MKHWANAZI (UMHLATHUZE MUNICIPALITY)		
CLIMATIC EVENT		CLIMATIC EVENT	IMPACT	
Dry climate and droughts.	They have affected our gardens, livestock, and incomes from our produce, food supply and water. The dry climate also brings wild fires. We are always having fires and they kill our livestock.	Extreme heat	Damages our crops and affects water supply. The heat also affects our energy levels. It is difficult to be productive during these periods	
Abnormal long winters, extreme cold and snow fall	It is affecting our planting and harvesting season, affects our crops, our children are always having flue and getting sick. This affects their education because when the children are sick they stay home.	Low and erratic rainfall	Affects our crops, we can't harvest on time, we don't get enough to eat and sell, and we make a loss because we have spent our little money to plant.	
Strong winds/wind storms	Destroys our homes (roofing) and crops.	Droughts	Killed our livestock, damaged our crops, affects normal food supply, affects water supply and affects limited financial resources as we are forced to purchase food at high prices.	
Hot, dry and windy weather	Spreads wild fires threatening our homes, lives and crops.	Strong winds/wind storms	Destroys our crops and remove the roofs from our homes.	
Low and erratic rainfall	Affects our crops, we can't harvest on time, we don't get enough to eat and sell, and we make a loss because we have spent our little money to plant	Floods	Destroys our crops and our homes	

Apart from the predicted climate change impacts (DEAT, 2000; Christensen *et al.*, 2007; Midgley *et al.*, 2007), the impacts of current climate variability such as those outlined in *Table 3*, are already being felt. Though the impacts of current climatic events have already been felt and are well documented, knowledge on differential impacts of these events on men and women is very limited. As already indicated in the literature review, knowledge based on already experienced climatic events is vital for understanding how climate change is likely to impact men and women differently.

In trying to understand the gender differentiated impacts of current climatic events, men and women participating in the study were engaged in discussions on how they have been impacted differently by the climatic events they have been exposed to. Initially both men and women debated on how they could be impacted differently given that they are all poverty stricken with livelihoods that are dependent on agriculture and natural resources that are affected by climate. Emerging from the discussions held with both men and women from Dube and Mkhwanazi rural communities, there was a clear indication that when their crops fail due to unfavourable climatic conditions (e.g. lack of rain, extreme cold or heat, strong winds) they are all at a lose and feel devastated as they have not only invested much of their time and energy planting the crops but they also depend on these crops for food and income.

Though both men and women in Thelaphi are more dependent on agriculture (home gardens and small livestock) for household food consumption, their views were similar to those of both men and women in Dube and Mkhwanazi. Both men and women reported taking part in crop production. Below are some of the quotations from the participants.

Participant 1

"In our community everyone has a garden whether you have a job or not. Even those who get employment it is seasonal and the work is still in the area of agriculture. The men are just like us now because there is no work for them. They have to help us at

home and work with us. If there is no rain our crops fail and that affects us whether you are a man or woman. Because at the end of the day we can all go hungry when we can't get food" (female participant from Thelaphi).

Participant 2

"We cannot say that the impact is different when we are all in the same situation. Our lives depend on farming. It is either you are working on your own farm so you can sell the crops and get money to do other things or you work on someone's farm to get an income or you go and work for the commercial farmers on their farms. It is very difficult to get good jobs that do not have anything to do with farming. It is just not possible" (male participant Mkhwanazi).

Participant 3

"With no employment men have no work so they also work with us in the garden and on the farms. We all do what we have to do to survive. There is no more saying a woman should do this while the man does this. Today life is hard a woman does the same as the man. We can also go to school, go look for paid work" (female participant from Thelaphi).

Participant 4

"With no jobs and most of the people not working, we all try to survive and deal with any situation that affects our survival. As a woman who is a head of my family, I go through a lot of stress when my crops fail. It means I will have nothing to sell and nothing for the family to eat. I will have to think and work harder to find a way to feed the family and still get money to do other things. In our community you find men with families who are also having so much stress, when their crops fail" (female participant Mkhwanazi).

At the time of the field work, participants in Thelaphi were experiencing low rainfall, strong winds and extreme cold. Both men and women explained that they have never experienced such winds at that time of the year. Participants in Dube and Mkhwanazi were experiencing low rainfall, dry, hot and

windy climatic conditions. Participants (both men and women) were concerned about their crops and food security. Some of the participants insisted on showing the research team their gardens so as to have an understanding of what they were talking about (see Figures 12 – 18).

In Figure 13 a female participant from Dube shows how her crops have failed due to the dry and hot climatic conditions. She had the hope of harvesting her produce for both commercial and household consumption. The onions and the cabbages are slowly drying. There was no hope for harvesting crops worth selling. This is a great loss as money, energy and a lot of time was spent planting.

In Figures 14 and 15, a male participant from Dube also explains how his tomato and onion garden has been affected by the dry and hot climatic conditions. He also invested his savings and time to cultivate the crops with the hope of generating some profits.



Figure 12: Poor Quality Cabbage



Figure 13: Dry Onion Garden



Figure 14: Dry Onion Garden



Figure 15: Dry Tomato Garden

In Figure 16 a female participant from Thelaphi shows what should have been a garden filled with beetroot. The beetroot was cultivated for household consumption however it failed due to unfavourable climate.

In Figure 17 and 18 a male participant from Thelaphi shows his spinach garden also cultivated for household consumption. His garden is doing well compared to garden in Figure 16 even though they are experiencing the same climatic conditions. This is because the male participant goes to collect water which he uses to water his garden. He explains that watering the garden is time consuming as it takes away his time for doing other activities. However he indicated that it is worth the burden as his family will have vegetables to eat.

Both men and women participating in the study seemed to be more concerned about the general impacts of the changing climate (mainly food security and impact on livelihoods). Given that literature (WEDO, 2007) states that climate change will impact men and women differently due to inequalities manifested in their roles, responsibilities and power relations, both men and women were asked to list their roles and responsibilities, then discuss impacts with reference to their roles and responsibilities. Results yielded from the discussion are presented in more detail on next page.



Figure 16: Dry Beetroot Garden



Figure 18: Spinach Garden



Figure 17: Spinach Garden

Gender differentiated impacts with reference to socially constructed roles and responsibilities

Though both men and women participating in the study noted that climate variability is impacting on everybody who is poor and depends on activities and resources that are threatened by climate, gender differentiated impacts were established with reference to roles and responsibilities. Table 4 below presents gender roles and responsibilities as noted by the participants.

Based on this table, there is no doubt that there is unequal distribution of roles and responsibilities. Though this is the case, participants pointed out that men and women's roles will also differ within households depending on the relationships and

values of household members. Participants further stated that some (majority) households are female headed and therefore women take on all household responsibilities and the same in households with single fathers (takes on roles that are traditionally known to be for women).

During women's focus group discussions and individual interviews, all women participating in the study reported that, because it is their role and responsibility to ensure household food security, they work harder to find the means and resources to sustain food supply in the household (during periods of harsh climate that affects food security) while making sure that all other needs are being met. Women noted that therefore they have to be innovative to diversify their livelihoods (to be discussed in more detail with respect to coping and

Table 4: Gender Roles and Responsibilities

THELAPHI (UMZINYATHI MUNICIPALITY)		DUBE AND MKHWANAZI (UMHLATHUZE MUNICIPALITY)	
MEN		MEN	WOMAN
Provide for family financially	Food preparation	Provide for family financially	Food preparation
Protect family and community (safety)	Collect firewood for cooking	Protect family and community (safety)	Collect firewood for cooking
Subsistence farming	Subsistence farming	Subsistence farming	Subsistence farming
Livestock rearing	Food security	Livestock raring	Food storage
Help collect firewood	Harvesting	Agriculture	Harvesting
	Food storage	Water supply (young men)	Water supply
	Ensure day to day survival of their families	Commercial farming (mainly forestry, sugar cane)	Commercial farming (mainly food crops)
	Cleaning the house		Food security
	Collect thatching grass		Collect grass for craft work
	Childbearing/upbringing		Childbearing/upbringing
	Caring for the sick and elderly		Caring for the sick and elderly
			Caring for children

adaptation mechanisms) as it is the only way they can continue to provide food for their families. This includes participation in various income activities. The women added that as a result of the extra workload, they tend to work longer hours than the men. Men were reported to have more leisure time as compared to women.

Emerging from the discussions with men, it was clear that their impacts are more psychological, resulting from feeling helpless. Men from both study areas reported that they often feel stressed when crops fail due to unfavourable climate conditions. Men indicated that they are also aware of the burden and heavy workload that women endure while trying to secure food to sustain the household (food production, income activities, care for children and still do house chores). This makes them feel helpless resulting in stress for majority of men. It was established that the psychological impacts are further compounded by unemployment which hinders men's ability to support and provide for the family in times of need.

