#### 1 Introduction

Rural people in southern Africa make a living in diverse ways, often in harsh physical and economic environments. Such contexts are fast-changing, requiring shifts in livelihood strategies and mixes of activities. This article explores both the vulnerability contexts and livelihood strategies found in the three study areas examined during the SLSA research programme: Zambézia province, Mozambique, Chiredzi district, Zimbabwe and South Africa's Wild Coast. This article assesses how such livelihood strategies interact with wider institutional and governance contexts, and how such arrangements facilitate or constrain access to natural resources and the realisation of sustainable livelihoods in these areas. An examination of what people do to make a living in the case study sites demonstrates that natural resources continue to play, alongside a portfolio of other activities, a crucial part in rural people's livelihood strategies.

The first section presents some basic information on the study areas, setting these within national contexts. The second section highlights some of the changing contexts that influence livelihood opportunities in southern Africa. Together these have resulted, we suggest, in increasing livelihood vulnerability over the last decade in all three study areas. The ways such changing contexts have affected different livelihood strategies are explored in the following section, with agriculture, off-farm diversification and migration looked at in particular. The final section turns to the central question of the research: how do institutions and policies, or more generically the governance context, affect the way people are able to construct their livelihoods? This article, then, picks up on the themes introduced in article 1, but focuses in on the particularities and details of the study areas, providing the necessary background on contexts, livelihood strategies and governance arrangements for the discussion and analysis in the subsequent articles of this Bulletin

# 2 The case study areas

#### 2.1 Mozambique

Mozambique is one of the poorest countries in the world. It has a population of 18 million, a Gross National Income (GNI) of US\$21 per capita and a

# 2. Livelihood Dynamics:

Rural Mozambique, South Africa and Zimbabwe

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Figure 1: The case study areas



Human Development Index (HDI) of 170th of 173 countries globally in 2001. This is reflected in a life expectancy at birth of 39 years on average and literacy rates of 44 per cent (UNDP 2002). The country has suffered major disruption due to war over the past 30 years, with a war of liberation being fought until Independence in 1975, followed by a subsequent divisive and bloody civil war until 1993. The scars of these conflicts are still felt today, with people only now returning to places from where they were displaced, and divisions between the ruling party, FRELIMO and the former rebel

movement, now opposition party, RENAMO (Mozambique National Resistance/Resistencia Nacional Moçambicana) central to national politics. At independence, the new government inherited a run-down economy with many key assets destroyed by fleeing Portuguese colonists. Large plantation estates were abandoned and not functioning and much infrastructure was in a poor state. The socialist policy of the FRELIMO government saw nationalisation as the key to regeneration and many formerly privately held assets were taken under state ownership. The civil

war though took its toll and the economy did not flourish as hoped for. Only with the end of the war, coinciding with the end of the Cold War, and the injection of significant amounts of foreign aid (with all sorts of associated conditionalities, including the steady abandonment of socialist planning approaches) did the economy start to grow, with annual growth rates of 10 per cent in the late 1990s, although admittedly from a very low base. Natural hazards have had a major impact in Mozambique, with the major floods of 2000 (and lesser floods of 2001) being particularly damaging to the economy and livelihoods. Mozambique remains a "highly indebted country", with significant levels of deep poverty. It is part of the IMF-World Bank initiative aimed at poverty reduction linked with debt relief, and has received US\$4.3 billion in recent years. The policy discourse, at least at rhetorical level, of the "poverty reduction strategy paper" process is on everyone's lips, at least in the donor agencies and ministries in Maputo. With aid per capita at US\$57 in 2000, Mozambique is highly reliant on the international donor community.

Research for the SLSA programme was carried out in the province of Zambézia, Mozambique's most populous province. Zambézia was part of RENAMO-held territory for much of the civil war, with many local chiefs and other traditional leaders providing support to the rebels. This particular political history has had a major impact on the institutional and administrative politics of the region, with tensions between the central state – seen as very much associated with Maputo and the south – and the local populace part of an on-going dynamic (Norfolk *et al.* 2001; *SLSA Research Paper* 13).

Zambézia province has a diverse agroecology, from dense forest areas, with valuable timber increasingly commercialised by legal and illegal loggers; to agricultural lands, some of it of high quality where extensive former colonial estates and plantations were sited; to coastal areas, with rich fisheries (Norfolk *et al.* 2001). In terms of natural resource assets, therefore, the province is exceptionally rich. But, its economic status is poor, with extensive rural poverty, associated with poor infrastructure, weak markets, limited service provision and a long history of resource extraction

– whether by colonists, rebel movements, the private sector, party officials or the state – which has seen little benefit, beyond poorly paid wage labour, for the rural poor (Norfolk *et al.* 2001).

Two case study sites were chosen: the first, in the district of Morrumbala, is located in the central forest belt running across the province from west to east and borders Malawi. The research was concentrated in the administrative post of Derre and focused in particular on the livelihoods of forest-dwelling communities. The second study site, in the district of Maganja da Costa, is located on the coastal strip in the northern part of the province in an area where there has been a long history of conflict over natural resource use, particularly between large landholding private sector entities and local communities. Research here focused on the administrative post of Bajone.

## 2.2 South Africa

South Africa, by contrast, is a relatively rich country, with a strong industrial sector, good infrastructure and a sophisticated, "modern" economy. With a population of around 43 million, South Africa has a Gross National Income per capita of over US\$3000 and an HDI rank of 107 out of 173 globally. Some 11 per cent of the population is below an income poverty line of \$1/day and 36 per cent below \$2/day (UNDP 2002). Unemployment is high at 30 per cent nationally.1 But such averaged figures mask the fact that a legacy of apartheid is that South Africa has one of the most inequitable income distributions in the world. Poverty is concentrated in certain areas, and most notably in the former homelands. One of the most disadvantaged of these, the former Transkei, is within the new boundaries of the Eastern Cape Province. According to the 1996 census, Eastern Cape was South Africa's poorest province with 70.7 per cent of its 6.2 million inhabitants living below the poverty line.2

The case study area chosen for this work was initially defined as the Wild Coast district of Eastern Cape province in the former Transkei. In December 2000, the Wild Coast district Council was abolished and its area of jurisdiction divided between various new District Municipalities. As a result, the study district was redefined as the

eastern portion of the Wild Coast, particularly the new local municipality of Ingguza, which in turn forms part of the new O.R. Tambo District Municipality. Within Ingquza, the village of Mdudwa was selected for intensive study. Since the advent of majority rule in 1994, places like Mdudwa village have not received substantial development benefits. Services remain basic, infrastructure is poor and people, in many ways, are as vulnerable as they were before, if not more so. Livelihoods in the former homelands are particularly dependent on links with employment elsewhere: in the mines of the Rand, domestic or labouring work in towns such as Umtata, or the white commercial farms elsewhere in the Eastern Cape for example, and so are especially vulnerable to shifts in the broader economy. The inheritance of the apartheid era, with the homeland areas seen as labour reserves for the mainstream (white) economy has been hard to break. Local economic development has been sporadic, with limited success (Binns and Nel 1999), and such areas continue to rely on flows of remittances and pensions as a main source of local livelihood (May 2000; Ntshona and Lahiff 2001; Perret 2001).

