Managing protected areas in post-apartheid South Africa: A framework for integrating conservation with rural development

Daniel T. Magome

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Durrell Institute of Conservation and Ecology
Department of Anthropology
University of Kent

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Abstract

The South African National Parks (SANParks) initiated this study in order to provide a policy framework for integrating national parks with the development needs of local people living adjacent its national parks. However, based on the selection of case studies and the changing legal framework in the post-apartheid era, the study extended to cover all state protected areas (PAs). Indeed, the transformation of state agencies following the post-apartheid election of April 1994, in part, drove the need for this integration. Given the history of land alienation during apartheid rule, the relationship between land tenure rights, various levels of ownership, and PAs formed the central hypothesis of this study. Hence, case studies with tenure arrangements ranging from weak, through intermediate, to strong ownership, were selected to test the attitudes of beneficiaries towards PAs.

To set the study in its widest context, obstacles and challenges surrounding biodiversity loss, the key motive behind conservation efforts, were analysed (Chapter 1). The review concluded that governance in conservation and development initiatives (CDIs) could enhance the accountability of key role players involved, i.e., the state, private sector and local people within the context of institutions (Chapter 2). Based on the South African context, case studies were selected (Chapter 3). The results of this study demonstrated that strong ownership out- performed lesser ownership levels on short-term and medium-term benefits arising from PAs (Chapter 4). Thus, lesser ownership cannot secure biodiversity in PAs in times of pressing social needs. The study limitation is that relatively wealthy individuals of strong ownership were compared to relatively poor individuals of lesser ownership. The influence of conservation agencies on the attitudes of local people to PAs under different provincial contexts and philosophical approaches was somehow important only if it could be sustained (Chapter 5). For lesser ownership, combinations of explanatory variables acting together on medium and long-term benefits co-determined the attitudes of respondents to different benefits arising from PAs (Chapter 6). Of these combinations the most important were: the conservation agency in charge, the age and the ownership of respondents for they acted across medium and long term time frames.

In the post-apartheid era, the challenges to transform conservation agencies in order to achieve the developmental imperatives under the 1996 Constitution are fraught with difficulties. Using SANParks as a case study (Chapter 7), it became clear that without good leadership with well-articulated desired outcomes, technocrats could scupper transformation efforts. Given all the challenges, the new legal framework for PAs, rural development, and policy guidelines is outlined (Chapter 8), and thereafter recommendations and conclusions of the study are presented (Chapter 9).

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1.1. Introduction

This study provides the basis for developing a policy framework that would ensure the support of local people to protected areas (PAs) that are mainly under the management authority of South African National Parks (SANParks). As a policy study, the key question is: what do we generally know about involving local people in biodiversity conservation, and how can the present study assist SANParks to design sound policy guidelines that can meet both its conservation and rural development goals? In order to answer this question, I examine relationships between biodiversity conservation, PAs and rural development in the democratic South Africa (Appendix 1). To set the study in its widest context, I assimilate and distil narratives of biodiversity loss, economic development, and participation by local people in conservation and development initiatives, because these are core to the conservation and development paradigm.

The biggest challenge facing planet earth's most prolific and pan-dominant mammal species, *Homo sapiens* or humans, is to strike a balance between the two contested issues of conservation and development. Efforts to link conservation to development globally range from broad environmental movements, such as the Earth Summit and the World Parks Congress (WPC), to specific instruments such as the Convention on Biological Diversity, and various other international treaties. The global solution to this dilemma is illusive, and remains a daunting task for the new millennium. Equally, national or local solutions to this dilemma are unclear, and do not provide workable models. Therefore, managers of PAs are often tossed between conflicting conservation and development narratives. Since one or more combinations of narratives inform conservation and development initiatives, a good understanding of narratives and their underlying assumptions is important.

The nub of this introductory overview is that curbing biodiversity loss, or at least maintaining current levels of biodiversity, is the central issue to linking PAs with both economic development and local people. As with all overviews, the big picture is the key focus here because details are in specialised literature.

Accordingly, this overview is structured as follows:

- **Section 1.1** sets the stage for the overview;
- **Section 1.2** provides a brief account of the historical creation of PAs;
- **Section 1.3** outlines obstacles to biodiversity conservation;
- **Section 1.4** highlights the main challenges to biodiversity conservation; and
- **Section 1.5** concludes the overview.

The remaining chapters of this study are organised to test a tight research hypothesis: that some level of ownership influences the attitudes of local people, or the intended beneficiaries, to various benefits arising from PAs, and ultimately to achieving long-term goals of biodiversity conservation. Correspondingly, I review the importance of institutions in biodiversity conservation (Chapter 2), because they are often posited as incentive and disincentives for conservation. Thereafter, I provide a brief outline of South Africa's socio-political history and its current political dispensation as further background to the study design; selection of study areas, and general methodologies (Chapter 3). In fact, SANParks commissioned this study because of changes in the country's political landscape, which in turn strongly influenced the formulation of the research hypothesis.

In the main body of this study, I present and discuss the study results (Chapters 4-6), and the extent to which they test the research hypothesis. To broaden the application of the study to SANParks, I outline how the post-apartheid political landscape forced the national conservation agency to adjust its operational strategies (Chapter 7). Since state agencies need legal mandates, I outline the country's environmental law reform programme as a background to the proposed policy framework for linking PAs with rural development, and thereafter make study recommendations for further various actors and conclusions (Chapter 8).

1.1.1. **Biodiversity as top priority**

Biodiversity is the sum totals of all living things on earth, taking into account all their variation in structure, function, and composition (Wilson 1988; Noss 1990; Swingland 1993; La Riviere 1994). Apart from a few semantic differences (Gaston 1996) and differences in breadth (Swanson 1997), this definition expresses variability between all living organisms and the variety of ecological complexes in which they occur. This variation occurs at the genetic, species and ecosystems levels (Gaston & Spicer 1998; Kamppinen & Walls 1999). Given its elasticity, ecologists of different persuasions limit the application of the concept to fit their own narrow disciplines. Similarly, many conservation ecologists describe biodiversity within the productivity of undisturbed natural processes and often have little, or no, interest in agricultural diversity. In this overview, biodiversity is defined and discussed within the controversial context of natural landscapes.

Considerable debate continues on how biodiversity should be conserved. However, the main debate for its future conservation is: who appropriates it; how is it appropriated; and how does its appropriation affect others and the resources in question? This is because biodiversity loss is driven by human-induced activities such as habitat loss, invasive alien species, and overexploitation of high value species. In fact, biodiversity loss is the key motivation behind many conservation efforts (Frankel & Soulé 1981). It is often portrayed as a 'crisis discipline' (Soulé 1985) that urges some ecologists to use emotive rhetoric in defence of biodiversity conservation, believing that such utterances will inspire others to join in their cause (Soulé 1987). In support of this position, the world's biodiversity is now more at risk than at any time since the extinction of the dinosaurs 65 million years ago (Wilson & Peter 1988).

Humans are precipitating an event that may rival the Big Five mass extinctions of the geological past (Balmford *et al.* 1998). Accordingly, biodiversity loss is the dialectic of catastrophe. Based on this dialectic, things are so bad that the solution must be at hand, and be absolute (Myerson & Rydin 1996), otherwise species-rich habitats will be destroyed (Pimm & Raven 2000). The unprecedented biodiversity loss is presented

as a battle, but at times there is non-census on whether the crisis really exists. Some scientists argue that, unless we act, posterity will be helpless to do so (Frankel & Soulé 1981). Others argue that unless we hurry to acquire knowledge on which a wise policy of conservation and development can be based for centuries to come (Myers 1988, Wilson 1988; Western 1989), the battle is lost (Ehrlich 1988) and the ark is sinking (Myers 1979; McNeely 1992). Some believe that it is in our hands to save our one earth at the time when much of it is on the brink of terminal threat (Myers 1994). The impression given is that if the earth is about to break, we must respond to this biodepletion crisis (Myerson & Rydin 1996). Although this crisis is well articulated, there is no consensus on how we should act, and this causes tension and conflict.

It is generally accepted that biodiversity *per se* is a good thing; that its loss is bad, and therefore that something must be done to maintain it (Gaston 1996). In fact, unless humanity is suicidal, it should want to preserve, at the minimum, the key natural life support systems and processes required to sustain our own existence (Daily 1997). As a result, biodiversity can be construed as a 'buzzword', a 'bandwagon', a global resource, a political slogan, or a story of a construction of a social problem (Gaston 1996; McNeely 1998; Haila 1999). Consequently, the agenda, disguised or blatant, is that biodiversity conservation should assume top priority while development paths based on massive land conversions should receive less priority (Magome 2000).

The paradox is that, while improving and maintaining human life is the key motive behind most development efforts, achieving this requires biodiversity conservation. In practice, biodiversity conservation is a strategy of limitation of resource use against ongoing human population increases (Bell 1987; Swingland 1998). Failure to integrate biodiversity conservation with development is mostly associated with uncertainty over achieving biodiversity goals in the face of achieving development goals. In many contexts development goals assume that modernisation should be replicated globally (Swanson 1997, 1999). However, development is often framed within narrow views of what is the desired outcome of project design. Modernisation is often seen as a threat to both nature and 'traditional' lives of rural people, and it is driven by texts ranging from humanitarian tracts to national development plans (Adams & Hulme 2001a).

1.1.2. **Paradigm shift**

In his classic book *The structure of scientific revolutions*, Thomas Kuhn (1962) noted that as understanding in a field is advanced, a point is reached where existing theory is inadequate to explain reality, and this calls for a paradigm shift. A paradigm is the worldview shared by a discipline (Kuhn 1972). However, a discipline is not a logical construct. Instead, it is a social crystallization that occurs when a group of people agree that association and discourse serve their interests (Soulé 1986). Therefore, a paradigm is a set of theories that underpin a discipline (Pickett *et al.* 1992); underlie the approach taken to a discipline, its basic assumptions; and, guide the practitioners of that discipline (Meffe & Carroll 1994; Bennett 1999).

Similarly, when presented as a theory of doom, biodiversity loss failed to garner the public support required to reduce its loss, and this precipitated a shift to alternative theories/narratives such as 'environmental economics', 'ecotourism' and 'participation by local people'. As opposed to the theory of doom, the attraction of the new theories or narratives is their positive image rather than their accuracy. These narratives are derivatives because they rely heavily for most of their approach, content, and objective on the primary narrative of biodiversity loss. Nevertheless, secondary derivatives are often understood pejoratively as inferior and, therefore, not fully original. However, these secondary narratives are as durable as the primary narrative they serve.

1.2. **Evolution of the protected area paradigm**

The history of establishing PAs is well documented (Nash 1972; Runte 1979; Scherer & Attig 1983; Dixon & Sherman 1990; Beinart & Coates 1995). Briefly, protecting pieces of land for exclusive recreational and or cultural use by certain sectors of our society is as old as civilisation itself. Reserves for hunting were put aside for Assyrian noblemen as far back as 700 B.C., and for the ruling class in ancient Rome and also in Medieval Europe. In contrast, the practice of setting aside natural areas for the public good in order to protect resources they contain took off in the 20th century. Today, PAs have become a major environmental movement that continues to redefine itself.

PAs are predominantly natural areas that are established, and managed through legal and other effective means for conserving biodiversity and cultural resources (see IUCN 1994). This broad definition is sufficient to cover a spectrum of categories from strict preservation, solely for nature conservation, to various combinations of multiple use areas (IUCN 1994; O'Connell 1996). The importance of PAs in conserving biodiversity cannot be over-emphasised. However, that they represent the single most important method of conserving biodiversity (Wells 1992) is greatly exaggerating the facts. Many of the existing PAs were originally established for aesthetic, political and socio-economic reasons, and thus received little or no scientific input in their design (Leader-Williams *et al.* 1990; Pressey 1994). Some of the world's biologically rich areas are either still unprotected or inadequately protected, and the level of protection for existing PAs varies widely from site to site (Rodrigues *et al.* 2003) while many threatened species remain outside PAs (Rodrigues *et al.* 2004).

It is an accepted narrative that the first national park (NP) to have been declared is Yellowstone (1872), although Yosemite NP (1864) was the first to be established. The difference between Yosemite and Yellowstone could have been that the former was first established as a 'Park' for the state of California, while the latter was, from the onset, established as a NP because at the time no state existed in the Yellowstone region (Jeffrey 1999). These two NPs were set aside for their exceeding scenic beauty and not for their biodiversity value. They therefore epitomised monumentalism as opposed to environmentalism, and were proclaimed to prevent private exploitation and to keep them for public recreation (Runte 1979). In fact, the US government wanted to avoid mistakes that led to uncontrolled development of the Niagara Falls, of which its scenic beauty had been destroyed, subjecting the government to severe criticism (Huth 1972; Runte 1979; Coates 1992).

Closer inspection of the US NP legislation unravels the evolution of the so-called NP concept. With Yosemite, the NP legislation (1864) stated that: the park premises shall be held for public use, resort and recreation; and, shall be inalienable for all time, but leases not exceeding ten years may be granted for portions of its premises. However, with Yellowstone, the US NP legislation (1872) became stricter than Yosemite stating

that, with underlines for emphasis:

> *The park is reserved and withdrawn from settlement, occupancy, or sale under the laws of the United States, and dedicated and set apart as a public park or pleasuring-ground for the benefit of the people and all persons who shall locate and settle upon or occupy the same, or any part thereof, except hereinafter provided, shall be considered trespassers and removed therefrom.*

The exclusion of people from Yellowstone could be the reason why it is often referred to as the first NP. However, Yellowstone was established in an area formerly occupied by, and already emptied of, Shoshone, Crow and Blackfoot Indians (Kemf 1993). The key element of the new NP was that no people, except for park staff, were allowed to live permanently inside, and this led to the removal of the few remaining indigenous people. The US model of an ideal NP allowing no human settlement grew steadily, and there are now many NPs globally that are modelled after Yellowstone, mostly within IUCN's Category II (see Table 1.1). In contrast to the US, formal conservation efforts by colonists in Africa began at the turn of the 20th century in response to declining large mammals due to 'big game hunting' and these efforts increased after World War II (Cumming 1993). In colonised countries, some threatened animals were declared 'royal game' or 'protected species' that could not be easily killed and certain lands were proclaimed as game reserves (McCracken 1987; Owen-Smith 1993). As momentum to create more game reserves increased, the residence of Africans in these areas, except for employees, was regarded as incompatible with nature conservation.

The NP idea as we know it today did not emerge in its finished form; it evolved over time (Runte 1979). Thus, as the perceptions of people about the environment changed, gradually NPs became important for other purposes other than recreation, including scientific research, wilderness preservation and also biodiversity conservation. After World War II, NPs became national icons. When the IUCN (formerly the International Union for the Conservation Nature, now the World Conservation Union) was created in 1948, it came to be regarded as the world authority on nature conservation. As a result, many countries adopted the IUCN's 1974 definition of a NP, which is:

A relatively large area that is not materially altered by human exploitation and occupation, and where the highest competent authority of the country has taken steps to enforce aesthetic features which have led to its establishment, and where visitors are allowed to enter, under special conditions, for inspirational, cultural and recreational purposes.

To accommodate different forms of nature protection, NPs form part of a broad array of PA categories, ranging from strictly protected NPs to watersheds, forests and other recreational multiple use areas (IUCN 1994, Appendix 2). To ensure common goals, three management goals are central to the creation of PAs (IUCN 1980). The first is to maintain essential ecological processes and life-support systems such as soil, water, and the atmosphere. The second is to maintain representative biotic communities and genetic diversity. The third is to ensure sustainable use of species and ecosystems. As a result, these three goals are efforts to maintain human livelihoods. However, in many developing countries, PAs have been created on the model that was first pioneered at Yellowstone, leading to a strong protectionism that started to guide the management actions and strategies of PAs (Pimbert & Pretty 1995). As a result, a strong perception that people are incompatible with unregulated use nature begun to symbolise and to inform the creation of many PAs.

The world's network of PAs is growing fast, indicating that there is worldwide support for protecting pieces of land (Table 1.1). For example, coverage for PAs has increased from 30,000 (Davey 1998), extending over 13.3 million km^2 or about 10% of the earth's land surface (WCMC 2000, UNEP 2000), to 102,000 covering 18.8 million km^2 or 12%, which represents an area slightly larger than China and India combined (IUCN 2003). While some 1,500 delegates attended the 1992 WPC in Caracas, Venezuela, 3,000 attended the 2003 WPC in Durban. The 'achievement' of 12% was welcomed with euphoria, and when Madagascar announced that it has decided to increase its PA coverage to 10%, the jubilation boarded on religious absurdity — akin to welcoming a new convert! However, increasing benefits beyond the boundaries of PAs to local people remains a daunting task because there are still multiple obstacles and challenges to overcome (Hutton & Leader-Williams 2003; Magome 2003a).

Table 1.1. Global number and extent of Protected Areas (PAs).

Category	Number of sites	% of all PAs	Area covered in km^2	Proportion of total area covered %
1a	4,731	4.6	1,033,888	5.5
1b	1,302	1.3	1,015,512	5.4
II	3,881	3.8	4,413,142	23.6
III	19,833	19.4	275,432	1.5
IV	27,641	27.1	3,022,515	16.1
V	6,555	6.4	1,056,880	5.6
VI	4,123	4.0	4,377,091	23.3
Uncategorised	34,036	33.4	3,569,820	19.0
Total	**102,102**	**100%**	**18,763,407**	**19.0**

Source: IUCN (2003).

1.3. **Obstacles to biodiversity conservation**

Biodiversity conservation is largely based on the principles of ecology, sociology and economics, which are each exceedingly complex and often poorly understood by the general public (Bell 1984a-b). Furthermore, ecology, sociology and economics have, for a long time, operated as distinct disciplines. It is now accepted that our understanding of nature is informed by science and society (Adams 1996). Thus, integrating ecology, sociology and economics into a single coherent discipline, is long overdue. However, reversing biodiversity loss requires changing patterns of human activity or moderating its impact on the environment (O'Connell 1996). Biodiversity conservation is not about trying to stop human impact on the environment, but is about negotiating impact, and this requires compromise or consensus (Adams 1996).

The challenge facing policy makers is how to change or influence patterns of human behaviour that impact negatively on the environment. However, this is a daunting task as human behaviour is often characterised by complexity and resistance to change. To highlight this challenge, I will now unpack three key dilemmas facing biodiversity conservation, as most efforts to conserve biodiversity are affected by combinations of these managerial dilemmas.

1.3.1. **Ecological dilemmas**

Human activities are at the core of ecological dilemmas facing PAs and, ultimately, biodiversity conservation. Humans are, and will continue to be, a part of both natural and degraded ecological systems, and their presence must be included in biodiversity conservation planning (Meffe & Carroll 1994). Biodiversity conservation efforts that attempt to exclude the human influence on ecosystems will ultimately fail to achieve desired outcomes. By analysing constraints on PAs, and by understanding ecosystem functioning, we can start to focus on priority areas. Indeed, many PAs are constrained by ecological dilemmas (Cumming 1993) because many species and habitats are not represented in the current network of PAs (Rodrigues *et al.* 2003, 2004). Incomplete ecosystems are a feature of many PAs. In fact, many PAs are too small to maintain unmanaged populations of many large mammals (Owen-Smith 1983), raising concerns of effective population sizes because fragmentation tends to reduce genetic diversity.

In practice, PAs tend to be established in places that are not affected by threats to biodiversity loss (Leader-Williams *et al.* 1990; Pressey 1994). Effective biodiversity conservation efforts will require that priority for the protection of individual areas is based both on the contribution the area can make to representing overall biodiversity, and on the degree to which the area, in the absence of action, is vulnerable to loss of its biodiversity (Noss 1990; Faith & Walker 1996). This is important, given the fact that PAs are often small and widely scattered, and will not avoid future ecological haemorrhage when overtaken by a sea of humanity. While ecological criteria for effective biodiversity protection are well documented (Shafer 1990; Meffe & Carroll 1994; Pimm & Lawton 1998), cultural, political and economic factors often determine where PAs will finally be located (Soulé & Simberloff 1994; Soulé & Sanjayan 1998).

Ecological design dilemmas are, all over the world, central to reaching biodiversity conservation objectives. This difficulty led Ehrlich (1988) to conclude that the tactical success of the conservation movement can be appropriately evaluated against a backdrop of total and continuing disaster. Indeed, the knowledge of ecologists on many questions relating to effective biodiversity conservation is insufficient and in

some situations even lacking (Pimm & Gittleman 1992; Wilson 1992). Although there is concern about possible negative effects of human activities on biodiversity, there is often little quantitative evidence of postulated negative consequences of development (Solbrig *et al.* 1994). Therefore, there will be a time lag as data are analysed and before scientists know how ecological ecosystems function when their components are eliminated, whether as rivets popping from an aeroplane (Ehrlich 1988) or one by one (Roughgarden 1995). In the meantime, ecologists may have to act with incomplete data, while learning appropriate techniques along the way using adaptive management models. These data gaps make the process of policy-making, and of changing human activity even, more difficult. Correspondingly, placing emphasis on extensive studies in order to conserve biodiversity is equally risky.

Ecosystems themselves often fail to signal the long-term consequences of losing their resilience, continuing to function in the short-term as resilience declines (Holling *et al.* 1998). While ecologists contend that reliable knowledge is the only basis for sound decision-making, most admit that they have inadequate data about natural life cycles, relationships between ecosystem components, and the impact of various management regimes on biodiversity (McNeely 1996; Holling *et al.* 1998). Indeed, as summarised by Holling & Gunderson (2002:27):

> *Ecosystems are moving targets, with multiple features that are uncertain and unpredictable. Therefore, management has to be flexible, adaptive, and experimental at scales compatible with the scales of critical ecosystem functions.*

In terms of global perspective, the IUCN does not specify how much biodiversity should be protected or how many PAs are required to achieve the desired levels apart from the now surpassed, historic 10% target of each country's surface area. Most countries assume that the more PAs they have the better, and this results in selective application of the IUCN criteria (Bell 1987). In practice, the global protection of biodiversity will depend on balancing ideal and real options (Leader-Williams *et al.* 1990). Consequently, the ideal recommended percentage coverage of each country's surface area may become *de facto* ceilings of protection, implying these figures will prevent extinction (Soulé & Sanjayan 1998).

In theory, large PAs make ecological sense by reducing extinction risks but, in practice, developing countries lack resources to protect valuable species from illegal exploitation (Leader-Williams & Albon 1988). Unless PAs occupy nearly the entire globe, there is little chance that they will adequately protect global biodiversity. There is, therefore, a worldwide crisis in biodiversity conservation (Holling *et al.* 1998). As a result, the world's species continue to face unprecedented levels of extinction caused by human fragmentation of ecosystems and habitat destruction. Currently, the number of species threatened with extinction (Hilton-Taylor 2000) far outstrips the financial resources available for conservation (Balmford et al. 2002), and this places a huge premium on identifying areas with the highest concentrations of endemic species.

Prioritising those ecosystems with high need and large potential payoff from resources to safeguard their integrity can allow scientists to engage in systematic responses to large-scale extinctions (Myers *et al.* 2000). In practice, ecologists lose a sense of the big picture in their effort to understand parts of the system. However, 'biodiversity hotspots' should not 'trap' scientists into neglecting areas that are already protected by assuming that they are less important. Hence, Gunderson & Holling (2002) argue that an integrative theory must be developed so that we can understand the changes occurring globally. They point out that such changes are economic, ecological, social, and evolutionary. Correspondingly, the management of ecosystems must be dynamic, flexible, and adaptive to deal with such complex and interacting systems.

1.3.2. **Social and political dilemmas**

The social and political dilemmas facing biodiversity loss were long recognised by Aldo Leopold (1949) when he stated that, despite nearly a century of propaganda, conservation efforts slip two steps backward for each forward stride, with progress consisting largely of letterhead pieties and convention oratory. These dilemmas arise because the two pillars of biodiversity conservation—altruism and posterity—are human-devised puzzles that do not fit with reality (Hardin 1977). Where biodiversity conservation is concerned, there is a discrepancy bordering on the absurd because words rarely match deeds (Martin 1984a).

Biodiversity conservation has serious implications for how people use land, a highly limited and finite resource, attracting potentially large opportunity costs (Swanson 1994). Furthermore, the increasing human population, with its consequent need for more land, makes conflict inevitable. Biodiversity conservation is a long-term strategy that conflicts with short-term human interests, a clash of bio-economic theory. In practice, any programme that emphasises long-term communal benefits at the expense of short-term individual benefits usually faces resistance (Bell 1984a; 1987; Mentis 1989). Biodiversity conservation holds the appeal of altruism[1], that individuals must constrain their actions, to their own immediate detriment, for their later benefits, or for the benefits of posterity (Bell 1987; Mentis 1989; Pearce *et al.* 1990). However, many contemporary values, attitudes, and institutions militate against altruism (Caldwell 1990; Miller 1992). In fact, the greatest honour is often accorded to demagogues who derive their power by appealing to the selfish interests of individuals (Hardin 1993).

Human beings are, by nature, selfish and tend to have a high propensity for material consumption. However, this consumption is biased to developed countries, where one individual is estimated to consume an equivalent of 40 individuals in less developed countries (IUCN 1980). It is generally accepted that 20% of the world's population consumes 80% of the world's resources and yet there is no sign of this imbalance being redressed (Barkham 1996; Daily & Ehrlich 1996). Ironically, the human desire for profit and for material consumption is stronger than the biodiversity conservation-oriented philosophy of restrained use (Mentis 1989; Leader-Williams *et al.*1990; Brubaker 1995; Barkham 1996; McNeely 1996). Indeed, the acquisition of material resources is given the utmost prominence in capitalist human societies. Accordingly, the pressure to acquire more and more material resources has never been greater, and marketing to achieve this has never been more powerful (Barkham 1996). Sadly, only a few people are making substantial profits from overexploiting biological resources, and those with the highest political profile seem to generate the largest profits than those without (Brubaker 1995; McNeely 1996). Consequently, the call to alter human patterns of consumption is seldom heeded because of selfish greed.

[1]Altruism is not universally practiced and spontaneous conservation demands from the individual altruism against which his Darwinian heritage rebels.

The loss of biodiversity has not yet had immediately observable negative impact on lifestyles, especially of those people living in cities far removed from biological resources that support their consumption. In fact, many people argue that advocating for biodiversity conservation need not involve them making immediate changes to their own personal lifestyles (Brennan 1996). If indeed hundreds of species are lost daily, then people are already living with the consequences of extinction without any discernible effect on their daily lives (McNeely 1996). Only a small fraction of the world community is aware of the importance of biodiversity and most people do not realise that the functioning of local ecosystems contribute to the overall biosphere functioning (Alders 1994; McNeely 1996). Therefore, when conservationists argue that efforts to conserve endangered species deserve especially high priority, they often have difficulty linking their argument to development issues that are of interest to politicians (McNeely 1996; Kamppinen & Walls *et al.*1999).

Population and economic development pressures virtually ensure that natural areas will be exploited at ever increasing rates (Alders 1994). Most governments, driven by the need to create jobs or some undefined public good, are often the least responsible stewards of biodiversity resources. Governments of all political persuasions have licensed and bankrolled polluters, turned forests into wastelands, emptied oceans of fish, and dammed rivers that were once magnificent (Brubaker 1995). In fact, the amount of money spent by many governments on perverse subsidies that ultimately lead to environmentally destructive activities amount to US$2 trillion, and this trend is still continuing (Myers & Kent 2001).

As governments are pressured to please their citizens, policy-making on biodiversity renders scientific knowledge open to re-interpretation and selective use for political purposes (Holland 1996). Equally, citizens want politicians to deliver benefits and not constraints (McNeely 1996). Indeed, when it comes to policy-making for biodiversity, various policy actors use scientific facts in differing ways (Holland 1996; Peuhkuri & Jokinen 1999; Kamppinen & Walls 1999). Thus, keeping biodiversity conservation on the public agenda is not easy, since incentives to use far exceed incentives to conserve, again a clash of interests.

Most developing countries of the South are financially indebted to the developed countries of the North. The average African country has an external debt greater than 100% of its GNP (Gross National Product), inevitably leading to unsustainable use of many biodiversity resources for both direct consumption and for generating cash (Barkham 1996). In addition to servicing debts, most African countries give priority to their urban populace. Thus, development efforts are concentrated on infrastructure and on highly visible projects that yield quick results and which, therefore, win them immediate support from urban taxpayers (Areola 1987). In this context, biodiversity conservation measures, other than establishing PAs for the supposed common good, lack immediate political appeal or utility.

1.3.3. **Funding dilemmas**

Inadequate funding for PAs is well documented (see Bell 1984a; Leader-Williams & Albon 1988; WRI 1989; Leader-Williams *et al.*1990; Cumming 1993; McNeely 1996; Jachmann & Billiouw 1997; Phillips 1998; James *et al.*1999; Balmford *et al.* 2002). In fact, many PAs exist on paper rather than on the ground, and most face threats of poaching, encroachment and over-exploitation. In sub-Saharan Africa, the financial situation is particularly bad. Insufficient funds are often channelled into biodiversity conservation and, where sufficient funds are provided, they always tend to be spent ineffectively. Contrast this with US agencies that spent $37.5 million in 1987 on biodiversity research, and increased it to US$63 million in 1989 while Africa and Asia together received less than US17 million (Abramovitz 1991). This is because many developing countries expect PAs to pay their own way, but this is often difficult to achieve (McNeely 1994). Furthermore, taxpayers regard PAs as public resources and are generally reluctant to pay high user fees (Boo 1990; Leclerc 1994).