The impacts are also felt by the elderly women who are left at home to care for children and perform household duties as younger women go out in search of seasonal work or piece jobs as they are called. Women with young children further stated that being away from their young children in search of seasonal work takes away time to socialise and bond with their children. Women indicated that they tend to feel guilty for being away from their young children for long hours.

Women further stated that as caregivers, they often have to care for the sick and children in addition to making sure there is food in the house. They noted that they are faced with the challenge of making sure that the sick and the children have nourishing food at all time. As a result they often become frustrated and anxious about where the food will come from when it is in short supply. Women indicated that not only do they get physically worn out by the workload but that they also get emotionally drained.

Women being the main users and collectors of water, they explained that accessing it easily would

make life so much easier. Participating women from Dube and Mkhwanazi (uMhlathuze Municipality) reported having difficulties in accessing water as they have to walk long distances to the water points. Some women stated that they have had to walk as far as 15km in search of water. Women further explained that it is a challenge to walk long distances in search of water when it is extremely hot or cold. Women in Mkhwanazi pointed out that at times the water points have no water and they must move on to find other points with water. For women in Thelaphi, each household has a water point in the yard which makes water collection less of a problem. Women reported that having water close to them frees up time for them to engage in other activities. Women appreciated such infrastructure as it made their lives easier.

In spite of women's workload increase during harsh climatic events, women from Dube and Mkhwanazi (UMhlathuze Municipality) acknowledged men who are making the efforts to assist during the difficult times. All women taking part in the study made it clear that though it has been tradition for them to play the role food providers, caregivers, firewood and water collectors, these roles are starting to change. Women pointed out that, men are now also involved in home gardens and that the younger men are involved in collecting water (Figure 19) and firewood. These are all activities that were previously dominated by women and girls. These results were confirmed by men participating in the study. A shift in gender roles is not only unique to these communities but has also been observed in other communities (Djeynaba, 2007; WEDO, 2008; Shefer et al., 2008).

In an informal conversation with the young man observed collecting water in Mkhwanazi, he indicated that young men in his community are engaged in collecting water. The young man explained that, throughout his life his mother has taught him to do any kind of work. He indicated that this is normal in other families he knows in his community. In most households boys and girls alternate to do

household chores. This shows that there is also a change in the way girls and boys are socialised. It was also pointed out that mothers try to keep young boys and men busy with household chores to prevent them from becoming lazy men. Young man from Mkhwanazi had the following to say,

"I am raised by a single mother. She needs all the help I can give her. She works hard to provide for me and my sister. I also help my sister when she cleans the house. My mother always tells me that when I get a wife, I treat her well and help her with work in the house. She wants me to be a good responsible man. She tells me lazi-

ness is a disease. I will never be able to survive with laziness. I must be willing to do any work. There is no such thing as work for girls and work for boys or work for women and work for men."

With further discussions with men in Thelaphi, it was clear that since they have nothing else to do as a result of unemployment, they need to engage in other activities and take on new roles. Some men in Thelaphi admitted to taking part in household chores to assist and relieve their spouses. Some men explained that they did household chores to avoid being labelled lazy by their spouses.

The above results seem to suggest that through socially constructed roles and responsibilities, women bear the most burdens of impacts resulting from climate variability. The results however also show that gender roles are undergoing change due to the impacts of climatic events and unemployment which forces men and women to engage in different activities leading to new roles.

5.5 Current capacities, coping and adaptation strategies

As already indicated in the conceptual framework, ability or inability of individuals or social groups to



Figure 19: Young Man Observed Collecting Water in Mkhwanazi

respond to, cope with, recover from or adapt to, any external stress placed on their livelihoods and well-being will depend on what resources (e.g. social, economic, ecological and human) are available to reduce or eliminate vulnerability. Results generated from focus groups discussions and individual interviews (including key informants) revealed the following findings regarding men and women's capacity to cope with, recover from or adapt to climate change including climate variability.

5.5.1 Access to resources and information

Both men and women in the communities of Thelaphi (UMzinyathi Municipality) and Dube and Mkhwanazi (UMhlathuze Municipality) indicated that they all had some form of access to land, information and other natural resources (such as water, medicinal plants, different types grass plants used thatching houses, making baskets and mats). Though there are no restrictions on who may use the natural resources, women were found to be the majority users of the grass plants mainly used to make mats and baskets. When asked why this was the case, men simply indicated that they had no interest and that collecting the grass was hard work and time consuming. Men were more interested in how they can own land and get employment to earn an income. Though getting employment proved to be difficult for a number of reasons discussed later, men were willing to try and generate income through commercial farming. Women on the other hand indicated that they are willing to make use of any resources available to them to generate an income.

Women in Thelaphi (UMzinyathi Municipality) indicated that they spend the entire winter collecting grass used to thatch houses (Figure 20). The reason they take the whole

winter collecting the grass is because they have to walk long distances, as a result it takes long to accumulate enough to sell. Sometimes younger men assist them. Once they have accumulated enough thatching grass, on the days the grants and pensions are being given out, they go and sell to those who have just received pensions and grants. They target the pensioners because they have limited access to markets.

A few women in Dube and Mkhwanazi (UMhlathuze Municipality) utilise the different types of grasses to make baskets and mats, which are then sold to willing buyers (tourists and members of the community). Women can only go to sell their products in the markets once or twice a month due to distance and transport costs. Though women are in a position to access the grass to enable them to make products that they could trade to accumulate an income, they still faced with transport challenges and distance to the markets. Women indicated that the income generated from selling grass products is used to meet various household needs (e.g. food, health, children's education). Some of women indicated that they save 50% of the income for future emergencies. For instance during poor harvests and resultant food shortages the money will be used to buy food for the household. The money is also used to cover medical expenses for family members.



Figure 20: Grass Used to Thatch Houses

The ability of women to generate income from the products they make has significant importance for adaptation to climate change. Having access to income provides the women with purchasing power when exposed to food insecurity. However the reliance on such natural resources to generate income puts women in a vulnerable position as climate change could alter or affect these resources.

5.5.2 Access and control of land

Land is an important resource to the survival of many rural communities. Having access to land is therefore crucial. In general access to land in South Africa is a sensitive and complex subject. This was clearly reflected in the interviews and focus group discussions. To fully understand the complexity of accessing land one has to look back at the history of struggles over land. According to Walker (1998) since 1994, South Africa has introduced land reform programmes to address the injustices of a grossly skewed land distribution system with the aim of reducing poverty, promoting sustainable land use and economic development, and to establish tenure security for all. However the most fundamental component of the land reform programme is the clear commitment to gender equality which involves targeting women as major beneficiaries (Walker, 1998).

In the communities of Thelaphi (UMzinyathi Municipality) Dube and Mkhwanazi (UMhlathuze

Municipality) both men and women indicated that they obtained land in various ways. Both men and women (adults) had some form of access to land which was obtained either through inheritance or land reform programme (land redistribution, tenure reform and land restitution). In Thelaphi (UMzinyathi Municipality) adult men and women obtained land mainly through land restitution and inheritance. Through land restitution the land was restored to the community. Thelaphi community has no chief and no tribal council; instead they have a community trust. The community trust is responsible for allocating land to individuals (men and women), households (male and femaleheaded), and groups of people. The community trust which comprises of both men and women was democratically elected by the community.

In Dube and Mkhwanazi (UMhlathuze Municipality) adult men and women obtain land through inheritance, land redistribution and tenure reform. The men and women further explained that accessing land involves an application process. Both men and women have equal opportunity to apply for and acquire land. Women can also apply as a group to acquire land for economic development. Both men and women admitted that the process of acquiring the land is not that easy but eventually with everything in order one gets the land. There is also communal land that members of the community can utilise. This is also accessible to both men and women. They added that it is very difficult to own land for both men and women. The land can be accessed and utilised by both men and women but they do not own it, in other words the land is not registered in their names. They also explained that in townships however men and women can have sole ownership of land (land they can call their own, with their names attached to it).

Land is also through the Ingonyama Trust Board by both men and women. According to a key informant the Ingonyama Trust Board was established in terms of the KwaZulu-Natal Ingonyama Trust Act. This was Act 3 of 1994. The Board functions as landowner-in-law of Ingonyama Trust Land. The land extends to about 2.7 million hectares spread

throughout KwaZulu-Natal. The Ingonyama Trust Board was established with the vision of improving the quality of life of the people living on Ingonyama Trust land. This vision was to be realised by ensuring that land usage is to the benefit of the people in accordance with the laws of the land.

