Chapter 5

Livelihoods in the Conservancy Study Areas

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Introduction

In Chapters 3 and 4 the discussion explored the evolution of CBNRM and associated policy and legislation. The discussion also addressed the various ways in which CBNRM is currently being implemented and the extent to which it is contributing to national development objectives. This chapter turns to look in some detail at the livelihoods of people living in the study area conservancies. It aims to contribute to the development of CBNRM by providing a detailed understanding of household livelihoods in these areas. The chapter provides an overview of key livelihood issues and identifies priority resources, activities and strategies for the study areas in the Kunene and Caprivi Regions. The aim is to present background information relating to people's key strategies, their priorities and to the various options available to them in terms of accessing resources and cash. This provides a context within which it is possible to assess the current and future contributions that CBNRM and wildlife and tourism land uses make to household livelihoods.

The chapter presents detailed information relating to Caprivi and Kunene separately, and is organised in the following way. First an overview for each region of general observations relating to livelihoods; then a description of the broader regional livelihood contexts (demographic, health and educational issues); this is followed by a detailed description and analysis of livelihood priorities, natural resource use, incomes, issues of wealth and differentiation and finally the presentation of case study material. In conclusion, the chapter highlights key livelihood issues for CBNRM and identifies why it is important to incorporate livelihood analysis as part of the future development of conservancies. The discussion in this chapter draws on primary and secondary survey data and on household case study material. Table 6 presents a summary of the WILD/EEU survey sample sizes in relation to the demographic data of the conservancies (where available).

Table 6: Summary of sampling size data for WILD/EEU survey

Conservancies sampled	Total estimated no. hhs in conservancy	No. hhs sampled	Sample size as % of conservancy hhs	Total estimated conservancy population	No. individuals sample represents	Sample size as % of total population
Kwandu	N/A	184	N/A	6,000	976	16%
Mayuni	389	183	47%	1,714	872	50%
Salambala	1,597	206	13%	8,020	1,267	15%
Torra	123	84	68%	884	379	42%
≠Khoadi //Hôas	641	210	33%	3,500	1,181	33%
Sorris Sorris	230	175	76%	900	861	75%
Ehirovipuka	N/A	150	N/A	N/A	1,216	N/A
Total[1]		**1,115**			**6,339**	

Source: Adapted from Suich 2003, and Humphrey and Humphrey 2003

[1] The total represented here excludes the purposive sample of those directly involved in CBNRM and Tourism for Caprivi.

Livelihoods in Practice

In general terms the livelihoods of people in the communal areas are primarily based on combining strategies and resources relating to livestock production, crop-based agriculture and gardens, natural resource utilisation and the search for and exploitation of income opportunities (including employment). The opportunities to enhance livelihood security and for on and off-farm diversification are limited. People are also vulnerable for a variety of reasons including drought and variable rainfall; the presence of wildlife species and predators (resulting in damage to water points and loss of crops to elephants and other herbivores, and livestock losses to carnivores); lack of secure land tenure; poor access to markets; limited alternative sources of income; and health risks associated with HIV/AIDS, malaria and others. Their livelihoods are risk prone and they live in conditions of seasonal and longer-term uncertainty.

Despite this, which would present a rather dismal picture, people have adapted and refined their strategies over time in order to cope with adversity. The relative success of their efforts is based primarily on the capabilities and knowledge that people exercise. It is through combining, in different ways, a complex of strategies, resources and activities available that people construct their livelihoods. This ensures that they minimise risks and achieve a degree of household food and income security. Livelihood diversification is central to this. A few examples illustrate the strategies employed. In arable cropping contexts, planting a range of grain and vegetable crops using indigenous and in some cases hybrid varieties in different soil and land types has the effect of mitigating against seasonal and variable rainfall. Livestock production systems rely on seasonal grazing patterns (either through transhumance or more localised movements), with areas identified as emergency grazing for use in times of poor rainfall. This has a similar effect on periodic drought mitigation. The production of mixed stock (goats, cattle, domestic fowl, horses and donkeys) is also an aspect of diversification. In contexts where a mix of livestock and cropping or gardens is possible (for example in Caprivi) the two combine to provide additional security. The failure of one may be offset against the ability to provide income or food from the other. In addition, people have access to small amounts of income from a variety of sources. These include incomes from the sales of agricultural produce and livestock, pensions, some remittances, and cash earned through small-scale off-farm activities (including rendering services, manufacturing, and sales). A further diversification strategy that is commonplace involves utilising a range of natural resources (both flora and fauna). These are primarily used for consumption purposes, for their medicinal values and sometimes for sale.