The scope of unmet funding for biodiversity conservation is often difficult to estimate or to predict. In 1989, it was estimated that as much as US$20-50 billion would be required to fund PAs globally for the period 1990-2000 (WRI 1989). Sadly, most of this funding has not been realised (Balmford *et al.* 2002). Instead, parochialism or idiosyncratic protection characterises the attitudes of most agencies where relatively

large sums of money are allocated to species that are locally rare, while in poorer nations species threatened with global extinction receive far less funding (Hunter & Hutchinson 1994; McNeely 1998; Stuart 1999). In fact, while many NGOs generate substantial funding from developed countries, ostensibly to assist species conservation efforts of developing countries, most of the funding covers their running costs.

The full benefits of PAs are unquantifiable and are seldom recognised, making their benefits less apparent to policy-makers. Many of the benefits of PAs are not recorded, and hence the distribution of their benefits is insufficiently addressed (McNeely 1994; Constanza & Folke 1997). Funding for PAs in many developing countries has fallen sharply (Davey 1998), resulting in shortages of staff, vehicle, fuel, and other basic expenses (James *et al.*1999; Wilkie *et al.* 2001), risking both biodiversity and benefits that PAs provide to local and global communities (Balmford *et al.* 2002). Although it is estimated that about US$1.1 billion per year is required to cover basic expenses for all PAs in developing countries and countries with economies in transition (Balmford *et al.* 2002), and that US$12-13 billion per year will be required over the next decade to manage and expand PAs (Bruner *et al.* 2003), so far neither sum is being realised.

1.4. **Challenges to biodiversity conservation**

The theme of *People and Parks* chosen by the 4th WPC in Caracas in 1992 was dominated by two questions. Firstly, how can PAs contribute sustainably to economic welfare, without detracting from their natural values? Secondly, how can local people adjacent to PAs be provided with benefits so that they become supporters of PAs? Recognising that, as part of their economic development, PAs can provide multiple benefits to society, the 5th WPC held in Durban 2003, re-affirmed this with its theme of *Benefits Beyond Boundaries.* In this section, I use the narratives of sustainable use, economics, ecotourism, and community participation to show why they are often used as solutions to conservation and development problems. The reason is because narratives help policy-makers and practitioners to confidently fill the gap between ignorance and expediency (Fairhead & Leach 1997). Are these narratives still valid, or is it time for counter-narratives?

1.4.1. **Sustainable use and economics**

Humanity lives on a finite planet with limited resources, and this alone imposes limits on how natural resources can be used. As a result, sustainability of human activities is a major concern because natural resources are decreasing, while the human population is showing an opposite trend. Concern with sustainability is justified, and narratives of biodiversity conservation are attempts to achieve sustainability of resource use. In this context, I only highlight challenges facing the sustainable use narrative because details are implied in this chapter.

When *Caring for the Earth* was published in 1991 as a global strategy for sustainable living, Robinson (1993) raised two contentions: 1) that a sustainable society as defined in *Caring for the Earth* is an unattainable utopia because its stated goals and principles are incompatible with one another; and 2) that the goals of both sustainable use and development, as defined in *Caring for the Earth*, will lead inevitably lead to the loss of biodiversity. Part of the problem is that the sustainability is all things to all people (Mearns 1993). While these contentions are logical, they are considered unhelpful to achieving the goals of either sustainable use or of maintaining biodiversity (Holdgate & Munro 1993). Sustainability is not properly monitored (Rasker & Freese 1995), and overuse threatens indigenous species (Hilton-Taylor 2000). Sustainable use is usually underpinned by different theoretical and practical views (Leader-Williams 2002), and its implementation is a highly contested (Magome & Fabricius 2004).

Sustainable development is now a focal concept of development theory and practices (Moyo *et al.* 1993), and has become a prominent discourse in development language (Adams 2002). Since sustainable development has different things to different actors, it has become a collision of incompatible concepts. Indeed, sustainable development has become an oxymoron, representing a reality that has never existed and is beyond our capacity to create (Sinclair-Brown 2003). Using biodiversity is an imperative for humanity (Hutton & Leader-Williams 2003). Thus, regulating use requires incentive-driven conservation approach ('t Sas-Rolfes 1995; Murphree 2003; Hutton & Leader-Williams 2003). Inevitably, incentive driven conservation is about economics.

Economists view the earth as a storehouse of raw material resources (Caldwell 1990), with people as rational economic creatures, *Homo economicus*. Empirical evidence shows that the economic benefits of most PAs are limited at a local scale, increase somewhat at national level, but become substantial at a global scale, while their costs move in the opposite direction (Wells 1992; Moran 1994; Brown 1998). It follows that developed countries fill their consumption at the expense of developing countries, leading to greatly mismatched costs and benefits. However, the process of evaluating the contribution of biodiversity to human welfare is a complex task that also involves values, ethics and politics. Indeed, costs and benefits, including differences between commodity and moral value, are complex issues (Munasinghe & McNeely 1994).

It is questionable how complex resources such as biodiversity can be captured by cost-benefit analysis (Pearce 1993; Roughgarden 1995; Brennan 1996). As a result, it is necessary to contrast what is financially beneficial to private individuals and to society as a whole, and the latter judgement is a political decision. Thus, not all policy issues are purely economic, and certainly not all questions of value are economic (Brennan 1996). Many decisions take place within the realm of environmental ethics, which by its very nature consists of competing sets of theories about whether human actions and attitudes to nature are morally right or wrong (Comstock 1996). When ethical values are too conflicting, compromises are difficult to reach.

CO_2 emissions provide an excellent example that suggests that developing countries act as global pollution sinks. In 1993, the US and Europe contributed 32% and 44%, respectively, to global atmospheric pollution while Africa contributed only 2%. In fact, most of the economic development of the North has been partly achieved at the expense of unconsidered environmental costs. While economists maintain that funding for biodiversity should be based on the principle that "those who benefit from biological resources should pay more for the costs of insuring that such resources are used sustainably" (Abramovitz 1991:30), reality shows otherwise. It is unrealistic and disingenuous to imagine that countries that have not been the beneficiaries of this growth will readily accept curtailment of their own prospects of development by a similar route without substantial support (Barkham 1996).

Based on CO_2 emissions, developed countries have already used up the ability of the atmosphere to absorb CO_2, thereby foreclosing all future industrial options for the developing countries (Daily 1997). For example, the US is the leading source of fossil fuel emissions (Harvey 2000). Unlike developing countries, developed countries can easily switch to other energy-efficient means of production, and can even benefit from the change by realising more jobs, thus becoming the beneficiary of improved energy measures (Renner 2000). However, fossils fuels are abundant and will likely dominate energy markets through the 21st century (Taylor & Van Doren 2000). In fact, controls over fossil fuels are the main causes of war in the Middle East.

Considered as a single product, biodiversity cannot be sold because consumers only wish to buy some of its components. To put a cost on something that is not already traded is very difficult. Thus, biodiversity resources are consumed wastefully, and willingness to pay (WTP) techniques cannot accurately measure the importance that people attach to these resources. The major problem with these numbers is that their accuracy is more akin to that of World War II bombers than to that of precision-guided missiles (*The Economist*, 3 December 1994:106). If WTP was the basis for securing essential goods, there would be a total economic disaster because the manufacturing industries would fail to recoup even the bare minimum of production costs. In the case of high value biodiversity resources, WTP is further masked by perverse government subsidies and by conflicting pricing structures (Myers & Kent 2001).

The consequentialist basis of economics limits its general usefulness in contributing to informed biodiversity decisions. In fact, no description can totally capture the essence of biodiversity and no formula will demonstrate its true value (Holland 1996). Generic balance sheets showing the economic value of individual ecosystem services and the cost of replacing them are valuable, but they lack connection to the lives of real people (Wilcox & Harte 1997). The major limitation of economics is its inability to put real monetary value on all components of biodiversity. In 1855, Chief Seattle (in Benton & Short 2000:12) is said to have asked: "how can one buy or sell the air, the warmth of the land?" Despite these limitations, economics is often presented as a narrative that can best mitigate these skewed imbalances.

1.4.2. **Ecotourism**

Ecotourism is a complex phenomenon that cannot be easily defined (Goodwin 1996; Roe *et al.* 1997; Goodwin *et al.* 1998), but as a concept it is associated with nature tourism. The distinction between urban tourism, for example, the motivation to see the concrete jungles of London or New York, and nature tourism does exist in the decisions of most tourists. It is, however, difficult to make a clear distinction between urban and nature tourism because the tourist often combines both activities in a single trip. While many scholars and practitioners try to argue that there is some distinction between general tourism and ecotourism, they invariably use terms interchangeably with little implied difference between them.

The term 'ecotourism' was coined to describe prescriptive activities. Its narrative is that the primary purpose of a tourist is to interact with nature while also minimising negative impacts and benefiting local people. It suggests that the ecotourist visits relatively undeveloped areas in the spirit of appreciation and sensitivity by practising non-consumptive use of biodiversity resources while contributing to the visited area through labour or financial means in order to directly benefit the conservation area and the economic well-being of local residents (see Ziffer 1989). In reality, this altruistic and benevolent tourist does not exist. For instance, a study of 23 PAs with projects designed to generate local economic development found that, while many projects promoted ecotourism, few generated substantial benefits for either PAs or local people (Wells & Brandon 1992). Thus, promoting ecotourism on the pretext that it benefits nature and local people is disingenuous (King & Stewart 1996).

The ecotourism industry focuses on flowing money to service providers, and has since become a fiercely competitive business. Planners of the ecotourism industry are now forced to recognise the importance of earning money. Despite the strength of the tourist demand and the constant desire for new and exotic experiences, individual destinations must compete as never before for the fickle, often seasonal interest of tourists (Richter 1992; Ceballos-Lascurain 1996; Honey 1999). Thus, without binding guidelines for the industry it is difficult for local people to benefit from ecotourism.

So far, developed countries capture most of the benefits that are associated with the ecotourism industry. A particular concern is the high leakage in the industry, and in some cases, leakage is as high as 90% (Koch 1997; Gossling 1999). The major cause of high leakage is that, at the national level, the potential for the ecotourism industry in developing countries is often crippled by lack of infrastructure (Goodwin *et al.* 1998). Hence, the control of the industry lies in the hands of foreign companies. The industry is a multi-layered maze that is dominated by international corporations that are also becoming increasingly consolidated (Honey 1999). The fact is that developing countries cannot easily control what they do not own, nor can they own what they do not control. For instance, most of the high income generating industries such as hotels, car rentals and airlines, are owned and operated by multinational companies. The destination region relies upon these companies to sell their products.

Ecotourism has been hailed as a panacea for funding biodiversity conservation, but a closer look shows a much more complex reality than the rhetoric. Worldwide, most PAs face destructive activities of tourists, suggesting that the economic benefits of ecotourism are inflated, while its ecological costs are either ignored or minimised (Alderman 1994). Some of the negative impacts of ecotourism include: overcrowding leading to environmental stress; animals showing changes in behaviour; erosion of trails or beaches; increased pollution such as noise and litter, and; over-development with unsightly structures (Roe *et al.* 1997). Ecotourism is usually lined with pitfalls and it is not a panacea.

Ecotourism also contributes to biodiversity loss through infrastructure development. In many coastal areas, a golf course, a marina and a sandy beach are regarded as having greater value than mangroves and wetlands (Hall 2000). Unavoidably, ecotourism is a choice between the good of money brought in by the tourist, and the bad of undesired negative environmental and social consequences. Despite the plethora of discussions about sustainability in ecotourism, we often seem no closer to finding solutions to the problems that are associated with its development. For every ecotourism success, there are failures, or recognition of its negative impact on biodiversity (Hall 2000), as well as undemonstrated positive attitudes to conservation (Walpole & Goodwin 2001).

1.4.3. **Local people**

Describing beneficiaries at biodiversity conservation sites is controversial, especially when distinctions between indigenous and local people are assumed. Although rural people like the San live primitive lifestyles in inhospitable areas and seem to resist modern development, the term 'indigenous peoples' is not universally accepted and is also problematic (see Burger 1987; Thornberry 1991; Wilmer 1993; Furze *et al.* 1996; Colchester 1997; IUCN 1997). I therefore use the term 'local people' to describe rural people who depend on biodiversity resources to sustain their daily lives. While biodiversity conservation requires local solutions (Martin 2000), a critical problem in relation to local people is the definition of 'localness' (Adams & Hulme 2001).

Involving local people in conservation uses many acronyms. Recent reviews focused on four key: 1) ICDPs, integrated conservation and development projects (Wells & Brandon 1992); 2) CBC, community-based conservation (Western & Wright 1994); 3) CC, community conservation (Hulme & Murphree 1999, 2001), and; 4) community-based natural resource management, CBNRM (Magome & Fabricius 2004). Involving local people in conservation projects has become a popular alternative to exclusionary practices of the past (Hackel 1999; Kellert *et al.* 2000). Attempts to link biodiversity conservation to rural development are collectively discussed as conservation and development initiatives (CDIs) because they advance a discourse that conservation and development can be initiated to mutual advantage (Magome 2000).

CDIs offer the lure of 'win-win' solutions to the human-wildlife conflict (Infield & Adams 1999; Adams & Hulme 2001a) and are usually used as a 'tactic' to convince local people about the value of conserving wildlife (Fabricius *et al.* 2001a). In extreme cases, local people are expected to tolerate their conflict with harmful wildlife. These crypto-conservation strategies partly explain why those advancing the discourse on CDIs often rush to judge projects on the ground, and, invariably, conclude that results are 'mixed' or that the approach 'does not work' (Adams and Hulme 2001b). In practice, any debate about whether CDIs work or not, depends on a frame of reference or the context under which projects are taking place (Table 1.2).

Table 1.2. Conditions for effective conservation and development initiatives (CDIs).

Context	Projects likely to achieve both development and conservation objectives	Projects unlikely to achieve both developmental and conservation objectives
Wildlife resource harvest	Yields sustainable revenue.	Does not yield sustainable revenue flow
Sustainability of market for wildlife resource	Sustainable	Not sustainable
Adequacy of wildlife resource	Large enough to secure local support for conservation action	Not large enough to secure local support for conservation action
Range of biodiversity on which economic benefits depend	High	Low
Loss of rights by local people	Outweighed by economic benefits and/or other incentives	Not outweighed by economic benefits or other incentives
Donor investment	Long-term	Short-term
Influence of CDI rhetoric on conservation agency	Ideology and practices of conservation agency change	Ideology and practices of conservation agency do not change
Extent to which expectations are met	Project delivers benefits as planned	Project promises are not delivered
Extent to which conservation agency shares power with local people	Genuine power sharing (in terms of tenure security in resource access and/or revenues and decision making)	Token power sharing
Non-monetary values of nature	Shared by local people	Not shared by local people

Source: Adapted from Adams & Hulme (2001b)

CDIs are dynamic, varying greatly over time and space dimensions. They are also highly influenced by unexpected events such as socio-economic situations and local politics. Hence, evaluations of projects done in 'snapshot' fashion invariably lead to wrong conclusions. As concluded by Fabricius *et al.* (2001a:iv) CDIs are:

> *Characterised by widely diverging goals and contexts, in terms of their actions, their reasons for establishment, control of access, level of community participation, type of land and resource tenure, level of community cohesion and distinctiveness, extent of donor support, and their revenue-generating potential. It is extremely dangerous to extrapolate from one initiative to another. Different role players have different end goals, and measure success differently. Government officials, communities and private investors have different perceptions about scarcity of natural resources, and of human impacts on biodiversity. This lies at the root of many of the conflicts observed.*

CDIs are based on the false premise that local people have a greater self interest in sustainable use of biodiversity resources than does the state (Brosius *et al.* 1998), and are, as a result, active supporters of conservation efforts (Hackel 1999). The narrative of CDIs is powerful and convincing. Yet promise and rhetoric represent one reality, while implementation and delivery represent quite another (Kellert *et al.* 2000; Hulme & Murphree 2001). Conceptual dilemmas are the bane of CDIs because the model on which most of them is based is seriously flawed, for three main reasons.

The first flaw is the dogged belief based on a false assumption that a 'community' of homogenous people, all with common interests and purpose, exists and is the best mechanism for implementing CDIs. In fact, the concept of 'community' is a mirage (Andersen 1995). However, it is difficult to dispel of the community narrative because it evolved to deal with uncertainty and complexity (Roe 1991, 1995) and, by repeating it over and over again, it has become part of received wisdom (Leach & Mearns 1996; Leach *et* al. 1999). The community narrative is used to describe people living in the same geographic area, but having little else in common (Fabricius *et al.* 2001a-c). The term 'community' persists because it derives power from its vagueness. Since CDIs are more complex than the simple shift of responsibility from the state to local people (Wells & Brandon 1992; Western & Wright 1994; Hulme & Murphree 1999; Hulme & Murphree 2001; Adams & Hulme 2001a), the term 'community' fills the gap.

The second flaw is a belief that the time prior to modernisation was compatible with nature and that it should be recreated (Spinage 1998; Leach *et al.* 1999; Kellert *et al.* 2000). Central to this belief is an attempt to re-engineer the historical past, wherein human beings supposedly lived in harmony with nature. CDIs are a revisionism that attempts to revive historical traditions and cultures for managing the environment (Agrawal & Gibson 2001). There is no turning back to such idealised 'harmony'. For if we turn back, we must go the whole way and return to the beasts (Popper 1966), but this is unlikely for we are always 'in search of a better world' (Popper 1994a). In CDIs, 'turning back' can take different modes of delivery (Agrawal & Gibson 1997; Hulme & Murphree 1999), and in some cases they idealise ecological consciousness where the "noble savage has become the ecological hero" (Benton & Short 2000:1).

In practice, there is no evidence of communities managing biodiversity resources or living in harmony with nature. In stark contrast, Agrawal & Gibson (2001:3) stated that:

> *Images of pristine ecosystems and innocent primitives yielded over time views of despoiling communities out of balance with nature, mostly due to the double-pronged intrusion of the state and the market.*

The third flaw is the naivety to overlook the broader political environment affecting CDIs. The mixed profile of success and failure in CDIs owes much of its ambiguity to strategic pragmatism in its implementation, because policy and practice have been placed before politics (Murphree 1995). The false assumption here was to expect post-colonial planners and politicians to support CDIs. This has encouraged the birth of CDIs into a political and legal environment, which if not hostile, is hardly a nurturing one (Murphree 1995). This has put an ironic twist on the conventional approach to planned change. In order to ensure that the objectives of biodiversity conservation are achieved, participation by local people in CDIs is often reduced to a point where they are just passive partners (Gibson 1999; Hulme & Murphree 1999). To put it bluntly, where biodiversity conservation is the core function, buying support from local people is usually dressed up with the rhetoric of development language such as 'participation' and 'economic empowerment' (Magome 2000).

The practical implementation of CDIs are like the proverbial "between the devil and the deep blue sea" (Magome 2001), for they require greater state capacities than did the fortress narrative (Adams & Hulme 2001a). In developing countries, the state often lacks the capacity to meaningfully engage local people in CDIs, and this situation is unlikely to change in the foreseeable future. Nevertheless, the once dominant narrative of fortress conservation no longer enjoys hegemony because it has progressively been challenged by the discourse that stresses the need not to exclude local people from biodiversity conservation (Adams & Hulme 2001a). CDIs are here to stay (Adams & Hulme 2001b) and lessons learnt from case studies may provide some ideas on how to avoid some pitfalls (Table 1.3). As shown in the table, the successes or otherwise of CDIs is influenced by several factors.

Table 1.3. Lessons learnt from CDIs.

Key Factor	*Condition for success*
Donors	• Funding is most useful in the early stages of initiatives, as seed funds. • Funds for training are most useful when local people have a sense of permanence and long-term guarantees of resource security. • The need for institution building needs to be carefully investigated before funds are invested in local institutions. • The role of government as administrator should not be underestimated. • There is a need for skilled facilitators, and donor funds can assist with this. • Sudden injections of funds can be misappropriated or lead to conflict.
Facilitators	• High-quality, light-touch facilitation is a key ingredient in the success of CDIs. • Government remains an important role player. • Local people training needs should be carefully determined before training programmes are designed and implemented. • Local people define and redefine themselves on an ongoing basis, and all consist of sub-units that have different needs and aspirations; to lump diverse groups together into single unit invariably leads to conflict. • All role players need to commit resources to the bargaining table.
Local people	• Local people need to increase their bargaining powers by laying claim to assets that they can put on the 'power table'. • There is no substitute for land ownership. • Appropriate facilitators play an important role and need to be recruited. • Fractures within local people should be anticipated when financial benefits become substantial, and strategies to deal with conflicts should be in place.
Conservationists	• Law enforcement is one of the cornerstones of common property resource management and cannot be neglected. • Participatory monitoring can be a useful tool to sensitise all role players to trends in natural resources. • CDIs are a slow and expensive process; to fast track it is to invite disaster. • As few promises as possible should be made. • Sustainable resource management should be adopted at the outset. • Skilled facilitators are valuable. • Alliances between government departments, local people, private sector, NGOs, and donors should be promoted. • Information should be provided to local people about the broader (national and international) scarcity or abundance of the resources at stake. • Clear CDIs policy directives should be given to officials, and other role players need to be informed about policies and policy changes.
Policy-makers	• Resource ownership is important, to give a sense of permanence to local people and to lower their discount rates. • Policies should harmonise CDIs and other role players. • Policies should be made accessible to all role players. • Agreements that prevent sustainable resources use should be avoided. • Local people should be allowed to define themselves, geographically or otherwise.

Source: Adapted from Fabricius *et al.* (2001b).

1.5. **Conclusion**

Biodiversity conservation is a beleaguered movement because the unprecedented loss of diversity still continues. Indeed, biodiversity conservation is still beset by problems at three scales, comprising ecological, socio-political, and financial. Since 1878 when Yellowstone NP was established with a strong protectionist mandate, these key dilemmas still persist. If anything, this situation has created more paper PAs, re-affirming that the fortress approach to managing PAs offers little hope for conserving biodiversity. Equally, PAs all over the world are still struggling to overcome the key challenges posed by narratives such as ecotourism, economics, and the participation of local people in biodiversity conservation. Despite various attempts to implement these narratives, we are no closer to curbing species and habitat loses than when the primary narrative of biodiversity loss was popularised.

A question can be asked as to who are 'the winners and losers' from these narratives, and whether counter narratives can be advanced (Swift 1996). However, pondering alternatives is outside the scope of this overview. For now, we have to contend with the fact that we there are gaps between theory and practice. State actors at all levels of scale prioritise economic growth and accord biodiversity conservation mechanisms such as CDIs second-order priorities in national context where they are implemented (Murphree 1997). Unavoidably, biodiversity conservation is about resolving conflicts at all levels of scale where it affects the interests of various actors.

Notwithstanding the dismal performance of secondary narratives, ostensibly derived to curb biodiversity loss, the global network of PAs continues to increase (IUCN 2003), suggesting that the primary narrative of biodiversity loss is still powerful enough to garner public support. We can conclude that in practice, the protectionist strategies of 'the state is best', or the new model that 'local society is best, or the market is best', have all proved invalid (Hulme & Murphree 1999:283). Consequently, scholars and practitioners are back to the drawing board, first to analyse what went wrong and why, and second to design new experiments because biodiversity conservation is a complex issue and, as a result, its solutions or narratives cannot be over-simplified.

As stated by Peuhkuri & Jokinen (1999:133-134):

> *The complicated nature of the biodiversity issue makes it possible to emphasise its different aspects. In other words, different interests tend to own the problem of biodiversity loss and define it in their own terms. There are divisions, for example, between actors recognising or denying the problem, between property owners and groups without property rights, between anthropocentric and ecocentric values, and between local and global spheres of action.*

The key challenge is to design adaptive management models that can work with the support of a broad range of key stakeholders or actors. While conservation biologists have diagnosed that biodiversity is declining at an unprecedented rate, the prescription to reduce human activities that alter the functioning of habitats and ecosystems cannot be administered for two fundamental reasons (Magome 2000):

> *First, the prescription tastes bitter to the client and is simply rejected. Second, despite the diagnosis of a worsening situation, the quality of life of the client does not deteriorate and, as a result, the prescription fails to make sense.*

The key challenge is how to influence the human psyche so that negative attitudes to conservation can be altered in to achieve global goals of biodiversity conservation as proposed at the 5th WPC. What have we learnt as a result of decades and decades of developing narratives and counter narratives, and why are models not working? A key lesson learnt is that 'throwing out the baby with the bath water' is unwise. It is now recognised that not all the elements of a narrative are wrong. Policy makers can, using an incrementalist approach, 'pick and mix' from these discourses to generate a range of practical policy choices (Adams & Hulme 2001). There are no universally accepted laws that govern the way people will behave, because human behaviour is the result of complex interactions between various actors, individuals, communities, national and international on the basis of shared and unshared values. Even while there is a general acceptance of models that advance sustainable living (Adams 2002), ultimately power differentials between various actors became the centre stage for conflict (Magome & Murombedzi 2003). Consequently, the effectiveness and relevance of models such as CDIs is being questioned.

In the context of involving local people, the complexity of problems is compounded because of disincentives. As summarised by Magome & Fabricius (2004:106):

- The contribution of CDIs to biodiversity conservation is highly questionable, and there is little evidence of local people investing resources (time, money, and effort) in biodiversity conservation;
- The direct benefits from formal biodiversity management are negligible in most instances, while the direct benefits from informal use are substantial;
- The relative contribution of biodiversity to local people's complement of their livelihood strategies is poorly understood, but can be relatively small in some instances, and;
- The cost of living with some components of biodiversity such as wildlife (in terms of both the opportunity costs to land and labour, and the direct costs of damage to property) is very high. The transaction costs, in terms of causing conflict and administering initiatives, are also high.

When it comes to biodiversity conservation, reality often falls short of the rhetoric of the narratives derived to reduce its loss. To reduce biodiversity loss, our theory and practice must be less prescriptive and must appreciate that effective biodiversity conservation requires effective institutions, the focus of the next chapter.

Chapter 2

Institutions and biodiversity conservation

2.1. Introduction

In this chapter, I outline institutions that are often regarded as effective tools for biodiversity conservation and how they affect various beneficiaries. Central to the notion of institutions, formal and informal, is the realisation that success or failure to conserve biodiversity is nested within the human-devised systems of incentives and disincentives. Thus, the proposition that biodiversity should be considered as a global common heritage or good has been rejected, because most of its components are situated under the jurisdiction of nation states (Ostrom 1990). While recognising that biodiversity conservation is a common concern of all humankind, an emphasis is now placed on the sovereign rights of nation states over their biological resources (Glowka *et al.* 1994). Hence, the *Convention on Biological Diversity* (CBD) focuses on national responsibilities over biodiversity resources and cooperation between nations.

The CBD was adopted on 22 May 1992, in Nairobi, and was signed by over 150 nations on 5 June 1992, in Rio de Janeiro, and entered in force on 29 December 1993 to provide a framework for contracting parties on biodiversity conservation. The CBD meets every 2 years and its provisions are legally binding. By the end of 2003, over 188 countries had ratified the CBD. As a global treaty, the CBD commits all of its contracting parties to achieve three objectives: 1) conserve biodiversity; 2) use its resources sustainably; and, 3) ensure fair and equitable mechanisms for sharing the benefits derived from the use of genetic resources. Generally, contracting parties support the first and second objectives of the CBD. However, the third objective continues to stir up debates and heated discussions (Louafi & Morin 2004). As a result, developing countries that hold most of the world's biodiversity-rich countries (Appendix 3) have formed a group of 'like-minded megadiverse countries' in order to promote their interests regarding biological diversity.

The CBD recommends institutions such as property rights and good governance as the way to enhance biodiversity conservation and to provide for fair equitable distribution of its resources (UNEP 1992). When it comes to accessing components of a powerful commodity such as biodiversity, equitability becomes a fuzzy concept. Torn between the demands of the global agenda and the prerogative of nation states, the CBD states that biodiversity is a global heritage, but accepts the sovereign rights of nation states over its use. The CBD requires contracting parties, often biodiversity-rich developing countries, to allow access to their genetic resources for use by other contracting parties, often developed countries, on mutually agreed terms (UNEP 1992). However, the provisions of the CBD, though legally binding, are broad aspirational goals that do not contain everything practitioners wished to see reflected (Holdgate 1992).

The objectives of the CBD are masked by those of the powerful WTO (World Trade Organisation), which promotes the privatisation of biodiversity resources, knowledge and technologies to the detriment of nation-states and their local people (Kennedy 1998). The initial and continuing opposition to the CBD by the United States (US) government was based on inadequate protection of patents and the rights of US firms engaged in international bio-prospecting. The sovereign rights enshrined in the CBD provoked the US delegation at Rio, heavily lobbied by biotechnology industries, to reject the treaty, and so far the US Senate has not ratified the CBD (Garner 1999). In spite of this, the resolutions of the CBD must be improved to provide a coherent framework for delivering incentives efficiently, and should be monitored in order to measure its effectiveness in producing the desired results (Vickerman 1999).

Legislation on biodiversity conservation legislation should seek to be comprehensive in its approach (Stuart 1999). Since Rio, the resultant six Conferences of the Parties (COP) to the CBD have focused on actioning the decisions of the CBD by putting in place measurable goals. Despite these efforts, the decisions from the sixth meeting of the conference of the parties (COP) to the CBD (CBD 2003) are imprecise, and this forced COP7 to set measurable goals, objectives, targets, and activities for contracting parties and the secretariat. However, applying institutional arrangements, such as the CBD to local people is still unclear.

2.2. **Institutions**

Institutions are human-devised constraints that define relationships among individuals and indicate who may do what to whom (Bromley 1989). Consequently, property right systems are institutional arrangements. Institutions are the norms and the rules of the game that influence human behaviour in relation to social interactions. Institutional arrangements establish relationships to resources by translating interests into claims, and claims into rights (Gibbs & Bromley 1989). Thus, institutions structure incentives in human exchange, whether political, social or economic, by defining organisations (North 1990). Hence, organisations, groups or individuals are actors whose behaviour is governed by institutional arrangements, which in turn define the space within which individuals, groups, and organisations exercise decision-making discretion.