Regarding who has control over the land depends on a number of factors. In female headed households which happen to be the majority in the rural communities studied, women have full power and control over the land. In male headed households the husband and wife may share control and coown the land. Changes made to customary law have made it easy for women to access and own land. Women married under customary law can now inherit and own land after a divorce or death of husband. If women apply for land as a group they have full power and control over the land. In a maleheaded household with no female partner the man will have full ownership and control over the land. In today's ever changing society, fathers and mothers are now also equally passing on land to their daughters as they would do for their sons. The daughter gets to own and have control over the land.

A more detailed research will have to be conducted to fully understand the politics and other issues regarding gender and land. However for the purpose of this study and trying to establish who has access to what, it is clear that both men and women in one way or another do get access to land.

Regardless of how the men and women accessed land, they explained that the major challenges occurred after accessing the land. These challenges included lack of technology and capital to work the land. The complaints were made by both men and women. They indicated that they have no financial means to invest in livestock farming, irrigation systems, tractors, and seeds that can withstand different climatic conditions that they experience. They noted that private commercial farmers in their areas are very successful because they have capital and all the systems in place to protect their crops from harsh climatic conditions. Rural men and women expressed that accessing credit was a big challenge for them. For example (see appendix

1), through the Ingonyama Trust Board, a group of women were allocated land for chicken farming but due to financial constraints they have not been able to pursue their project.

In Figure 21, another group of women were allocated land for commercial farming but they have no capital to install irrigation systems, they have limited man power and no tractor. As a result this limits the amount of land they can cultivate.

In Figure 22, plenty of communal land in Thelaphi remains unutilized due to lack of input resources (technology, seeds, and man power). In addition

to lack of resources they also have no access to markets should they want to get involved in commercial farming.

In Thelaphi rural men and women have resorted to simply cultivating for household consumptions to sustain household food security. In Dube and Mkhwanazi (UMhlathuze Municipality) both men and women continue to take a chance with cultivation. Agricultural production is seen by both men and women as a high risk activity with poor returns. In a focus group discussion with the youth, they indicated that when they are old enough to access land, they will utilise it for non-agricultural activities. They





Figure 21: Land Allocated to Women for Commercial Farming



Figure 22: Communal Land not in Use





Figure 23: Failed Women's Project

were not very keen on agricultural activities because they see the difficulties being experienced in their communities. The youth also noted that the difficulties are not just issues of climate but also problems of accessing capital. The problems are experienced by both male and female farmers.

Apart from those using the land for agricultural activities, those using the land for non agricultural activities proved to be experiencing similar constraints. For example, Figure 23 shows an incomplete structure of a multipurpose centre intended for training community members on lifetime skills. The project allocated to a group of women could not be completed due to lack of funds. The incomplete structure has since then been vandalised and the land is not maintained. This is clearly wasted efforts and resources that were used to get to this point.

The men and women pointed out that they have other projects that they would like to pursue but lack finance. For example, women talked of starting a craft business as an income generating activity seeing that they have access to the grass that is used for mat and basket weaving. Both men and women talked about producing and canning fruits and vegetable for commercial markets. They had a several more ideas of what they could do if they had the means. This is an indication that both men and women have the potential to benefit from natural resources provided they can get financial assist-

ance. Both men and women require more than just having access to land and natural resources.

Though land is an important asset, the above results indicate that having access to land does not automatically generate wealth. Both men and women who rely on land for food and income are at risk of being vulnerable to climate change. It is clear that they lack the technology and economic resources required to reduce impacts of current climate variations which could be worsened by climate change. Climate change could therefore increase their poverty levels heightening the men and women's already existing vulnerabilities.

5.5.3 Leadership and Decision-making

Literature has shown that women tend to have limited access to decision-making and leadership positions hindering their involvement in the "public" sphere and restricts their contribution to disaster prevention and emergency response and management. In the context of climate change gender perspectives are vital for effective gender policies (WEDO, 2007). Generally at the municipal level there is a clear shortage of women in positions of leadership and authority. However at provincial level, it must be acknowledged that progress has been made regarding women in leadership. The provincial government of KwaZulu-Natal comprises of women MECs (four out of ten). At least 8 of the provincial departments are headed by women.

Progress has not only been made in Kwazulu Natal but in other African countries as well. For example, in South African neighbouring country (Botswana) history was made among the Balete people's in 2003, when the daughter of royalty became first female paramount chief. The skin of a leopard which symbolises absolute power that was passed on from father to son for generations, for the first time in history, it was passed onto a woman (Kraft, 2003). Kraft (2003) states that as African women take on new roles in government, business and other realms of modern life, their position in traditional society is also evolving and expanding into a domain long the stronghold of men. Kraft (2003) adds that, though powerful women have not been easily accepted in traditional societies, a paramount chief of Botswana's Balete people shows centuries-old customs are bending.

In Swaziland it is reported that, Africa's last absolute monarch declared that his mother serves as his equal. Lesotho's constitutional monarchy was ruled by a queen for 20 years and women chiefs are said to be common in its rural villages. Queen mothers in Ghana are known to nominate chiefs and kings, and in some cases even impeach them (Kraft, 2003).

Such progress is significant as it demonstrates women's capacity to take on leadership roles which could provide them with more decision making power on issues of climate change. Within the rural communities in both study areas the women reported that they are involved in decision making. The extent of their involvement could not be measured as this would require a more detailed evaluation process and observations of what actually happens in meetings. Based on the interviews and focus group discussions women are represented in councils and they do take part in making decisions. They explained that Men and women sit together and make decisions on specific needs and priorities of their communities.

These findings are consistent with some of the findings in a study conducted by Sithole *et al.*, (2007) in three municipalities of Kwazulu Natal. The study focused on rural communities in Msinga,

eThekwini and Hibiscus Coast. Though each community presented a different situation, through a detailed evaluation and observations made, Sithole *et al.*, (2007) found that women are represented in council in all three communities. In Hibiscus Coast women were found to be vocal in meetings and there is a strong consciousness about gender quotas. Women's participation in IDP (Integrated Development Plan) projects was acknowledged and women articulated clearly that they benefited from the projects (Sithole *et al.*, 2007).

Having established that women in Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) are involved in decision making at community level, both men and women were asked about leadership and decision making in their households. In the case of female-headed households, which are the majority in the communities studied, women indicated that they are in charge and make all the decisions. In male-headed households, there were variations in who made the decisions and had control over the household. In some cases husband and wife had equal control and made decisions together, in some the man had control and the power to make all decisions and there were a number of cases where the woman had control and power to make all the decisions. This was mainly in households where the woman was the main earner.

Women who earned their own income revealed that they never have any intensions to hand over the money to their male partners even if they were to demand it. In interviews with men who were in households controlled by a woman, it was clear that the men felt undervalued. They indicated that having to ask for money from woman and explaining themselves all the time made them feel like children. Through observations it was evident that these men were frustrated.

The above results clearly show a shift in gender power relations. There seems to be a change from the traditional norm, where the men controlled and dominated all aspects of decision making in the household. A number of factors which are revealed in the next sections can be used to explain this shift in

gender power relations. The change in gender power relations also has implications for climate change. In cases where women are in a position to make decisions they have a higher chance of being less vulnerable to the impacts of climate change. The woman is also in a position to make decisions that will reduce household vulnerability to climate change.

5.5.4 Institutions

In an interview with a key informant it was established that there are various institutions (government and non government) within the province of Kwazulu Natal committed to increasing equality between men and women. The institutions work together with the municipalities to reach all communities including Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality). Given that these institutions are committed to addressing gender equality, they are better positioned to address climate change from a gender perspective. These institutions include the following:

The Office on the Status of Women, which is responsible for the advancement of national policy on women empowerment and gender equality as well as developing key indicators for measuring provincial progress towards gender equality.

Provincial Men's Forum (PMF) of KwaZulu-Natal was launched in November 2007. This forum operates within the Provincial Gender Machinery that aims at promoting gender equality in the province. The overall goal of the gender machinery being to significantly reduce or eliminate the levels of victimisation to allow women to play their rightful role in leading the growth and development of KwaZulu-Natal. The Men's Forum deals with men's issues and takes on gender based programmes to raise awareness of violence against women and children. Their goal is to create an enabling environment in which women can exercise their rights without fear of family or community retribution.

Inkunzi isematholeni (means 'how the calf is raised will determine the quality of the bull'). The role of this institution is to support the development

of boys and young men into good fathers and sexually responsible partners. The institution predominantly deals with rural schools in the province.