#### 2.3 Zimbabwe

Zimbabwe too has a highly unequal distribution of livelihood opportunity, an inheritance of the colonial era. The country has a total population of 12.8 million and an average GNI per capita of US\$480. But again this masks the fact that most of the wealth is concentrated amongst a few. As in South Africa, land ownership in particular is highly skewed, with the vast mass of the African population living in the crowded former "reserves" or "tribal trust lands", renamed "communal areas" following independence in 1980. At independence the new ZANU(PF) government embarked on an ambitious programme of development. Significant investments were made in education and health services, alongside agricultural extension, rural infrastructure and so on. Land reform was part of the package, with some significant successes. By 1989 the government had resettled some 52,000 households and purchased 2.7 million ha (around 16 per cent, of the largely white-owned commercial farmland). However, as discussed in the introductory article of this Bulletin, such efforts faltered in the latter part of the 1980s and into the

1990s, and many of the post-independence achievements have been reversed, with declining – or effectively absent – state support for many services, particularly in remote communal areas, coinciding with a collapse in economic growth rates (estimated at minus 8 per cent per annum in 2001).

Sangwe communal area in the southeastern lowveld region of Chiredzi District in Masvingo province, the Zimbabwean case study area, is a good example of such a remote and marginalised communal area. It covers a total of 48,441 ha spread over five wards that are sandwiched between the Save river, the Save Valley (wildlife) Conservancy, and Gonarezhou National Park. Large multinational sugar estates are found nearby. The majority of the private ranches in the vicinity had moved into game ranching, in some cases amalgamating their land to form massive conservancies. Since 2000, most of these ranches, as well as a portion of Gonarezhou National Park, have been settled by beneficiaries of Zimbabwe's controversial fast-track land reform programme many from Sangwe communal area. In the language of Zimbabwean landuse planning Sangwe is classified as belonging to Natural Region V, characterised by low rainfall, high temperatures and vulnerability to droughts, and officially only considered suitable for extensive cattle or game ranching. However, such designations bear little relation to local realities. Sangwe is a densely populated area despite its low and highly variable rainfall, where a mix of dryland agriculture, some small-scale irrigation and off-farm activities such as building, trading (including cross-border trade to South Africa and Mozambique) and piece-work labouring. As in South Africa, remittance income is a significant source of local livelihood and connections across the border to South Africa have always been key (Mombeshora et al. 2001; Wolmer et al. 2003). Unlike South Africa, though, state pensions are not a feature of the Zimbabwean scene, and rural people must rely more on local economic activity as a consequence.

Table 1 provides a quick comparative summary of some of the key features of the three study areas. But, as subsequent sections of this article relate, such snapshot overviews may mislead. Hidden behind such presentations are numerous variations, with different age, gender or socio-economic

	Derre <sup>a</sup> and Bajone <sup>b</sup> , Zambézia province, Mozambique	Wild Coast, Eastern Cape, South Africa	Sangwe, Chiredzi District, Zimbabwe
Annual rainfall	c. 1350 mm	c. 1200 mm	450–650 mm
Population density	31/km²	38/km²	34/km²
Main crops grown	<sup>a</sup> Maize, cassava, beans, cotton <sup>b</sup> Cassava, rice, coconuts, cashew nuts	Maize, pumpkins, beans, cannabis	Maize, cotton, groundnuts, sorghum
Diversified livelihood strategies	Fishing, hunting, gathering of forest products for sale, salt extraction	Pensions, casual employment, remittances, hawking, kin dependency	Employment in South Africa and sugar estates, poaching, trading
Governance/policy contexts	New Land Law, conflict between communities and private sector, community delimitation	Local government reform, land reform, Black Economic Empowerment	Fast-track land reform, emergence of war veterans as political actors, economic crisis

groups, for instance, pursuing very different livelihood strategies. Such patterns also vary over time, with new pathways of livelihood change emerging in response to changing vulnerability contexts. Changes in such contexts over the last 10 years are the subject of the next section.

# 3 Changing vulnerability contexts

The last decade has seen some major changes in the contexts within which livelihoods are played out in southern Africa. During the early phase of the SLSA programme, research teams investigated the consequences of these changing contexts on the livelihoods of people living in the three study areas. Three themes recurred in the stories told by local informants, and in the reviews of survey data from across these areas. These were the impacts of economic structural adjustment policies; the consequences of the HIV/AIDS epidemic; and the ravages of climatic events of different sorts. These are now looked at in turn.

## 3.1 Economic structural adjustment

Economic reform programmes have had major impacts on livelihoods in southern Africa since the

early 1990s. This is particularly well illustrated by Zimbabwe's experience of the Economic Structural Adjustment Programme (ESAP) from 1991. In urban areas ESAP resulted in the retrenchment of a significant number of people who returned to their rural homes in search of subsistence security. The removal of food subsidies in urban areas meant a sharp rise in the cost of living and falling real incomes. It became increasingly difficult for urban dwellers to continue to remit part of their incomes to relatives in rural areas such as Sangwe.

ESAP also resulted in the removal of subsidies on agricultural inputs and the opening up of commodity markets to new players and privatisation of parastatal marketing boards. Subsidies on key agricultural inputs such as seed, fertiliser and chemicals were removed and at the same time extension and veterinary services were scaled down. Farmers in Sangwe, and elsewhere in the country (Chipika et al. 1999), found themselves increasingly exposed to the whims of the market. For some this provided opportunities as output prices rose. But for others, particularly in more remote areas where the subsidies of the former state-supported marketing and input supply system were targeted, this was a major blow.

market, but the rest resorted to planting without

applying fertilisers and chemicals, resulting in poorer yields and increased food insecurity.