Institutions and property rights are centred on the notion of entitlement, which is often defined as a legitimate command over endowments or bundles of commodities. As a result, entitlements enhance the capabilities of claimants to achieve their well-being by choosing what they can do with their endowments (Leach, *et al.* 1996). Consequently, institutions shape processes of endowment and entitlement to resources in question. In biodiversity conservation the way that we understand the role of institutions and institutional change in resource allocation is central to our analytical framework. Thus, the distinction between endowments and entitlements depends on context and time (Leach *et al.* 1996), especially in situations where legislation for the control and use of resources is fragmented (Bond 2001).

The purpose of institutions is to reduce uncertainty by making human behaviour more predictable. However, the effectiveness of institutions in achieving this predictability is subject to compliance and enforcement of agreed rules (Presber James 2001). For every right, rules must exist that dictate reciprocal behaviour from other individuals in relation to that right. Thus, institutions can be viewed as regularised patterns of human behaviour from underlying structures or sets of rules in use (see Leach *et al.* 1999; Klooster 2000; Presber James 2001). Of interest in biodiversity conservation are rules governing common property resources (CPRs) or common-pool resources. However,

CPRs require collective decision-making, co-operation and adherence to sets of agreed rules by resource users (Ostrom 1990; Ostrom *et al.* 1994; Ostrom & Schlager 1996; Berkes 1995). However, CPRs are characterised by the difficulty of excluding access to common resources and by subtractability, whereby each resource user subtracts from the welfare of other the users (Berkes 1989, Ostrom *et al.* 1994; Berkes 1995).

Most CPRs draw their legitimacy from resource users, and not from nation-state from in which they are located. In spite of this, the rules for most CPRs are problematic and very difficult to pin down, and this makes implementation difficult (Young 1995). As a result, CPRs are often based on the sensibility of users, and assumes that they will not become irrational. However, if individual rationality is not viewed as rational from the perspective of the group, overuse leads to 'CPR dilemma' or to the 'tragedy of the commons' (Ostrom *et al.* 1994). In the case of CPRs, the probability of behavioural change without strong and well-defined property rights is very low (Hanna *et al.* 1995). In the context of institutions, it is important that the usage of terms such as 'property' and 'rules' is fully understood, particularly in highly contested entitlements to a global resource such biodiversity.

Rules are prescriptions that define what actions are required, prohibited, or permitted, and the sanctions authorised if rules are not followed (Ostrom *et al.* 1994). In society, 'rights' often emanate from 'rules', but rights are not equivalent to rules (Ostrom & Schlager 1996). Ultimately, rules are designed implicitly or explicitly to achieve order and predictability of desired outcomes. Thus, understanding rules in use is important in the analysis of CPRs. However, many local institutions have already disintegrated to the extent that there are concerns that they will be destroyed and taken over by either economic markets or by states (Ostrom & Schlager 1996). In fact, local institutions have changed so many times that insistence on indigenous systems or CPRs as practised with fishery resources, is absurd. While considerable attention has been given to the role played by local people in biodiversity conservation, empirical evidence to support the effectiveness of CPRs has been flimsy at best, and historical in most cases (Little & Brokensha 1987). The challenge is whether CPRs can cope with problems of a modern age (Ostrom & Schlager 1996) under insecure ownership.

Full ownership means the right to use resources, to determine the mode of usage, to benefit from their use, to determine the distribution of benefits and the rules of access (Murphree 1993). To achieve this, local people must have a sanctioned authority that implements their responsibilities. This requires the state to relinquish its authority and responsibility to local people, but this runs contrary to the bureaucratic impulse to retain central authority (Murphree 1994). The performance of local institutions rarely approximate to their promises, because the central political and economic structures of nation-states are not disposed to surrender their privileges, and will use their power, including their abilities to shape policy and law, to maintain the monopolies of their position (Gibson 1999). These rules may be formal or informal, written or unwritten, as in the case of statutes or culture and tradition (Presber James 2001).

2.3. **Property rights**

Property rights are about rules and obligations. The debate on property rights has a long pedigree. Since 1888 the *communist manifesto* of Marx & Engels (1967) traces the debate on property rights back to the end of the feudal system in France. In fact, Marx and Engels submitted that the 17th century arguments about the origins of property proceeded from *Genesis*, according to which God had given the earth to mankind for use in common. In modern societies, property rights are a form of power, sanction and authority for decision-making (Denman 1978). Central to all notions of property are issues of rights, resources, and of the power of resource users to achieve desired outcomes from the resource in question. In law property is not 'things', but 'rights' in things or 'rights' to things (Hollowell 1982).

A property right is a socially enforceable claim to a resource, or its use including a right to select its uses as an economic good (Alchian 1987). Property rights provide some exclusivity, security, and transferability of economic goods. Correspondingly, as resources become scarce and increasingly valuable, resource users are often willing to bear the costs of establishing and enforcing their rights over resources (Brubaker 1995). Furthermore, systems of property rights are deeply rooted in economics (Lane & Moorehead 1996), and are part of society's institutions (Hanna *et al.* 1996).

Property rights change over time, based on the purpose that society or its dominant class expects these rights to serve (Bromley 1995). Therefore, facts about systems of property are not simple, but change over time. Property rights must be grounded in a public belief that the claim is worth protecting and that it is morally right. A claim requires enforcement, and often the authority to do so is vested with the state. In fact, property rights protect those who are able to enlist the power of the state (Bromley 1995). A crucial question to be asked of any system of property rights is whether it favours political stability (Rose 1998). Ultimately, property is a bundle of rights that allows the holder to possess, use, control, alienate others, transfer, sell, exchange, and donate or bequest the property in question. In theory, the bundle of rights is nominally held under four regimes (Table 2.1).

Table 2.1. Four categories of property regimes.

Property	Description
Communal, *res communes*	Rights are vested in a distinct group of users. This is the model often advocated for local people.
Open-access, *res nullius*	Rights are absent and, therefore, access is open to all. In the context of land, a limited resource, open access refers to state property where the state cannot provide effective policing or control.
Private, *res in commercio*	Rights are vested in individuals or in a corporation. Private property is often regarded as the most advanced form of ownership.
State property, *res publica*	Rights are under state control supposedly for the public good.

Source: Adapted from Berkes (1989) and Van Schalkwyk & Van der Spuy (2002).

In reality, few situations fit exactly into any one of these categories because nation states often determine property regimes that they can enforce. Thus, the four property rights are unlikely to found in one country. For example, while South African scholars talk about four categories of property rights, legal systems accord greater respect and recognition to state and private property rights at the expense of communal property rights (Bennett 1995). This is because the South African legal system evolved from the Roman Dutch law and endorses western property rights at the expense of African customary rights (Van Schalkwyk & Van der Spuy 2002). Ultimately, systems of property rights are crafted by nation states depending on various objectives that they want to achieve such as political, and socio-economic agendas.

In reality, the increasing human population and limited resources, imply that rights are often exercised either in open access or in private regimes. Hence, 'open access' often refers to mismanagement of any property, and this occurs in situation where the capacity of the right holder to maintain or control the property in question is either absent or severely constrained. Similarly, state property often equates to corporate rights (Alchian 1987) while common property can be considered a special cluster of private property rights (Lynch & Alcorn 1994). Thus, this reduces the four bundles of rights to only two: state and non-state property such, as various private property rights (Lynch 2001). Despite this, it is still difficult for scholars involved in conservation and development work to accept that, in many situations of resource use, state and non state property regimes are the only two that influence behaviours of resource users.

In a system of secure property rights, some form of ownership promotes stewardship (Brubaker 1995). Ownership determines the value of property rights (Delport 1999), such as the right of possession, use and disposal of worth, and entitles the owner, *inter alia*, to: control (*ius possidendi*); use (*ius utendi*); enjoy (*ius fruendi*); encumber (*ius abutendi*); alienate (*ius disponendi*); vindicate (*ius vindicandi*), including to ward off infringements (*ius negandi*) (Van Schalkwyk & Van der Spuy 2002). However, ownership is often formed by political, legal, socio-economic, historical, religious, and philosophical ideas. Briefly, ownership is the most comprehensive right a legal subject can have in relation to a thing, but the entitlements of the owner are not absolute and unlimited because they exist within the limits placed by the law (Van Schalkwyk & Van der Spuy 2002). Limitations on entitlement may originate from the provisions of the law or from rights of others with or without permission of the owner.

Entitlements can be strong or weak depending on how rights are enforced by both the state and society. Ownership is not absolute; it is a spectrum of rights from weak to strong. The strength of ownership is determined by its time frame and the conditions attached to it (Alchian 1987). Thus, ownership is a right to use resources with limitations regarding the rights of others, and intellectual property rights (IPRs) are a case in point. Until recently, it was considered highly unlikely that IPRs could cover collective assets of indigenous people (Posey & Dutfield 1996). Increasingly,

governments, NGOs and private entrepreneurs deem the knowledge of local people to be of some commercial value and, thus, property that can be bought or sold. In reality, local people have major hurdles to overcome before IPRs can be of benefit to them, and this in essence makes equitable sharing difficult to achieve. Indeed, there is a discrepancy between *de jure* and *de facto* rights of users (Murphree 1997).

IPRs provide companies, corporations, groups or individuals legal protection against the counterfeiting of their products, technologies, and services. By covering patents, copyright and trademarks, IPRs protect ideas and data that can be of commercial value. In biodiversity conservation, IPRs are mechanisms by which bio-prospecting can provide equitable distribution of benefits derived from biodiversity among nation-states (Gollin 1993). If properly administered, IPRs can provide developing countries with most of the benefits of biodiversity resources. Hence, the potential welfare gains to developing countries from strengthening IPRs have been the subject of on going theoretical analyses (Perrin 1999). However, IPRs have been construed as negative rights, because they prevent others from using the original invention (Cornish 1999), making them the battleground for trade in biodiversity (Bhat 1999; IUCN 1999).

Solutions to these problems are vaguely defined in the CBD (UNEP 1992) and the WTO 1993 Trade-Related Intellectual Property Rights (TRIPS). Part of the problem is that powerful agencies have more interest in gaining jurisdiction over biodiversity resources than on its equitable distribution. The application of IPRs to the traditional knowledge of local people is still controversial because the key problem facing local people with respect to IPRs is to prove authenticity; to reduce or limit biopiracy, and to stop commercial exploitation of their indigenous knowledge (Appendix 3). IPRs are somewhat inimical to their interests because often they do not know how to act legally or, if they do, legal action is often prohibitively expensive. Having a right is one thing, and exercising the right is completely another thing. Despite these difficulties, local people are starting to asset their rights. Rights are about entitlements, which form the core of the human psyche with regards to ownership. Based on the difficulties of overcoming problems caused by IPRs, tenurial rights of local people over resources in their spheres are now advocated as means to enhance their livelihoods.

Tenure is as also a subset of property rights, and it is simply a bundle of rights (Bruce & Fortmann 1988) that defines the obligations of individuals or groups regarding resources governed by a particular system (Murombedzi 1990). Tenure defines social relations between people with regard to their legal status in land, such as freehold, leasehold or communally owned (Lynch & Alcorn 1994; Martin 1997). Therefore, individuals or groups with tenure have certain status *vis-à-vis* resources on their land in comparison to those without tenure. However, where local people lack strong tenure rights, attempts to involve them in biodiversity conservation are often co-optive or collaborative arrangements (Murphree 1994). However, in biodiversity conservation, most state property rights exemplify the state's reach exceeding its grasp (Bromley & Cernea 1989) and this converts *de jure* rights to *de facto* open access regimes.

In CPRs, rights have several important dimensions (Barrow & Murphree 2001):

- Rights are rarely, if ever, absolute: their strength is determined by time frames and conditions attached to them. Correspondingly, the longer the sanctioned duration, the stronger their tenure will be, and the fewer conditions attached to them, the stronger their ownership will be.
- Rights can be conferred: by the state, in a strong form as *de jure* rights or in weaker versions as *de facto* rights; by customary law derived from the norms and practices of long established non-state agencies and social groupings; or, by the configurations of power in specific contexts of social interactions.
- Rights require regimes of authority ranging from small units, e.g., household or partnership, to the state. The authority is usually influenced, *inter alia*, by the nature of the resource over which rights are exercised.
- Rights confer authority and responsibility. When authority and responsibility are delinked, and assigned to different actors, then both are eroded.

In CPRs, tenurial systems are complex mixtures of individual and group rights. Thus, the legitimacy of CPRs is dynamic, ever evolving, and often contested. Accordingly, institutional arrangements for establishing and allocating rights are needed (Lynch & Alcorn 1994). Hence, the role played by tenure in shaping institutions of local people is still the focus of empirical research, including this study.

2.4. **Governance**

In modern societies, property rights and institutions are ultimately nested within some system of governance. Correspondingly, governance determines how property rights and institutions translate into a functional network of interdependence between social, political, economic, and environmental interests. However, while the political role of governments as human-devised systems of creating social order is somewhat easy to define, there seems to be no consensus on how governance should be defined. Indeed, governance may refer to just about anything political (Hyden 1998). Politicising the concept is sad because governance should shape the actions of governments to avoid them being synonymous with undesired social outcomes such as excessive regulation, corruption, and lack of accountability.

The connection between governance and conservation and development initiatives is relatively recent (Hyden 1998; Smith *et al.* 2003). Many analysts now accept that biodiversity conservation is not only technical or economic but is also explicitly political. In the context of biodiversity conservation, governance refers to institutional structures that promote the accountability of three key actors, the state, the private sector, and local people to one another with regard to the use of affected resources (Brinkerhoff & Veit 1997; Hyden 1998; Hulme & Murphree 1999). Furthermore, governance requires models that allow all three key actors, i.e., the state, local people and the market to operate and to be accountable to one another in ever changing situations, such as environmental, economic and socio-political conditions (Hyden 1998; Hulme & Murphree 1999).

Biodiversity conservation is a quagmire of moving factors in a fierce battlefield of competing and conflicting interests (Magome 2001), and this makes governance difficult to implement. Since there are no fixed states, but different configurations through which reality presents itself, governance models must be fine-tuned with clear accountability and responsibility for all actors involved. It is therefore assumed that by specifying the roles and the responsibilities of all actors, ensuring accountability, and by providing legal recourse, governance can be realised. However, governance means

absolutely nothing if it cannot be easily implemented. For most developing countries, the challenges are huge and vary greatly based on their histories, current socio-economic situation, and future options. Recognising the centrality of governance, the 5th WPC noted that governance is about power relations and accountability.

A key variable in these models is co-operation and trust among main actors, so that new experiments allowing for 'both-and' rather than 'either-or' can be initiated (Adams & Hulme 2001). Correspondingly, academic scholars and practitioners who are interested in finding workable solutions to both the challenges of biodiversity conservation and of economic development must attempt to device experiments that recognise this dynamic environment and should implement projects on a 'learn-as-you-implement' basis. However, in implementing experiments, various actors need some form of a framework at various levels of scale.

2.5. **Conclusion**

The governance model should not become another narrative because the storyline of narratives is too simplistic, but it is also very dangerous because of its prescriptive nature. In fact, the challenge is to have 'governance without governments' (Rosenau & Czempiel 1992) by promoting the role of social institutions (Youn 1996). In terms of biodiversity conservation, ecologists have now narrowed the gap between ignorance and knowledge. While actions for achieving biodiversity goals are specified (Holdgate 1996), there is little agreement on how they can be attained (Child *et al.* 1997; Swanson 1997), and this creates problems. Central to the success or failure of these experiments, is the role that can be played by institutions that operate across scale in the arena of property rights and governance. The challenge facing scholars and conservationists is how to design institutions that can harmonise the apparently conflicting goals of biodiversity conservation with those of economic development. In the next chapter, I outline the context within which such institutional arrangements are often crafted as a background to this study.

Chapter 3

South African context, study areas, and methods

3.1. Background to South Africa: a country in transition

South Africa, is ±1.22 million km^2 in extent, occupies the southern most part of the African continent and is surrounded by both the Atlantic and Indian oceans. The population of South Africa is increasing rapidly. In 1996, the population was about at 41 million (Stats SA 1998), but the 2001 census revealed over 45 million people. The population comprises largely black Africans (78%) and is growing at an annual rate of 2%, which is matched by a slow economic growth rate of 2% (Appendix 4). Despite a *per capita* income of US$3,000, 52% of the country's rural people live below the poverty line of SAR237 or US$67 per adult per month (Carter & May 1999). In fact, South Africa is a recent democracy that is still trying to shape its political landscape, which was created by apartheid[2] prior to 1994. The action space for conservation and development initiatives is largely created by post-apartheid shifts in natural resource policies and strategies (Isaacs & Mohamed 2000). In order to understand the context of biodiversity conservation and related policies in South Africa, it is imperative to outline its pre- and post-apartheid eras, because 'success' or 'failure' of its objectives and strategies to conserve biodiversity is strongly aligned to these two political eras.

In this chapter I provide the context under which South Africa's PAs and its flagship national agency, now renamed South African National Parks (SANParks), implement conservation strategies. Consequently, this chapter first starts by providing a brief description of the land conquest in South Africa and the government's land reform process. This is then followed by contextualising the country's network of PAs including its national parks agency. Thereafter, I provide the study hypothesis, study areas, and the general methods used throughout the study.

[2]A racially based separate development strategy that was designed by government to advance and to benefit the interests of its minority white citizens at the expense of its majority of black people.

3.2. **Land conquest**

The history of land conquest in much of Africa is strongly associated with colonial rule. In South Africa, the land conquest dates back to 1652 when the first European settlers arrived. The land conquest started slowly with colonial rule, and was rapidly consolidated by apartheid rule. From the mid 17th century, black farmers and other African pastoralists, such as the Khoi and the San, were gradually dispossessed of most of their land through conquest, spurious treaties and economic pressure (Ramphele 1991; Levin 1996). Bourgeois private property regimes were introduced, frequently to the exclusion of the black indigenous people. Legislation in the early 1850s paved the way for land titling and registration to exclude black people, leading to unjust legal dispossessions, generally without the knowledge of the inhabitants of the land. Huge parcels of traditionally or communally owned land were privatised, and this consolidated land dispossession by entrenching private property rights of minority of white people at the expense of the majority of black people.

Land conquest was institutionalised and fast-tracked when the government passed the Natives Land Acts of 1913 and 1936. These Acts restricted land ownership by black people to just 13% of country's total land area (Puzo 1978; Platzky & Walker 1985; Ardington & Nattrass 1990; Ramphele 1991; Worden 1995; Tordoff 1997; Reader 1998), which in turn left a legacy of land degradation. Ultimately, these land Acts limited the amount and locations of land owned by black people to isolated areas known as 'Native Reserves' or 'black areas' (Figure 3.1).

The significant impacts of these Acts are summarised by Levin (1996:105-106):

> *These 1913 and 1936 land acts limited the amounts and locations of African-owned land, and facilitated the forced removals of many communities from land to which they claimed ownership and, at times title deeds. Other communities were dispossessed of their rights to occupy and use land because of the abolition of labour tenancy. Still more Africans were removed to make way for forest plantations or national parks. These removals destroyed the local agricultural systems as well as social structures.*

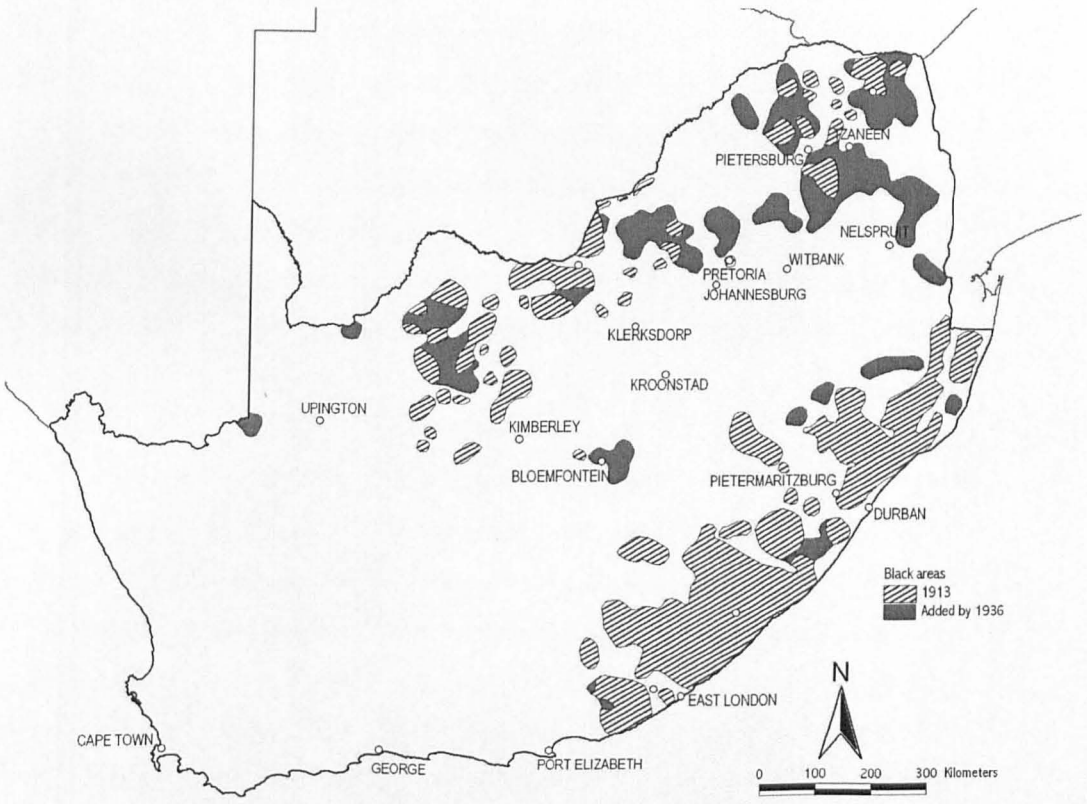


Figure 3.1. Land distribution for black people from 1913to 1994.

The land allocated to native reserves consisted of fragments that were deliberately scattered in selected regions of South Africa and was, with very few exceptions, agriculturally unproductive. The resultant population increase put further pressure on limited land resources enclosed within native reserves. These land Acts removed the means by which black people had resisted incorporation into the migrant labour system of the gold mines and the wage labour on maize farms. Ultimately, these land Acts were engineered to produce cheap labour. For this reason, these Acts have been described as the product of 'the alliance of gold and maize' (Worden 1995). These Acts established the principle of a racially based, dual system of land ownership.

In 1970, the apartheid government passed the Homelands Citizenship Act, which was based on ethnic or tribal differences. This Act justified, both *ex post facto* and for the future, the policy of forcibly removing black people from so-called 'restricted areas' to these homelands in order to maintain the apartheid policy. Politically, the homelands system provided the apartheid regime with the ethnic justification for 'moving black people to where they belong', thus re-enforcing tribal divisions between black South African. These tribal divisions were part of a 'divide and rule' strategy, which reduced combined resistance by homeland leaders to apartheid policies. By erecting puppet regimes headed by African leaders, apartheid rule legitimised its control over repressed African subjects (Levin 1996).

Between 1958 and 1988, over 3.5 million black people were brutally uprooted and forced to settle in homelands. The homelands (as they were colloquially known in South Africa) provided a basis for deeming black people to be citizens (based on ethnic groups) of one or other of the homeland territories. The effect of this was to cause the lapse of normal South African citizenship. Following this Act, nominal independence was accepted by the homelands of Transkei in 1976, Bophuthatswana (1977), Venda (1979) and Ciskei (1981), and hence the acronym 'TBVC states'. The remaining six homelands, Gazankulu, KwaZulu, KwaNdebele, KaNgwane, Lebowa and QwaQwa, instead opted for the status of 'self-governing territories' (SGTs). The TBVC states were generally viewed as puppet states, while the SGTs were viewed as having resisted the apartheid government.

The TBVC states and the SGTs were both financially and economically dependent on the apartheid government, the effect of which ensured *de facto* and *de jure* control by the apartheid regime. Hence, the division between TBVC states and SGTs only reinforced apartheid rule by increasing political tensions in the various leaderships of black people. These tensions manifested themselves through so-called 'black on black violence'. The effect of creating homelands was to prolong apartheid rule. However, with the transition to democratic rule on 27 April 1994, the four apartheid provinces of Cape, Natal, Orange Free State, and Transvaal, and the ten homelands, have been abolished and absorbed into nine newly designated provinces (Figure 3.2).

Figure 3.2. The redrawn provincial boundaries of the post-apartheid South Africa.

3.3. **Land reform**

The land reform programme is crucial to the successful creation of a politically stable post-apartheid South Africa, because unequal access to land affects over 15 million rural black people living in the former homelands as tenants or farm labourers (Cooper 1991). Restructuring of land tenure rights is now used to redress the legacy of land conquest. Section 25 (7) of the South African Constitution, Act 108 of 1996, states that:

A person or community dispossessed of property after 19 June 1913 as a result of past racially discriminatory laws or practices is entitled to the extent provided by an Act of Parliament either to restitution of that property or to equitable redress.

The primary aim of land reform is to: 1) redress the injustices of apartheid; 2) foster national reconciliation and stability; 3) underpin economic growth; and, 4) improve household welfare and alleviate poverty. To achieve restitution or equitable redress, the government promulgated the Restitution of Land Rights Act 22 of 1994. This Act epitomises the struggle for social justice in the democratic South Africa. At its starkest, the question posed by the Act is whether a society can ever hope, by a dint of a fresh round of law making, to undo the effects of past unjust laws (Budlender *et al.* 1998). Land restitution attempts to link land issues to issues of social justice, and this ultimately makes land reform both a political issue and a human rights issue. For example, some 50,000 white farmers have access to twelve times as much land for cultivation and grazing as 15 million rural black people (Table 3.1).

Table 3.1. Land use in South Africa before majority rule.

	Extent in millions of km^2	Percentage (%) of total owned by white people
Farm land*	1.01	83
Arable farmland	0.17	14
Livestock production	0.84	69
Protected areas	0.07	6
Undefined (including urban)	0.13	11
Total	**1.22**	**100**

*Farmland comprises commercial agricultural farms (70%), various communal areas mainly in the former homelands (13%), and state owned (17%).

Source: Adapted from Huntley et al (1989).

Against the disproportionate land holdings between the small advantaged minority and the vast majority of disadvantaged South Africans (Table 3.1), the post-apartheid land reform process is both a complex and a difficult task to implement speedily on a nation-wide scale. While it is one of the government's priority is to restore land rights to those previously dispossessed by the apartheid era, justice must be balanced with the long-term goals of political stability and economic growth. Indeed, the government wants to settle all valid claims by the end of 2005, an ambitious date indeed. To attain social justice, the government's land reform process aims to meet three key objectives of land redistribution, land restitution, and land tenure reform (Table 3.2).

Table 3.2. Aim of the Restitution of Land Rights Act.

Programme	Intended outcome
Redistribution	Aims to provide the poor with land for residential and productive use to improve their livelihoods because it will be difficult for them to buy land on the open market without state assistance. To achieve this, the principle of 'willing seller, willing buyer' is applied. However, under the volatile economic conditions of high interest rates, troubled agriculture and soaring debts, current land owners are often willing to find a buyer.
Restitution	Emphasis is often placed on restitution, and not restoration of land lost because of racial laws passed since 19 June 1913.
Tenure reform	Land to restructure land rights: the dilemma is that the post-apartheid constitution protects the land rights of those individuals that were unfairly privileged by the previous political order.

Source: Adapted from Magome & Murombedzi (2003).

However, there are major problems with the land reform process. Restitution is often delayed by inefficient administrative systems that must first establish those in critical need of land, and then secure them state grants (Du Toit 2000). Restitution seems to apply a strict judicial procedure that uses noble principles of fairness and equity to what in essence is a political problem (Winberg & Weinberg 1995). Therefore, even though claimants have to recount how they were removed from their land and stripped of their dignity, they cannot be guaranteed getting their land back. Claimants must, as a matter of fact, balance legal costs of regaining land lost against benefits of restitution (Magome & Murombedzi 2003). As a result, land reform has serious implications for PAs because the state must balance its imperatives of land reform against those of conserving the country's biodiversity (Cock & Fig 2002; Magome & Murombedzi 2003). Given the escalating cost of land and imperatives of restitution, it is debatable how the state will increase the coverage of its PAs from 6.5% to 8% (Magome 2003b).

3.4. **Management of protected areas**

It is a commonly accepted narrative that wildlife conservation in South Africa started in 1888 during the early colonial rule in the Cape Province. A century later, wildlife conservation was entrenched in the Transvaal when the Kruger National Park was established in 1898. Under apartheid rule, government agencies charged with the management of PAs were diverse and highly uncoordinated, and this situation has not

yet changed (Table 3.3). The responsibility for conservation at the national level lies with the Ministry of Environmental Affairs and Tourism. The National Parks Board (NPB), first constituted by the National Parks Bill of 1926, oversaw the creation and central management of all national parks outside homelands. In addition, provinces, homelands, and local municipalities also performed some conservation functions. As a result, each conservation agency determined its own philosophy and policy, and the management structure it adopted.

Table 3.3. The protected area network in South Africa after majority rule.

Responsible agency	Number of PAs	Area (km^2)
Provincial authority		
Eastern Cape Province	42	4899
Northern Cape Province	7	740
Western Cape Province	69	8130
North West Province	14	2319
KwaZulu Natal Nature Conservation Service	103	7871
Free State Province	17	1984
Mpumalanga Province	25	2099
Northern Province (now Limpopo Province)	54	3477
Gauteng Province	10	422
National authority		
Department of Water Affairs and Forestry	72	839
National Botanical Institute	10	15
South African National Parks (SANParks)	19	34244
Department of Environmental Affairs and Tourism	2	335
Total	422	67373

Source: Kumleben et al. (1998).