The resources available to people include natural resources, based on land, plants, animals, and in some cases fish (Caprivi for example); their access to infrastructure (boreholes, roads, health and education facilities and markets); cash through employment, remittances and pensions; their own capabilities (educational attainments, skills and health status) and social networks (including kin neighbours and political arenas). Access to a variety of cooperative social networks and institutional relationships are extremely important. These may serve as safety nets in times of adversity (bereavement, drought etc.), when it may be possible to make a claim on ones own kin network for support, or they may function to determine a farmer's access to land, grazing and water, or decision-making arenas. Social relations can also put a strain on people's livelihoods as people have obligations and need to support others (Næra *et al.* 1993). Making claims and meeting the claims of others is intrinsic to the role that social networks play in people's lives. The extent to which remittances play a role in supporting the livelihoods of conservancy and other communal area residents is also an important feature of the local economy. Approximately one quarter of all households surveyed by WILD stated that they received some form of cash remittance from relatives living away from the area.

The two study regions where fieldwork under the WILD Project was carried out (Kunene and Caprivi) vary considerably in terms of their social and political contexts and histories; their biophysical and agro-ecological environments and consequently the variety and mix of strategies and activities that people engage with (see Humphrey and Humphrey (2003) for descriptions of the study sites). However, there are clear similarities in relation to people's expected or desired livelihood outcomes. All people in rural areas are trying, to varying degrees, to meet food and income security needs; to meet the educational requirements they expect for their children; and to meet household health needs (see Vaughan *et al.* 2002, Vaughan and Katjiua 2002, and Murphy and Mulonga 2002a). In addition, both regions are subject to the policies and legislation of the Namibian Government, and in both areas CBNRM support organisations operate to support community efforts to manage natural resources and capture tourism revenues.

Government strategies to address supporting livelihoods and development have identified improvements to small-scale farming; assisting with non-farm income enterprises and food security; supporting environmentally and ecologically sustainable farm practices; and promoting the conservation of plants and animals (GRN 2001a). In other words, recognised options for improving livelihoods relate to the better management of the natural resource base (for example, water, rangelands, agricultural lands and wildlife [flora and fauna]) and hence improving productivity or exploiting new opportunities for on and off-farm production and the generation of income (including through tourism); and on being able to secure better access to markets, through both

improved infrastructure and improved policy and institutional support. The discussion presented in Chapter 4 highlighted some of the ways in which CBNRM is currently contributing to these objectives at a regional and national level. The discussion provided in the conclusions to this chapter focuses more specifically on supporting and enhancing livelihoods through these and other strategies at farm and household level.

Livelihoods in the Caprivi Region

People in Caprivi are dependent on cropping, livestock, piecework, wages, pensions and the use of a variety of natural resources (including wildlife [fauna], plant and forest or river-based resources) for their livelihoods. For the majority, the degree of dependence on these varies according to their socio-economic status, their locality within the region and the season. Wealthier people with larger cattle holding, for example, are less reliant on pensions or the harvesting of natural resources than those who are considered poorer (i.e. with less cattle)[2]. Locality also plays a role. Those who live close to the Zambezi River and its flood plains, for example, utilise fish resources more than those who live in the western parts of Caprivi. The proximity to Katima Mulilo and other small urban centres has an effect on the degree to which any particular mix of strategies and activities may be employed by households. Infrastructure, particularly proximity to markets, also shapes the combination of activities. Social relations between kin and lineage members are also important and the role of headmen, the *induna*, and the traditional leaders is particularly strong and important, especially in respect to disputed settlements and in terms of controlling access to key resources, for example, land.

Since much of Caprivi is subject to annual flooding, the degree to which people can access various resources changes across the year. Seasonality relates to rainfall patterns. There is a good deal of unpredictability about the outcome of cropping, since agriculture is rain dependent. Rainfall in Caprivi is higher than elsewhere in Namibia, but it is still subject to a great deal of variability. During the WILD Project's three years' duration, there was only a single year of average rains (+/- 700mm). There are also seasonal patterns to the expenditures that need to be met by households (MAWRD 1999). In January and August school expenses need to be paid, and in April and May there are often additional medical costs (including transport to urban centres) as families pay for the prevention and treatment of malaria.

In addition to the above, there are other factors that shape people's livelihood strategies and outcomes: for example, the composition and structure of households, the educational status of individual household members and their health. In the context of agriculture, for example, or livestock keeping, the number of people available to provide labour for cultivating, weeding, harvesting or for herding cattle will have an impact on the extent to which these strategies are successful. Caring for household members with HIV/AIDS or any loss of a family member will result in the inability of households to meet their labour requirements and put additional stress on the capacity of individual households to secure their livelihoods.

Summary:
Cropping, livestock, piecework, wages, pensions and the use of a variety of natural resources (including wildlife [fauna], plant and forest or river-based resources) are essential livelihood activities. The degree of dependence on these varies according to people's socio-economic status, their locality within the region and the season.

Regional livelihood contexts

Caprivi has a high population density compared to the other regions of Namibia. The 2001 National Census reported that the total population in the region was 79,852 people. The landmass for Caprivi is 20,009 km^2. For two of the WILD study area conservancies, Humphrey and Humphrey (2003) reported that the population density was 8 and 11 persons per km^2, with average household size being five and six persons (Salambala and Mayuni respectively). The WILD/EEU survey supports findings relating to average numbers of persons per household (five on average), as does national census data (GRN 1991) and MAWRD agricultural surveys (MAWRD 1999).