The Rural Women's Movement was established in 1995. This movement takes on issues of land, gender and development at both local and national levels. The movement teaches women their rights to own land and access resources. In turn this is to enable women to gaining independent access to land, regardless of any relations to male kin that they may have. The movement further provides life training skills to rural women and men, men are therefore not excluded. It also facilitates women's active participation in local government with the hope of strengthening their role within these institutions.

Education is one institution in which more and more women of all ages are getting educated. It is now realized that educating a woman gives her a greater voice within her family and community. In addition educated women are more likely to participate in political, social and economic decision making. Education presents women with endless opportunities and choices. The rural women in Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) have committed themselves to making sure their daughters get educated. Their hope is to see their daughters live a better and fulfilling life. Women indicated that they will do whatever is necessary to provide an environment that allows girls and young women to go to school. This is the only way to ensuring that young women are empowered to lead change.

Other institutions that operate within the goals of the Gender Machinery include The Department of Social Development, Department of Community Safety and Liaison, Department of Health, Department of Arts, Culture and Tourism. Through various activities all these institutions play a role in promoting gender equality. These activities include organising lobbies on subjects they consider important, involving women in decision making so as help shape policy, taking gender issues to parliament and involving women in development.

Not only do the above institutions have the potential to address climate change from a gender perspective but they also have the capacity to empower men and women to reduce their vulnerability to climate variability while enabling them to adapt and build resilience to climate change.

During interviews and focus group discussions men and women were asked if they were aware of the different institutions available to them. In all the communities participants were aware of at least three institutions. Men and women stated that there are also a number of activists that inform communities about several social issues. Men and women in Dube and Mkhwanazi (UMhlathuze Municipality) explained that they had attended a number of workshops and awareness campaigns that addressed various issues ranging from violence against women and children, educating the girl child, land issues, human rights issues, issues surrounding customary practices, different topics addressing injustices against women, issues of development and HIV/AIDS. Those involved in farming had attended workshops addressing farming issues. Similar workshops could be held to address issues of gender and climate change within in the communities they serve.

They were also aware that the country's constitution forbids any form of discrimination. Women added that knowing the law is on their side, they do not have to accept any injustices against them. They explained that even though they are still struggling to get out of poverty, they appreciate the freedom they have to express themselves. Having institutions that acknowledge and recognise women's concerns is very inspiring for them. They feel inspired to do whatever they can to enhance not just their lives but also the lives of their children and the communities in which they live. Through both women's expressions and verbal communication it was clear that they have the determination and the will to explore various options that will allow them to be more self sufficient. Being self sufficient is important for adaptation and building resilience to climate change. Women who are

self sufficient are likely to be less vulnerable to the impacts of climate change.

In Thelaphi though not all men and women understood fully the actual purpose of the institutions, they were however aware of their rights. They understood that there should be fairness between men and women. Some of the participants had been to various awareness campaigns that addressed different social problems and they were able to pass information to the rest of the community. Some indicated that they get to know about most issues through the radio and others through the youth who get information through education. One way or another they do get informed about various issues that affect their lives as individuals and as a community. When the participants were asked to talk about how the information they have has influenced their lives, men noted that women are more vocal than they were in the past. Women indicated that freedom to speak and voice there their opinions has impacted positively on their lives. They are now able to fight for their right to several things like education, health care, easy access to water and energy, access to basic services and the right to income generating activities.

It is clear that various institutions exist to represent rural communities and to create awareness. The institutions have also had some influence on the way women view themselves. Both men and women seem to be aware of what their rights are and how to exercise those rights. As respondents indicated there are a number of campaigns and through them they get informed on various social matters including gender issues. These institutions would be even more beneficial to the communities if they addressed issues of climate change from a gender perspective.

In general the communities of Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) have the capacity to access natural resources, land and information. Access to these resources does not make both men and women resilient to climate change impacts as they lack the capacity to fully benefit from the land as well as the natural resources. They do have the

ability to accumulate wealth from the resources available to them, which in turn could reduce their vulnerability to climate variability and change.

5.6. Gender differentiated coping and adaptation strategies

Given that climate change is likely to impact men and women differently, they are also expected to have different priorities and responses to climate change in terms of coping, adaptation and mitigation to build resilience. Literature has shown that despite obstacles faced by women, they are already developing effective coping strategies, which include adapting their farming practices (Mitchell *et.al*, 2007).

In the rural communities of Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) coping and adaptation strategies to current climate variations involve changes in gender roles. Both men and women reported that as the year-to-year climate continues to vary, the rate at which they are exposed to extreme climatic events puts stress on their limited existing coping strategies. Today men and women in both study areas are struggling to cope with current climatic conditions. Both men and women pointed out that their coping strategies are close to non-existent.

Women and men previously solely dependent on agricultural activities reported that they are now shifting from agricultural livelihoods to non-agriculture based livelihoods, with income generating activities and government social grants becoming more important. Women indicated that though they are making the shift from agriculture to non-agriculture activities, they still consider agriculture and other land-based (collecting of grass for thatching and craft work) activities as important components of their livelihoods.

5.6.1 Migratory labour practices

Based on results generated from life histories and focus group discussions, in the past men (both old and young) were more involved in migratory labour practices as a response to impacts of

climate variations. Even though women could move freely, they felt it was better for the men to migrate as they did not have many responsibilities in the home. Women started to realise that the mobility of men was giving rise to increased unfair and unequal sexual relationships. Men were having multiple sexual partners and money was spent on entertainment and alcohol. These practices became a disadvantage for women left behind to manage the home. Women and their children were neglected and the women were also vulnerable to HIV/AIDS when the husbands returned. Even young women in the rural areas who were in relationships with young men involved in labour migration were at risk of being infected. Some of the women due to fear of being infected and the thought of dying and leaving their children behind decided to reject sexual relations with their returning husbands. In many cases this lead to breaking up of the family. With no breadwinner and household food security continuously under threat, most women felt the need to supplement home-grown food with regular purchase of additional foodstuffs. The youth and young women joined the labour migration activities.

This did not seem to solve the situation as the young women also entered sexual relationships with more well off men as coping strategy. As these young women could not get employment it is alleged that they got involved in prostitution. Young women are becoming vulnerable to HIV/AIDS and abuse. Often young women fell pregnant and brought the children for their mothers to look after. Not only did they abandon their children in the village, the young mothers did not send any money to support the children. This created more expenses putting additional stress on already limited resources as the pensioners were left to feed and educate these children. The older members of the community did not see any benefit in migration. Though remittances and transfers of money were important, labour migration proved to be unsuccessful for many more reasons. To elaborate how unsuccessful labour migration has been, below are examples of what some the participants had to say.

Participant A

"When things became very bad men and the youth went looking for work in the towns and cities. These days we don't do that because it is not worth it. When men and youth go to look for work in the cities, they spend a lot of time looking for the jobs. A month can finish with no job. Then you start asking those at home like friends and relatives to send you money for food and accommodation. When now they get the jobs, the payment is very small because of the jobs are not good. Young women will get domestic work, or they wash dishes in the restaurants. Men get jobs of working in the gardens. When you get paid the little money you have to think of yourself first. You have to pay for the small room you stay in; you have to buy yourself food and pay for transport to go to work. By this time you have no money to send home to help the family. So it is better not to move to the city. We can use all this time to help in our homes". (Male participant from Phelathi).

Participant B

"When men and the youth go to look for paid work they come back sick with HIV/AIDS. Now we have to spend the little we have to look after then. Men also bring the disease and they give it to their wives. Then the whole family suffers. We have many orphans in our community that we have to support. All these problems make it more difficult for us. We don't encourage going to the cities to look for work, it will do more damage than doing any good. We never see that money that they go to look for. They can be more productive if they stay and help here in the community. A lot of help is needed here. There is work of looking for firewood, working in the garden, looking for water to water the garden and use in the home". (Female participant from Phelathi).

5.6.2 Accessing Social Grants as a Coping Strategy

Most of the women involved in the focus group discussions in both study areas revealed that social grants (child grant, orphan grant, pension grant and disability grant) are very important in their households. They indicated that these grants allow

them to acquire food (especially in times they are not able to harvest) and other non-food items for their households. Women noted that majority of the households in their communities are benefitting from the social grants in one way or another. Households with unemployed caregivers with children up to the age of eight receive child grants. Women over the age of 60 and men over the age of 65 receive a pension and household members unable to work due to a disability receive disability grants (includes HIV/AIDS patients). The orphan grant goes to households looking after orphans.