In terms of philosophy and policy, most agencies followed policies that focussed on creating and maintaining a network of PAs to protect biological diversity. Relatively few agencies followed integrated policies of making conservation socially acceptable to black people. This network of PAs has, by and large, emerged because colonial needs and values were imposed on local people whose livelihoods depended on using biological resources inside PAs (Fabricius *et al.* 2001a), paying little attention to the negative impacts of PAs (Cock & Fig 2002). Hence, the management of PAs in post-apartheid South Africa is still characterised by past and present conflict.

During the apartheid era, the homeland agencies of the former Bophuthatswana and KaNgwane pioneered conservation policies that were sensitive to the needs of local people. While Natal Parks Board achieved prominence in the early 1990s by initiating programmes that attempted to integrate their local people with PAs, the NPB waited until 1994 (Robinson 1994). Indeed, although the NBP strategically uses Richtersveld National Park as a prime example of its community owned land, Richtersveld was, according to Robinson & Fowkes (1996), a 'saga' that was settled after 18 months of a long protracted legal battle (Magome & Murombedzi 2003).

Nonetheless, the post-apartheid political changes have led to drastic review of all the conservation agencies, including the NPB. Indeed, most of these agencies find themselves under siege, and now desperately seek new social and economic roles to justify and secure their future (Wells 1996). Accordingly, the NPB commissioned this policy study ostensibly to provide a framework that would ensure that it complies with the political, social, and economic realities of the post-apartheid era. However, the political realities of the post-apartheid South Africa affect all PAs, and hence the study took a broadened approach.

3.5. **Research aim and hypothesis**

Since the study was originally commissioned, the former NPB has been partially transformed (Chapter 7), both in name and function. Now known as the South African National Parks (SANParks), the organisation derives its mandate from new legislation (Chapter 8). As previously constituted by National Parks Act (57 of 1976), section 4 of this Act limited the role of national parks to within their borders, stating that:

> *The object of the constitution of a park is the establishment, preservation and study therein of wild animals, marine and plant life and objects of geological, archaeological, historical, ethnological, oceanographic, educational; and other scientific interest and objects relating to the said life or first-mentioned objects or to events in or the history of the park, in such a manner that the area which constitutes the park, shall as may be and for the benefit and enjoyment of visitors, be retained in its natural state.*

However, more recent government policy on PAs requires otherwise. For instance, the Government Gazette No.18163 (1997:34), specifically states that:

> *The government will through the Land Restitution Programme, and in accordance with the Constitution of South Africa and the Restitution of Land Rights Act 22 of 1994, facilitate the settlement of land claims, taking into account the intrinsic biodiversity value of the land, and seeking outcomes which will combine the objectives of restitution with the conservation and sustainable use of biodiversity.*

This study initially aimed to provide a dynamic policy framework that integrated NPs managed under SANParks, with the development needs of local people (see Appendix 1). To achieve this broad aspiration, this study aimed to determine the most appropriate institutional framework for integrating the development needs of local people with the biodiversity conservation goals of SANParks. Hence, the research approach to this study centred on two fundamental questions: what should SANParks consider when developing a policy framework, and what practical means exist to make such a policy framework successful? Answering these key questions required framing the research hypothesis on the basis of South African's previous attempts to integrate local people with the management of PAs, and on the constitutional requirements.

In the post-apartheid South Africa, constitutional requirements introduce rights, and in particular the central issue of property rights. For marginalised black people, tenurial rights are assuming greater significance as issues of human rights take the centre stage of political debates. Of major relevance to conservation agencies is how the conceived rights of various local actors influence their attitudes to both PAs and biodiversity goals. As a result, the research hypothesis was broadened to include key PAs in the post-apartheid South Africa, stating that:

> *The relationship between PAs and their local communities is best enhanced when such affected people enjoy some form of ownership.*

The hypothesis tests incentives and institutional arrangements for linking biodiversity conservation to rural development. Arising from this hypothesis is the need to test if indeed the central issue affecting the attitudes of beneficiaries to PAs is ownership. To

test this, case studies were investigated to contribute data that could give rise to policy recommendations that can ultimately assist the managers of PAs to link conservation to the socio-economic needs of local people.

3.6. **Rationale for choosing study areas**

South Africa offers a wide range of case studies that can test the research hypothesis that ownership affects attitudes of beneficiaries to various benefits arising from PAs. During the apartheid era, the participation of black people in conservation activities was mostly limited to homelands. In this context, the conservation agencies of the North West Province, Mpumalanga Province, and Limpopo Province, situated in the former Transvaal of apartheid South Africa, provided appropriate case studies for testing the present study hypothesis. Furthermore, these provincial conservation agencies also had long established histories of involving a wider spectrum of actors and beneficiaries, including both white and black people.

A case study refers to the collective of assumed beneficiaries of the activities of a particular PA. One case study area was selected at each of three levels of ownership in each of the North West Province, Mpumalanga Province, and Limpopo Province, in situations where a continuum of ownership levels were mediated through the three provincial conservation agencies (Figure 3.3). Hence, the study sought to compare a total of nine case studies, three in each province. No case study of strong ownership that co-operated directly with the provincial conservation agency could be identified in Limpopo Province. However, Selati GR is entirely under private ownership and appropriately filled the gap.

The basis for defining the three ownership levels was as follows:

- Strong ownership refers to beneficiaries who, through legal documents, have rights over both land and wildlife, and extend full management control or have secure tenure over PAs. However, owing to South Africa's political history, white people mostly enjoy these rights, and are dominant among this level of this ownership.

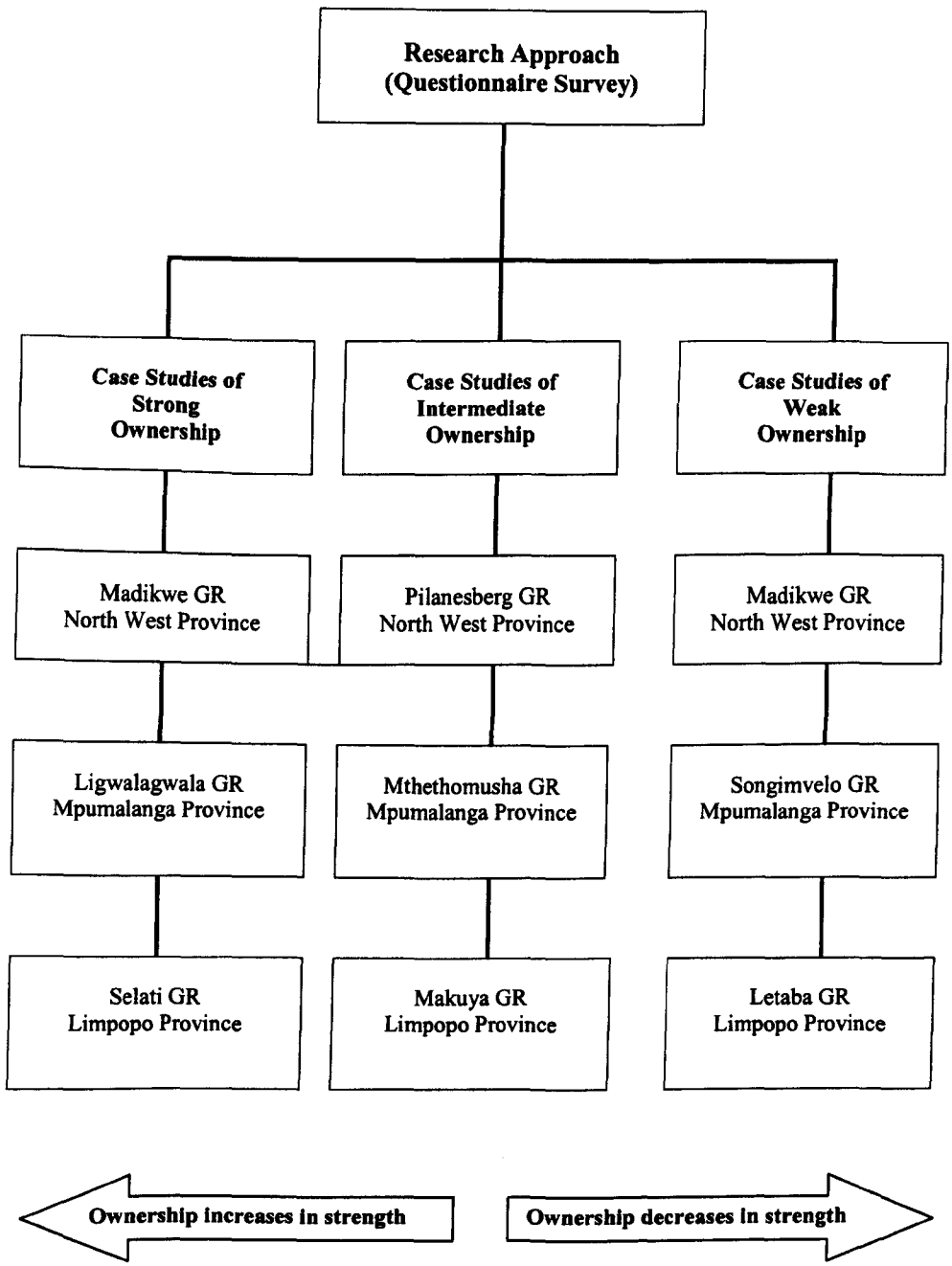


Figure 3.3. Research approach and the case study areas arranged by levels of ownership for each one of three provinces. As shown with these arrows, ownership is not absolute, but it is a continuum of use rights ranging from weak to strong use rights (refer to Chapter 3 for definitions).

- Intermediate ownership refers to beneficiaries who have land title but lack full control of wildlife because the state has appropriated its control, and has in its discretion given nominal rights to identified communal owners.
- Weak ownership refers to beneficiaries without clearly defined tenurial rights over both land and wildlife. In this level of ownership, the state has given local rural black people marginal benefits from GRs, in the form of jobs, thatching grass, firewood and or subsidised meat.

This typology of ownership does not take account of the extent to which different categories of owners exercise the rights appropriate to their level of ownership. For example, it could be argued that the level of intermediate ownership gives community members an even higher legal status to exercise their rights than those categorised as strong ownership level. However, those within the strong ownership level, primarily the white landowners with a long history of ownership, had very strong perceptions of their rights. Such experience of exercising a right can prove even more important than the provisions made for them in legal instruments.

In all the nine case studies, benefits from different forms of resource use had to be somewhat comparable, thereby allowing comparison of consumptive (commercial safari hunting) and non-consumptive (photographic) tourism activities in each GR on an equal footing. Given the selection of these nine case studies, I will now outline the political economy of the three provinces, and their associated conservation agencies because these factors are most likely to have an influence on socio-economic situation of beneficiaries around each GR. The socio-economic status of the three provinces is well documented (Stats SA 1998; Burger 1999), and is briefly provided below.

3.7. **North West Province**

The North West Province is 116320 km^2 in extent, had a population of about 3.5 million people in 1996, and included much of the former Bophuthatswana homeland, known colloquially as 'Bop'. About 23% of adults older than 16 years in this province were uneducated. The province contributed 5.5% to South Africa's total GDP, with

mining contributing 55% to the economy of the province and employing a quarter of its labour force. In the selected case studies, the agency in charge was formerly Bop Parks, but it is now the North West Parks & Tourism Board (NWP). The study areas comprised Pilanesberg and Madikwe GRs, the latter of which contributed both weak and strong levels of ownership within different areas and contexts of Madikwe.

3.7.1. **Pilanesberg Game Reserve**

Pilanesberg GR (Pilanesberg) is 550 km^2 in extent (Figure 3.4), and was created by the state in 1979 to primarily to protect its unique geology. It is the second largest alkaline ring complex in the world, after the inaccessible and snow-covered Russian Kola Peninsula (Lurie 1973). Livelihoods of local people around Pilanesberg are peri-urban, being neither strictly rural nor highly urbanised. Nevertheless, the livelihoods of local people around Pilanesberg are cash-driven, initially due to rich iron ore and platinum mining in the Thabazimbi (meaning 'mountains of iron') and the platinum reserves of Rustenburg and Bafokeng areas, and later due to the tourism activities arising from the adjacent multi-million dollar Sun City Casino and other tourism resorts. During the time of Bop, local people were arbitrarily given ownership of some 80 km^2 of land inside Pilanesberg, but wildlife is controlled by NWP&TB, and this makes them intermediate owners. However, with the introduction of Land Restitution Act, these local people are attempting to reclaim the entire Pilanesberg.

3.7.2. **Madikwe Game Reserve**

Madikwe GR (Madikwe) covers 750 km^2 (Figure 3.4), and was established in 1991 on state land, based on three key assumptions: 1) that wildlife-based tourism was the best economic use of the acquired land; 2) that it would increase the value of the land and economically benefit local people whose lives depended on cash income and livestock production, and; 3) that the state, private sector, and local people would all equally benefit from the creation of Madikwe. Since both land and wildlife are state-owned, this makes local people weak owners. However, some adjacent landowners have use rights over wildlife and land in Madikwe, and this makes them strong owners.

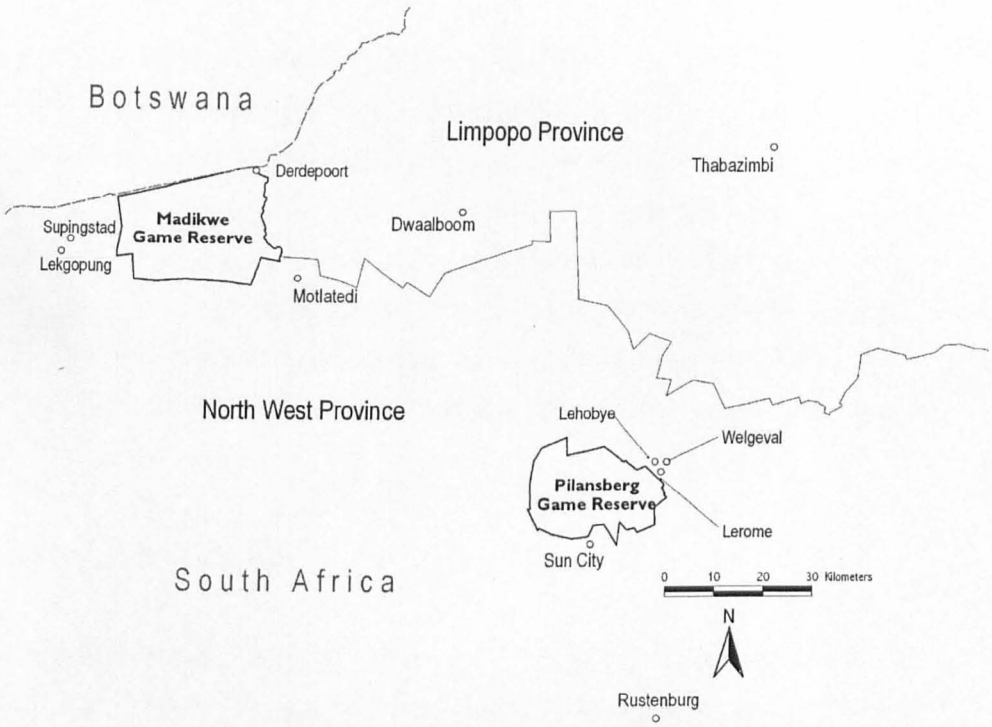


Figure 3.4. The location of selected study sites in the North West Province.

3.8. **Mpumalanga Province**

The Mpumalanga Province covers 79490 km^2 in extent, had a population of about 3 million people in 1996, and incorporated the entire territory of the former homeland of KaNgwane. About 29% of adults were illiterate. The province contributed 8.2% to South Africa's total GDP, and had a well-diversified economy with one of the highest citrus-producing areas in the country, as well as rich coal reserves. However, tourism remains the main driver of the local economy, as the province has strategic road links with the neighbouring countries of Swaziland and Mozambique. The key tourist areas in the province include the south-western region of the Kruger NP with famous resorts such as Sabi Sand Reserve, and PAs under the Mpumalanga Parks Board (MPB), three of which were included in this study.

3.8.1. **Mthethomusha Game Reserve**

Mthethomusha GR (Mthethomusha) covers 72 km^2 (Figure 3.5), and was created in 1986 on land owned by local people in the former KaNgwane homeland. The main purpose of establishing Mthethomusha was to reduce erosion of its mountain slopes caused by high cattle grazing. The name 'Mthethomusha' means 'new law' because in this situation, local people were not forcibly removed for its establishment. In fact, they co-owned the idea and agreed to resettle nearby. The livelihoods of local people around Mthethomusha are peri-urban, similar to those around Pilanesberg, but wildlife is state-controlled under MPB. In combination, these factors define these local people as intermediate owners.

3.8.2. **Songimvelo Game Reserve**

Songimvelo GR (Songimvelo) is 490 km^2 in extent (Figure 3.5), and was created by the state in 1986 to protect its rich biodiversity. In fact, 'Songimvelo' means 'nature protection', and it contains some unique Cape plant species including archaeological evidence of human habitation dating back to both stone- and iron-age periods. The livelihoods of local people around Songimvelo are mainly rural, and are dependent on a mixture of livestock production and some cash income. Both the land and wildlife resources are controlled by MPB, and this defines local people around Songimvelo as weak owners.

3.8.3. **Ligwalagwala Game Reserve**

Ligwalagwala GR (Ligwalagwala) covers 120 km^2 in extent (Figure 3.5), and was created in 1997. The establishment of Ligwalagwala was primarily motivated by both biodiversity conservation objectives and the need to create a viable tourism industry by pooling resources together. It is therefore an initiative to increase the size of conservation land and to increase tourism income by joining privately owned land with state land under MPB to form one relatively large contiguous area. As the landowners also manage the wildlife, this defines them as strong owners.

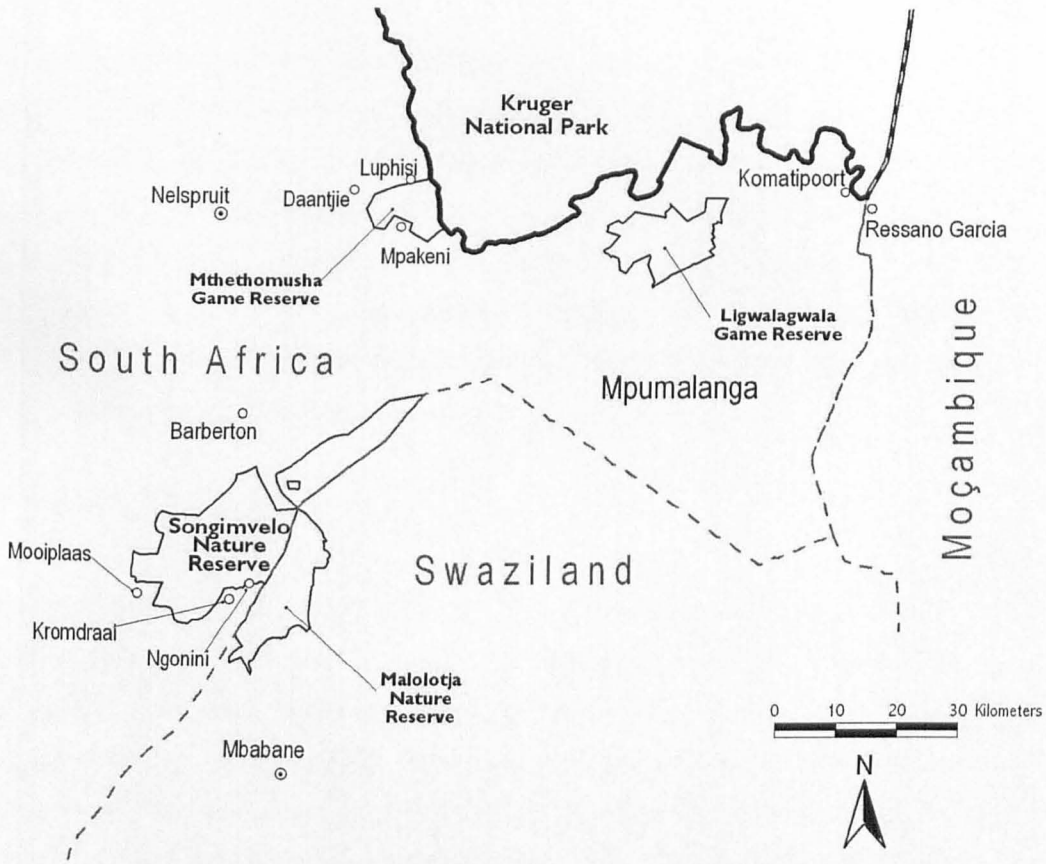


Figure 3.5. Location of selected study sites in Mpumalanga Province.

3.9. **Limpopo Province**

Limpopo Province is 123910 km^2 in extent, had a population of 5 million people, and it incorporated the former homelands of Gazankulu, KwaNdebele, Lebowa and Venda. About 30% of adults in the province were illiterate. The province contributed 3.7% to the country's total GDP, mainly from state employment, commercial agricultural, and mining of copper, asbestos, iron ore and chromium. The tourism industry was far from being optimally utilised. The agency in charge of the selected GRs was the Limpopo Parks & Tourism Board (LTB). LTB managed two study sites, Makuya and Letaba GRs, while the third, Selati GR, was both privately owned and managed.

3.9.1. **Makuya Game Reserve**

Makuya GR (Makuya) covers 158 km^2 (Figure 3.6), and was created in 1984 on land owned by local people in the former homeland of Venda. Makuya is far removed from major metropolitan areas, and is accessible only by all-wheel-drive vehicles with high ground clearance. With only one bush camp, Makuya is underdeveloped and was used only for limited hunting. Furthermore, local people live some 50 km away from the reserve and their livelihoods are dependent on a mixture of livestock production and cash income, derived mostly from the local mines. Wildlife is controlled by LPB, and this defines local people as intermediate owners.

3.9.2. **Letaba Game Reserve**

Letaba GR (Letaba) covers 420 km^2 (Figure 3.6), and was created by the state in 1981 under the former homeland of Gazankulu. The Letaba was established mainly for commercial wildlife enterprises such as hunting. Like Makuya, Letaba is also poorly developed and does not even feature on key tourism guides of the country. Tourism activities in Letaba are sustained by limited and irregular hunting operations. The livelihoods of local people around Letaba are rural and are similar to those described for Makuya. Both the land and wildlife are controlled under LPB. In combination, this situation defines local people around Makuya as weak owners.

3.9.3. **Selati Game Reserve**

Selati GR (Selati) is 300 km^2 in extent (Figure 3.6), and was established in 1993 as a nature conservancy. While the endemic cycad, *Encephalartos dyerianus*, gives Selati a special biodiversity feature, economic viability through co-operation forced private land owners to gave up unprofitable cattle ranching for commercial wildlife activities, such as hunting, selling live animals, and photo tourism. As already mentioned, Selati is independent of LPB, as it is entirely under the control of its private owners. Hence, Selati is a special case study of strong ownership.

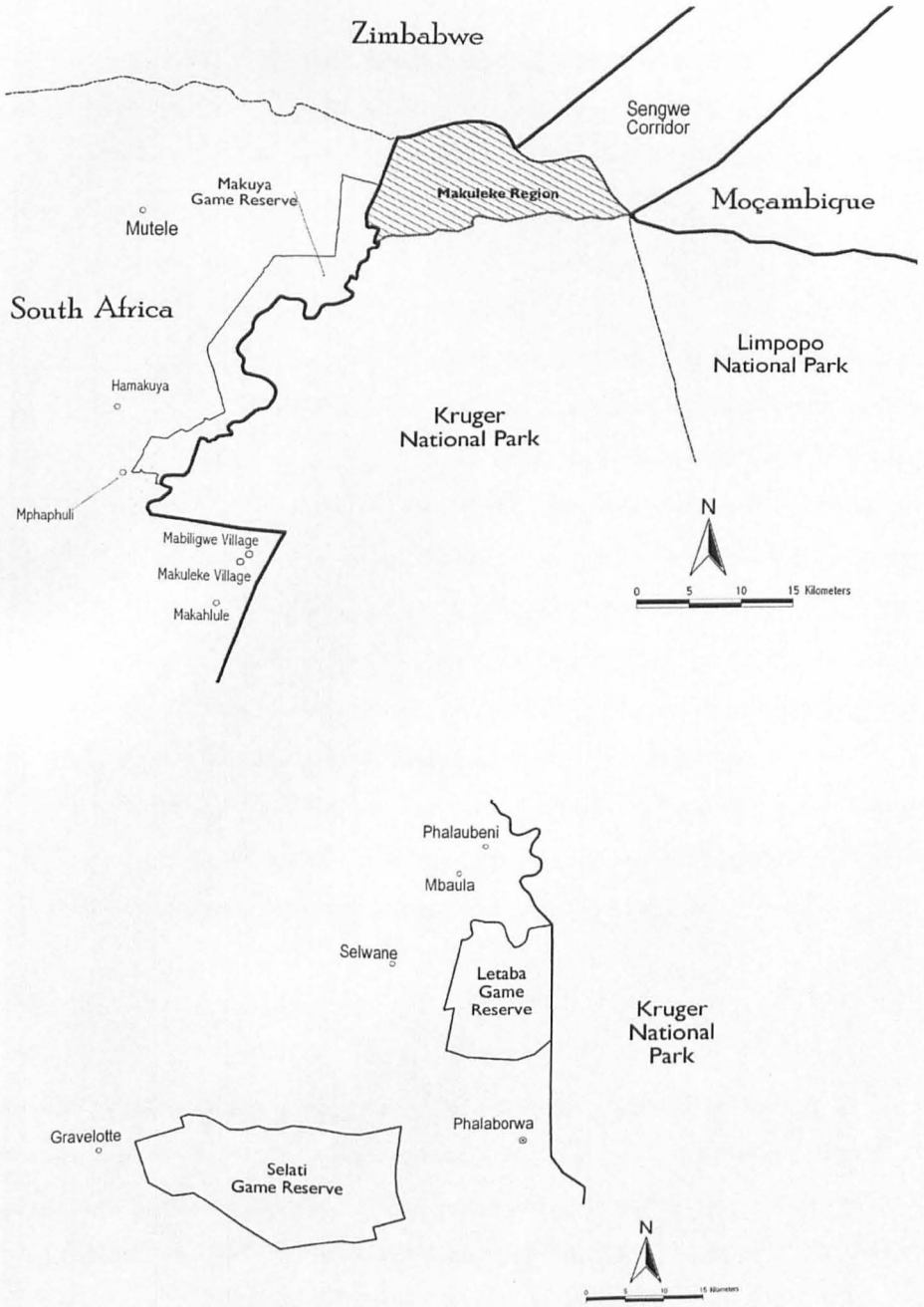


Figure 3.6. The location of study sites in Limpopo Province.

3.10. **General study methods**

Applied policy research demands a fine balance between both theoretical research and applied research. Where applied policy studies straddle political transition, the need to cross-check the applicability of study recommendations becomes even more daunting than if the study was undertaken in less dynamic situations.

In general, the study methods were divided as follows:

- Testing the ownership hypothesis required obtaining data from representative samples of the case studies outlined above. Invariably, social science methods were used to establish if there were differences between the three ownership levels. In this context, structured questionnaires adequately served the purpose.
- Testing the transferability of the study results since SANParks commissioned this study in order to provide policy guidelines that would integrate all national parks with the development needs of the neighbouring local people. Achieving this required gaining insights into SANParks by reviewing secondary data, both published and unpublished documents, and by triangulation.
- Policy guidelines often follow from study results, but the changing political climate in the post-apartheid South Africa, dictated that policy guidelines should flow from the new legal contexts and not the other way round.

3.10.1. **Structured questionnaire surveys**

Obtaining information from people often requires using survey techniques. Indeed, survey research is widely used in social sciences (Babbie 1973), and has since evolved to include action-based approaches such as participatory research appraisal (Chambers 1986). Modern survey methodologies can be traced back to ancient forms of human census (Neuman 1997). Briefly, all field techniques are based on a combination of complimentary approaches such as: observing; listening; and, asking questions that cover a broad spectrum from researcher structured to respondent and/or situation structured surveys (Byers 1994). Using different sources of information also provides cross-checks or triangulation (Chambers 1991; Furze *et al.* 1996; Neuman 1997).

For purposes of testing the study hypothesis, structured interviews using direct face-to-face interviews was the most appropriate tool to sample local communities in the lesser ownership levels, comprising weak and intermediate owners. However, the busy schedules of strong owners dictated that the face-to-face technique be combined with telephone interviews. Refining the questionnaire involved pre-testing with the research assistants and testing in the field with respondents. There are two major disadvantages of using surveys. Firstly, they interfere with the routine of respondents. Secondly, they can provide misleading data when respondents attempt to please the researcher. The questionnaire data only provided a narrow perspective of the reality of respondents, and must be supported by, or triangulated with, other sources of data.

3.10.2. **Secondary data review**

Social policy research is a highly specialised field (Samson & South 1996; Pawson & Tilley 1996). In order to gain further insights into the various attempts by SANParks to include local people in the management of its national parks required researching archives to review annual reports, internal articles or magazines, organised workshops or conferences, and other published documents. The purpose of this exercise was to provide 'real life' experience of what SANParks went through in order to involve local people, and how it could overcome the challenges it faced.

3.10.3. **Triangulation**

As a policy study, there was a key need to 'ground-truth' the validity of observations made in both the analysis of results and in the review of secondary data. Accordingly, this required triangulation, a term originally used in land surveys using trigonometry (Bruinsma & Zwanenburg 1992). In the social sciences, triangulation is used to cross-check the validity of results with other sources (Sapsford & Jupp 1996), because qualitative data are often blamed for lacking the tenets of 'good' science (Decrop 1999). In this study, triangulation involved comparing findings with other researchers mainly in the discussion sections of each chapter in Chapter 7, which focused on the transformation attempts of SANParks.