With markets liberalised, the monopoly that had been enjoyed by state marketing agencies was eliminated. For example cotton, a key crop in the lowveld areas such as Sangwe, was previously sold to the Cotton Marketing Board only, but could now be sold to a new proliferation of private buyers, including multinational companies. Farmers could now choose whom to sell their commodities to. But this also brought its own problems. Farmers who bought inputs on credit from new buyers were not able to repay and found themselves heavily indebted. However, the few "rich" farmers in Sangwe, who had the resources to expand their production, took advantage of these new marketing opportunities and realised more from selling agricultural commodities to competitive buyers. Others had to make do with what resources they had, often shifting crops to less inputdemanding options, or reducing agricultural activities in favour of off-farm options or labouring on richer farmers' fields.

Due to a combination of factors, including (although this rarely makes the headlines) the legacies of ESAP, Zimbabwe is currently in a state of economic crisis with hyperinflation and severe shortages of foreign currency, fuel and even basic commodities. Some attempts have been made to reverse elements of the liberalisation policies of the last decade. But price control policies, for example, have resulted in shortages and the exchange of whatever commodities are available in the strong parallel market. A second economy is being fuelled which is lucrative for the sellers but corroding the livelihoods of buyers. Farm inputs, which have now also been brought back under government price controls, have been in short supply and are being bought at exorbitant prices on the informal market. Prices of maize seed, for example, have risen by over 200 per cent since 2000 and fertiliser is beyond the reach of the majority.3 The jobs market is continuing to shrink and fewer than ever opportunities exist. The legacy of economic reform has been the implosion of the formal economy with social inequality continuing to increase, as a small cadre of politically well-connected and affluent entrepreneurs have benefited from the increasingly politicised situation.

Although their current economic circumstances are less dire than Zimbabwe's, South Africa and Mozambique have also borne the brunt of similar market and fiscal reforms. Mozambique embarked on a structural adjustment programme in 1987, with a major transformation in the economy, including liberalisation of markets, removal of subsidies and privatisation of state enterprises, of which over 1200 have now been transferred to new ownership. This has resulted in in-flows of foreign investment, particularly from South Africa, and a growth in the economy in double digits. But economic reform has resulted in substantial divestment of state assets with the Mozambican elite gaining in particular. As a result, new patronage networks have been established between the state, the ruling party and a new economic elite, and the rural poor remain on the margins with few obvious benefits (Bowen 2000).

In South Africa, the government adopted the Growth, Employment And Redistribution (GEAR) macro-economic policy in 1996 aiming to cut the budget deficit, liberalise trade, and boost foreign direct investment and economic growth in high potential sectors (see article 6, this Bulletin). Yet there is little evidence that GEAR is producing the sort of growth that might allow income redistribution or of benefits flowing to the rural areas of former homelands. Economic liberalisation has been held responsible by many for increasing unemployment and the knock-on impacts of reduced remittances (e.g. Bond 2001). And, despite some rhetoric to the contrary, rural development and poverty alleviation are low on South Africa's mainstream policy agenda.

## 3.2 HIV/AIDS

Perhaps the most serious factor contributing to the increased vulnerability of poor households in southern Africa is the HIV/AIDS epidemic that has been tearing at the social and economic fabric of the region.<sup>4</sup> In 2002, the national rates of infection had reached 35 per cent in Zimbabwe (42.7 per

cent in Masvingo Province), 13 per cent in Mozambique (15.4 per cent in Zambézia province) and 11.4 per cent in South Africa (6.6 per cent in Eastern Cape).5 It has distorted the demography of rural populations, leaving in its trail the old and young and wiping away the productive age groups. In Zimbabwe and Mozambique the average life expectancy at birth is now under 40 years. Household structures have therefore changed: in many instances grandparents are left to look after the young and the incidences of female- and childheaded households have increased. The death toll has also had a dramatic impact on household labour availability and remittance income, puts heavy demands on women's time for home-based care, as well as causing increased expenditure on health care and funerals. HIV/AIDS thus substantially reduces households' resilience to other livelihood shocks, such as poverty-related malnutrition or disease, drought-induced food shortages or the economic consequences of policy reform.

HIV/AIDS has also had an increasingly felt impact on the ability of the state or NGOs to respond to rural development needs. Infection and mortality rates among professional groups in the key ages between 25 and 40 have been especially high, with teachers, extension workers, government officials, NGO workers and others becoming ill and subsequently dying in alarmingly large numbers. As a result whole swathes of the civil service are becoming incapacitated, with staff numbers down, illness rates up and, as part of the stringencies of economic reform, vacant posts not filled. Attendance at funerals of relatives, colleagues or friends is sadly a regular occurrence, with major impacts on work rates and efficiency. With politicians, key administrators and senior party officials often struck by HIV/AIDS, either directly or indirectly, the wider ramifications of HIV/AIDS on the way the future is viewed, policies are enacted or areas governed can only be guessed at (De Waal 2003)

#### 3.3 Climatic events

All the study areas are characterised by high levels of rainfall variability, with both drought and floods being regular phenomena. Such events are not new, however. Southern African rainfall has in the past

been characterised by cyclical wet and dry periods (Tyson 1991; Tyson and Preston-Whyte 2000), associated with related shifts in cropping pattern, livestock management strategies and patterns of accumulation and disposal (Scoones et al. 1996). Opportunism has characterised livelihood strategies, with rainfall being a major determinant of both opportunity and constraint. However, of late, such rainfall variations have become more extreme and less predictable. Climate change, including major El Niño events hitting the region, has taken its toll. The major droughts of the early 1990s and more recently in 2001–2002 have been associated with such wider climatic trends. Floods have also hit hard, with major flooding in the Zimbabwe study area as a result of Cyclone Eline in 2000. Floods also hit the Mozambican study area in 2001.

Thus climatic uncertainty is a major factor affecting livelihood strategies. Yet, coping with such variations in crop output, livestock feed or water for irrigation, for example, is made more challenging by other changes in vulnerability contexts. Sickness or lack of labour due to HIV/AIDS mortalities, for example, makes certain drought coping strategies – such as temporary migration with cattle, or foraging for wild foods – more difficult. Similarly, the economic consequences of adjustment, notably the reduction in remittance flows, mean that income sources not covariate with climate may not be available.