Women further pointed out that in most cases they are the ones responsible for the grants. There were reported cases of men receiving social grants but instead of distributing the money according to household needs, the money is used for alcohol consumption. For this reason, women are responsible for making decisions on what the money should be used for. Women do not give the money to the men and some cases this was reported to cause conflict within the household. Women whose households are dependent on pension grants are also making an effort to find other means to generate income that will support the household should the elderly household member pass on.

Both men and women further indicated that some households get government relief aid in the form of food. They explained that the food usually lasts a maximum of one week and they are back to fending for themselves. They have community trusts but without finances they are as good as nonexistent. In Thelaphi, the community had to close down a nursery school due to lack of food to feed the children. In Thelaphi, due to distance and lack of markets for women to actively get involved in informal trade, they are only able to purchase food on days that coincide with their receipt of monthly social grant payments. Their regular diet comprises of maize-meal and vegetables which are grown in small gardens next to their homes. The size of the household restricts the quantity and range of foodstuffs available for their consumption.

Poor households consume an average of two meals a day or they rely upon the generosity and

goodwill of neighbours and friends to share their food. Women are always anxious about where the next meal will come from. This has become a significant stress with which the women have had to deal with.

5.6.3 Mobility of women and informal trade

Women from the communities of Dube and Mkhwanazi (UMhlathuze Municipality) reported that with agricultural activities not yielding much due to unfavourable climatic conditions more and more women are getting involved in non agricultural activities. Some are now working alongside men in mining sectors, road construction and on commercial farms owned by white farmers. Women are also actively moving between their rural homes and other centres to secure a variety of goods and services so as to conduct economic activities.

The majority of women from Dube and Mkhwanazi (UMhlathuze Municipality) are now more involved in informal trade compared to women in Thelaphi. Due to market distance and lack of transport women in Thelaphi reported that taking part in informal trade is a great challenge. Women are therefore dependent on social grants and small home gardens. Given that they have easy access to water (water point in the yard of each household) women in Thelaphi find it easy to water the home gardens which are used for household food consumption.

Women from Dube and Mkhwanazi (UMh-lathuze Municipality) community also pointed out that the men's inability (due to unemployment) to provide financially for the household further motivated them to take part in income generating activities. Women further explained that they were tired of men not disclosing any of their earnings if they were lucky to get seasonal work. Any income generated by most men was mainly used for personal consumption (alcohol and spending on other women). With household poverty deepening, women therefore feel they must take on financial responsibility for the household so as to support their children and provide food for the household. Furthermore with the prevalence of HIV/AIDS

leaving most women heading the family, they felt it was time to take charge of the households' economic situation. Diversifying livelihood activities is now a priority for women in Dube and Mkhwanazi (UMhlathuze Municipality). They also explained that even without the impacts of climate variability, poverty has always presented several challenges for them. Some women had the following to say;

Participant 1

"I have to work for my children. I am the one they depend on for food and school uniform. They never ask their father. So what do I say to them when I can't provide for them? I do not want them to worry; they must go to school and get a better life."

Participant 2

"I am doing everything I can to make sure my daughters don't go looking for rich men. That will be the end of their lives. That is what happens when parents can't provide for the children. They look for help elsewhere."

Participant 3

"There are many men who are working. The gardens are not doing well. Even if the garden is not doing well the family must still eat and I have small children to feed. My husband is not working and even if I tell him what will he do? When he worked in the mines he did not do much, I struggled to get money from him. I have just been managing since I started selling second hand cloths and shoes."

Participant 4

"As I speak to you now I am HIV positive. I left my husband after he gave me AIDS. I am trying to stay positive for my two children. It is very difficult for me. I must do everything for my children now before I start to get sick. They do not know I am sick. I make traditional baskets and mats to sell."

The majority of young women, women from maleheaded households and women heading households from Dube and Mkhwanazi (UMhlathuze Municipality) are involved in Informal trading.

A few are formerly employed as teachers in their communities. While in the field, time was spent with some the women to gain insight on the economic activities they are involved in. Figures 24-29 indicate various economic activities as observed.

Young women selling bananas in Dube and Mkhwanazi (uMhlathuze Municipality) captured in Figure 29 indicated that they have to walk at least 15km to buy these bananas. They are bought from a private commercial farm. They indicated that some days the profit is good and at times they make no profit. The efforts and determination of these women to become self-reliant and take charge of the household economic situation was reflected in the distance they have to walk to sell their goods and provide other services. The strategy used to identify points of business is to select areas of high transport intersections. To get to these busy intersections they must wake up as early as four am and walk at least 20 to 30km. However, in Thelaphi (UMzinyathi Municipality) women only sell their products on pension days. They also sell to members of the community as busy intersections are too far for them to target; the nearest intersection is more than 40km. They are just as determined but frustrated by lack of basic services such as transport.

In addition to wanting to become economically independent women noted that they have had to compromise some of their traditional reproductive roles. For example children are left in the care of elderly members of the community as a result they do not get to spend time with their children. There were cases among the male-headed households whereby man is unemployed and he helps with some of the household activities. The women in these households indicated that they try to encourage the men by acknowledging and appreciating their work.

Furthermore with women becoming more involved in other activities other than household chores, they indicated that they are grooming the young boys and men to also get involved in household work. They are trying to change their attitudes towards gender roles stereotype. They want their sons to become more responsible men in their

homes and in their communities.

As a coping strategy, women in the study sites indicated that they are trying to get the younger boys and men more involved in household activities. This will reduce the amount of work women have to do when they get home after being involved in economic activities. They also felt that over time they will have more men assisting with household activities to free up the women. Some women as already indicated, were already starting to see some changes in the men's role. These are women who admitted to getting help from their male partners.

Not only do women in uMzinyathi and uMhlathuze want to be able to cope better with the impacts of climate variability, but they also want to advance their economic and social conditions. They desperately want to get out of poverty which makes them more vulnerable to the impacts of climate variability. These women want a good education and a better life for their children. They want to be self-reliant and though they still experience a number of inequalities, they have made some significant progress towards empowering themselves. Women noted that traditional roles do not have to prevent them from moving forward. They are now taking charge of their households and making decisions on how the money they make is spent.

It is clear that with more women diversifying their livelihoods, gender roles are being affected. There is a change in gender roles to accommodate responses to the impacts of climate variability. Women's role in decision making at the household level is being strengthen as they get increasingly involved in income earning activities such as trade and contribute to the household financial needs.

5.6.4 Men's coping and adaptation strategies

Based on focus group discussions and interviews held with men in Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) it was clear that they were finding it difficult to cope with changes in climate. Men pointed out that it not just issues of changes in climate that they need to cope with but other social problems that affect their daily lives. They argued that impacts



Figure 24: Selling of Vegetables



Figure 26: Providing Phone Service



Figure 28: Selling of Bread



Figure 25: Young Woman Washing Car



Figure 27: Selling of second hand items



Figure 29: Selling of Bananas

of climate variability can be dealt with, given the means. However, issues such as poverty, HIV/AIDS and unemployment on the other hand constantly take away their pride. Men indicated that due to high unemployment and low incomes they were prevented from playing their role as providers for their families. They feel helpless as they see women take on extra economic responsibilities that should be fulfilled by them. When asked how they cope, they simply remarked that they drink alcohol to take away stress. What seems to be emerging from the interviews and focus group discussions is that men's self-esteem as well as their social values is being affected.

The results from key informant interviews reveal that men from Mkhwanazi and Thelaphi communities are turning to destructive behaviour as a coping mechanism. These include mainly sexual relationships with multiple partners and an increase in alcohol abuse. One of the key informants explained that having multiple sexual partners is a way of getting back their identity and selfesteem. With such conduct the risk of spreading HIV/AIDS infection is high. Not only is there a high risk of HIV/AIDS infections but this is evidence that unequal sexual relationships exist between men and women in these rural communities. Some of women in Thelaphi revealed when men are under the influence of alcohol they disturb the peace in the community, cause social problems and strain family relations.

Being unemployed, men use social grants and borrow money from other members of the community to buy alcohol. This was reported to be a big problem particularly in Thelaphi. Women stated that men were using grant money to purchase alcohol instead of putting the money to good use for the benefit of their families. The women explained that for such reasons they do not handover their income to their husbands. In Dube and Mkhwanazi (UMhlathuze Municipality) the women also confirmed that they do not trust men with money so they keep it away from them.

From the above results it can be concluded that men and women are finding it difficult to cope

not only with current climatic conditions but with other stressors that affect their daily livelihoods. This has serious implications for adaptation strategies to climate change. Based on the results women seem to cope better than the men to current climatic conditions. Though women still experience a number of inequalities they are still able to explore opportunities that enable them to cope better with the effects of climate variations.