Chapter 4

Ownership and attitudes

4.1. Introduction

Biodiversity conservation is a social, economic, and political issue, whose success or failure needs to be defined within this broader context. It is a stewardship of natural resources for the public, and in partnership with the public. Accordingly, the problem in biodiversity conservation is the management of the public. Hence, biodiversity conservation is 90% managing the public and 10% managing the resource (Fazio & Gilbert 1986). Therefore, problems facing biodiversity conservation have their roots in how the public view and use natural resources. Traditionally, managers of PAs have focused on technical problems, but have generally been less successful in dealing with the public. Indeed, while the core activities of PAs focus on managing biodiversity (Caughley & Sinclair 1994), implementing successful programmes for these areas is fundamentally about managing public attitudes.

Despite this, public attitudes are often treated as a peripheral issue to the management of many PAs. Since the public is amorphous, managers of PAs must try to identify the constituencies on whom success or failure of their desired programmes will ultimately depend. Local people neighbouring PAs are often regarded as a major constituency because the success or otherwise of efforts to conserve biodiversity requires their support. In the context of South Africa, with its racist history, the support of local people, now a powerful voting constituency, is essential to the long-term conservation of the country's biodiversity. Correspondingly, some of the country's conservation agencies are attempting to establish the attitudes of local communities neighbouring PAs to determine the extent to which they can influence their attitudes in order to achieve desired outcomes (Infield 1988). Since local communities are also amorphous (Murphree 1993), it is important to establish a range of key local communities that are linked to various PAs, and this is the key focus of this chapter.

Under apartheid, relationships between local communities and PAs were characterised by constant conflict and distrust (Carruthers 1989; Ellis 1994). Prior to South Africa's 1994 democratic elections, surveys tended to focus mainly on the attitudes of black people towards PAs (Infield 1988). Understandably, the objective of these surveys was to test the extent to which the exclusion of black people from PAs had an influence on their attitudes to these areas. After the 1994 democratic elections, South Africa's new Constitution placed a great emphasis on creating one nation where every citizen has equal rights. It is therefore imperative that, where possible, the attitudes of all South Africans in key sectors of the country's political ecology be established in order to guide land reform programmes, including relevant policies and strategies.

Nevertheless, South Africa's 1994 democratic elections did not immediately end or destroy the unequal structures and patterns created by the apartheid regime. Rather, the 1994 elections satisfied an essential precondition for dealing with the apartheid legacy, in other words, to establish the principle of administrative justice (Budlender, *et al.*1998). Therefore, administrative justice should become the *modus operandi* that would create an institutional framework for legitimising South Africa's land reform policy. However, ownership and distribution of limited land remains the cornerstone of South Africa's property rights. In fact, skewed ownership of land is one of the central legacies of the apartheid era that is still intact. While property rights and economic development form the basis of South Africa's democratic constitution and its Bill of Rights, property rights may strongly influence ownership of resources and, ultimately, the attitudes that people hold towards the resources contained on such land.

The challenges are: to establish a legal way of effecting land reforms that can maintain political stability; to facilitate socio-economic growth without drastically undermining the Bill of Rights; and, ultimately, to assist the country to achieve national unity. In this chapter, I test the hypothesis that land rights and resource ownership together improve the relationship between PAs and potential beneficiaries. In order to test this hypothesis, I attempt to establish if indeed there are significant differences in attitudes between case studies around Game Reserves (GRs) under three levels of ownership, comprising strong, intermediate and weak owners (see Figure 3.1).

4.2. **Methods**

Structured interviews, using a mixture of yes/no responses, and open-ended questions (Appendix 5) were conducted between March 1997 and February 1999. Respondents in both intermediate and weak ownership levels were interviewed going about their daily business in villages, houses or offices. For these lesser ownership levels, sample sizes were based on at least 10% of adults aged 16 years and above living in each targeted village around 'their' PA, based on the 1996 census (Stats SA 1998). For the relatively small group of strong owners, attempts were made to interview all respondents, using a combination of telephone surveys and face-to-face interviews.

Briefly the questionnaire survey (shown in full in Appendix 5, interrogated individual respondents, *inter alia,* about the following:

- Socio-economic status, important for assessing the local situation as well as for gaining insights into the composition of samples for each case study;
- Awareness about the existence of PAs from which respondents are supposed to realise real and perceived benefits;
- Attitudes about land use choices, important for establishing the level of support for conservation against other short- and medium-term livelihood benefits;
- Perceptions of broad long-term issues of biodiversity conservation, such as its importance for posterity, and its contribution to the country's economy, and;
- Needs and aspirations, important for establishing expectations of beneficiaries from each PA.

4.3. **Data analysis**

Completed questionnaires were available from 2901 respondents, comprising: 29 for strong ownership; 1607 for intermediate ownership; and, 1265 for weak ownership, each distributed between provinces as shown in Table 4.1. Once all the questionnaires had been cross checked and tallied, the questionnaire answers were re-organised using the descriptors illustrated in Table 4.2, in order to explain the basis of any differences between ownership levels.

Table 4.1. Distribution of ownership levels between provinces.

Ownership level	North West	Mpumalanga	Limpopo	Total
Strong	11	8	10	29
Intermediate	542	519	546	1607
Weak	317	392	556	1265

Table 4.2. The re-organised questionnaire for analysis showing re-ordered questions and their original number from the questionnaire (Appendix 5), the statistical test to which each descriptor is subjected, and the section where the analysis for each descriptor is presented.

No.	*Question*	*Descriptor (test)*	*Section*
1	Gender and age	Socio-economic profile	4.4.1
2	Currently earning a salary?		
2.1	If yes, monthly salary range?		
3.2	If no, receiving other income?		
3	Visited the PA?		
3.1	If yes, for what purpose?		
3.2	If no, why not?		
		Benefits from PA[3]:	
9.2	Local people can collect firewood freely	Short-term benefit (χ^2)	4.4.2
9.3	Landless to be allocated PA land		
4.1	Develop PA land for mining, industry or agriculture	Mid-term benefit (χ^2)	4.4.3
4.2	Remove animals and redistributed PA land		
5	Government should fund the PA		
6	PA contributes to your livelihood		
9.1	PA protects biodiversity	Long-term benefit (χ^2)	4.4.4
9.4	Managers protect PA for our benefit		
9.5	Fences protect wildlife and people		
9.6	PA should be kept for posterity		
9.7	PA contributes to SA economy		
7	How does you or your community (currently) benefit from PA?	Aspirations (rank tests)	
8	How would you or your community like to benefit from PA?		
		PA agency effect (χ^2)	Chapter 5
	Differences within provinces by ownership		
		Determinants of attitudes (MLR)	Chapter 6
	Socio-economic factors that determine attitudes		

Source: Adapted from Appendix 5

[3]Short-term benefits are immediately realisable from the relevant GR, while medium-term benefits are realisable after change of current land use. Long-term benefits span both present and future generations.

Data analysis was conducted as follows:

- The socio-economic profile of respondents, comprising: gender; age; and, sources of income, were summarised using descriptive statistics;
- Differences in proportions of "yes" and "no" answers were compared across different ownership levels, using a chi-square (χ^2) test in the statistical package Minitab.
- Differences in needs and aspirations were ranked and analysed using rank tests in the statistical package Minitab. Differences were compared only between intermediate and weak owners, as the needs and aspirations of strong owners were totally different to those of lesser ownership levels.

4.4. **Results**

The comparisons between the three ownership levels were ordered into the socio-economic profiles of respondents (4.4.1); their short-, medium- and long-term benefits (4.4.2); and, their needs and aspirations of respondents (4.4.3). Overall, the results showed very significant differences between strong ownership and the other two lesser ownership levels. Nevertheless, there were significant differences between the two lesser ownership levels.

4.4.1. **Socio-economic profiles by ownership level**

Of the 29 strong owners, 3 were females while the rest were males. In stark contrast, 989 females (62%) and 618 (38%) males were interviewed amongst the intermediate owners, and these proportions did not differ (χ^2= 3.35, df=2, P>0.05) from the 795 females (63%) and 470 males (37%) interviewed amongst weak owners. The age range amongst the strong owners was 28 to 76 years, which differed markedly (χ^2= 3.35, df=2, P>0.05) from the age range amongst intermediate and weak owners, many of whom were in the younger band from 16 to 27 years (Table 4.3a). Absence of this younger age class among strong owners could have influenced results, and this could have significantly affected the differences between the strong and lesser levels of ownership, including the determinants of attitudes (see Chapter 6).

Table 4.3a. Age profile of respondents.

	Strong ownership		Intermediate owners		Weak owners	
Age class (years)	**No.**	**Percentage**	**No.**	**Percentage**	**No.**	**Percentage**
16-21			388	24%	341	27%
22-27			318	20%	258	20%
28-33	3	10%	254	16%	204	16%
34-39	4	14%	180	11%	138	11%
40-45	3	10%	129	8%	107	9%
46-51	8	28%	100	6%	72	6%
52-57	3	10%	67	4%	42	3%
58-63	2	7%	64	4%	39	3%
>63	6	21%	107	7%	64	5%
Total	**29**	**100%**	**1607**	**100%**	**1265**	**100%**

All strong owners earned income, some (27%) from the PA in question and the rest from other sources (Table 4.3b). In comparison to the lesser levels of ownership, most strong owners were relatively wealthy individuals, over 90% of whom earned more income than the top earners among the two lesser ownership levels (Table 4.3b).

Table 4.3b. Monthly income of respondents expressed in South African Rand (SAR) and US$ (with 1 US$=6SAR in 1999).

Income Range		Strong owners		Intermediate owners		Weak owners	
In SAR	**In US$**	**No.**	**Percentage**	**No.**	**Percentage**	**No.**	**Percentage**
No income		-	-	1207	75%	1039	82%
≤500	≤83	-	-	152	9%	100	8%
501-1000	84-166	-	-	76	5%	51	4%
1001-2000	167-333	-	-	89	6%	25	2%
2001-3000	334-500	-	-	36	2%	23	10%
3001-4000	501-667	-	-	17	1.06%	16	1.8%
4001-5000	668-833	-	-	15	0.9%	6	0.5%
5001-6000	834-1000	-	-	10	0.6%	-	-
6001-7000	1001-1167	-	-	3	0.19%	1	0.08%
7001-8000	1167-1333	3	10%	1	0.06%	2	0.16%
≥10001	≥1667	26	90%	-	-	-	
Total		**29**		**1607**	**100**	**1265**	**100**

Very few respondents (10%) among strong owners earned SAR7000-8000 (US$1167-1333) per month, while the remainder earned well over SAR10000 (US$1667) per month. Most were managing other businesses, and were therefore reluctant to disclose their full incomes. In contrast, among lesser ownership levels, 78% of respondents combined earned no income, and of the small proportion that earned income, most

(61%) earned less than SAR1000 (US$166) per month, with no evident difference (P>0.05) between intermediate and weak ownership levels.

All respondents (100%) among the strong owners had visited their neighbouring GRs (Table 4.3c). All the strong owners cited wildlife and landscapes as the main attraction for their visits to PAs. However, all respondents among strong owners recognised that they had the necessary transport such as motor vehicles to visit GRs. Indeed, some strong owners resided within their GRs and, as a result, found the question a bit irrelevant. Visiting PAs by the strong ownership level was correlated with both their life styles and tourism-related business activities, such as checking tourist transactions. In contrast, many fewer individuals among both intermediate (47%) and weak owners (57%) had visited their neighbouring GRs (Table 4.3c). The lesser owners required a great deal of financial sacrifice to visit their neighbouring PAs even when they needed to make the trip in order to look for work or to visit family relatives. Apart from lacking the culture to visit PAs, the costs of the visits far outweighed the benefits.

Table 4.3c. Reasons for visiting and not visiting PAs.

	Strong owners		Intermediate owners		Weak owners	
Reason	**No.**	**Percentage**	**No.**	**Percentage**	**No.**	**Percentage**
For visiting:						
Enjoy wildlife and landscape	29	100%	205	16%	270	17%
Stay in accommodation	-		12	1%	102	6%
Look for work	-		256	20%	340	21%
Work there	-		49	4%	113	7%
See friends	-		74	6%	67	4%
Total	**29**	**100%**	**596**	**47%**	**892**	**55%**
For not visiting:						
Not interested	-		335	27%	455	29%
Too expensive	-		334	26%	260	16%
Total	-		**669**	**53%**	**715**	**45%**

Only 16% of the lesser ownership levels cited wildlife and landscapes as the main attraction to visit PAs, while the rest either worked there or had gone to look for work. Furthermore, even if they had wanted to visit PAs, the lesser owners simply lacked the means, such as transportation or sufficient money, in order to make the trip possible. Accordingly, visiting PAs amongst lesser ownership levels was more dictated by the

necessity of meeting basic material needs rather than to relax or to appreciate wildlife and landscapes. Hence, only 21% of lesser owners overall stated that they could not afford to visit because it was too expensive. The remaining half (49%) of the lesser ownership level indicated that they were not interested or even keen to find out what was happening inside PAs (Table 4.3c). In summary, the differences between strong and lesser levels of ownership are like two worlds apart in the context of visiting PAs, because they have totally different viewpoints on the use of PAs. To the strong ownership level, visiting PAs or their respective GRs is considered an integral part of their lifestyles, and perhaps a key aspect of conducting their business strategies.

4.4.2. **Attitudes to short-term benefits by ownership level**

Most strong owners did not support providing any immediately realisable benefits from PAs to local communities, whether this comprised free firewood collection or allocating land to landless people (Table 4.4).

Table 4.4. Differences between the views of respondents to short-, medium-, and long-term benefits, according to ownership level (with S=strong, I=intermediate, and W=weak).

Time frame & variables	Strong (%)	Intermediate (%)	Weak (%)	S v I v W χ^2: df=2	I v W χ^2: df=1
Short-term:					
For free firewood collection	21	72	86	124.8***	81.4***
For allocation of land to landless	7	48	37	44.7***	34.8***
Mid-term:					
Against development of PA land	97	41	38	41.8***	2.6
Against removing animals	97	50	64	80.3***	56.4***
For state funding of PA	59	51	63	39.3***	41.3***
PA contributes to livelihood	97	54	49	28.5***	7.1**
Long-term					
PA protects biodiversity	100	80	86	22.0***	17.7***
Managers protect PA	97	71	78	28.3***	18.2***
Fences reduce conflict	100	93	91	6.1*	4.1*
Keep PA for posterity	100	87	84	9.9**	5.0*
PA contributes to SA economy	97	71	76	17.1***	8.9**

Only 21% of strong owners supported free firewood collection, compared with 72% of intermediate, and 86% of weak owners, respectively. Furthermore, there was even less support (7%) among strong owners for allocating some PA land to landless people,

compared with 48% of intermediate, and 37% of weak owners, respectively. These differences were significant, both between all three levels of ownership, and between intermediate and weak owners (Table 4.4).

4.4.3. **Attitudes to medium-term benefits by ownership level**

Almost none of the strong owners supported removing the animals from PAs (refer to Table 4.4). For example, 97% of strong owners were against both these medium-term benefits. In contrast, there was more, although not overwhelming, support among both intermediate and weak owners for developing PA land and for removing the animals, although the latter received less support. There was majority, but marginal support for state funding of the PA, with strong showing among weak owners. Almost all strong owners recognised that the PA contributed to livelihoods, while views were more evenly divided among intermediate and weak (Table 4.4).

4.4.4. **Attitudes to long-term benefits by ownership level**

Almost all the strong owners supported long-term benefits of PAs, including that the PA protects biodiversity that managers protect the PA for the common good, that PAs should be kept for posterity, and that PAs contribute to the South African economy (see Table 4.4). There was also very strong support among the intermediate and weak owners for the long-term benefits of PAs. Furthermore, there was greatest agreement between ownership levels on the value of fences in protecting people and wildlife, and on keeping PAs for posterity.

4.4.5. **Current benefits and expectations**

The benefits and expectations of strong owners were so totally different from those of lesser ownership levels that they could not be compared using Mann-Whitney rank tests. The benefits that strong owners received from associated PAs were rewards such as high returns on capital investment, and psychological fulfilment or 'the feel-good factor' of self-actualisation as a result of achieving objectives. In terms of aspirations,

strong owners simply expected more of the same rewards, namely, continued capital appreciation, high return on initial investment, and more of 'the feel-good factor' or increased self-actualisation. Clearly, the strong ownership level was into high order needs (Maslow 1970). In stark contrast, the benefits and aspirations among the lesser ownership levels were exactly the same, namely, jobs, development, and education, and both levels of ownership simply expected more of the same benefit (Table 4.5).

Table 4.5. The current and expected future benefits of the lesser ownership level.

	Level of ownership		
	Intermediate	**Weak**	**Significance**
Current	1. Jobs 2. Infrastructure development 3. Education or awareness 4. Electricity 5. Subsidised meat	1. Jobs 2. Education or awareness 3. Infrastructure development 4. Firewood 5. Subsidised meat	P<0.005
Aspirations	More of the same current benefits	More of the same current benefits	P<0.005

The rank test showed significant differences between weak and intermediate owners in terms of prioritisation of these benefits and aspirations (Table 4.5). For weak owners, the benefits that they perceived from PAs were, in descending order of priority: jobs, education or awareness, and infrastructure development. For intermediate owners, the order of priority of the second and third expectations was reversed, and emphasis was placed on development needs, and less emphasis on environmental education. In the case of aspirations, the differences were not significant. In both situations, provision of energy and cheap meat ranked lower than other benefits.

4.5. **Discussion**

The level of ownership in PAs strongly influenced the attitudes of respondents to the time-related benefits that could be derived from PAs. In the context of the hypothesis that ownership influences the relationship between PAs and their beneficiaries, it is the strong ownership level had highly positive attitudes to PAs when compared to lesser ownership levels. However, the attitudes of all ownership levels varied significantly

according to the time frame involved, but this could equally have being influenced by factors such as the differences in the age classes of samples from the strong and lesser ownership levels, and as well as the social status of the different ownership levels.

Based on short- and medium-term benefits, the strong ownership level supported PAs more than lesser ownership levels. However, all the ownership levels showed strong support for long-term benefits of having PAs, suggesting that they all supported the long-term ideals of biodiversity conservation. Despite this, the lesser ownership levels earned far less income than the strong owners, implying that, while the long-term ideals of biodiversity conservation are supported by all levels of ownership, the short- to medium-term benefits of PAs were most likely to determine whether the lesser levels of ownership supported PAs or not.

In terms of current benefits received from PAs and aspiration, the lesser ownership level viewed PAs totally differently from the strong owner. While the lesser ownership levels expected PAs to provide them with basic socio-economic benefits such as jobs, education, and infrastructure (good roads, water, and electricity), the strong ownership expected high order socio-economic benefits such the 'feel good factor' based on high returns on their investment. Of particular interest here was that the lesser ownership levels simply aspired for more of the same benefit, suggesting that the lesser ownership levels would always expect PAs, or the managing conservation agency, to contribute towards improving their livelihoods. Accordingly, the present study results should be interpreted and discussed in the context of how the various ownership levels were constituted.

Initially, the strong ownership level developed through the wildlife ranching industry, and mainly from the desire by the ranch owner to have a wildlife retreat for their private enjoyment (Bothma 1996). Strong owners, invariably white people, benefited from the privileges associated with long established access to state PAs. By having long established access to PAs they internalised both the conservation and economic values of these areas. Indeed, the strong owners entrenched their rights to wildlife by establishing their own PAs. For instance, in 1995 there were about 5,100 registered

game ranches, and in 1997 these ranches increased in numbers to 8,000 covering 150,000 km^2 or 14% of South Africa's land surface (Du Plessis 1997). Through trial and error, white farmers recognised that wildlife ranching was more profitable than cattle farming in marginal rainfall areas (Robinson & Lademann 1998; Grossman *et al.* 1999). On fenced ranches, wildlife belongs to landowners, while it is state-owned and controlled on unfenced land (Glazewski 2000). In marginal rainfall areas, wildlife ranching performs better than agricultural farming in terms of financial returns on initial capital investment (Magome *et al.* 2000), and private wildlife ranchers are fully aware of these facts.

The private wildlife ranching industry is no longer 'a tottering child' using trial and error, or 'gut instinct' (Bothma 2002), instead it has become a 'centre of excellence' (Bond 2004). By early 2000, wildlife ranches had increased in numbers to 9,000 covering 170,000 km^2 or 2.5 times the total area covered by state PAs (Bothma 2002), and this total excludes unregistered wildlife ranches (Magome 2003b). Recognising the contribution of private landowners to both the economy and to conservation, the state assisted them (Bothma 2002). In return, there were massive investments by white farmers in conservation, and this encouraged the government to leverage this success to achieve national goals (Magome 2003a, 2003b).

In stark contrast, black people have been marginalised from the wildlife industry since colonial rule. Land dispossession through apartheid rule was more extensive and systematic, more protracted, and probably more violent and cruel than elsewhere in Africa (Bernstein 1997). This dispossession created a dichotomy of experiences at all levels between white and black South Africans, ultimately culminating into two sets of racially polarised views and attitudes on almost all aspects of the country's socio-political economy. Indeed, nature conservation and an interest in wildlife have been largely the preserve of the privileged white people, those with the privilege and leisure to enjoy such pursuits (Kumleben *et al.* 1998). By restricting black people to 13% of the country's land surface, the apartheid regime got rid of those features of their land ownership that it found undesirable (Everson & Hatch 1999; Miller 2000). Ultimately, this dichotomy placed obstacles in the path of economic advancement of black people.

To the extent that this is true, the results of this chapter simply reflect the country's political dichotomy. In this context, simple scientific analyses play only a small part in explaining the human-environment interactions (Stott & Sullivan 2000). Furthermore, the need to develop a sound policy framework requires that the results of this chapter be further discussed in three key contexts: 1) testing the effect of ownership in terms of the study hypothesis; 2) the political ecology of ownership on the attitudes of the respondents to PAs, by unveiling the socio-political environment in which such ownership was initially crafted, and; 3) the political ecology of ownership in Southern Africa in terms of those studies involving only local communities, by removing the confounding effect of the strong ownership.

4.5.1. **Effect of ownership**

Strong owners showed more positive attitudes on most key measurements of attitudes towards PAs than lesser levels of ownership. Thus, the relatively small group of strong owners, with their management plans formalised through written agreements, showed cohesion and a shared common purpose. The net effect was that title to land and its associated wildlife use rights shifted the balance of power to a privileged group of the South African society. Most (76%) of these strong owners are white males, with the only exception of strong owners in Madikwe, who comprised four white women and three black men. The white females were commercial owners of land inside and outside of Madikwe, while the black men were predominantly cattle farmers with only lease rights on state land. While almost all white people in the strong ownership were pursuing the highly profitable benefits of Madikwe's wildlife tourism, black people in the same ownership level were only pursuing the less profitable cattle farming option.

The relatively high socio-economic profile of strong owners showed that they had enjoyed long established access to PAs. In South Africa, white people have enjoyed access to PAs since 1898 when Kruger National Park was first established as a game reserve. Furthermore, other investments, jobs and pensions provided the bulk of non-farm income for strong owners in South Africa (Benson 1986). Elsewhere, different socio-economic status between respondents accounted for some of the key observed

variations in attitudes to PAs (Jacobson 1991; Sanjay & Weber 1995). Availability of disposable income affects leisure and livelihood choices, particularly in situations where such choices require travel to expensive destinations.

The attitudes of strong owners included in this study favourably compared with those of their counterparts in the USA (Benson 1986). Indeed, a high socio-economic status usually confers greater leisure time and mobility, more opportunity for enjoying the recreational advantages of nature, and less direct financial dependence on deriving a living from using its resources (Kellert 1996). Therefore, demographic and socio-economic factors exerted greater influences on the attitudes of respondents, suggesting that local development needs are important (Mehta & Kellert 1998). In addition, appreciation of PAs varies between cultures, and the circumstances under which affected people provide for their daily livelihoods (Jachmann 1998). In stark contrast, the lesser ownership levels did not have a long-established practice of visiting PAs.

Under the apartheid regime, the lesser levels of owners, comprising only black people, were denied access to PAs. The only meaningful choice left to them was to secure jobs in activities associated with PAs. In this context, it is financially expedient for the lesser ownership levels to value short- and medium-term benefits associated with PAs, because of discounting. Equally, it is difficult for the lesser ownership levels to justify state funding for PAs, as it would reduce funding for other welfare needs such as education, health, and social security. However, state funding subsidises management costs for PAs, explaining the support from strong owners who are in partnership with the state, for example at Ligwalagwala and Madikwe.

Ligwalagwala and Madikwe were created as new models of state and private sector partnerships. The state provides the basic infrastructure such as land, fencing, wildlife, electricity, water supply, and road networks, while the private sector builds lodges to accommodate paying tourists, which in return pays lease and right-to-use fees to the state. This *quid pro quo* ensures that the state re-invests part of the lease money to maintain the integrity of its PAs (Magome *et al.* 2000), thereby further improving the investments of the private sector. However, for a completely private initiative such as

Selati, receiving state funding could limit their right to freely manage their land. The refusal of Selati owners to accept state funding limits interference by the public, who could otherwise object to the state enriching private individuals at their expense. For a long-term conservation development initiative to succeed, members must share common goals. In Selati, the seven founder members understood that success entailed: 1) sharing of a common goal, and recognition amongst the founder members ensured that they were creating a new partnership, and; 2) understanding by the founder members that they were not striking a one-off deal but embarking on a process in which early focus had to be given to the legal structuring of the project (Snaddon 1994). To ensure success, Selati's common long-term goal was agreed to and written in bold letters as: "**to conserve and enhance the bio-diversity of the ecosystem and to realize its full economic potential on a sustainable basis**" (Snaddon 1994:3).

Similarly, the founder members of Ligwalagwala had a similar goal. However, high financial returns on initial investments were the primary motive for strong owners in Madikwe, while biodiversity conservation goal was a secondary spin-off (Davies 1996; Magome 1996; Magome *et al.* 2000). In essence, these goals are similar since they are all based on attempts to generate sustainable economic benefits from biodiversity conservation. The shortfall of the Madikwe model might arise when the pursuit of financial returns starts to compromise long-term biodiversity conservation goals. However, practice so far demonstrates that strong owners recognise that they will not make a quick or high economic return on their initial capital investment, and so recognise the need to look after their business interests over the long term.

Strong owners also have financial incentives that shape their attitude. Thus, conservation and utilisation of wildlife on private land in South Africa has contributed towards a change in the wildlife management profession (Benson 1989). Accordingly, strong owners did not support short- and medium-term benefits from changing land use, because they had already made a quantum leap to the most appropriate economic and productive use of land over the long term. The same cannot be said, however, about lesser owners for whom most of the benefits of PAs are less easily quantifiable, but for whom the opportunity costs of forced removal or denied access to resources

are real. Indeed, the lesser ownership levels were largely composed of unemployed respondents with poor levels of education. In stark contrast, high levels of education are generally associated with support for the natural world (Kellert 1996).

Many among the lesser owners were poor or had low income, and the ratio of potential beneficiaries to that of available resources was high compared to that of the strong owners. Consequently, the lesser owners preferred short- and medium-term benefits that had the net effect of increasing benefit streams to their constituency. The lesser ownership levels visited PAs mainly to seek jobs as opposed to engaging in leisure activities. Their marginal support for PAs was evidenced by opting for agriculture or industrial development or industrial development over medium-term benefits from conservation, and suggested that they are unlikely to support PAs in the short- or medium-term when their survival needs were not met. It is likely that their level of support for environmental issues was tempered by the fact that their basic economic needs had not been met (Kivilu 2002). Given these social needs, the lesser ownership levels wanted PAs to provide immediate material gains, suggested by their strong utilitarian view of PAs.

In South Africa, this utilitarian view of PAs has indeed been heavily promoted by some homeland agencies as part of their conservation strategies (see Odendal 1991; Molope 1988; Davies 1993; Anderson 1995). This utilitarian view further suggested that many local people supported conservation if they received material benefits. Elsewhere in South Africa and in Tanzania, some local communities supported PAs only on the basis of material benefits that they derived from them (Infield 1988; Newmark *et al.*1993). In contrast, this study covered three ownership levels, and because of South Africa's political history, it also encompassed two polarised racial constituencies. Thus, the antipathy of black people to both nature conservation and wildlife is of concern to the post-apartheid government (Kumleben *et al.* 1998). Sadly, this dichotomy also affected the views and attitudes towards PAs. The differences between the strong owners and lesser levels of ownership limited general comparisons with other studies on attitudes (compare to Infield 1988; Newmark *et al.* 1993). Other differences between strong and lesser ownership levels are related to issues of scale.

Generally, the smaller the number of people in an ownership level, the more effective they are in achieving stated goals. Thus, increases in scale complicate communication and decision making. Beyond certain levels, management must be bureaucratised with the attendant costs (Murphree 1998). For local people, due to large numbers of people involved, 'bureaucratised' systems will imply further inefficiency in the management of communal resources. There is also a relationship between ownership, economic value, and institutions. With weak ownership, people tend to form institutions only when resources have very high economic value. With strong ownership people tend to form institutions even when there is very little economic value to be derived from the resource in question (Bond 2001). Thus, people will not form management institutions when the combination of ownership and economic value are inadequate. Hence, the likelihood of people forming workable institutions increases with the strength of ownership (Bond 2001; Murphree 2002). While the lesser ownership levels lacked the incentives required to approximate the attitudes of strong ownership, the central issue here is a dual land tenure system in terms of inherited colonial property rights.