As we write, drought - seriously exacerbated by a series of economic and political factors - has triggered a serious food crisis in Zimbabwe. As of December 2002, the Famine Early Warning Systems Network (FEWS Net) reported mounting food insecurity and threats to livelihoods, and classified the Zimbabwean food crisis as an emergency. About 6.7 million people (49 per cent of the population) were deemed extremely food insecure. There have been at least two partial failures of agricultural production in the last three years. However, FEWS Net also reports that 'despite having experienced equally poor harvests [to other southern districts], less than 65 per cent of the people in Chiredzi, Beitbridge and Chipinge require food aid because of their well developed strategies for coping with perennially adverse conditions and their access to informal food

imports from nearby Mozambique and South Africa.'6 The degree to which such strategies will actually prove effective remains to be seen. The 2001–02 drought is significantly different to the last major drought event in 1991–92. Many of the coping strategies available then, including livestock sales and finding temporary employment (cf. Kinsey et al. 1998; Eldridge 2002), are no longer available to many. Instead, illegal gold panning along the rivers, harvesting and sale of timber, "poaching" of wildlife and "border jumping" have become the more desperate measures used by people to survive.

Zambézia province in Mozambique comparatively high rainfall on average, and, unlike Chiredzi distrtict, has been relatively unscathed by the regional droughts of the past decades. However, periodic flooding is a major cause of livelihood disruption in the lower-lying and coastal areas. This appears to have increased in frequency. There was serious flooding in 2001, following major floods elsewhere in southern and central parts of the country in 2000 (Christie and Hanlon 2001), where more flooding is reported in 2003. The wiping out of any crop production, destruction of basic infrastructure (roads, bridges etc.) and the cutting off of large areas from markets and other services had a major impact on people's livelihoods in 2001 in Zambézia. Many livestock died and human disease burdens increased in the villages. For some, assets painstakingly accumulated in the short period from the end of the civil war were wiped out at a stroke. While aid efforts avoided any major catastrophe, the floods just added to the increasing vulnerability of the rural population.

Of the three study areas, the Wild Coast in South Africa is perhaps the least prone to climate-induced risks and uncertainties. Rainfall is relatively reliable, droughts are rare and flooding not an issue. This does not mean, however, that such areas are immune from the effects of climate change. Across southern Africa, rainfall variability appears to be increasing, and, although this may mean variation around a higher mean, this does impose greater uncertainty on cropping strategies, requiring in turn adaptive responses by farmers. It is not surprising that, in part due to such climatic factors, farmers are turning to gardening in the Wild Coast study area

(as in the others) with additional irrigation, often only by hand from rivers or shallow wells, as a way of offsetting such additional risks.

Thus the impacts of economic reform, HIV/AIDS and heightened climatic variability are superimposed and interlinked and so conspire to bring about a situation of chronic vulnerability in these corners of southern Africa, where a large proportion of the population live below the poverty line.

# 4 Livelihood dynamics

Livelihood strategies in the study areas are dynamic, varied and differentiated due to the daily, monthly and annual variations in the timing and quantity of factors such as rainfall, labour availability, input costs, access to public services, markets and credit, migration opportunities, remittance income and transport costs. Those pursuing different livelihood strategies are also differentiated by age, gender, wealth and ethnicity, as people are able to draw on differing material and social assets, political connections, experience and expertise. Here we outline the three main groupings of livelihood strategies employed by rural people in Zambézia, the Wild Coast and Chiredzi district.

#### 4.1 Agriculture

A great deal of policy on rural development and land reform in southern Africa has been informed by an ideal-type image of the small farmer. Smallscale farming was seen to be efficient and productive, providing food security and employment in rural areas, and the engine of economic growth in the economy more generally (see article 1, this Bulletin). This image has a range of assumptions bound up in it – for example that these are full-time farmers, practising "mixed farming" on "viable units" (Scoones and Wolmer 2002). In Zimbabwe, for example, it has been hugely influential in the design of interventions from agricultural extension to resettlement planning from the colonial era right through to the present. In Mozambique, some advocate a smallholder led agricultural strategy as part of the divestment of former state farms (e.g. Strasberg and Kloek-Jenson 2002). However, this image runs the risk of excluding many of the non-agricultural options and strategies so vital to livelihoods in southern Africa (see below) and misrepresenting the reality of farming practice for many.

In South Africa, the bucolic image of the smallscale rural farmer has perhaps had less purchase. The "betterment" schemes of the apartheid era attempted to impose a rigid, ordered farming landscape in parts of the former homelands, but in practice such a vision never took off. Labour migrancy was always a dominant feature, and especially so in the former homelands (cf. Murray 1981). Farming was therefore part-time, often associated with women who remained at the homestead and represented a supplement to pension incomes for those who had returned home on retirement. Nevertheless, with the end of apartheid and a commitment to rural development through the Reconstruction and Development Programme of 1994, there was much talk of a revival of the small-scale farming sector through land reform and extension programmes (Lipton et al. 1996). However, this never really took off. As article 5 in Part III of this Bulletin documents, shifts in policy emphasis since then have significantly down-played the smallholder model and, instead, emphasised a category of new, black commercial farmer on medium-sized "economically viable" plots as the basis for the new agricultural economy. Meanwhile, there is remarkably little attention paid - through research, extension or policy discussion and support - to agriculture as part of livelihoods in the former homelands, and this despite the importance of a combination of agriculture and common property-based natural resources to overall livelihoods, particularly for poor and marginalised people (Shackleton et al. 2000; Kepe 2002).

Notwithstanding the importance of non-agricultural strategies, livelihoods derived from cropping and livestock management are key in Zambézia, the Wild Coast and Chiredzi district. Yet the way such agriculturally-based livelihoods are combined with other livelihood strategies is highly varied, and is differentiated among socio-economic groups. Livestock ownership, for example, is highly skewed in all areas. Across the sites, livestock and particularly cattle, is a key livelihood asset, and often the route to other forms

of accumulation. But in Mozambique livestock populations have been decimated by war, with many today only owning smallstock or poultry. In Chiredzi district too there have been marked decreases in cattle ownership in recent years – only a relatively wealthy minority own cattle and for the rest there has also been a shift towards owning smallstock, particularly goats. This is attributable to a variety of factors including: drought, stock theft and discontinuation of veterinary services. Goats have various advantages to vulnerable households: they are hardy browsers, they are less prone to stock theft, veterinary care is relatively simple, they fetch better prices than sheep, and are in demand for traditional ceremonies (Wolmer et al. 2002).

The shift from cattle to goats has altered the gender dynamics of livestock ownership in many areas. In Chiredzi district, for example, men are increasingly goat owners; something that has often been the preserve of women. The lower number of cattle concentrated in fewer hands has also had implications for draught power for cultivation. More people have had to hire draught power from the wealthy few, often ploughing at less advantageous times, or resorted to hand hoeing fields. It is also increasingly common in Chiredzi district for people to plough with mixed spans of cows and donkeys rather than oxen (Wolmer *et al.* 2002).