The WILD/EEU survey revealed that 30% of respondents over 20 years of age had had *no* formal education. This compares with the 1991 National Census, which report that for the region, as a whole, just over one third of the population (aged over 15) had never attended school. Access to school for Caprivian learners is 85% being within 5 km radius of a school facility. Such high access rates indicate that the majority of learners currently have access to formal education. The fact that many people with education tend to move away from their natal areas to urban centres is also significant and may account for why the WILD/EEU survey only found that one per cent of those surveyed had completed any form of higher education. For those currently of school age, 22% of households have children not attending school because of an inability to afford school fees or other school related costs (n=496) (Suich 2003).

The health status of people in Caprivi can be gauged through access to secondary sources. It was not a direct part of WILD research, but is nevertheless an important contextualising factor and a measure of poverty. Since Independence (1990) infant and child mortality rates have declined across Namibia. In the north-east, however, the infant and child

[2] In the Caprivi Region cattle holding has frequently been used as a indicator of wealth (see for example, Ashley and La Franchi 1997, MAWRD 1999, Suich 2003).

mortality rates have not fallen as markedly as they have for other regions. This is largely due to greater poverty, poorer access to medical care and the presence of tropical diseases like malaria (Mendelsohn *et al.* 2002). Life expectancy in the Caprivi is lower than in other regions, but in part, this is accounted for by the high infant and child mortality rates. In recent years life expectancy has also dropped considerably, but due in large measure to the prevalence of HIV/AIDS. Caprivi suffered the biggest drop in life expectancy for the whole country, falling by 20 years between 1991 and 2000 (Mendelsohn *et al.* 2002). The number of people who contract malaria, and the HIV infection rates (currently estimated to be approximately 33%)[3] are among the highest in Namibia. Despite this access to health care facilities is generally good. Over 80% of the population have access to a clinic within a 10 km radius of their homes.

Other indicators of poverty are provided by Mendelsohn *et al.* (2002). They cite the internationally accepted standard indicators: the Human Development Index[4] (HDI) and the Human Poverty Index[5] (HPI). Caprivi has the highest HPI for the country as a whole and the lowest HDI. These measures don't capture the variation between rural and urban areas in Caprivi, nor that there are also differences between households within particular areas, but what is clear is that these measures indicate that Caprivi is one of the least well-off and least developed of regions in Namibia. One further piece of information that provides useful background is the Gini Coefficient[6]. Namibia as a whole has a relatively high Gini Coefficient (0.67). This suggests that there is a large disparity in terms of the distribution of wealth nationally. By comparison, Caprivi has the one of lowest Gini Coefficient scores for the whole of Namibia (0.55) (Mendelsohn *et al.* 2002). This indicates that the distribution of wealth is not as polarised as it is for the country as a whole. Taken together with the other data and indices this tells us that the situation for many in Caprivi is that they live below internationally accepted standards in terms of daily incomes, and that although not everyone is poor, there is not much of a disparity between those who have wealth and those who don't. Poverty is more widespread than for the country as a whole.

Summary:
- Caprivi is one of the least well-off and least developed regions in Namibia.
- Many in Caprivi live below internationally accepted standards in terms of daily incomes.
- The distribution of wealth in Caprivi is not as polarised as for the country as a whole.
- Access to education is good.
- HIV infection rates are among the highest in Namibia.
- Poverty is more widespread than for the country as a whole.

Livelihood priorities

Data from the WILD/EEU household socio-economic survey that was conducted in June 2002, in three conservancies in Caprivi, suggests that to meet their overall livelihood needs, more than half of the respondents clearly identified that the priority livelihood activity to households was crop production for domestic consumption. This was ranked first by over 60% of survey respondents (n=496) (Suich 2003: 29). Of those activities ranked second and third by respondents, natural resource utilisation (specifically thatching grass and reeds) followed by livestock production were identified as important. Those activities ranked as most important to cash incomes (ranked first) were prioritised as follows: pensions, crops sales and then the sale of natural resources (Suich 2003: 30). Respondents reported that any second or third cash income sources were minor and insignificant compared with these. So much so, in fact, that for the majority there was no third source of cash. This lends weight to the argument that for people in the conservancy areas there are few income opportunities.

Summary:
Priority livelihood activities to households –
1. Crop production for domestic consumption
2. Natural resource utilisation
3. Livestock production
Priority activities for cash incomes –
1. Pensions
2. Crop sales
3. Sale of natural resources

[3] The statistics on HIV/AIDS infection rates must be treated with caution, since the statistics do not reflect the reality of the situation on the ground. Elsewhere in Namibia it has been reported that for every positive result there will be six more that go undetected (Talavera *et al.* 2000). It is expected that this would also be the situation in Caprivi.
[4] The HDI is a summary measure of human development. It measures life expectancy at birth; adult literacy rates; and GDP per capita.
[5] The HPI is a measure of deprivation. It combines a number of attributes of poverty including: literacy rates; malnutrition among children; early death; poor health care; and access to safe drinking water.
[6] The Gini Coefficient is a useful measure in that it tells us about the disparity in terms of the distribution of wealth.