In this historical context, communal tenure was formalised specifically to deny local people strong property rights (Murombedzi 1999). Ultimately, the trend in communal areas was for the local structures of governance to be replaced by conditions of open access with its ills (Turner 2000). As a result, the differences between strong and lesser ownership levels should be discussed beyond simple statistical analysis. The key question is: what is it about ownership that makes strong owners have more positive attitudes to PAs than lesser owners? While there is no simple cause-and-effect relationship, the answer is partly nested within the political economy of South Africa: how the interplay between politics and economic aspects of a nation state constitutes its political economy; how production, distribution, and consumption of goods are organised within its society.

In South Africa, the concept of 'political' goes beyond this simple definition. The political economy of South Africa is well documented and is often described as a 'dual legacy of a deeply divided racial society' (Nattrass & Ardington 1990; Anwireng-Obeng 1996; Schoeman 1998). Compared to other nation states, the political economy

of South Africa was systematically engineered under apartheid, an era of separate human development that asserted the superiority of white people over black people. In fact, the political and economic strategy was to design racist laws, rules, regulations, and practices aimed at benefiting the colonisers. As a result, the country's political economy was deliberately planned ostensibly to promote the interests of white people at the expense of black people. What is relevant here is how South Africa's political economy affected institutions, including property rights and the notions of ownership between white and black people.

Ultimately, these historical developments left the country's political economy with, *inter alia*, a key strategic feature, namely, a centralised ownership of both land and big business in the hands of the few white people (Schoeman 1998). While white people in South Africa use their rights in property and land to secure capital growth, black people use their rights to maintain survival strategies. The net effect was that people with entrenched rights were compared to people with extinguished rights. South Africa's political economy polarised its minority white people from its majority black people in all aspects of their lives, essentially creating two worlds in one country: 'first world' lifestyles for white people and 'third world' livelihoods for black people. As a result, the observed attitudes of respondents in this study mainly demonstrated the long established *status quo* in South Africa.

The effect of South Africa's political landscape on the attitudes of its society, strong ownership (mainly white people) and lesser ownership (only black people), is further discussed in relation to the environment. Interpreting ownership in relation to political ecology is what Wolf (1972) termed 'ownership and political ecology'. Understanding full extent of the effects of institutionalised racism on the political ecology of South Africa, particularly in rural areas, is a pre-requisite for meaningful reform measures (Turner 2000). Political ecology, as politically located ideas of the environment and of the 'right' relationship of society to and within it, has existed unconsciously from the time people started to imagine environmental utopias and dystopias (Stott & Sullivan 2000). In-depth analysis helps to reveal and to clarify the circumstances whereby differences within society mean that not all people experience environmental ideas in

the same way (Stott & Sullivan 2000). Furthermore, the limitations of conventional analyses of environmental data are that they rely heavily on scientific explanations, with both social and political dimensions either ignored or downplayed (Adams 2002).

4.5.2. **Political ecology of ownership in South Africa**

In policy studies, contextualising the influence of politics on human attitudes to the environment offers better insights into observed patterns than relying on scientific data alone (Hammersley 1995; Fook 1996; Bryant & Bailey 1997; Bryant 1998; Gibson 1999; Stott & Sullivan 2000; Anstey 2001; Adams 2002). During apartheid, there were some accounts of the interplay between society and environment (Cock & Koch 1991; Griffiths & Robin 1997). Ironically, most conservation and development studies rarely draw from political ecology to explain either the results or the performance of projects. Much knowledge about the people and the environment is mythologised as scientifically correct, while ultimately being based on very little (Stott & Sullivan 2000). By ignoring political ecology, some studies lack insights to produce sound policy guidelines. Indeed, methodologies of 'science' play a small part in explaining interactions of humans and their environment (Stott & Sullivan 2000).

Political ecology provides explanations that take into account the dynamics and the properties of the politicised environment, and of how unequal power relations between different actors affect outcomes of interactions of society and its environment (Stott & Sullivan 2000; Adams 2002). Therefore, political ecology can shed more light on the results of the present study than depending on statistics alone. Much of the 20th century South Africa has been one of imposition of many constraints on black people, rather than of opening opportunities for them (Buttler *et al.* 1977).

Under apartheid, conservation objectives were secondary to the political priority of establishing a society based largely on the privileges of white people (Khan 1989). Since South Africa is a legacy of dualism that was politically crafted ostensibly to separate black people from white people, a historical perspective for interpreting the polarised nature of environmental issues is indispensable (Khan 1989). This is because

the 'politics of ecology' (Cock 1991a) is at the core of this study. South Africa still has two racial constituencies for PAs, white people with easy access to PAs, and black people with restricted access. The results of this study mirror this reality. Under apartheid, offending black people were brutally assaulted by law enforcement officers, and subsequent fines imposed by the courts became another prohibition. These cruel practices often raised questions of human rights: are poachers 'victims or villains' (Klugman 1991) of 'fences and fines' (Carruthers 1995)? Therefore the differences between the attitudes of strong and lesser ownership levels on visits to PAs, and on short- and medium-term benefits, provide insights into the country's political landscape, and its effects on the socio-economic status of its racial constituencies.

The debate on issues of environment and socio-economic has a long pedigree in South Africa (Glazewski 2000; Seleoane 2001; MacDonald 2002), and this influenced how the country's two major political constituencies, white people and black people, view environmental issues. Under the apartheid era, South Africa's PAs were 'playgrounds' for white people (Carruthers 1995). Except for a few national parks, almost all PAs were created to re-establish declining populations of 'game', basically comprising hunted large mammals, for the exclusive use of the country's white citizens. The hunt was a seminal rite of passage for young white males (Beinart & Coates 1995). Thus, the hunting industry stimulated a rapid growth in the number of private ranches (Bothma 1996). Indeed, the word 'park' was problematic because it conveyed ideas of a public recreational playground, and titles such as 'reserve' had connotations of exclusivity (Carruthers 1997). In fact, the term 'game' instilled a strong commercial use of wildlife because it is in most situations, highly associated with recreational hunting of wildlife species. With time, some PAs became important cash generating areas, as photographic tourism started to compete with the hunting industry.

South African PAs were deeply political because racial privilege dictated access to resources, and issues of power intensified as a result of opportunity costs, restricted access, and denied rights. Hence, the problems and costs of PAs depend on the extent to which long-term conservation goals conflict with short- to medium-term needs of a people (Bell 1984b). Since short-term economic gains are likely to replace long-term

rewards, any discussion of my results needs to frame the issues of access and control in a broader political context (Zerner 2000) of rights and privileges (Beinart 2003). In South Africa, local people have been influenced by social, political, and economic factors, both in time and space. Accordingly, the present results reflect the country's colonial and racial history, and are a snapshot of its transition from this history into a yet undefined future. What is relevant here is how this history affected the present results, in terms of the attitudes and behaviours of both lesser and strong owners.

The creation and management of South Africa's PAs was part of a socio-political plan of land use that was systematically engineered by the apartheid regime. At the height of apartheid (1913-1983), black people were legally prohibited from visiting PAs except as employees (Khan 1990). This situation somewhat changed with the creation of homelands for black people, as some PAs fell under the homeland management systems. However, homelands did not rectify problems caused by isolating and restricting black people from PAs. While some homeland agencies tried to integrate local people with PAs, these efforts could not rectify land rights, which were essentially a national problem. Thus, when the concept of property rights is applied in South Africa in relation to land, its effectiveness is restricted (van der Merwe 1990).

In the context of PAs, understanding of property rights reflected exclusive access only for white South Africans that focused on big game (Cock 1991a, 1999b), and its commercial use in private game ranches (Bothma & Teer 1993; Bothma 1996). The net effect of this approach was to entrench the rights of all white South Africans towards PAs. In fact, many of the country's game ranches were created in 1950s for economic returns often associated with the hunting industry (Steyn 1966; Joubert 1968; Grossman 1989). While white people narrowly associated PAs with the notion of pristine nature, black people associated PAs with forced removals, denial of access to natural resources and creation of privileges for the white minority (Glazewski 1999). Indeed, denying black people rights included land rights, in the most economically viable parts of the country (Miller 2000). With the majority of black people trapped in a continual battle to survive, few had the means, the inclination, or the leisure to engage in the country's conservation activities (Khan 2002).

It would be naïve to expect black people, largely peasants, to have the same positive attitudes to PAs as white people, who were mainly entrepreneurs. Thus, for the strong ownership level, privately owned game ranches are investments in real property that is tradable and can be used as collateral for other investment, thereby increasing choices. In Zimbabwe, a large number of commercial farms have converted to game ranches as a result of the 1975 amendment to the Wildlife Act, which gave ownership of wildlife to the landowner. While white farmers involved in game ranching used the full gamut of activities such safari hunting, cropping for venison and hides, trading in live animals, and photographic tourism (Martin 1984b), the biggest challenge was to bring the rural peasant sector into the wildlife industry through the CAMPFIRE programme (Martin 1984b; Murphree 1984).

In South Africa, private game ranching has made conservation gains through profit incentives for white farmers (Luxmoore 1985). Private land ownership in South Africa has a strong Caucasian ancestry because the owners of private lands are mainly white people of European descent (Benson 1989). Over time, these white people evolved capitalist systems of wildlife ownership similar to those in other developed countries such as the United States of America. Hence, wildlife is a source of income for white farmers and they treat it as such through good management (Benson 1986, 1989). In contrast, the immediate concerns of the lesser ownership levels are to sustain their livelihoods, and land-based strategies are central to achieving this. South Africa's rural population of over 11 million black people live in communal areas of the former homelands (Van Horen & Eberhard 1995), and they need land in order to sustain their livelihoods (May 1996; Cousins 1999), but this is unavailable (Miller 2000). These land-based livelihood strategies focus on meeting basic survival needs such as small scale subsistence farming, and trade with natural resources (Shackleton *et al.* 2001).

The attitudes of the lesser ownership levels correlate closely with their survival needs. For black people still reeling under the impact of apartheid laws, and struggling to survive the harsh socio-economic and political climate created by these laws, and with few opportunities for quality education or leisure time in PAs, conservation issues were of extremely low priority, if indeed they were thought of at all (Khan 2002).

Contrast these black people with established white people using their land as game ranches, and in some situations through partnership with state-PAs to exploit the choices associated with the lucrative wildlife-related industry. While the rights of strong owners were psychologically and socially entrenched, and were also protected by the law, the rights of the lesser levels of ownership were extinguished without legal recourse. The social engineering that characterised the apartheid rule was linked to the ways in which occupation of land, and resources were regulated (de Villiers 2003).

It can be posited that this study unfairly compared an advantaged and enfranchised minority of South African society to its majority of disadvantaged and disenfranchised citizens, and such a comparison is seldom done. While in the democratic South Africa, black and white people are supposedly equal in law, the former have economic power, and the latter have political power. Consequently, the words 'in a democratic South Africa' designate a long-cherished but still unrealised ideal (Cowen 1999). For policy guidelines, the key question is whether the marginal attitudes of disenfranchised lesser owners can be changed to approximate to those of the enfranchised strong ownership observed in the present study, assuming that the attitudes of the strong ownership are desirable for the long-term conservation of the country's biodiversity. The answer to this question depends on what the government wants to achieve in terms of allocating rights and various incentives to its constituencies for biodiversity conservation, and on how a particular constituency wants to use such allocations.

To improve the land ownership of disadvantaged South Africans, the government has introduced a land reform programme, a sensitive political issue that must balance the issues of social justice against those of the broader socio-economic goals of creating a stable and viable economy. In the context of this study, the apartheid government created incentives for its powerful political constituency by entrenching their property rights. The quagmire is that Restitution of Land Rights Act epitomises the paradox at the heart of the struggle for social justice in South Africa, for it poses questions about whether a society can ever hope, by a dint of a fresh law-making, to undo the effects of past unjust laws (Budlender *et al.* 1998). While restitution and environmental rights of black people can be achieved by targeting basic survival needs (Khan 2002), the

elite status of white people increases their wealth (Burgess 2002). However, for the first time since the 17th century, black people in South Africa can now form a juristic person, a Communal Property Association (Act 28 of 1996), to acquire, hold, and manage property on an agreed basis by community members based on a written constitution. While the white people of South Africa use their rights in PAs to leverage income, black people are still trying to learn the ropes. The key question is whether local people wish to maximize financial returns on their land investment or whether they wish symbolic rights (Magome & Murombedzi 2003). However, if local people wish to maximize returns from PA under secure tenure rights, they may have to use modern conventional business principles.

4.5.3 **Political ecology of ownership in southern Africa**

In most African countries wildlife is a state owned resource. Furthermore, the manner in which local people participate in conservation activities is strongly influenced by the wider political context, and macro policies affecting access to land and natural resources vary among different countries (Little 1994). Ownership of both wildlife and land has a crucial bearing on how local people view their participation in conservation efforts (Murphree 1997; Glazewski & Bradfield 1999). Without very clearly defined tenurial rights, the *sine qua non* of power, local people lack incentives to participate in conservation efforts that were designed for their benefit (Magome *et al.* 2000; Murphree 2003). So far, this chapter has shown that strong owners enjoy secure land rights, but this is mostly limited to a privileged sector of South Africa. Therefore, various attempts to link local people to successful biodiversity conservation initiatives boil down to two harsh realities — disenfranchised rural people with weak rights, and developing countries with limited resources to improve livelihoods of their citizens.

Most rural people of southern Africa live on state land, in conditions where the state cannot manage resources, and where local people have neither the motivation nor the authority to manage the resources themselves (Murphree 1991). Indeed, small-scale black farmers exist in the fiefdoms of bureaucracy under tenurially discriminatory conditions, in systems where title deeds are regarded as emblems of competence, and

communal land ownership the badge of incompetence (Parker 1993). Ironically, land reform policies of the region have failed to change the situation. The main reason for this failure is that post-colonial governments are interested in economic growth, which is centrally driven and controlled (Murphree 1997). Therefore, the success or failure of communal resources is influenced by central policy imperatives.

Post-colonial political land settlements in southern Africa have been dominated by concerns over the fate of the colonial settler class, thereby further entrenching their property rights (Murombedzi 1999b). In essence, most countries of the region have maintained the *status quo,* except that only the new political elite has also become the strong owners observed in this present study. At the local level, most government priorities encompass the appropriation of power and value from the centre (Murphree 1997; Gibson 1999). The region's rich wildlife resources are used to control political constituencies. Indeed, the significance of wildlife makes it a political commodity, and politicians use it to discriminate between allies and enemies (Gibson 1999). Hence, the local people are most unlikely to enjoy benefits from wildlife with state interference.

In Namibia, South Africa, and Zimbabwe, land reform policies are mainly based on land redistribution, as well as land tenure reform, in order to ensure some security of tenure for local people who did not have any such security during the colonial era (Murombedzi 1999). As land and natural resources have assumed greater economic and political values, post-colonial authorities have also expropriated resources for themselves. As a result, communal tenure suggests that local communities can control only those few resources with negligible values (Murombedzi 1999). It is evident that devolution of authority to local people in the context of natural resources is a complex issue, raising a number of fundamental legal and institutional questions, which go to the very heart of sustainable development (Glazewski 2000).

In Namibia, over 90% of the populations of some large wildlife species are located outside formally proclaimed PAs, largely on agricultural land (Richardson 1998). In wildlife-rich communal areas of Namibia, residents of communal areas can be granted conditional ownership of certain wildlife species, the right to other species through a

permit system, the right to buy and sell wildlife, and this has encouraged local people to form conservancies. In this context, local people define ownership in terms of their connection to wildlife based on cultural values, rather than on property rights derived from the state (Jones 1999). As a result, property rights are important to local people in terms of improving their livelihoods. By pooling their land resources together to improve economies of scale, perhaps they may in time achieve the entrepreneurship of strong owners. Where local people have land titles and some limited control over the natural resources, as is the case with land claims within PAs of South Africa, it depends on what they wish to achieve with acquired land.

In spite of these laudable efforts, providing security of tenure to local people appears to be fraught with difficulties. For example, in South Africa many rural people experienced total disruption of their indigenous systems and traditional structures of communal tenure, because they were perverted and destroyed by externally imposed administration (Turner 2000). In fact, most dimensions of the so-called communal management in rural areas of South Africa are in disarray, and require legal attention in the draft bill on communal land rights. However, the government seems determined to ignore advice or to overlook mistakes of other countries like Kenya, where imposed land titles did not resolve or secure livelihoods issues of the poor.

In communal areas of Zimbabwe, local communities do not view themselves as the joint owners of wildlife. Rather they continue to see wildlife as a resource that belongs either to the state or to the rural district council (Murombedzi 1994). Correspondingly, attempts to foster local people's participation in conservation through the distribution of revenues from wildlife without devolving rights to such people, does not improve local stewardship of those resources, regardless of the extent of revenues distributed (Murombedzi 1999a). Furthermore, these local communities cannot use their limited rights in wildlife to the extent that they can gain an increased stake in its multiple level of value. Since property rights are the foundations of resource use, management and conservation (Everson & Hatch 1999), local people are constrained from reaching full resource utilisation by entitlement failure (Murombedzi 1999b). The challenge for the state and its policy advisors is how to enhance entitlements or how to use entitlements

frameworks to improve livelihoods of local people. However, post-colonial African governments continue to deny local people full authority to own the wildlife resources among which they live.

The management of communal lands is dynamic and challenging (Everson & Hatch 1999), but the post-colonial models still treat them as static (Barrow & Murphree 2001), Thus, as in colonial times, communal lands are still held in the fiefdoms of state bureaucracies, political elites and their private sector business partners (Murphree 2003). In situations where the community structures have been revived, local people neither manage nor control the resources on their lands (Gibson 1999; Doré & Chafota 2000; Murombedzi 2003). This situation continues unchanged throughout much of southern Africa, of the rest of Africa, and in many developing and many developed countries (Murphree 2003). Correspondingly, the discourse of the performance of communal lands often ignores the pressures of the broader political ecology in which projects operate (Koch 2004a).

In Zimbabwe, while the Wildlife Act of 1975 granted full ownership of wildlife to the private landowners (Martin 1984b), the Communal Lands Act of 1982 only vested the ownership of communal resources with the state and assigns rural district councils the power to regulate resource use in such communal lands (Murombedzi 2001). A central feature of all these developments is a lack of devolution to local communities (Anstey 2001). Therefore, as currently constituted, local people are most unlikely to approximate the status of strong owners observed in this study. Furthermore, the diversity of stakeholders and socio-economic conditions makes it difficult to apply formal management regimes to communal lands (Benson 1989; Everson & Hatch 1999; Els 2002a). The problem becomes acute and compounded where biodiversity resources contribute little to livelihoods (Magome & Fabricius 2004).

Given all these constraints, what should local people do? In situations where wildlife is profitable, local people are advised to commercialise part of their equity to competent individuals or agents that can match the sophisticated world of managing the tourism industry (Magome & Murombedzi 2003). Commercialising does not mean

selling off, but outsourcing those aspects of resource management that fall outside the core competencies of local people. Most, if not all, communal rights are combinations of communal and individual assets (Fabricius & Koch 2004). Failure to recognise this has crippled the multiple nature of rural livelihood strategies (Turner 2004).

In theory, control over spatial access through clearly defined rights and boundaries has been emphasised as an essential factor in effective communal control over resources (Berkes 1989; Ostrom 1990; Western & Wright 1994). In practice, rights alone do not constitute sufficient conditions for justice, whether as communal control, capture of benefits, or resource management (Zerner 2000; Hulme & Murphree 2001). Access to other goods and services such as markets, is equally important. Therefore, analysts and advocates of communal resource management regimes need to frame issues of access and control in a broader multidimensional context (Zerner 2000). Indeed, communal approaches to biodiversity conservation have a strong economic rationale (Emerton 2001). Despite this, issues of both access and control pass each other by, like ships at night (Turner 2004), because analysts often fail to realise that in rural development, the concept of a community is an imposed social construct (Koch 2004b).

4.6. **Conclusions**

Strong ownership clearly has played a key role in influencing positive attitudes of a few respondents to PAs in South Africa. However, in this situation strong ownership has enjoyed entrenched rights with a long history of resources management. The major difference in the present study is that: 1) relatively wealthy individuals in the strong ownership level were compared to relatively poor individuals in lesser levels of ownership; 2) small and cohesive groups were compared to large and uncoordinated masses of local people that, as it appeared, hardly shared a common vision; 3) strong rights were compared to weak rights that had been extinguished *de jure*; and 4) astute entrepreneurs with well developed business acumen were compared to peasants trying to eke out a living under difficult rural conditions. The central challenge facing policy makers is whether this situation can be reversed.

In essence, the results of this chapter epitomise the uneven power balance between black and white people of South Africans. These 'racial inequalities should largely be understood in terms of deeply ingrained white power and black powerlessness' (Terreblanche 2002:391). In South Africa racial discrimination has been a major factor in shaping access to natural resources (Beinart 2002) because of the country's 'legal pluralism' (Bekker et al 2002). While the principles of game ranching can be applied in rural areas to promote socio-economic development of local people (Els 2002a), they are often limited to how the private landowners can involve local people (Els 2002b-c). Under these conditions, expecting the results to show otherwise would be like assuming that the post-apartheid South Africa has already completely nullified the existence of apartheid, implying that it was *pro non scripto*. However, some homeland conservation agencies attempted to nullify the apartheid divide, and this is the object of the next chapter.

Chapter 5

Conservation agencies and attitudes

5.1. Introduction

The *World Conservation Srategy* (IUCN 1980) is often regarded as the first global attempt to encourage conservation agencies to win the support of local people for the goals of biodiversity conservation. In Africa, an early recorded attempt to integrate the needs of local people with PAs began in Kenya in 1960 when recommendations were made to preserve the hunting rights of the Wata tribe along the Tsavo National Park boundary (Parker & Amin 1983). However, implementation of the recommendation was scuppered by the conservation philosophy of the Kenyan Wildlife Department (Adams & McShane 1992). Evidently, the philosophies and policies of conservation agencies do influence the success or otherwise of integrating PAs with local people.

Integrating people in biodiversity conservation is a contested issue because long-term benefits of conservation often conflict with its short-term needs (Bell 1984b). Thus, conservation awareness is often used as a means of influencing public attitudes. While educating the public about conservation is important, two key factors should be noted (Price 1984). Firstly, each stakeholder group among the public has different opinions and interests, and relates to conservation objectives in different ways. Secondly, each must be reached differently. In spite of its key role, monitoring of public opinion has tended to be neglected in the past because it is time consuming, it has less immediate appeal than classical ecological studies, and it often produces data that managers of PAs do not want to hear (Bell 1984b).

In South Africa, notable attempts to meet the needs of local people living adjacent to PAs started in the early 1980s when the homelands governments established their own conservation agencies. Apart from material benefits that local people received from homeland conservation agencies, some agencies introduced conservation education. It

can be argued that conservation education was part of a philosophy to instil a sense of ownership of PAs in local communities, in order to overcome some bad attitudes that were associated with apartheid conservation agencies. In the context of the present study hypothesis, the conservation agencies of the North West Province, Mpumalanga Province, and Limpopo Province offered the opportunity to further test the success or otherwise of these efforts (Chapters 3&4).

In Chapter 4, I showed that strong owners were significantly more supportive in all aspects of their attitudes towards protected areas (PAs) than lesser owners over the short-, medium- and long-term benefits. While various factors were responsible for the favourable attitudes of strong owners, mostly white people with secured rights in PAs, the key challenge facing South African conservation agencies is to win the support of the lesser ownership levels, comprising black rural people adjacent to PAs. As previously mentioned, white people with strong rights in PAs have had a long history of access to PAs, which pre-dates the influence of homeland conservation agencies. Indeed, as was apparent with the private owners of Selati, it is highly unlikely that the attitudes of strong owners were influenced by the conservation agencies included in this study. As a result, this chapter focuses exclusively on the influence of conservation agencies on the attitudes of the lesser ownership levels, popularly known as 'local communities' in other similar studies, and hereafter referred to as such.

5.2. **Methods**

Data from the same structured questionnaire (Chapter 4) were used for respondents in the lesser ownership levels, comprising only the intermediate and weak owners. The same description of time-related benefits as used in Chapter 4 were again used, except that data from strong owners were excluded because they were not relevant for the purposes of this chapter. Data on the needs and aspirations of the local communities are used in this chapter to ascertain the extent to which they related to conservation agencies and attitudes. However, the approach here was centred on how conservation agencies, or provincial contexts, or a combination of both, influenced attitudes of local communities to short-, medium-, and long-term benefits arising from PAs.

5.3. **Data analysis**

The questionnaire data (Chapter 4) were re-analysed using chi-square tests (χ^2) to test the difference between: 1) intermediate and weak owners based on the three provincial conservation agencies; and, 2) to test for differences between intermediate and weak ownership level within provincial agencies. Secondary data on other factors affecting livelihoods of local communities were obtained from Stats SA (1998).

5.4. **Results**

Briefly, the effect of provincial conservation agencies on the attitudes of respondents is examined at three levels. Firstly, there were significant effects on all other variables across all time frames between the three ownership levels, except for 'state funding for PAs' and for 'fences reduce conflict' (5.4.1). Secondly, significant differences were observed within ownership levels according to provinces at all levels (5.4.2). Thirdly, secondary data on people's livelihoods provided insights into the results (5.4.3).

5.4.1. **Difference between provincial owners**

Among the intermediate owners (Table 5.1a), there were significant differences over the short-term benefits of free firewood, which resulted from marginal support (55%) in Makuya (Limpopo Province) compared to strong support (76%) from Pilanesberg (North West Province), and even much stronger support (86%) from Mthethomusha (Mpumalanga Province). In stark contrast, respondents at Pilanesberg were the least supportive (28%) of giving land to the landless, compared to marginal support from Makuya (58%) and Mthethomusha (57%). For the medium-term benefits, respondents from Pilanesberg showed marginal support for industry (49%) while there was less support from Makuya (39%) and Mthethomusha (36%). However, some respondents at Makuya were less against wildlife (44%) compared to marginal support from those at Pilanesberg (53%) and Mthethomusha (52%). Long-term benefits were generally well supported, but Mthethomusha respondents were least supportive of the potential of PAs to improve the economy (63%) and to protect biodiversity (69%).

Table 5.1a. Differences between the views of provincial respondents among the intermediate owners to the short-, medium- and long-term benefits, with ***=P<0.001, **=P<0.01, and *=P<0.05.

Time frame & variables	Makuya (%)	Pilanesberg (%)	Mthethomusha (%)	χ^2, df=2
Short-term:				
For free firewood collection	55	76	86	139.5***
For allocation of land to landless	58	28	57	124.2***
Mid-term:				
Against development of PA land	39	49	36	20.6***
Against removing animals	44	53	52	11.8***
For state funding of PA	50	50	54	1.4
PA contributes to livelihoods	49	53	59	10.5**
Long-term:				
PA protects biodiversity	90	81	69	78.5***
Managers protect PA	78	64	71	27.2***
Fences protect people & animals	92	92	93	0.5
Keep PA for posterity	92	84	81	26.5***
PA contributes to SA economy	75	74	63	20.5***

Among the weak owners (Table 5.1b), short-term benefits of free firewood were least supported (27%) at Letaba (Limpopo Province) compared to the strong support (73%) at Songimvelo (Mpumalanga Province), and even stronger support (78%) at Madikwe (North West Province). However, 67% of respondents at Songimvelo wanted some of the PA land reallocated to the landless compared to the weak support at both Letaba (25%) and Madikwe (23%) for this measure.

Table 5.1b. Differences between the views of provincial respondents among the intermediate owners to the short-, medium- and long-term benefits, with ***=P<0.001, **=P<0.01, and *=P<0.05.

Time frame & variables	Letaba (%)	Madikwe (%)	Songimvelo (%)	χ^2, df=2
Short-term:				
For free firewood collection	27	78	73	297.8***
For allocation of land to landless	25	23	67	206.9***
Mid-term:				
Against development of PA land	34	51	33	33.0***
Against removing animals	60	51	62	16.5***
For state funding of PA	58	55	77	44.8***
PA contributes to livelihoods	44	51	56	14.9***
Long-term:				
PA protects biodiversity	84	91	84	9.2**
Managers protect PA	75	81	81	6.1*
Fences protect people & animals	92	86	92	10.4**
Keep PA for posterity	92	90	97	15.1***
PA contributes to SA economy	75	87	66	48.8***

For medium-term benefits, there was marginal support against industry at Madikwe (51%) compared to least support at Letaba (34%) and Songimvelo (33%). For long-term benefits, notable differences are on the contribution of PAs to the economy and for keeping them for posterity. Except for low support at Songimvelo on the economic importance of PAs, long-term benefits are well supported by all owners.

5.4.2. **Difference within provinces by ownership**

In the North West Province (NWP), there were few differences (Table 5.2a) on short-term benefits between weak (Madikwe) and intermediate owners (Pilanesberg), with short-term benefit of allocating some PA land to the landless being strongly resisted by both ownership levels. There were significant differences on medium-term benefits against removal of wildlife, with strong support (74%) from Madikwe. Although there were significant differences on long-term benefits, the overall results showed that the NWP had stronger support for its PAs with little variation between ownership levels.

Table 5.2a. Differences between the views of respondents to short-, medium- and long-term benefits among intermediate and weak owners in North West Province, with ***=P<0.001, **=P<0.01, and *=P<0.05.

Time frame & variables	Intermediate (%)	Weak (%)	χ^2, df=2
Short-term:			
For free firewood collection	76	78	0.6
For allocation of land to landless	28	23	2.3
Mid-term:			
Against development of PA land	49	51	0.5
Against removing animals	53	74	34.8***
For state funding of PA	50	55	1.9
PA contributes to livelihoods	53	51	0.4
Long-term:			
PA protects biodiversity	81	91	15.9***
Managers protect PA	84	81	1.2
Fences protect people & animals	92	86	8.9***
Keep PA for posterity	84	90	5.9*
PA contributes to SA economy	74	89	26.3***

In contrast to NWP, Mpumalanga Province (MP) had significant differences for short-term benefits (Table 5.2b), with about 67% of weak owners (Songimvelo) supporting allocating land to landless people than 57% of intermediate owners (Mthethomusha).