A variety of flexible crop management strategies are employed by farmers to hedge against uncertainty and cope with the vagaries of climate, disease and the economy. These include diversifying the varieties of crops grown, intercropping small grain crops to make best use of a short wet season (Sangwe); the extensification of fields in response to declining soil fertility (Derre); and growing vegetables for consumption and sale in home gardens (all sites), the major constraint being water availability. In the Wild Coast the illicit cultivation of dagga (cannabis) is also popular and lucrative.

Another important trend across the region is the increase in contract farming or out-grower schemes. In Zimbabwe, for instance, companies such as the Cotton Company of Zimbabwe (COTTCO) provide loans for cotton seeds, fertiliser, pesticides and agricultural equipment to

growers, in return for a contractual commitment to use them to market the product. AGRIMO in Mozambique enter into similar arrangements with cotton growers in Derre, although cotton production has declined considerably here as it is regarded as requiring too much labour and producing too little profit. Other "new" crops, such as paprika, are also grown on contract. Such arrangements provide a guarantee of income to farmers, along with inputs, which they can no longer afford. However, they are subject to other forms of uncertainty, as contractors may suddenly withdraw and the investments in switching to new forms of production are not necessarily secure.

#### 4.2 Diversification

Alongside agriculture, rural southern Africans, as we have already indicated, engage in a wide portfolio of livelihood activities of varying degrees of seasonality and remuneration. However, a clear contrast can be drawn between the South Africa and Zimbabwean case study areas, on the one hand, and the Mozambican ones on the other. In Mozambique there are markedly fewer cashearning opportunities and consequently a bigger reliance on agriculture, alongside hunting, fishing and gathering of other natural resources for sale. Although here too there is no homogenous pattern and rural populations are highly differentiated (cf. O'Laughlin 1996; Bowen 2000). Derre Forest Reserve, for example, provides a source of mushrooms, honey, clay, roots and tubers, medicinal plants, building materials, thatching grass, firewood and bamboo; and the mangrove swamps near Bajone are used for salt extraction (Norfolk et al. 2001).

#### Box 1: Livelihood strategies in Mdudwa, Eastern Cape, South Africa

#### Case 1

Nyuwani is 72 years old and his wife is 56 years old. Both have been educated up to Standard Four and both receive old age pensions. They live with five of their children, who are all unemployed, and nine grandchildren. As a youth, Nyuwani worked in Natal for six months, herding livestock and doing other piece jobs. He later went to work in Gauteng for five years and in Cape Town for three years. Between 1955 and 1991 he worked for the government as a painter. Nyuwani's household ploughs one field of their own, another that will soon be occupied by their eldest son and a third belonging to Nyuwani's second wife who has long ago relocated to another village. In their fields, they plant maize, pumpkins and beans. In their small garden they plant potatoes, tomatoes and carrots. In a good season they fill three tanks with maize cobs. When there is a need for cash, they sell one 50 kg bag for R60. With their livestock, they plough and harvest these three fields and also help two neighbouring households. A women's vegetable project has been established on one of the three fields belonging to Nyuwani's household, but will soon be moving to another plot. Nyuwani's wife started the project. She invited other people to join her, and charged them a joining fee of R50.

## Case 2

Nkazi is 58 years old. He never went to school and he is not yet eligible for a pension. He stays alone but his married daughter lives nearby. He worked before in KwaZulu Natal. He had five *joyini* (migrant contracts) in the area, four *joyini* to Billieskop, one to a coalmine and finally another one back in Billieskop. His wife left him a long time ago. He has not planted anything in the past few years because he does not have money. He complains that his single plot is not productive and that he does not have money to buy fertiliser. He also complains that his land is small and accuses the village headman of allocating people "ezindaweni zokukhoboka" (places of slavery, i.e. unproductive land). His main sources of livelihood are handouts from his relatives and weeding other people's gardens, for which he gets between R30 and R100.

Source: SLSA Research Paper 5.9

#### Box 2: Livelihood strategies in Bajone, Zambézia, Mozambique

Porteiro is a former Zambézia Company worker; he worked on coconut plantations for almost 30 years, until the mid-1980s when the company went bankrupt due to economic and political instability. Like most families in Bajone, he lives on a plot belonging to the company with his wife and his six children, who were all born while he was working for this company. With the end of the war in 1992, he decided to join the informal market selling dry coconut fruit harvested illegally from the Zambézia Company land to sell to the small private entrepreneurs from Quelimane City and Nampula province. He involved his two eldest sons in the business while his wife and other children were engaged in salt production and farming in infertile areas belonging to the company.

In early 1994, when all the people farming in company areas were ordered to abandon the illegally occupied plots, he moved to an area out of the company area to get land for farming. To obtain this land he counted on the help of his neighbour and former colleague Ndalanda, who introduced Porteiro and his wife to his friends, who gave a plot of land after establishing a new relationship. From that period his wife lived semi-permanently in the new area, while Porteiro, returned to his original area, was forced to change his activity from coconut harvesting to fishing since the coconut trees were no longer very productive.

From fishing he gained cash income to buy basic food for his household and gave a portion to his wife in the other area because in the first months she was not yet producing anything. He also bartered fish within the community to obtain maize and bean seeds, and cassava and sweet potato plants for the new field.

Source: Mozambique Team Fieldnotes 2002.

Particularly in the Wild Coast, and to a lesser extent Chiredzi district, waged labour and the resulting remittances are very important. But even in South Africa regular waged employment is the preserve of the lucky few.<sup>8</sup> In Mdudwa village formal local employment is mainly found in the public sector. This includes working in the nature reserves, as dip tank attendants, or employment in village plantations (for example as security guards). Informal employment includes seasonal jobs in the plantations, caring for other people's children, and collecting fuelwood for other people. Box 1 offers profiles of two contrasting livelihood strategies from people resident in Mdudwa village in the Eastern Cape of South Africa.

In Sangwe communal area, Zimbabwe, there are limited employment opportunities in Chiredzi township and on the large sugar estates. However, the recent economic collapse has carried off many jobs in its wake, forcing people to look further afield for work (see below). But the new political (and physical) landscape has brought new

opportunities for some. The fast-track land reform has created a large demand for short-term agricultural labour to clear fields from former cattle and game ranches, as wealthier settlers have employed a new class of informal "farm workers" (SLSA Research Paper 3).