5.7 Constraints to Climate Change Adaptation

Beyond issues of gender inequality, the men and women in Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) communities are experiencing other challenges that heighten their vulnerability to both current climate variability and future climate change. Factors that affect their ability to cope with current climatic conditions include the following;

5.7.1 Gender and Poverty

Poverty poses a great challenge for the men and women in Thelaphi (UMzinyathi Municipality) and Dube and Mkhwanazi (UMhlathuze Municipality) rural communities. As already indicated in the background information, UMzinyathi and UMhlathuze municipalities have some of the poorest and most underdeveloped rural areas of KwaZulu Natal with very high unemployment levels. The largest proportions of poor households are located within the rural municipalities. This is mainly attributed to poor basic services and limited access to social services and employment opportunities, further impacted by HIV/AIDS. Some of the participants had the following to say

Participant C

"We are trying everything we can to deal with all these problems we have with this climate that is changing all the time. It is very hard for us because we are poor and we have no money. We can't even buy seeds which are resistant to climate changing. We are struggling and I don't know how long we can

survive like this. In this place if you have no money you cannot do much. We are just stuck. We need some help from the government. Times are very difficult who can we go to for help. We have ideas and projects we can do but we need funding". (Male participant from Dube)

Participant D

We have been cursed with poverty. It is the source of all our problems. I do not know what it will take to get us out. Being unemployed makes the situation worse. What do we do without skills and education?" (Male participant from Thelaphi).

Participant E

"Forget about climate. Compared to the way poverty affects us, climate impacts are nothing? If we were not poor do you really we would feel the impacts of climate variability?"

Both men and women in the communities of The-laphi (UMzinyathiMunicipality), Dube and Mkhwanazi (UMhlathuze Municipality), do not seem to be the only ones who see poverty as a major concern. In Msinga (Kwazulu natal), Sithole, *et al.* (2007) found that the issue of poverty and destitution was of major concern. The officials were frustrated as they did not know how to deal with gender issues when the whole municipality is under great strain. It was seen as a luxury to even hold gender workshops and engage people on gender issues when people do not have money or food to survive.

Poverty is among the major factors that weaken ability to cope and adapt to climate variability. This situation is not unique to the communities of KwaZulu Natal, in Southern Africa an estimated one in two people live in poverty. Generally it has been reported that most of the poor are rural and will be so for several decades. They face many interlocking barriers to progress (IFAD, 2001) with most trying to cope with chronic food shortages and having almost exhausted their coping mechanisms. The poor hardly get opportunities to find employment in the formal sector to earn enough income to buy food where it is available (Christian Aid, 2002).

5.7.2 Gender and Trade

Men and women in both study areas reported that access to markets to sell their produce if any is a challenge. They noted that the market system was not fair to them. If they do get enough to sell, they are forced sell at low prices. They complained of distance to markets, lack of roads and problems with transporting their products. As a result they feel discouraged to sell their produce. In Phelathi (UMzinyathi Municipality) the majority of the population has resorted to subsistence farming and to trade within the community. In Dube and Mkhwanazi (UMhlathuze Municipality) men and women argued that they were experiencing competition with private commercial farmers who have better products. Private commercial farmers have the technology and resources to provide the market with a better quality of products.

"We are having a difficult time selling our produce because the quality is not as good as the white farmers. White farmers have all the resources they need to produce good crops. We have nothing. We just pray for climate to be on our side. If we are lucky to harvest anything we try to sell to the supermarkets also but they already have agreement with the white famers. We don't know what else to do" (male participant from Dube).

It can be concluded that inability for both men and women to access the markets for their produce impacts on their ability to earn an income. As a result they are not able to accumulate any assets. This contributes to their vulnerability.

5.7.3 Gender, Skills and Employment

Unemployment is a concern for developing countries as it affects income generation (Kunfaa *et al.*, 2002). In Southern Africa, unemployment has left people unable to purchase food during drought periods. It is partly the reason poverty continues to deepen (Christian Aid, 2002). In South Africa Unemployment is a serious problem, particularly affecting rural areas and unskilled, illiterate people. Given that the economy of South Africa is growing in the tertiary sector, in line with many first world countries in the world, a large propor-

tion of the South African population does not have the qualifications and skills to find employment in the secondary or tertiary sectors. (Vuka Town and Regional Planners Inc, 2002).

In the rural communities of Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) the men and women have low educational levels to none which makes it difficult for them to find employment in the secondary and tertiary sectors. Currently the young population is encouraged to get educated so as to be to have employment opportunities. There is a strong need to foster a population with skills necessary for a workforce in these rural communities. The high rate of unemployment prevents the men and women from accumulating financial resources which would reduce their vulnerability to food insecurity during poor harvest years.

5.7.4 HIV/Aids and Gender

The AIDS pandemic was reported to be a serious problem in both UMzinyathi and UMhlathuze municipalities. The effects of HIV/AIDS are being felt dramatically in these rural communities. One of the most serious impacts of the AIDS pandemic is the creation of AIDS Orphans, whose parents have died of the disease, often after a lengthy illness. This is causing the apparent increase in the number of child-headed households in the rural areas. Children heading households comprise of both boys and girls depending on who is the eldest.

5.8: Gender and Climate Change Adaptation Capacity

Having noted both men and women's issues and concerns, a question arises as to whether issues of climate variability and change are a priority for poor men and women? They have acknowledged the impacts of climate variability but they seem to be more concerned about issues of poverty, HIV/AIDS and unemployment. Possibly, when designing gender and climate change policies, consideration should be given to rural men and women's priorities.

Understanding the vulnerabilities and capacities of men and women can enable support that will build on their means of coping with climate change and climate variability. This might include incomegenerating activities to allow for cash purchases. The men and the women in Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) rural communities indicated that addressing the problem of poverty would eliminate their vulnerability to climate change. This would include providing access to basic services and infrastructure, improving access to markets and assisting them with resources to enhance agricultural production.

There was a lot of emphasis on the need for support to enhance their food security by helping them put systems in place that will enable them to produce more and better quality crops which in turn will increase their incomes. With increased income they are able to accumulate financial assets and purchasing power that enables them to cope and adapt better.

5.8.1 Enhancing existing knowledge

Literature such as (WEDO, 2003; Gurung et al., 2006; Mitchell et al., 2007) pointed out that women are very knowledgeable and experienced with regards to coping with climate related impacts. They are aware of their needs and are very innovative in the face of change. This was also found to be true in the South African case study. Women in both communities demonstrated unique knowledge and expertise in leading strategies to combat the effects of climate variability. This was evident in the women's ability to engage in the discussions on various issues regarding climate variability, its consequences and alternative coping mechanism. The women reported that they need to change to crops that are more resistant to specific climate conditions. However, they have no access to such seeds, which prevents them from diversifying their agricultural practices.

As an alternative, some women have resorted to planting on wetlands or close to water sources. For example, by planting near water sources (Figure 30),



Figure 30: Water Being Channelled to Garden Trenches



Figure 31: Water being channelled into trench around vegetable garden

they dig trenches around their gardens such as in Figure 31 to channel water to their crops.

Men admitted that women in their communities are very knowledgeable and more in control when faced with climatic events that threaten their livelihoods. In general, men emphasised that women know more about what crops need to be planted depending on the climate, they know what agricultural practices should be implemented and they also have various skills.

Women in Thelaphi gave examples of food preservation techniques which they use to preserve

certain food supplies so as to ensure their families' survival in the face of food shortages. For example, they dry green vegetable which can be used when crops fail due to climate related impacts. In figure 32 an elderly woman shows her preserved guavas which she will utilise should the climate not be favourable for guavas in the next season. She only cultivates for household consumption as she has no access to the market to sell any excess fruits or vegetables. During the seasons that she has excess fruits and vegetables, she preserves and stores them for periods of short supply.



Figure 32: Preserved Guavas

With such skills, innovations and knowledge, women need to be empowered through capacity building to enable them to acquire the means necessary to improve or strengthen their skills. They also need access to credit and markets that would allow them to expand production beyond household consumption. Women in Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) rural communities could benefit financially from their skills and innovations. This could enhance capacity to cope and

adapt to climate change. Such skills and knowledge are critical for mitigating and adapting to climate change. It is therefore important that this knowledge is appreciated captured and lessons drawn to guide climate change adaptation interventions.