Table 5.2b. Differences between the views of respondents to short-, medium- and long-term benefits among intermediate and weak owners in Mpumalanga Province, with ***=P<0.001, **=P<0.01, and *=P<0.05.

Time frame & variables	Intermediate (%)	Weak (%)	χ^2, df=2
Short-term:			
For free firewood collection	86	73	26.4***
For allocation of land to landless	57	67	9.6**
Mid-term:			
Against development of PA land	36	33	0.7
Against removing animals	52	62	9.0**
For state funding of PA	54	77	50.8***
PA contributes to livelihoods	59	56	0.7
Long-term:			
PA protects biodiversity	69	84	29.2***
Managers protect PA	71	81	12.3***
Fences protect people & animals	93	92	0.3
Keep PA for posterity	81	97	56.6***
PA contributes to SA economy	63	66	0.7

On medium-term benefits, the key significant difference was on strong support (77%) given by weak owners for state funding as opposed to marginal support (54%) from intermediate owners. For long-term benefits, key insignificant differences were on the importance of fences to protect people and wildlife and the contribution of PAs to the economy. However, weak owners strongly supported (84%) the importance of PAs for protecting biodiversity compared to the intermediate owners (69%). Similarly, weak owners even strongly believed that PAs should be kept for posterity (97%) than did the intermediate owners (81%).

However, Limpopo Province (LP) showed highly pronounced significant differences than those observed in the MP (Table 5.2c). While there was marginal support of 55% for the short-term benefit of free firewood by intermediate owners at Makuya, weak owners at Letaba were less supportive 27% in this measure. Similarly, while weak owners showed much less support (25%) for allocating some PA land to the landless, intermediate owners indicated a marginally high and opposite support for the same benefit (58%). On medium-term benefits, few intermediate owners (44%) were against removal of wildlife, a view not shared by a 66% of weak owners. Overall, support for long-term benefits was much higher and less varied in Limpopo Province than was in the other two other provinces.

Table 5.2c. Differences between the views of respondents to short-, medium- and long-term benefits among intermediate and weak owners in the Limpopo Province, with ***=P<0.001, **=P<0.01, and *=P<0.05.

Time frame & variables	Intermediate (%)	Weak (%)	χ^2, df=2
Short-term:			
For free firewood collection	55	27	89.4***
For allocation of land to landless	58	25	126.8***
Mid-term:			
Against development of PA land	39	34	3.5*
Against removing animals	44	60	30.6***
For state funding of PA	50	58	6.7**
PA contributes to livelihoods	49	44	3.4
Long-term:			
PA protects biodiversity	90	84	10.2***
Managers protect PA	78	75	1.4
Fences protect people & animals	92	92	0.0
Keep PA for posterity	92	93	0.3
PA contributes to SA economy	75	75	0.0

5.4.3. Socio-economic difference between ownership levels by provinces

The differences between ownership levels within and between provinces could also be influenced by the sizes of the populations within those villages chosen as study sites (Table 5.3) relative to available resources.

Table 5.3. Population estimates and number of people employed in case study villages.

	North West Province		Mpumalanga Province		Limpopo Province	
	Pilanesberg	**Madikwe**	**Mthethomusha**	**Songimvelo**	**Makuya**	**Letaba**
Population	16,269	5,941	49,378	5,993	1,872	6,107
Employed	3,559	277	9,713	450	142	125
Unemployed	2,590	1,071	4,772	773	189	435

Source: Stats SA (1998).

In this context, there were many more intermediate owners in Mpumalanga in terms of the population size and size of the reserve. Relative to the number of beneficiaries in the intermediate ownership level, Mthethomusha was the smallest reserve (72 km^2), yet was surrounded by far the largest population. However, the proportion of people unemployed (33%) around Mthethomusha was lower than that of both Pilanesberg

(42%) and Makuya (42%). In contrast, case study sites under weak ownership had by far the smallest populations, but relatively larger reserves. Furthermore, about 21% were unemployed in Madikwe, 23% in Letaba, and 37% in Songimvelo. Ironically, the weak ownership level outperformed the intermediate ownership level in key aspects of attitudes to PAs such as short- and medium-term benefits (5.4.2). This could suggest that intermediate ownership expects their equity in PAs to yield higher benefits than it is possible, thereby leading to disappointment or to resentment.

Compared to provincial unemployment levels, case studies had by far the highest level of unemployment (Stats SA 1998). For example, average unemployment levels ranged from 33% in Mpumalanga Province, through to 38% in North West Province, and to 46% in Limpopo Province. Despite this situation, respondents in Limpopo Province were more supportive of their PAs than the better-resourced respondents in both the North West Province and Mpumalanga Province, even when they were also less dependent on electricity as a source of fuel compared to respondents in relatively better-resourced provinces (Table 5.4).

Table 5.4. Source of energy by numbers of households within case.

	North West Province		Mpumalanga Province		Limpopo Province	
Energy source	Pilanesberg	Madikwe	Mthethomusha	Songimvelo	Makuya	Letaba
Electricity	670	144	1,774	107	3	4
Other*	2,750	1,159	8,080	1,034	369	1,148
Proportion with electrified	20%	12%	18%	9%	0%	0%

Source: Stats SA (1998). *Other refers to dependence on fuel wood, followed by paraffin, and then gas.

The local communities in Limpopo Province were more impoverished than those in both the North West Province and the Mpumalanga Province, but they nonetheless still supported PAs. While there is no simple cause-and-effect way of interpreting the results, because the different contexts under which local communities live could affect the outcome differently, it appears that the attitudes of local communities towards PAs depend on other factors in the political ecology of case studies.

5.5. **Discussion**

This chapter showed that the attitudes of local communities to various related benefits arising from PAs, were influenced by both their provincial environment and their provincial agencies. These results further highlighted that the attitudes of local communities were strongly influenced by the political economies in which these communities were situated (see Chapter 4). Consequently, there was no simple 'cause-and effect' between the attitudes of local communities and ownership based on the efforts of the provincial agencies. To avoid 'snap-shot' conclusions, the attitudes of local communities towards PAs were further discussed in the context of the local environments that shaped such attitudes.

While there was generally strong support among all local communities for the long-term ideals of creating PAs, what appears to be important for local people is the ability of PAs to provide short- and medium-term benefits as they directly affect livelihood strategies. In the context of rural survival, both short- and medium-term benefits of re-allocating land from PAs for either industrial development or for replacing wildlife with agriculture, seemed to have the most deterministic effect on the attitudes of local communities. Correspondingly, while local communities generally appreciate the long-term benefits of PAs, limited livelihood choices suggest that their support for long-term benefits is most unlikely to secure the long-term protection of biodiversity in situations of abject poverty. Of particular significance is that local communities are unlikely to favour the biodiversity in PAs in times of pressing social need.

The harsh realities of rural poverty, may imply that local communities lack sufficient incentives to view PAs as medium-term investment. However, their long-term view of PAs is highly positive, and many ways suggest that local communities support the long-term aims of conserving biodiversity through a system of PAs. To improve understanding of these case studies, the results are further discussed in terms of how the three provincial conservation agencies may have influenced some of the observed results. However, gaining insights into the *modus operandi* of these three provincial conservation agencies requires 'case-by-case' discussion. The case-by-case approach

is now used extensively in social studies or policy research and it proved useful for Roe (1994, 1998) and Fortmann *et al.* (2001). For the results of this chapter, I have modified and adjusted the original framework used by Roe (1998) in order to suit the South African situation.

Based on this study, case-by-case discussion can provide insights into some of the observed paradoxes because:

- case-by-case draws insights from different complex situations at the different stages of evolutionary processes of projects. At any point in time, the analysis draws on different approaches in an attempt to triangulate, so as to be able to say that from whatever angle the situation is analysed, almost the same conclusion is reached.
- case-by-case means that each case study is analysed on its own merits in terms of at least three criteria: 1) whether management achieves its stated objectives; 2) against some idealised outcome, which the management objectives of the project may or may not match; and 3) the counterfactual, in other words, what would have happened had the management not been in effect.

Using the 'case-by-case' approach, the discussion outlines the context of case studies in terms of the philosophy of each provincial agency and its approach to working with local communities. The success or otherwise of each provincial agency is discussed in terms of current practice: are the same management objectives still being followed, and if not, why? The discussion with provincial agencies is both chronological and evolutionary in terms of which province first started working with local communities and one case study led to the next. Using the case-by-case approach, the results is also discussion within the southern African region in order establish similarities.

5.5.1. **North West Parks**

The NWP was the first conservation agency in South Africa to link local communities to its PAs with the primary objective of improving their livelihoods. The first case study was Pilanesberg. The initial survey of attitudes showed that the management at

Pilanesberg had failed to achieve its stated objective to 'the community' (Keenan 1984). The management of Pilanesberg reacted by employing a 'Community Liaison Officer' (Molope 1988) in order to ensure that Pilanesberg remained the 'jewel of Bophuthatswana' (Brett 1989). The local community wanted more than liaison, they wanted their land back, something the government refused to do (Munnik 1992). As a result, NWP agreed to contribute 10% of the gross annual entrance revenues earned by Pilanesberg to the local community, and the lease fee was retrospectively paid to 1979 when the reserve was first established.

The management at Pilanesberg started dividing infrastructure projects into "chewable chunks" so that the local contractors could benefit. The cash dividends received by the local community were used to build schools; health clinics; and, creating a 40 km^2 communal game reserve situated 30 km north of Pilanesberg. Pilanesberg showed that the best way of being a good neighbour, is to employ local communities and also to benefit local entrepreneurs (Munnik 1992). In 1993, cash flow to local communities was increased when lions were introduced into Pilanesberg to complement leopard, buffalo, rhino and elephant in order to become 'a big five' tourist attraction. Following this, the economic impact of Pilanesberg on its region ranged between SAR16 million (US$8.7 million) and SAR36 million (US$10.3 million) (Vorhies & Vorhies 1993). A follow up attitude survey also revealed that 70% of the local community supported the existence of Pilanesberg (Davies 1993). However, in 1994 new casinos were built in Johannesburg, and Sun City lost its monopoly on the gambling industry. As a result, the number of jobs was slashed from about 4,000 to less than 2,000, and this heavily affected the livelihoods of local communities.

In 1995, power struggles between the tribal authority and the ANC elected transitional councils led to the brutal death of a key leader of the local community. In 1996, NWP stopped paying the agreed 10% lease fee, and the communal game reserve was closed down as rife allegations of corruption and mismanagement took the centre stage. This probably explains the marginal support of local communities for Pilanesberg. With the introduction of local municipalities, the monetary benefits arising Pilanesberg also became the source of conflict, to the extent that NWP stopped payments to allow the

political situation to 'sort' itself out. Furthermore, Pilanesberg stopped all its previous direct dealings with local communities when local structures collapsed. The reasons for this included the changes in local politics and the management philosophy of the NWP following the post-apartheid era transformation challenges.

While the primary reason for establishing Pilanesberg was to protect landscapes, with community development as a secondary goal, Madikwe was created ostensibly to provide socio-economic benefits based on three major objectives: 1) that wildlife-based tourism was the best economic use of the acquired land because, and once fully developed, Madikwe would yield a predicted net return of 15% on the initial capital investment, exceeding the predicted 0.5% of cattle ranching (Setplan 1991); 2) that the local communities around Madikwe would benefit economically from this form of land use because they were economically disadvantaged, and would subsequently support the existence of reserve (Perkins 1993); and 3) that the conservation value of the land would be increased by wildlife tourism development through linkages and multipliers (Magome 1996). Ultimately, Madikwe was expected to improve net income to the state, private sector, and the local economy (Davies 1997). Based on these objectives, Madikwe was created as an idealised 'equal partnership' between the NWP, the private sector, and the community.

The wildlife-based tourism development objective was achieved and indeed was the best economic use of the acquired land. Over 90% of re-introduced animal species, presumed to have been there in historic times, have increased significantly in numbers (Hofmeyr 1997), and in market values, from about US$2.5 million to US$5.7 million (Davies *et al.* 1997). Within 5 years, 200 permanent jobs were created, surpassing the 80 jobs that could have been realised from the cattle ranching option. Despite these achievements, Madikwe was still far from realising the 1200 jobs promised to local people with an associated payroll of US$1.5 million per annum. Indeed, the initial 15% return on the investment was hugely overestimated, and only 5% was realisable (Wells *et al.*1997). While such huge overestimates of the project arose because of the lack of comparable models, they nonetheless had raised the expectations of the weaker 'partner', the local communities.

Madikwe also required more time to reach its tourism potential than was initially anticipated by the planners (Magome *et al.* 2000). This time lag delayed the delivery of intended benefits to local communities and, with unemployment standing at 90%, the few benefits received heightened tensions and conflict. By attempting to build the capacity of local communities for effective partnership, the NWP burdened itself with broader issues of rural development (Magome *et al.* 2000). Despite these obstacles, this study showed that local communities, the weak owners around Madikwe, were generally more supportive of the reserve than their provincial intermediate owners around Pilanesberg. The strong support for state funding may indicate that the local communities still hope that Madikwe could improve their lives. Within 10 years of its creation, Madikwe has created more jobs and multiplier effects than its original model predictions, and is now an example of how PAs can benefit local communities.

The Pilanesberg and Madikwe case studies demonstrated that PAs can contribute to the regional economy, and to the development goals of the government. However, to achieve this they required the critical mass generated by high volume tourism. In the case of Pilanesberg these goals were achieved within a within the first 10 years, while at Madikwe they might take some 30 years. The Pilanesberg case study demonstrated that conservation agencies can turn-around hardened negative attitudes of local communities into positive support for PAs. Furthermore, it showed that the livelihoods of local communities can be best enhanced through concerted efforts with the other local industries. However, the managers of PAs can easily get carried away, as was with the creation of the communal game reserve, by thinking that local communities have the necessary expertise to manage PAs.

The following lessons emerge from these two case studies managed by NWP:

- PAs that are located closer (150 km) to the economic hubs such as Pretoria and Johannesburg have more potential to reach their socio-economic goals than those further away from these economic hubs;
- PAs can contribute more to socio-economic objectives if they are part of a regional economic activity (e.g., Pilanesberg) than when they attempt to be the major driver of economic activity (e.g., Madikwe);

- When PAs are the only drivers of economic activity in a depressed economy, such as Madikwe, the time lag required to reach optimal tourism potential is significantly longer than in co-ordinated developments such as Pilanesberg;
- If PAs cannot meet their stated social objectives, the resentment that results from broken promises can be higher than if promises had not been made;
- The beneficiaries of PAs must be clearly identified and the benefits must be properly quantified because limited benefits become the source of conflict;
- PAs can, if part of a co-ordinated regional plan, contribute to improving livelihoods of local people by creating high volumes of job; and
- Land ownership, the *sine qua non* of power for effective bargaining, is the best mechanism to provide local people with required 'equal partnership' with both the state and private sector.

5.5.2. **Mpumalanga Parks Board**

Like the former Bop Parks, the former KaNgwane Parks Corporation (KPC), now Mpumalanga Parks Board (MPB) shared the same philosophy that PAs can and should contribute towards improving the livelihoods of local communities. In fact, the first Director of Pilanesberg, Dr Jeremy Anderson, resigned to become the first Director of KPC and thereby influenced the management philosophy of the MPB. Mthethomusha was the first case study for MPB to test the principle that sustainable utilisation of PAs can improve the lives of local communities. In order to contribute to the livelihoods of local communities, an up-market 60-bed lodge was built to serve as the main source of revenue from tourists. By 1990, 200 jobs were created for the local communities, and these surpassed the 20 jobs that cattle ranching could have produced (Odendal 1991).

In order to meet the protein needs of local communities some 150 impala, 25 zebra, 15 wildebeest, 6 giraffe and 40 buffalo, were to be culled annually. Furthermore, 60% of all income derived from the reserve was to accrue to the local communities (Odendal 1991). The KPC policy was 'parks for people' and indeed 'what finally convinced the tribal authority was the promise of jobs for their people' (Munnik 1992b). Most of the revenue generated by the reserve was spent on building schools and day-care-centres

(Koch 1997). The social objectives were a litany of disasters. From 1996, the number of jobs were reduced from 200 to 150 (Koch 1997), and the dividends from the lodge, the main source of income, were stopped from 1997 because the lodge was reported to be operating at a loss.

In 1997 only 4 buffalo and 1 giraffe were culled because tourists wanted to see more wildlife than was available in the reserve. Since 1998, the outbreak of the exotic bovine tuberculosis (BTB) forced large culling operations on buffalo to establish the extent of the BTB epidemic in the reserve. Meanwhile, the number of local people living around the reserve doubled to 60,000 (Stats SA 1998) and this doubled pressure on the 72km^2 of land. In 1998, MPB, *de facto* the renamed KPC had its funding cut by 50% resulting in management paralysis. In 1998, the present study discovered that local communities were indeed very disappointed and expressed anger and resentment towards their leaders and the reserve. Benefits had ceased leaking to them and the little benefits that were realised became a great source of conflict. This spawned high levels of distrust between local people, their leaders and the management of the reserve. The situation deteriorated to the extent that some influential local people wanted the reserve deproclaimed or handed over to the management of Kruger National Park.

The original objective that the local people should take over the management of reserve (Odendal 1991) was far from being achieved. Mthethomusha demonstrates that too often the benefits that can accrue from PAs can be hugely overstated. The social objectives lacked conceptual clarity and were, therefore, seriously flawed. The investment was simply too small to warrant such promises. To put it bluntly, the benefits that would normally accrue to one farmer in the country were extended to a local population of some 60,000 people. The poor support for the reserve was in part compounded by these unrealistic expectations. As was the case for Pilanesberg, the MPB has stopped most of the benefits that they used to provide to local communities, because their lease fee with the lodge was based on net profit rather than on either the percentage of revenue turnover or fixed fee per bed per annum. Since profit is only an accounting figure, the management of the lodge stopped showing profit as far back as 1995, and this gravely disappointed the local communities. Furthermore, the MPB also

stopped providing benefits such as cheap meat and other types of *ad hoc* assistance to the local communities because of inadequate funding. In contrast to Mthethomusha, Songimvelo was created primarily for its outstanding biodiversity and cultural features (Heinsohn *et al.* 1992; Boyles-Sprekel 1994).

Local communities were, as was the case for Mthethomusha, supposed to benefit from jobs, subsidised meat and limited harvesting of thatching grass (Anderson 1995). Most of the reserve's income accrued from limited trophy hunting and the reserve was heavily dependent on state funding. There were few supporting industries such as the asbestos mining and commercial timber harvesting. The reserve management sourced funding to build an environmental education centre in order to 'educate' the local communities about the importance of biodiversity conservation for both the present generation and for posterity. The conservation objective was achieved and there plans to link the reserve to Swaziland as part of transboundary conservation area. However, achieving social objectives also became a litany of disasters.

The asbestos mine closed down during in 1997 and livelihoods started to deteriorate, forcing some of the local communities to demand greater access to grazing rights within the reserve and to expect more social services than they had enjoyed before the closure of the mine. In order to appease the local communities, MPB took on the role of rural developer by setting-up small scale industries such as sewing, brick making and offering transportation for various social services ranging funerals to wedding celebrations. The reserve became a showcase of what PAs should do to assist local people improve their lives. However, there were limited markets for the materials produced by these small industries and sustaining them required more money than the reserve could afford. These artificial industries and unrealistic social services could not be sustained and as is wont to happen, the frustrated beneficiaries became resentful towards reserve and MPB.

Songimvelo showed that conserving biodiversity amidst rural poverty is a daunting task, and the weak support shown for MPB in this study reflected these difficulties. If tourist activities and or the government cannot create a viable economic model, the

incentives offered to local people are not sustainable and the situation deteriorates from bad to worse. Songimvelo was a promising model of how PAs can assist local communities to set-up small industries in order to reduce tourism leakage, but now it is the example of mistakes that PAs often make when they deviate from their function of biodiversity conservation to take on the social functions. However, this is with the benefit of hindsight and, under the circumstances, Songimvelo provides a lesson of how PAs can extend their limited resources too thinly. Both the Mthethomusha and Songimvelo case studies illustrate the dangers of what happens when a conservation agency tries to achieve too much with too little. The provision of subsidised meat was a typical post-colonial attempt to supply protein to 'poor' local communities.

The following key lessons emerge from the two case studies managed by MPB, and they are particularly useful and important for policy guidelines in responsible tourism:

- The lease payment from the private sector to the local communities should be based on percentage of turnover or number of beds rather than on percentage of profit. As previously mentioned, profit is an accounting figure, and that operators can hide behind it if they want to;
- If the tourism market is saturated, or there are other similar tourist destinations as is the case with Mpumalanga's highly diversified and numerous tourism activities, competitive edge is what achieves market edge, and in this situation government agencies show their limitations;
- PAs should not promise benefits that they cannot sustain in the long-term. It is better for PAs not to provide benefits than to provide them in the short-term and then stop them completely;
- Clearly, PAs are not the 'penicillin of all rural ailments' because they cannot adequately address all rural problems, even if they wanted to, and somehow the local communities must be made aware of this. In most situations the local communities are aware of the limitation, but management of PAs often opts otherwise; and
- The availability of long-term sustainable funding to PAs strongly affects the long-term viability of various projects that can be initiated and sustained with local communities.

5.5.3. **Limpopo Parks Board**

In the context of this study, conservation in Limpopo Province has had a long history of poor leadership, both during the apartheid era and even during the first decade of the post-apartheid era. During the apartheid era, Makuya was under the homeland of Venda and Letaba was under Lebowa homeland. Still undeveloped, both Makuya and Letaba are not yet regarded as major tourist attraction areas. Furthermore, PAs in the Limpopo Province have been managed as state departments from their creation, until 2002 when they were changed to a statutory body, the Limpopo Parks Board (LPB). However, local communities in Limpopo Province do not live as close to PAs as in the North West and Mpumalanga provinces. In the case of Makuya the nearest village was located 50 km away from the game reserve, and the furthest was 100 km away. In the case of Letaba GR, the nearest village was located 25 km away from the game reserve, while the furthest was 50km away. Furthermore, the two case studies did not have detailed outreach projects for engaging with the local communities.

The major difference between Limpopo and the other two provinces, North West and Mpumalanga, is that Limpopo Province was the least developed of the three study provinces, and the local communities at study areas were the most marginalized and disenfranchised. Limpopo Province is not popularly known as a tourist attraction, and LPB was the most under funded agency in this study. Despite these limitations, the respondents in Limpopo Province showed less interest in short-term benefits than did those in North West and Mpumalanga. Apart from firewood being relatively available in the vicinity of respondents, long distances to and from the PAs could have made firewood collection a prohibitively expensive exercise. Furthermore, the relatively low population in these study areas also made land shortage less acute. Hence, respondents in Limpopo Province performed better on medium-term benefits than respondents in both North West and Mpumalanga Provinces. Again, the spatial separation from PAs implied that these PAs were unlikely to create land use conflict on medium-term benefits. Correspondingly, respondents in Limpopo Province showed stronger support for some long-term benefits associated with PAs. Even after the post-apartheid era, the LPB has continued dealing with local communities as they did during apartheid era.

The following key lessons emerge from the two case studies managed by LPB:

- Local communities who live far away from their nearest PAs appear to place less socio-economic demands on such PAs, providing that they can access the same resources in their immediate vicinity; and,
- Conservation agencies who make few promises to local communities seem to generate a steady support base, neither too hostile nor over supportive.

5.5.4. **Attitudes to PAs globally**

This chapter has shown that the attitudes of local communities to PAs are influenced by socio-economic opportunities that they can derive from PAs, implying that local communities view PAs in terms of meeting their basic socio-economic development needs. Accordingly, local communities expect PAs to play the role of government or at least to facilitate such a role on their behalf. The expectation is logical since PAs are state-owned and, therefore, represent the government. While the attitudes of local communities elsewhere in sub-Saharan Africa was not the focus of this study, studies in much of sub-Saharan Africa unequivocally show that local communities view PAs or the natural resources they contain in terms of meeting most of their basic socio-economic needs (Cunningham 1989, 1995; Anderson 1995; Koch 1997; Murombedzi 1999, 2001; Fabricius *et al.* 2001a-b; Fabricius & Koch 2004).

In India, local communities that were entirely dependent on extraction of resources from PAs were less appreciative of PAs while those living far away from PAs were more supportive (Nepal & Weber 1995). To date, there is little evidence to illustrate that the various benefit-sharing schemes aimed at increasing support from the local communities have had their desired effect. In Kenya, Dr Richard Leakey's pledge of giving 25% of tourism revenue per annum to local communities raised expectations that KWS simply could not meet. In an attempt to rectify the error, Dr Leakey's successor, Dr David Western, reduced the pledge to 10%, but this promise was not fulfilled for most of the national parks under KWS (Honey 1999). About a third of the 300 KWS community projects involved construction of school buildings and the awarding of bursaries. Invariably, local communities expect PAs to be developmental.

5.6. **Conclusion**

The level of support received by local communities depends on several factors that are influenced by the local economic development context, a situation often outside the direct control of the managers of the PAs involved. Any form of assistance to the rural local communities involves extensive outlay of resources, and significant funding is required to achieve this. Since conservation agencies are mainly dependent on state funding, the support they can provide to local communities is very limited. In fact, any assistance to the local communities mainly comprises indirect financial support from the state. When funding for PAs is drastically reduced, support for local communities is also drastically reduced, and this causes resentment.

Given these constraints, the major challenge facing PAs is to identify the determinants of the attitudes of local communities to PAs, and to find alternative ways of meeting some of them. The next chapter attempts to isolate key factors that are affect attitudes of local communities to benefits arising from PAs.

Chapter 6

Determinants of attitudes to protected areas

6.1. *Introduction*

Linking local communities to protected areas (PAs) is both difficult and unpredictable (Chapter 5). Accordingly, there is an urgent need to rethink some of the theoretical assumptions on which conservation and development projects are based (Hackel 1999; Newmark & Hough 2000; Twynman 2001; Schafer & Bell 2002; Berkes 2003). In practice, managers of PAs have difficulties linking conservation to the development of local communities because of lack of funding and insufficient data on which to base most of their decisions. Furthermore, involving local communities is complex, and adds to existing demands that managers of PAs have to cope with. Therefore, it is important for planners and policy makers to establish determinants of attitudes to PAs so that appropriate programmes can be implemented.

The harsh realities of survival faced by rural Africans suggest that they might pay little or no attention to debates on conservation philosophy (Hoare 2000). Ideally, it would help managers of PAs if simple yet effective tools can be provided to increase support from local people. Unfortunately there is no blueprint, and it is unlikely that there can ever be one because local histories have a significant influence on the course that the project takes, and in particular the effects of conflict on natural resource management (Schafer & Bell 2002). The mixed results across the provincial conservation agencies (Chapter 5) showed that many conservation and development initiatives (CDIs) that attempt to involve local communities were not well conceptualised. The key challenge is how use limited funds to produce the most impact, and simultaneously increase support for PAs. What is desirable for managers of PAs is to be in a position to plan projects that are most likely to influence the attitude of target audience in a manner that will increase support for biodiversity goals. Although it is commonly accepted that attitudes are the centre of most human behaviour, attitudes are influenced by a

variety of factors, some controllable and others not. The key question is what actually influences respondents to respond the way they do. It is, therefore, important that the determinants of these attitudes to PAs be identified as a prerequisite to making sound management plans or policy decisions. In this chapter, I present further analyses in order to determine which factor or combination of factors influence observed attitude of respondents to various benefits arising from PAs. Essentially, this chapter attempts to put the results together in order to explain patterns observed so far.

6.2. **Methods of analysis**

The individual responses for each question comprising strong (n=29), intermediate (n=1607) and weak (n=1265) owners were coded, recorded in a matrix of 2901 blocks and then analysed using SPSS (Statistical Package for Social Sciences, Version 9.0 for Windows). The statistical tool used was the stepwise Multinomial Linear Regression (MLR) analysis, a relatively fine scale statistical technique that analyses data through a systematic elimination of insignificant variables. In the course of running the MLR analyses, explanatory variables that are not significant are systematically removed, leaving only those variables with significant probability values. Consequently, those variables with significant probability values form the basis for providing the possible explanations of observed results.

In the MLR analysis, each category of short-, medium- and long-term benefit (Table 6.1) was treated as a separate dependent variable, while age, gender, ownership level, conservation agency in charge, and visits to PAs were treated as independent or explanatory variables. A trial run of the MLR analysis identified errors because of the inclusion of data from strong owners. This was possibly due to their small sample size (29) and because data on age and gender that were not normally distributed (refer to Table 4.2, Chapter 4). Once data from the strong ownership level had been removed from the matrix, the MLR analysis proceeded smoothly and no further errors were detected. By showing errors when data from strong ownership was initially included, the MLR analysis further confirmed that data from this ownership level could not be easily compared to those of lesser levels of ownership.

The final data sets entered into MLR analysis were based on a total of 2872 individual responses affecting only the lesser ownership level comprising intermediate and weak owners. Therefore, those remaining significant explanatory variables were assumed to form part of the combination of factors that co-determined the observed attitudes of respondents in the lesser ownership level. As already explained in Chapter 4, the lesser ownership only comprised rural black South Africans who have often been referred to as 'local communities' in other similar studies focusing on CDIs.

6.3. **Results**

The MLR results showed that based on time frames, a combination of several factors influenced attitudes of respondents to various time-related benefits arising from PAs (Table 6.1). However, there were no determinants for supporting 'free firewood for locals' and for 'managers of PAs'. In sections 6.3.1 to 6.3.3, the main determinants of benefits are presented, except for the age of respondents, which is presented separately because it showed a unique pattern (6.3.4).