Unlike other countries in the region, pensions in South Africa make a significant contribution to rural livelihoods (see Box 1), constituting the bulk of the government's welfare budget. Pensions are the only regular source of cash income for many of the poorest households and typically support large extended families. In the Eastern Cape, pensions constitute approximately 40 per cent of household income, substantially higher than other provinces (Statistics South Africa 1999). Pension transfers are therefore perhaps the state's most important contribution to rural livelihoods.

In Mozambique relying on a pension is not an option and, as elsewhere, the range of diversified livelihood activities includes a number of local

crafts and trades, such as basket and mat making, beer brewing, building, carpentry, pottery and blacksmithing. Local trade is also very important and this typically, as in Derre, assumes an international dimension. Malawi, which borders Morrumbala district, is more accessible than the district capital and cross-border trade is largely unrestricted. Malawi also provides a source of commodities harder to source in Mozambique. Bicycles, for example, are particularly sought after, given the lack of transport infrastructure, and are commonly traded for maize and beans (Norfolk *et al.* 2001).

Even times of flux and crisis provide openings for opportunists. A number of new entrepreneurs have sprung up in occupied commercial farms and the fast-track resettlement areas neighbouring Zimbabwe's Sangwe communal area in recent years. These are people with access to limited capital and with political connections and lacking scruples who are able to take advantage of the situation by opening shabeens or setting up security companies in the resettlement areas for example (SLSA Research Paper 3). A "new" livelihood strategy open to those without capital has been poaching game to sell meat locally. In the climate of relative law enforcement laxity there have also been opportunities for theft and sale of other resources belonging to commercial farmers including: cattle (which are sold locally for meat or driven to Mozambique), sugar cane, fencing wire, and firewood. Activities such as prostitution, gold panning, and smuggling to and from Mozambique and South Africa are also on the increase in Zimbabwe. The aftermath of the Mozambican war provided similar room for illicit livelihood strategies, as Box 2 demonstrates.

#### 4.3 Migration

Rural southern Africans have long had lifestyles characterised by a high degree of mobility. Whether it is an opportunistic response to famine and risk, as hunters or traders, or as refugees, moving in search of a better livelihood, geographical movement is embedded within a range of cultural strategies. Migration is thus not a recent phenomenon and there was a tradition of migration ingrained in the pattern of everyday life. Labour migration from the Sangwe region of Zimbabwe to South Africa dates

from the opening of the diamond and gold fields in the nineteenth century. With large-scale labour migration to the mines repatriated wages became an important pillar of the local economy and migrant labour came to be viewed increasingly as a stage in a boy's passage to manhood. Today this is still the case, although there have been significant changes in the migrant labour experience. In the past, notwithstanding the activities unscrupulous labour recruiters, there was a legitimate, licensed and organised recruitment process. In recent times the vast majority of labour migrants have been criminalised as crack-downs on immigration in South Africa have led them to become "border jumpers" running the risk of dangerous animals and arrest as they travel at night through Kruger National Park. Most work is poorly paid and illegal on farms or in the cities rather than in the mines. Interviews suggested that there has been a diminishing terms of trade from the point of view of the labour migrants. While previous generations would have remitted a relatively large amount and returned with money to buy livestock and build houses current returnees rarely bring more than a few consumer durables (such as radios and bicycles) and enough money to buy smallstock (Wolmer et al. 2002). But economic meltdown, lack of job prospects at home and the current food crisis are increasing the flow of illicit work-seekers over the border.

In Derre, Mozambique, the most common form of migration is of young men to the local cities of Mocuba, Quelimane, Beira and Nampula. In Bajone, most of the reported migration was longer distance to Beira, Maputo and South Africa. A large proportion of the residents of both Derre and Bajone areas were displaced during the years of civil war (locally, or to Malawi) and are relatively recent returnees. Households with members living in urban areas also have better access to manufactured products which they are able to trade for labour using the *ganho-ganho* system (see below) and hence cultivate larger areas (Norfolk *et al.* 2001).

The remittances returned to families by labour migrants are also a crucial component of livelihoods in South Africa. However, remittances to rural areas have declined in recent years. This is due, in large part, to retrenchments in the mining,

manufacturing and public sectors, but also due to permanent migration of workers and their families to urban areas following the scrapping of influx controls in the late 1980s. The 1997 Rural Survey found that the average contribution of remittances to household income was 21.3 per cent nationally and 23.4 per cent in the Eastern Cape (Statistics South Africa 1999). Communities in Mdudwa and elsewhere have been hard hit by the retrenchments taking place across key sectors of the economy (Ntshona and Lahiff 2001).

## 4.4 Changing governance contexts

Gaining access to the resources required for different livelihood strategies, whether based on agriculture, off-farm diversification or migration, or combinations of these, requires negotiating an often complex and confusing institutional maze (see article 1, this Bulletin). Access to land, labour, cash or social networks is mediated by institutions of various sorts. These range from very local, often informal, arrangements between kin or village members to more formalised institutions at village, district, provincial or national level. The changes we have described above have affected these institutional arrangements - and the power and authority relationships that underly them - in fundamental ways over the past decade or so. Just as vulnerability contexts and livelihood strategies are undergoing change, so are institutional arrangements and the wider governance contexts of which they are part.

For example, at the local level the institutional arrangements underpinning agricultural practice are in flux, particularly as HIV/AIDS, poverty and drought have caused labour and draught power shortages for many. In Derre and Bajone in Mozambique an informal labour provision arrangement known as ganho-ganho is still strong. This is a system of providing labour in the fields of other families in return for payment, usually with manufactured items rather than cash or local produce. It is an important source of support for the most vulnerable households, particularly widows, yet men, who tend to be more mobile, have more opportunities to earn ganho-ganho. Beer parties, where food and drink are prepared for friends, relatives and neighbours in return for farming assistance, particularly cultivation, are also common (Norfolk *et al.* 2001). In Sangwe, Zimbabwe, a similar labour and draught power sharing arrangement known as *dhava* has become increasingly commercialised in recent years and withdrawn into tighter kin or patron-client networks (Wolmer *et al.* 2002).

As articles in subsequent parts of this Bulletin document in much more detail, there has been an ongoing multiplication of institutions of varying degrees of legitimacy and popular support in the rural areas of southern Africa. Thus chiefs, local councils, district administrators, sectoral ministries, catchment councils, user committees, traditional healers, community courts, peasant associations, war veterans, churches, NGOs, political parties, and private companies, among many others, all compete for power and resources. The shifting conflicts over power and revenue between these and other institutions are undoubtedly altering the ways rural people gain access to assets and services.