5.8.2 Improve access to water

Women in Dube and Mkhwanazi (UMhlathuze Municipality) rural communities indicated that an improved access to water could reduce their burdens of having to walk long distances in search

Table 5: Gender Differentiated Water Use (Thelaphi, Dube and Mkhwanazi communities)

MEN	WOMAN
Watering the gardenLivestock use (for those who have)Building	Watering the gardenFood preparationWashing clothes
BathingDrinking	 Drinking Washing dishes Bathing children
	CleaningBrewing traditional beerFor craft work

of water. They also noted that the time and energy spent on collecting water could be better used income generation and food production activities so as to improve household food security. Though both men and women need water, their use for it is usually different due to their differentiated roles and responsibilities in the household and community (see Table 5). During the focus group discussions, it was clear that women value water more than men as they are the main users. It is very vital for their household activities (e.g. cleaning, washing, cooking, bathing children etc) and when they are faced with water shortages these activities are disrupted.

The women in Thelaphi on the other hand appreciated having water in their yards. As indicated earlier, each household has a water point in the yard as shown in Figure 33. In addition to water points in the yard communal bore holes (Figure 34) are also located very close to the household as alternative water points. Providing easy access to water is one way to enhance adaptation and build resilience to climate change. This allows women to spend more time on other productive activates and also reduces their workload especially when faced with harsh climatic conditions.



Figure 33: Water Point Located in Yard



Figure 34: Communal Borehole

6. Conclusion and Recommendations

6.1 Introduction

This chapter presents the conclusions and recommendations based on the findings of the study. The study was commissioned by HBF to examine gender differentiated impacts of climate change, given that climate change is not gender neutral. The study made use existing experience and exposure to climate variability impacts to explore current gender differentiated impacts of climate change. It set out to address the following questions so as to gain understanding of gender differentiated impacts of climate change in South Africa.

- Are women and men in differently impacted by Climate Change?
- How women and men are differently impacted?
- What are the physiological, political, economic and societal causes for the differences experienced, if any?
- What are the current coping and adaptation strategies and capacities?
- How can the capacity of women and men be strengthened to better adapt to climate change and climate variability?

As already indicated in the literature, it is well established that while climate change is viewed to be global in nature, its impacts are not expected to be globally homogeneous but rather differentiated across regions, generations, social and cultural groups, age classes, income groups, and gender. The results generated from this study are not representative of South Africa as a whole as each South African community or social group is unique and will differ culturally, socially, economically and will have different norms and values that may influence gender differentiated impacts of climate change. The outcomes of the study are however, an important step in unveiling the dynamics and realities of

gender differentiated impacts of climate change including climate variability.

6.2 Gender and Climate Change Impacts in South Africa

Due to previous disadvantages and injustices emanating from apartheid, the men and women from Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) communities can be said to lack the capacity to adapt and build resilience to climate change. Both men and women are poverty stricken with very limited economic, human and social resources (see Figure 35) affecting the ability of men and women to build resilience to climate change.

Currently they are relying more on coping mechanisms to respond to the impacts of climate variation which merely allows both men and women to focus on short-term survival rather than long-term adaptation strategies. The coping strategies (e.g. social grants, government relief, seasonal employment and informal trade) which are a critical aspect of the communities are viewed as alternatives for adaptation.

In addition, ability to adapt and build resilience to climate change is compromised by a combination of other factors such as poverty, HIV/AIDS, governance and inability to effectively implement programs and policies designed to enhance the lives of men and women. These factors further affect adaption as they also hinder men and women's ability to recover from the impacts of climatic events. Recovery from climate variability impacts is usually a slow and difficult process that for example should another drought occurs before recovering from the previous drought or any other harsh climatic event, the men and women might fail to cope.

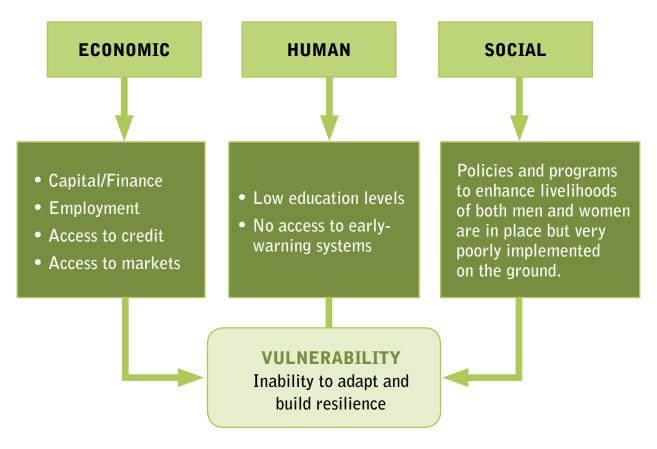


Figure 35: Limited Capacity Building Resources

Gender Differentiated Impacts

Gender differentiated impacts of climate variability were manifested in the unequal distribution of roles and responsibilities of men and women in both study areas. Results reveal that through socially constructed roles and responsibilities, women seem to bear the most burdens from climate variability impacts. Women's burdens were more evident in their response to the impacts of climate variability. Women were found to have extra workloads when faced with climatic stressors as they made efforts to cope with them (see section 5.6). Working longer hours than men affected them not only physically but emotionally drained them as they constantly have to worry about the well being of their household members, especially children and the youth who depend on them.

Men, on the other hand though not working as hard as women, they are also impacted by climate

variability. Men's impacts are more psychological than physical. Their psychological effects are further compounded by unemployment resulting in negative coping mechanisms (*see section 5.6*). There is therefore no doubt that climate change will impact differently on rural men and women. Specific details on how men and women will be differently by impacted by climate change however remain to be seen given the uncertainties that surround the climate change discourse. Based on experiences of current exposure to climate related hazards, women are predicted to be the most vulnerable to climate change.

As indicate by Leary *et al* (2007), vulnerability to climate change is complex and shaped by many interacting processes. These include social, economic, ecological, institutional, and technological and governance. As climate changes, the exposures and risks will also change. In addition, adaptation

will be needed to respond to the changing exposures and risks from climate stressors. With so many uncertainties much more research is needed to fully understand gender differentiated impacts and vulnerabilities to climate change.

In line with the above rationalisation, the vulnerability men and women experience today may change given that gender is dynamic. This could be further influenced by the changing social, economic, ecological, institutional, technological and governance processes that could reshape gender and gender relations. The study and existing literature (Goerz, 1995; Fierlbeck, 1995; Terisa et al 1997; Carr, 1996; Stephen, 2004; HRC, 2006; Dayan, 2007; Djeynaba, 2007; UN, 2008) has shown that shifts in gender and gender relations are already taking place not only in the communities studied but also in other communities around the world. In the communities studied gender roles are undergoing transformation due to climate related stressors which are heightened by other underlying factors such as unemployment, poverty and HIV/AIDS. These stressors force men and women to engage in different activities to diversify their livelihoods.

With more women diversifying their livelihoods, gender roles are also being impacted. There is a change in gender roles to accommodate responses to the impacts of climate variability. In this study it was evident that women are now more involved in activities that generate income, thus reshaping relationships between men and women. The income generated by the women through trade and seasonal employment is controlled by them, giving them more opportunities and power to decide what the income can be used for in the household.

The shift is also driven by the country's constitution, gender legislations in the province (Kwazulu Natal), the need for women to provide for their families and women's determination to see change that will improve their position in society. Women have also come to realise that it will take more than the constitution and decent laws to end gender inequalities. They strongly believe that in addition to the constitution and the laws, men need to accept the changing role of women in post-apartheid

society. Women are aware that the constitution and the laws simply provide an enabling environment and a platform, from which the women can voice their concerns. The rest depends on their determination to make the laws and the constitution work to for them.

Though women noted that they are still disadvantaged in many ways they acknowledged that they are in a much better position today and they are hopeful things will change. South African women are fortunate have policies and institutions that are driven by the constitutional imperative of gender equality and non-discrimination. Though much more remains to be done, it is important to acknowledge that significant progress has been made in promoting gender equality since independence.

Women in the communities of Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) are speaking out and even the voiceless are being spoken for. Like other modern women, they are making tremendous efforts in fighting for their rights and against all forms of injustices against them. They can no longer accept to be confined in the home as a result they are getting involved in other activities outside the home (e.g. self employment, informal trade, adult education, informal and formal employment and commercial farming). They are striving to participate in the economic and social development of their country. It is through acknowledging these changes that climate change adaptation interventions can effectively support all the efforts being made by these women. This is one way women's resilience to climate change could be enhanced.

South Africa's commitment to achieving gender equality has enormous potential to address gender differentiated impacts and vulnerability to climate change. Though the gender policies and institutions are not directed at climate change as indicated in section 5.5.1 and the literature review, they address gender inequalities that are predicted to heighten women's vulnerable to climate change. These policies if well implemented could therefore benefit South African women by enhancing their ability to

cope better with climate variability while adapting and building resilience to climate change.

For the policies to benefit women and enhance their ability to adapt to climate change, will depend on;

- The extent to which the constitution will be honoured by all (e.g. development and social institutions, individuals members of society, traditional and government leaders).
- Policy reinforcement laws to ensure implementation as well as effective monitoring and evaluation systems.
- How much progress would have been made in addressing gender inequalities by the time predicted climate change impacts are experienced.
- The extent to which Traditions, customs, stereotypes and discriminatory attitudes towards gender can be changed.
- The extent to which proposed strategies to improve women's position in society are actually implemented.
- The extent to which poverty, unemployment, HIV/AIDS and other related issues are addressed as these pose major obstacles for so many rural men and women.

With enough commitment and support, new opportunities may emerge to address issues of gender and climate change. As shown in this study, women have the opportunity to diversify their livelihoods to enable them to cope better with climate variability. Though this new opportunity may have its own challenges (such as increased work load for women) there are also positives in that, women are provided with the means to maintain household food security as well as cater for other important needs. This would not be possible if the women were confined to their homes as literature has always presented.

The women in the communities of Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) have the drive to survive and they are very resourceful and knowledgeable with regards to coping with the impacts of the changing climate. Lessons can therefore be

drawn from their knowledge on how women can be better assisted to adapt to climate change. Results confirm that women play an important role in supporting households and communities to cope and adapt to climate variability.

6.3 Recommendations

Mainstreaming gender into climate change is very critical and requires a holistic approach. While addressing issues relating to gender inequality it is also vital to look beyond gender inequality and assess the different needs and choices that men and women make that eventually impact on their way of life and the way they respond to climate related impacts.

There is a need to understand the historical and social disadvantages of both men and women. In the communities studied, there seems to be multiple concerns emerging from historical and social disadvantages of both men and women that affect their ability to cope with current climate variability and may further impact on their ability to adapt and build resilience to climate change.

Not only is there a need to address gender inequalities but also inequality between rich and poor that make the poor more vulnerable to the impacts of climate change.

With an increasing number of female-headed households, addressing poverty and provision of basic services is important for the women in the communities of Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality).

Though the promise of gender equality is to improve the wellbeing of all. Particular attention seems to be given to women. This creates a social environment where men feel left out. Especially the poor men who are also vulnerable. In Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) poor unemployed men with low levels of education feel helpless and are resorting to negative coping mechanisms. Men who are as badly off as women need to be considered as worthy beneficiaries of gender equality work.

Though climate change poses a risk for the rural communities of Thelaphi (UMzinyathi Municipality), Dube and Mkhwanazi (UMhlathuze Municipality) it seems to be overshadowed by more immediate concerns (poverty, unemployment, HIV/AIDS, lack of resources, poor infrastructure, poor and lack of basic service delivery etc) which are seen as more important for the men and women. Both men and women recommend addressing these concerns as they heighten their vulnerability to cope with climate change impacts. This can be done by enhancing their ability to access credit, risk-management instruments and effective support networks.

Women need to be supported so as to enable them to become active participants developing and designing adaptation strategies.

More gender based research is required to fully understand the major contributions of women as agents of change in mitigation and adaptation to climate change. Women should not only be seen as victims of climate change but must be appreciated as effective agents of change in relation coping and adaptation. As confirmed by the study, women are very knowledgeable and innovative when it comes to responding to climate variability. Their knowledge and expertise can be used in climate change adaptation strategies. However, there is a need for research to explore how this knowledge can be effectively utilized to achieve resilience.

- There is a need not only to close the gap that exists in the gender and climate change discourse, but also the need to better understand and learn from what has already been achieved with respect to gender perspectives in climate change.
- There is a need to develop innovative ways to eliminate gender stereotypes about the roles of women and men. This needs to begin at an early age in homes, schools and communities.
- There is a need to give both men and women some support to empower them to successfully excel in agriculture. They require appropriate and labour

- saving technology, seeds that can withstand different climatic conditions and financial capital.
- Government officials and decision-makers need to interact with the rural communities and involve them in their decision making, so as to formulate more successful programmes, which enable rural communities to build resilience against climatic conditions.
- Early warning systems giving information on the timing, length and adequacy of rainfall, or research into crop species that are more resilient to climate variation would be very beneficial to the men and women.
- Means must be sought to ensure the transition from coping with climate variability towards more adaptive resilient systems that can confront climate change.
- Microfinance programs aiming to reduce income poverty while also empowering men and women are required.

The study strongly recommends that, to effectively address issues of gender and climate change, focus must not only be on negative gender experiences but also assess and acknowledge progress that has been made in addressing gender issues and social changes that have taken place and lead to changes in gender relations. Lessons from positive experiences can be used to guide the way forward in achieve gender equality.

There is a need to rethink misleading stereotypes that present men as being entangled in a hierarchical and abusive system of gender relations, while women are constantly being seen as victims. Such perceptions tend to conceal the fact that men and women are dependent on each other and that they need to work together if gender equality is to be achieved. Men must therefore be seen as partners in fighting inequalities and not always as opponents. They must be involved in campaigns to achieve gender equality.

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8. Appendix 1

INGONYAMA TRUST BOARD

ESTABLISHED IN TERMS OF THE KWAZULU-NATAL INCONYANA TRUST ACTION OF 1864 1884

188 HOOSEN HAFFEJEE STREET - P.O. BOX 601, PIETERMARITZBURG, 3200 TEL: (033) 355 4361 - FAX: (033) 342 5045 E-MAIL: BDZONDI@DLA.GOV.ZA - WEBSITE: INGONYAMATRUST.ORG.ZA



Our Rer

KN8/5/11/18/0410 AL

YOUR MET

ENQUIRIES:

Lungile Sibiya

13 December, 2007

Mrs. Eunice N. Mkhwanazi Kangaroo Co-operative P.O. Box 38141 Esikhawini 3887

Dear Madam

Kangaroo Co-operative proposed Poultry Farming - Nseleni

I refer to your recent application and to the subsequent site inspection.

I now attach a schedule showing the main heads of terms of the proposed lease and would you please confirm that the information therein is correct and acceptable to you.

On hearing from you, a recommendation will be made to the Ingonyama Trust Board that a lease be granted to you based on these heads of terms.

Yours Faithfully

CHRIS AITKEN

INGONYAMA TRUST BOARD SECRETARIAT

8. Appendix 2

Table 6: Similarities between apartheid and patriarchy

	APARTHEID	PATRIARCHY		
Root of the problem	Unequal power relations based on race	Unequal power relations		
MANIFESTATIONS				
Social attitudes	Patronising attitude of whites: "our blacks are happy/grateful"	Patronising attitudes of men: "our women like staying at home"		
Complexes	Internalised oppression: "I am very happy working for my baas"	Internalised oppression: "My husband beats me for my own good"		
Focus on the physical	White myths and stereotypes about the physicality of blacks	Women are seen as sex objects		
Stereotypes	"Blacks are loud/lazy"	"Women gossip; they have nothing better to do"		
The law	Blatant legal discrimination based on race	Blatant legal discrimination based on sex		
Land	87 per cent of the population (blacks) forced onto 13 per cent of the land	Women not allowed to own land		
Education	Vastly inferior education system for blacks; few opportunities in science and technology	Equal numbers of boys and girls at primary and secondary school, but huge drop in girls at tertiary level; only tiny number in science and technology		
The economy	Blacks confined to lowest paid jobs; high unemployment	Black women confined to even lower paying jobs; even higher unemployment		
Politics	Until 1994 blacks barred from politics	Still very unequal representation of women in politics		
Violence	Very violent system; gross human rights abuses	Rape; domestic violence; sexual harassment		
FIGHTING THE SYSTEM				
	Blacks in the forefront, but supported by some progressive elements from other racial groups who recognised that transformation is in their interests	Women in the forefront, but supported by progressive men who recognise that transformation is in their interests		
Self-assertion	"Black is beautiful"	"Proud to be a woman"		
Strategy	Empowerment	Empowerment		

Source: Commission on Gender Equality, 2000

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The Heinrich Böll Foundation, associated with the German Green Party, is a legally autonomous and intellectually open political foundation.

Our foremost task is civic education in Germany and abroad with the aim of promoting informed democratic opinion, socio-political commitment and mutual understanding. In addition the Heinrich Böll Foundation supports artistic and cultural as well as scholarly projects, and co-operation in the development field. The political values of ecology, democracy, gender democracy, solidarity and non-violence are our chief points of reference. Heinrich Böll's belief in and promotion of citizen participation in politics is the model for the foundation's work.

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