In all three countries, policy initiatives from central government, often heavily sponsored by donor agencies, have been attempting to develop forms of local administration to deliver rural development. The creation of district, municipal or provincial local governments has been attempted with varying degrees of success (see article 7, this Bulletin). As part of the new, post independence/apartheid democratic settlement such authorities are invested with much hope, if not much power or resources. Yet they compete with other longer-standing sources of authority, most particularly so-called "traditional" leaders. Very often creations of previous regimes, chiefs, headmen and others claim authority over rural affairs, and carry with them certain allegiances. There are often tensions between such leaders and the contemporary state. For instance, in Mozambique many chiefs in the Zambézia province were RENAMO supporters in the civil war and remain suspicious of the FRELIMO government (SLSA Research Paper 13; Wilson 1992). Similarly, in South Africa, chiefs in the former homelands often benefited from the homeland system and are still seen by some in the ANC as a block to transformation (Nstebeza 1999). In Zimbabwe, chiefs may have ethnic allegiances and may resent the imposition of party-based rule from outside, while others may be supporters of Zimbabwe's fast-track land reform process involving the seizure and resettlement of largely white-owned commercial farmland has dramatically altered the physical landscape in Zimbabwe. Alongside this, a new political terrain has rapidly unravelled with new actors and new institutions. This is a confusing and dynamic landscape populated by actors as diverse as entrepreneurial war veteran "security guards"-cum-protection racketeers, militant ZANU(PF) youth brigades, and marauding elephants possessed by chiefly spirits.

A rejuvenated movement of veterans from the guerrilla struggle for independence in the 1970s has emerged as key political players on the new resettlement schemes. They led a quasi-militarised occupation of the farms and as base commanders chairing new settlers' committees and reporting directly to district and national levels they constituted a new, parallel, and highly politicised, loop of governance which by-passed existing state structures. The war veterans have both made concessions to, and been able to exert a certain degree of power over, representatives of the state (such as the agricultural extensionists planning the new resettlement areas) and traditional authorities, in particular the chiefs. It is the war veterans, not chiefs who have decided where and when land is occupied and to whom it is allocated, but chiefly ratification, even *post hoc*, is important for the perceived legitimacy of the process. However, chiefs suspected of supporting the opposition party have been marginalised entirely. In Chiredzi district this is all layered over the politics of ethnicity, with ethnic and familial connections with local ancestral spirits being another source of legitimacy in land claims and of local political authority in the new resettlement areas.

Tensions between authoritarian nationalism and ethnic politics, between a militarised, modernist order and "traditional" religion and authority have created a complex political mosaic, made up of multiple and overlapping identities and positions.

Source: SLSA Research Paper 3.

the opposition and may not be in favour with party officials locally (SLSA Research Paper 3).

Such tensions are played out in the variety of attempts to decentralise the management of natural resources. Newly empowered local authorities, municipalities and resource management groups (such as catchment councils, wildlife committees, borehole committees or forest management groups) are being superimposed upon "traditional" authority structures. Such dynamics are further complicated by the encouragement of the private sector to become engaged in rural areas, through mining, forestry, agriculture, wildlife or tourism ventures, for example (see article 6, this Bulletin). With unclear lines of authority and variable legitimacy of local leaders, rural communities are often not well placed to negotiate good deals with private sector entrants who often have more resources to hand than scruples. In settings of extreme livelihood vulnerability and extensive poverty, the promise of some limited benefits of a concession arrangement or a joint venture deal may look highly appealing. Those able to grab the opportunity, i.e. usually the relatively rich and powerful at the local level, do so, often to the longer term detriment of the area, and a further marginalisation of the already poor.

The complexities of this fluid situation, with new players entering into subtle, power-laden negotiations and allegiances, is particularly well illustrated by the trade-offs between war veterans, chiefs, extension services and ancestral spirits in the process of land allocation in Zimbabwe (Box 3).

In contexts where the only permanent thing seems to be constant change, rural people and policymakers alike are grappling to come to terms with the complex nature of these fast-changing governance processes. Drawing on the detailed empirical material gathered in the three study areas, the articles in the rest of this *Bulletin* ask how the changing institutional and policy environment in southern Africa is affecting people's access to natural resources and hence their ability to pursue sustainable livelihoods. In Part II, the articles look

at this question in relation to different resources: wild resources, water and land. In Part III, the articles look at an array of policy initiatives: private sector involvement, decentralisation and rights approaches and again examine how institutions, policy and governance are being reshaped and, with this, the impact on livelihoods.

#### **Notes**

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- 1. Statistics South Africa (www.statssa.gov.za).
- 2. www.statssa.gov.za/RelatedInverseSites/census96
- 'Food aid slow in reaching targets', FewsNet 23/12/2002, www.fewsnet/zimbabwe.
- See Barnett et al. (2001); Cross and Whiteside (1993); De Waal (2003); Dixon et al. (2001); Rugalema (2000); Zaremba (2001).
- Data from UNAIDS, www.unaids.org and Human Sciences Research Council (2002).

- Fews Net Zimbabwe Country Updates 23/12/2002, www.fewsnet/zimbabwe.
- 7. See also: Bowen (2000) for Mozambique; May (2000) and Perret (2001) for South Africa; and Campbell *et al.* (2002), Scoones *et al.* (1996), Wolmer *et al.* (2002), and Hebinck and Bourdillon (2001) for southern Zimbabwe.
- 8. Using the official (narrow) definition of unemployment, the rate for South Africa in February 2002 was 29.4 per cent and for Eastern Cape was 28.1 per cent (Statistics South Africa 2002).
- The complete list of SLSA Research Papers is found on page 116 of this Bulletin and full text versions are available at: www.ids.ac.uk/slsa.

# References

- Barnett, T., Whiteside, A. and Desmond, C., 2001, 'The social and economic impact of HIV/AIDS in poor countries: a review of studies and lessons', Progress in Development Studies, Vol 1 No 2: 151–70
- Binns, T. and Nel, E., 1999, 'Beyond the development impasse: the role of Local Economic Development and community self-reliance in rural South Africa', *Journal of Modern African Studies*, Vol 37 No 3: 389–408
- Bond, P., 2001, Against Global Apartheid: South Africa Meets the World Bank, IMF and International Finance, Cape Town: University of Cape Town Press
- Bowen, M., 2000, The State Against the Peasantry. Rural Struggles in Colonial and Postcolonial Mozambique, Charlottesville: University Press of Virginia
- Campbell, B., Jeffrey, S., Kozanayi, W., Luckhert, M., Mutamba, M. and Zindi, C., 2002, Household Livelihoods in Semi-Arid Regions: Options and Contraints, Bogor: CIFOR
- Chipika, S., Chisvo, M. and Chipika, J.T., 1999, 'Economic reform and smallholder communal agricultural development in Zimbabwe', Main Report, Final Draft, Harare: ITDG

- Christie, F. and Hanlon, J., 2001, Mozambique and the Great Flood of 2000, Oxford: James Currey
- Cross, S. and Whiteside, A. (eds), 1993, Facing up to AIDS: The Socio-economic Impact in Southern Africa, Basingstoke: Macmillan
- De Waal, A., 2003, 'How will HIV/AIDS transform African governance?', *African Affairs*, Vol 102: 1–23
- Dixon, S., McDonald, S. and Roberts, J., 2001, 'Special issue: AIDS and development in Africa', Journal of International Development, Vol 13 No 4
- Eldridge, C., 2002, 'Why was there no famine following the 1992 southern African drought? The contributions and consequences of household responses', IDS Bulletin, Vol 33 No 4: 79–87
- Hebinck, P. and Bourdillon, M. (eds), 2001, Women, Men and Work: Rural Livelihoods in South-Eastern Zimbabwe, Harare: Weaver Press
- Human Sciences Research Council, 2002, Nelson Mandela/HSRC Study of HIV/AIDS: South African National HIV Prevalence, Behavioural Risks and Mass Media, Pretoria: HSRC

- Kepe, T.V., 2002, 'Grassland vegetation and rural livelihoods: a case study of resource value and social dynamics on the Wild Coast', unpublished PhD thesis, University of the Western Cape, South Africa
- Kinsey, W., Burger, K. and Gunning, J., 1998, 'Coping with drought in Zimbabwe: survey evidence on household responses to risk', World Development, Vol 16: 89–110
- Lipton, Michael, Ellis, F. and Lipton, Merle (eds), 1996, Land, Labour and Livelihoods in Rural South Africa. Volumes 1 and 2, Natal: Indicator Press
- May, J., 2000, 'The Structure and Composition of Rural Poverty and Livelihoods in South Africa' in B. Cousins, (ed.), At the Crossroads: Land and Agrarian Reform in South Africa into the 21st Century, Cape Town: PLAAS
- Mombeshora, S., Mtisi, S. and Chaumba, J., 2001, 'Zimbabwe mapping phase report: case studies of Sangwe and Mahenye Communal Areas in Chiredzi and Chipinge', Sustainable Livelihoods in Southern Africa Mapping Paper, Brighton: Institute of Development Studies
- Murray, C., 1981, Families Divided, Johannesburg: Ravan Press
- Norfolk, S., Nhantumbo, I., Pereira, J. and Matsimbe, Z., 2001, Mapping Policy, Institutions and Livelihoods in Zambezia Province, Mozambique, Brighton: Institute of Development Studies
- Nstebeza, L., 1999, 'Land tenure reform, traditional authorities and rural local government in post-apartheid South Africa', *Research Report* 3, Cape Town: Programme for Land and Agrarian Studies
- Ntshona, Z. and Lahiff, E., 2003, 'Rural development, institutional change and livelihoods in the Eastern Cape, South Africa: a case study of Mdudwa Village', Sustainable Livelihoods in Southern Africa Research Paper 5, Brighton: Institute of Development Studies
- Ntshona, Z. and Lahiff, E., 2001, 'South Africa country study: mapping phase report', Sustainable Livelihoods in Southern Africa Mapping Paper, Brighton: Institute of Development Studies
- O'Laughlin, B., 1996, 'Through a divided glass: dualism, class and the agrarian question in Mozambique', *Journal of Peasant Studies*, Vol 23: 1–39
- Perret, S., 2001, 'Poverty and diversity in livelihood systems in post-apartheid rural South Africa: insights into local levels in Eastern Cape Province', Agrarian Development-EAAE Seminar, Livelihoods and Rural Poverty, Wye

- Rugalema, G., 2000, 'Coping or struggling? A journey into the impact of HIV/AIDS in southern Africa', Review of African Political Economy, Vol 27 No 86: 537–46
- Scoones, I. and Wolmer, W. (eds), 2002, Pathways of Change in Africa: Crops, Livestock and Livelihoods in Mali, Ethiopia and Zimbabwe, Oxford: James Currey
- Scoones, I., Chibudu, C., Chikura, S., Jeranyama, P., Machaka, D., Machanja, W., Mavedzenge, B., Mombeshora, B., Mudhara, M., Mudziwo, C., Murimbarimba, F. and Zirereza, B., 1996, Hazards and Opportunities. Farming Livelihoods in Dryland Africa: Lessons from Zimbabwe, London: Zed Books
- Shackleton, S., Shackleton, C. and Cousins, B., 2000, 'Revaluing the communal lands of southern Africa: new understandings of rural livelihoods', *Natural Resource Perspectives* 61, London: Overseas Development Institute
- Statistics South Africa, 2002, Labour Force Survey February 2002, Statistical Release PO210, Pretoria: Statistics South Africa
- Statistics South Africa, 1999, Rural Survey 1997, Pretoria: Statistics South Africa
- Strasberg, P. and Kloeck-Jenson, S. 2002, 'Challenging conventional wisdom: smallholder perceptions and experience of land access and tenure security in the cotton belt of northern Mozambique', *Mozambique Series Working Paper* 48, Wisconsin: Land Tenure Center
- Tyson, P.D., 1991, 'Climatic change in Southern Africa: past and present conditions and possible future scenarios', Climatic Change, Vol 18: 241–58
- Tyson, P.D. and Preston-Whyte, R.A., 2000, *The Weather and Climate of Southern Africa*, Cape Town: Oxford University Press Southern Africa
- UNDP, 2002, Human Development Report Indicators, http://hdr.undp.org/reports/global/2002
- Wilson, K., 1992, 'Cults of violence and counterviolence in Mozambique', *Journal of Southern African Studies*, Vol 19: 527–83
- Wolmer, W., Sithole, B. and Mukamuri, B., 2002, 'Crops, livestock and livelihoods in Zimbabwe' in I. Scoones and W. Wolmer (eds), *Pathways of Change* in Africa: Crops, Livestock and Livelihoods in Mali, Ethiopia and Zimbabwe, Oxford: James Currey
- Zaremba, J., 2001, 'HIV/AIDS and Sustainable Livelihoods', Sustainable Livelihoods in Southern Africa Programme, mimeo, Brighton: Institute of Development Studies