Table 6.1. The determinants of attitudes to PAs, with medium-term benefits highlighted as the most deterministic.

Time frame	Dependent variable	Explanatory variables
Short-term	For free firewood collection	None
	For allocation of PA land to landless	Agency, ownership, visiting PA, & age
Medium-term	Against development of PA	Agency, ownership, visiting PA, & age
	PA contributes to livelihoods	Agency, ownership, visiting PA, & age
	Against agriculture and industry	Agency, gender, & age
	Against removal of wildlife	Agency, ownership & income
Long-term	Managers of PA	Agency, Ownership & income
	Fences protect people and animals	Agency, ownership, & age
	PA protects biodiversity	Agency, ownership, & age
	Keep PA for posterity	Agency, ownership, & age
	PA contributes to SA economy	Agency, ownership, & age

In particular a combination of the agency in charge, ownership level, and the age of respondents, consistently cut across the two significant time frames of medium- and long-term. However, as argued in Chapter 5, medium-term benefits affected the future prospect of PAs more than long-term benefits because of discounting.

6.3.1. **Determinants of short-term benefits**

There were no explanatory variables that determined short-term benefit of allocating free firewood to local people (Table 6.1), suggesting firewood was not a significant factor. The reason often cited by the majority of respondents to free firewood was a lack of fair and equitable means for its allocation.

6.3.2. **Determinants of medium-term benefits**

The attitudes of respondents to medium-term benefits such as supporting current land use, and state funding, were co-determined by agency in charge, ownership level, visiting PAs, and age. However, each determinant influenced attitudes differently. For example, the effect of agency in charge is shown in Table 6.2.

Table 6.2. The effect of agency in charge as a co-determinant of attitudes.

Dependent variable	Agency in charge	Mean	SE	Wald age values	P values
For state funding of PA	NWP	0.470	0.034	18.677	P<0.005
	MPB	0.365	0.032		
	LPB	0.455	0.030		
PA contributes to livelihoods	NWP	0.600	0.032	45.396	P<0.005
	MPB	0.463	0.032		
	LPB	0.670	0.029		
Against development of PA land	NWP	0.500	0.034	27.915	P<0.005
	MPB	0.640	0.032		
	LPB	0.630	0.028		
Against removing animals	NWP	0.550	0.029	56.867	P<0.005
	MPB	0.395	0.032		
	LPB	0.390	0.029		

In terms of support for current land practices NWP performed better than the marginal support received by both the MPB and LPB. Support was higher among intermediate owners than among weak owners, and was lower for those who visited than not those who had not visited PAs. Furthermore, all three conservation agencies received weak support from their constituencies for state funding, with marginal support for both the NWP and LPB, and very little support for MPB.

Support for developing PA land for industry, agriculture or any alternative land use was co-determined by age, agency and gender while that for 'PA management' was co-determined by age, ownership and gender (Table 6.1). The support for developing PA land was weakest in NWP compared to that in both MPB and LPB, and women were generally more in favour of developing PA than were men (Table 6.3).

Table 6.3. The effect of gender as a co-determinant of attitudes.

Dependent variable	Gender	Mean	SE	Wald	P values
Against development of PA land	Males	0.560	0.030	8.587	P<0.005
	Females	0.620	0.023		

Support for current land use was lower for MPB compared to higher support for both NWP and NPB (Table 6.2). When this was included in the analysis, it suggested that, while the efforts of the latter two agencies won them better support from their local communities, MPB was less successful in this regard. Support on the role of PAs for improving livelihoods was better in NWP and LPB than it was in MPB. Ownership as co-determinant showed that support was better in weak owners than in intermediate owners (Table 6.4).

Table 6.4. The effect of ownership as a co-determinant of attitudes.

Dependent variable	Ownership	Mean	SE	Wald	P values
For state funding of PA	Intermediate	0.490	0.024	46.065	P<0.005
	Weak	0.360	0.028		
PA contributes to livelihoods	Intermediate	0.625	0.024	27.683	P<0.005
	Weak	0.530	0.028		
Against development of PA land	Intermediate	0.515	0.024	39.600	P<0.005
	Weak	0.340	0.063		

In this situation, NWP seemed to have influenced respondents to support current land use of PAs while LPB appeared to have influenced them on the importance of PAs for improving livelihoods. Ironically, visiting PAs showed an interesting pattern, as those few respondents who had visited PAs were less supportive than those who had not (Table 6.5). However, visiting PAs was associated with job seeking (Chapter 4).

Table 6.5 The effect of gender as a co-determinant of attitudes.

Dependent variable	Response	Mean	SE	Wald	P values
For state funding of PA	Visited	0.370	0.028	24.396	P<0.005
	Not visited	0.620	0.023		
PA contributes to livelihoods	Visited	0.510	0.028	34.430	P<0.005
	Not Visited	0.640	0.024		

Generally, weak owners were less supportive of medium-term benefits arising from PAs than were intermediate owners, except on current land use where their support was higher than that of intermediate owners. Intermediate ownership was important for medium-term benefits, and support was highest among respondents that had not visited PAs compared to those that had.

6.3.3. **Determinants of long-term benefits**

Long-term benefits were all co-determined by age, agency in charge, and ownership (Table 6.1). MPB influenced respondents to believe that its PAs contributed to South Africa's economy better than the equally matched NWP and LPB, but intermediate ownership accounted for this better than weak ownership (Table 6.6).

Table 6.6. The effect of gender as a co-determinant of attitudes.

Dependent variable	Ownership	Mean	SE	Wald	P values
PA contributes to SA economy	Intermediate	0.590	0.056	11.997	P<0.005
	Weak	0.530	0.064		
Fences protects people and animals	Intermediate	0.790	0.023	116.197	P<0.005
	Weak	0.890	0.024		
Keep PA for posterity	Intermediate	0.670	0.026	11.997	P<0.005
	Weak	0.780	0.028		

However, on the importance of PAs for biodiversity conservation, LPB garnered more support from respondents than the equally matched but marginally supported for NWP and MPB. In stark contrast to the importance of PAs for the country's economy, weak ownership was a better co-determinant on the importance of PAs for biodiversity conservation than was intermediate ownership. Again, a similar pattern was repeated on the importance of fences in protecting people and wildlife (Table 6.3).

6.3.4. **Effect of age on attitudes**

Of all the factors that co-determined the attitudes of respondents to various aspects of time-related benefits arising from PAs, age showed a very unique pattern that required special attention. The mean age of respondents, in combination with other explanatory variables produced a distinct pattern on individual responses. The pattern for all the medium-term benefits is shown in Table 6.7. In general, the resulting pattern showed that there was a positive correlation between age and mean responses, suggesting that older people were more supportive of medium-term benefits arising from PAs than younger people. However, while older people generally had much higher mean scores, they also had relatively large standard errors (SE) when compared to those of younger people (Table 6.7).

Table 6.7. The effect of age as a co-determinant of attitudes on medium-term benefits from PAs. SE=Standard Error and arrows showing increases with age, mean, and SE.

	For state funding of PA		PA contributes to livelihoods		Against development of PA land		Against removing animals	
Age	Mean	SE	Mean	SE	Mean	SE	Mean	SE
18.5	0.37	0.0342	0.50	0.0367	0.35	0.0375	0.57	0.0367
24.5	0.40	0.0421	0.54	0.0433	0.38	0.0417	0.57	0.0400
30.5	0.43	0.0447	0.59	0.0467	0.41	0.0458	0.60	0.0467
36.5	0.46	0.0553	0.63	0.0533	0.50	0.0583	0.55	0.0567
42.5	0.52	0.0632	0.64	0.0633	0.53	0.0625	0.68	0.0600
48.5	0.49	0.0763	0.63	0.0733	0.51	0.0792	0.62	0.0767
54.5	0.48	0.0947	0.69	0.0900	0.54	0.1000	0.59	0.0933
60.5	0.51	0.0974	0.69	0.0933	0.55	0.1000	0.70	0.0900
66.5	0.50	0.0734	0.74	0.667	0.61	0.0750	0.72	0.0667

In stark contrast, while younger people generally had lower mean scores, they also had smaller standard errors. Therefore, while older people were generally more supportive of PAs, their views tended to vary more widely, implying that it would be too difficult to establish the key reasons for such variations. In stark contrast, while younger people were generally less supportive of PAs, their views were less varied than those of older people, suggesting that young people could be easily influenced if the cause of the low support could be established. Furthermore, the effect of age showed that if there are efforts to influence attitudes, younger people should be the key target.

6.4. **Discussion**

This chapter showed that on medium-term benefits respondents among lesser owners expected PAs to provide opportunities such as jobs. While on the one side respondents marginally supported current land and state funding for PAs, and believed that PAs improved their livelihoods, these views were somewhat affected when visiting PAs for jobs was not rewarded. As explained previously (Chapters 5), nearly half of visits to PAs were job-related, suggesting that, if they failed to secure jobs, some respondents changed their views on medium-term benefits of having PAs nearby. The influence of the age of respondents further suggested that most support for PAs came from older people, mostly pensioners, who no longer needed jobs from PAs.

A previous survey in Pilanesberg showed that younger people, in particular school children, supported the reserve more than older people, and those who had visited were even more supportive than those who had not (Davies 1993). Visiting PAs is great fun for school children, but the same cannot be said for unemployed adults. This study focused on adults, and the importance of jobs was shown by the strong support given by women for industry over PAs. The urgency to meet survival needs dictated against long-term conservation goals. As a result, future benefits are often discounted for medium-term benefits. Due to land shortage, the South African economy is mainly cash-driven, and rural livelihoods are sustained mostly by income from women and pensioners (Stats SA 1998). Thus, while women preferred industry to PAs, pensioners with fixed sources of income supported PAs.

Overall, there was stronger support from intermediate owners than from weak owners, except for MPB, suggesting part ownership of PAs increased support for those PAs. However, other human welfare needs makes supporting current land use of PAs and state funding to achieve it, a very difficult decision for local communities which, if not carefully considered, appeared contradictory. Probable explanation of weak support from the intermediate ownership of MPB, was that since 1997 MPB has been attacked via the media for alleged mismanagement of funds in excess of US$50 million, and this might in part have affected the perceptions of local people PAs in the province.

6.5. **Conclusion**

In this chapter, there was no single key determinant that influenced the attitudes of local communities to PAs. Instead the results showed that combinations of factors acting over time, co-determined the attitudes of respondents to various benefits arising from PAs. However, it was the co-determinants of medium-term benefits such as the age of respondents, agency in charge, and ownership level, which played a key role in influencing the attitudes of local communities towards PAs and these, can in turn be influenced by the management of PAs. The results also suggested that conservation agencies can play a major role in co-determining the attitudes of local communities to PAs, and the decision to become involved should be taken by top management. While intermediate or part ownership of land played another important role in increasing the support of local people to PAs, according land rights is strictly a government decision.

The availability of jobs in and around PAs played another key role in determining the attitudes of local communities to PAs, implying that local communities include PAs in their baskets of livelihoods. The absence of explanatory variables over the importance of PAs for 'posterity' strongly supports this. Hence, local communities expect PAs to provide medium-term local economic opportunities, and failure to do so may, imply that posterity will have little to inherit. The implications are profound, suggesting that PAs can improve relationships with local communities if the total rural economy can be rapidly developed, which is another matter outside the control of PAs.

The key co-determinants of the attitudes of local communities to PAs over medium-term benefits are centred on South Africa's political economy and ecology. The common thread of all the co-determinants of the attitudes of local communities to PAs is economic benefits, through a thriving economy. It is indeed evident from these results that how local people view PAs is a function of the influence spatial scale, where it is located relative to other available alternative livelihoods strategies, and time scale, how the livelihood situation of a respondent is affected at that moment. For instance, local communities in Limpopo Province lived further away, ±20 km, from their PAs than those in Mpumalanga and North West Provinces who were much closer

to PAs. Consequently, while local communities in Limpopo where poorer than those in those living in the other two provinces, they still supported their PAs in much the same way as, and in some cases even more strongly than, those living close their PAs. However, local communities living close to PAs, easily change their views of their PAs depending on how the livelihoods are affected at a particular time. In fact, the patterns we observe in nature are only 'snapshots' or fixed configurations both in time and in space (Magome 2003c).

To local communities, participation in the management of PAs is primarily aimed at improving and securing their livelihoods, mainly through job creation. In this context, biodiversity conservation can be viewed as an imposed means to achieve this end. In practice, local communities use most of the benefits accruing from PAs to develop infrastructure such as schools and health facilities, but in reality this is taking over the responsibility of the government. In most developing countries, the government does not have sufficient financial resources to fund such developments, and in rural areas this places undue pressure on PAs. The government subsidises PAs and in a situation of continued budget cuts, the management of PAs is forced to cut down on secondary functions like rural development. When they do, local people unfortunately interpret it as reneging on promises made. Logically, it can be concluded that in fluctuating and unpredictable environments, as it happened with MPB, support of local communities to PAs cannot be easily guaranteed, despite huge initial investments.

Unpredictability introduces a quandary for managers of PAs, but should not act as a deterrent for trying out combinations of co-determinants that are likely to produce the desired outcomes. The complexity of both ecological and social systems, and the challenge of coping with both uncertainty and unpredictability of the natural world, increases the quest for workable solutions. In the next chapter, I provide a case study of how relationships between PAs and local people can be dynamic and unpredictable.

Chapter 7

Transformation and national parks

7.1. Introduction

In this chapter, I outline how the National Parks Board (NPB), as it was known during apartheid, tried to transform itself into a public service agency capable of benefiting local communities. The inclusion of the NPB is important for two key reasons. Firstly, while the NPB had commissioned this study, case studies were drawn from provincial conservation agencies because of their long history of trying to work with local people during apartheid era — an experience the NPB did not have. Secondly, since the NPB could not afford to wait for the recommendations of the present study, it is important to review the 'trials and errors' of the NPB in order to distil lessons learnt. Logically the lessons learnt from the NPB will guide the required policy framework. The NPB review systematically follows the 5-year strategic plans of each leadership era.

On 2 February 1990 the President of the apartheid South Africa, FW de Klerk, made a historic speech by unbanning all the underground political parties that represented the majority of black people. He promised to release political prisoners including Nelson Mandela, and introduced negotiations for transition to a new political system or 'new' South Africa, as he termed it. His bold step was followed by the 'Abolition of Racially Based Land Measures Act 108 of 1991', but this was only a pre-emptive dismantling of the cornerstones of apartheid. *De facto,* South Africa remained a racist state until the interim constitution of 1993 gave effect to the first democratic elections that were held on the 27 April 1994. Following the democratic elections, South Africa became a government of national unity. Under the government of national unity, the party with the majority vote was the African National Congress (ANC), which represented the vast majority of the previously marginalised black people. In essence, the hopes and expectations of the previously marginalized majority of black people were raised, and transformation became the new buzzword in South Africa.

Prior to February 1990 the NPB managed national parks in isolation from the socio-economic realities that affected them (Fourie *et al.* 1990; Fourie 1991). While some provincial conservation agencies had attempted to include the social needs of rural local people (Chapters 4-6), the NPB only started to consider this need in 1991, when political change was inevitable. Coincidentally, when Dr GA (Robbie) Robinson was appointed as Chief Executive of the NPB in April 1991, he tried to sensitise the organisation to the socio-political realities of the post-apartheid era (Robinson 1992, 1993, 1994). However, the repositioning of the NPB created debates within its senior management, thereby confirming that the organisation had conflicts about what should underpin its transformation (Loader 1994; Anon. 1995; Dladla 1995).

The need to transform the NPB was inevitable, but what had to change, and how it had to change, remained difficult to define. Consequently, the NPB remained for most of the first decade of democracy, extremely confused about what path to take. Part of the problem was the term 'transformation' because its vagueness meant different things to various political constituencies, and this generated extensive policy debates. Despite the various interpretations of transformation, all state-funded agencies were expected to implement meaningful change to avoid perceptions of maintaining the *status quo*.

7.2. **Methods**

I reviewed several documents on the transformation of the NPB, and the relevance of the transformation process for involving the local communities in the management of national parks. Additional data were obtained using archival research and personal observations. Archival research focused on the organisation's annual reports; internal journals such as *Custos*, *Koedoe*, *Timbila*, *Kiewiet*, and *Go Wild*; consultancy reports; workshop and conference materials; and, published documents. Personal observations were made from 1996 in two capacities. Firstly, during the field part of the study period, 1996 to 2000, I was part of the NPB's senior management and was privileged to participate in internal workshops aimed at helping the organisation to develop new vision, mission, objectives, and strategies. Secondly, after analysing the results of this study, I was appointed head of the Social Ecology Unit (SEU) in April 2000. As head

of the SEU, I was expected to 'finally' integrate national parks with their adjacent rural local communities. However soon thereafter, September 2000, I was appointed by the Board of Trustees (Board) to the position of Director Conservation Services. As Director of Conservation Services, my major function was to provide science-based policies for the entire organisation, including SEU. Therefore, I continued to manage the SEU until June 2003, when it was later replaced by a much bigger function of constituency building, following recommendations of McKinsey & Company (2002), a firm of international business strategy analysts.

7.3. **Transforming the NPB**

The transformation process undergone by the NPB epitomises the struggle for power and privilege in the democratic South Africa. The release of Nelson Mandela, and the advent of the post-apartheid era, forced the NPB to make strategic adjustments ranging from rhetoric to tweaking the organisation. While the NPB's rhetoric of involving the local communities was well documented in various issues of *Custos* dating from 1991 to 1998, evidence on the ground shows otherwise (DANCED 1997, 2000, 2001; Reid 2001; Fabricius 2002; Cock & Fig 2002; Magome & Murombedzi 2003). The NPB case study illustrates the politics, paradoxes, and puzzles of integrating national parks with rural local communities. Unlike the nine new provincial conservation agencies that had to merge various legally independent authorities, the ten former homeland and four apartheid agencies (Chapters 3-6), the NPB retained its existing legal status for at least ten years.

The 1993 interim constitution, envisioned nature conservation as a concurrent mandate whereby national parks were accountable to the national government, while other PAs were the responsibility of the provincial government. Subsequently, Schedule 4 of the 1996 Constitution reaffirmed the legality of national parks. The legal status of national parks under apartheid was carried over to the post-apartheid era. Given this false sense of security, the management of the NPB remained confused by not knowing what, why, when, and how to change. Indeed, the changes undergone by the NPB represent the pressures faced by its leadership under each 5-year strategic planning period.

7.3.1 **Transformation attempts, 1991-1996**

There were several attempts to transform the NPB between 1991 and 1996 (Robinson 1991, 1992, 1993, 1994a-b; 1995; NPB's Annual Reports 1993-1996). These attempts included: 1) repositioning the NPB (Robinson 1991); 2) improving its racial profile (Robinson 1992); 3) building its corporate image through public relations (Robinson 1993; de Villiers 1994); 4) drafting a Neighbour Relations Strategy (Robinson 1994); and, introducing the Social Ecology concept (Dladla 1995). In terms of involving local communities, the NPB's first case study started in 1991 with the Nama people who retained rights to the 1,625 km^2 Richtersveld National Park (Richtersveld), situated in the Northern Cape Province.

Richtersveld represents the unique arid mountain landscapes that support the endemic succulent Karoo vegetation and wilderness features of the Namib Desert. While the apartheid regime had wanted to 'protect' this landscape since the late 1960s, it was only in 1991 that Richtersveld was proclaimed a 'contractual' national park. However, the proclamation was made after a successful court interdict by some 3,000 affected Nama people who would have lost access to communal rights such as grazing for livestock, firewood and medicinal plants. At the time, the political climate favoured the Nama people because it was during the dying days of apartheid government and the rights of local people were being affirmed.

The results of the negotiations granted the Nama concessions such as: 1) maintaining grazing rights for 6,600 goats and sheep; 2) leasing the land for 30 years with options to renegotiate new rights; 3) reducing the size of the national park from 2,500 to 1,625 km^2 and providing 800 km^2 of additional grazing land; 4) guaranteed job opportunities and a lease fee of R0.54/ha; 4) creating a contract that recognised the Nama as rightful landowners; and, 5) creating a Joint Management Board (JMB) with the Nama having more representation than the NPB, and the chair of the JMB rotating annually between the two parties. Thirteen years after Richtersveld was proclaimed as a community-owned national park, the Nama have not received their title deed. The co-management ideal remains a managerial nightmare (Magome & Murombedzi 2003).

Realising that the political landscape was changing, Robinson (1992) outlined four key strategies for changing the NPB (Table 7.1). While it can be deduced from Table 7.1 that strategies 1 and 2 were long-term ideals that cannot be fairly assessed in the present study, strategies 3 and 4 are open to assessment over the time frame of this study. Although strategy 3 has not been achieved, it is still achievable. However, the development of 'a comprehensive and clear corporate social responsibility' (strategy 4) has been a daunting task for the NPB. In fact, the NPB abandoned the corporate social strategy for the Neighbour Relations Strategy (NRS). Ironically, the draft NRS published for public comment in the June 1993 issue of *Custos* was later withdrawn as the NPB felt it was prematurely released (*Custos*, January 1994). Withdrawing the draft NRS hinted at confusion and uncertainty.

Table 7.1. Four key strategies outlined in 1992 for transforming the NPB.

	Purpose and intended outcomes
Strategy 1	Create an organisation that will be recognised by the majority of South Africans as legitimate for managing national parks on their behalf.
Strategy 2.	Develop and launch a sound affirmative action programme that is assessed through targets and performance.
Strategy 3	Develop a national park system that will provide local communities on the border of national parks with meaningful opportunities to influence and to share responsibility for biodiversity conservation.
Strategy 4	Develop a comprehensive and clear corporate social responsibility for the NPB and ensure that it is applied effectively.

Source: Robinson (1992).

In September 1993, the Board in office before the 1994 elections approved the NPB's future management (Table 7.2), and published it for public comment (*Custos*, January 1994). However, the proposed structure stated the obvious and was vague on what direction, if any, the NPB should take. The policy proposed to ensure that the NPB enjoyed broader support, and that South Africa's important landscapes were identified, and protected (*Custos* January 1994). Strategically, the NPB used some of the land restitution claims to show its commitment to the government's social responsibilities.

Table 7.2. Agenda and management approach outlined in 1994 for the NPB.

Key driver	Rationale
Vision	• The national parks of South Africa are to become the pride and joy of all South Africans. • The national parks system is to represent the widest spectrum of biodiversity and unique natural features in South Africa. • The organisation is to co-operate with all groups in South Africa and must be recognised as a world leader in national park management and eco-tourism development.
Structure	• The NPB is to be apolitical, financially independent, business-oriented and decentralised. • The NPB is to be an equal opportunity organisation
Culture	• The NPB is to be visitor-friendly and enthusiastic, with an unquestionable image of high environmental ethics and social responsibilities. • There is to a greater emphasis on individual initiative and calculated risk-taking. • Employees of the NPB are to reflect the best South Africa can produce.
Performance	• Standards of performance for commercial, professional, research, maintenance, conservation and technical activities will demand ability, enthusiasm, motivation and teamwork of National Parks Board staff members as well as high morals and principles

Source: Adapted from Robinson (1994a).

In 1994, the NPB and the South African Defence Force (SADF) conceded to returning 70 km^2 of land abutting the Augrabies Falls National Park. The land had previously belonged to the Riemsvasmaak community, but was forcibly taken by the apartheid government. The Riemvasmaak land was proclaimed state property in 1865 and was thereafter known as 'crown land' (van der Walt 1995). From 1973 to 1974, the Riemvasmaak community, consisting of Damaras, Xhosa, and Namas was split and resettled elsewhere in Namibia, Transkei and Northern Cape. The forceful removal was carried out in terms of the 'Separate Development Act', which was based on ethnicity. The SADF used the land for military training while the NPB used it as a 'wilderness' area. When SADF left, they stripped the land of most of the infrastructure such as water pipes. Similarly, the NPB removed high value wildlife species such as the black rhinoceros. Without settlement support and proper advice on land use options, the new claimants resettled prime land capable of producing high value grapes for the lucrative wine export industry.

Part of the agreement was that 4 km^2 of Melkbosrand would be deproclaimed as a national park and also returned to the Riemvasmaak community based on Restitution of Land Right Act. The Riemvasmaak land claim was badly handled, and this led to a breakdown of trust between the claimants and the NPB. In fact, the Riemvasmaak case study was not widely publicised. Melkbosrand was re-claimed by the Riemvasmaak community and was only deproclaimed in May 2004. Convinced that a partnership with the NPB would not work, the Riemvasmaak community rejected initial proposals to co-manage their land with the NPB.

The NPB claimed it was "adapting to change" and stated that (*Custos*, January 1994):

> *Although national parks have traditionally been perceived as untouchable islands and are associated with the peace and tranquillity of nature, the outcome of the political debate, demands for land, a decline in domestic and foreign tourism due to the violence and financial restraints are all the factors that will determine their future.*

In mid 1994, the NPB outlined its neighbour relations strategy (NRS) as a new policy for extending the goals of biodiversity conservation and of tourism to include the neglected concerns of black people (Table 7.3). The NRS was supposed to articulate the NPB's corporate social responsibility, and in time become a policy document for including the local communities living adjacent to national parks. Logically, the NPB acknowledged that, to be accepted in the post-apartheid South Africa, it had to include the social concerns of the broader political constituency by replacing its notorious law enforcement profile with some contribution to local rural development. While the logic of introducing the NRS could not be disputed, the NRS was generally viewed as a 'having to do it' survival tactic (Loader 1994), because the NPB had neglected social issues (Smit 1995) and was, as a result, under siege (Wells 1996). Accordingly, the NPB tried to make strategic changes to its managerial structure, including financial systems, human resource policies, and its neighbour relations (*Custos*, January 1994). In reality, the 'strategic changes' translated into cosmetic adjustments, ranging from appointing high profile ANC-aligned black people to occupy senior positions at head quarters, to creating new units such as public relations and social ecology.

Table 7.3. Summary of the neighbour relations strategy for NPB.

Key driver	Background, desired outcomes and implications
Rationale	The NPB has, for many years, involved local communities neighbouring its estate in the activities of the NPB. Chief amongst these has been the focus on employment. However, the NPB recognises that poverty in South Africa is the greatest threat to biodiversity and environmental integrity. It has therefore formalised a draft neighbour relations policy to integrate conservation and the aspirations of its neighbours.
Purpose	The policy proposes a re-orientation of the objectives of the NPB in keeping with contemporary thought. At an organisational level we propose to revise the approach to our mandate to expand our existing objectives (biodiversity conservation and tourism and recreation) to encompass social concerns. We also propose to establish an appropriate corporate identity that will place less emphasis on the law enforcement profile of the NPB, and more on its contribution to human needs.
Target	At a local and sub-regional or neighbour relations level we propose to conduct or facilitate programmes to contribute to economic, institutional, technical and educational development. It is through these areas that the wider expertise and fund-generating ability of the NPB can be harnessed to the greater benefit of all South Africans and in particular our largely disadvantaged neighbours. We propose in this respect also to network with our more affluent neighbours. We propose in this respect also to network with our more affluent neighbours, some of them are already implement their own neighbour relations programmes.
Strategy	In order to accomplish this, the NPB will need to establish a neighbour relations division manned by appropriately orientated and skilled staff and of a size adequate for the fulfilment of the objectives of the division and of the NPB. Finally, set aside the necessary funding to conduct a meaningful neighbour relations programme.

Source: Robinson (1994a).

For ANC-aligned black employees, joining the NPB also created opportunities to establish new careers. While the creation of new functions later led to major financial problems for the NPB, the ANC-aligned senior black employees increasingly felt marginalised from the core activities of the organisation. When combined with Dr Robinson's highly centralised management style, the NPB's head office was like two organisations, one for black people and the other for white people. Accordingly, the high profile ANC senior managers felt unwelcome, and when perceptions of 'window dressing' increased, they all left within two years of joining the NPB. The NRS was replaced by the social ecology concept, which was created under the SEU headed by Dr Yvonne Dladla. Dr Dladla, a highly analytical black woman with social sciences qualifications, had originally applied for a position in human resources, but when she

realised that the NPB was not doing anything for 'ordinary people', she offered to help (*Timbila* 1 (4)). Dr Robinson asked Dr Dladla to help him conceptualise strategies for community development or neighbour relations, but she was not satisfied with either concept. As a result, a strategic planning meeting was held in 1995 to explore what 'this new thing would be called' (Dladla in *Timbila* 1 (4):60). The 'new thing' initially morphed into 'Social Conservation', but Dr Dladla rejected the concept and changed it to Social Ecology (SE).

However, Dr Dladla herself 'grappled' with the very concept she introduced (*Timbila* 1 (4)). Despite the appointment of Dr Dladla as General Manager of the SEU, the NPB was not ready to accept changes. Change is always painful because human beings are creatures of habit and tradition. In fact, transformation was associated with suspicions of hidden political agendas, general uncertainty, and also anxiety about the future. Indeed, as summarised by Dladla (*Timbila* 1 (4):61):

> *When I arrived I was the third black manager in SANP. I represented a lot of issues; a black female with social sciences background who was community-orientated. Can you imagine the threat I posed?*

In fact Dr Dladla and the SEU posed a threat, forcing Robinson (1994:10) to state that:

> *The NPB is not and should not be a community development agency because its fundamental brief, circumscribed by an Act of Parliament, is to conserve biodiversity. In spite of this we must contribute something directly to community development because of the overwhelming need for development that cannot be met by any single government department. To elaborate on the threat to our existence by not being relevant to the majority of the South African population, is hardly necessary.*

Uncertain what changes to make, the NPB spent time thinking strategies. Accordingly, the Chief Executive's Report stated (NPB Annual Report 1994-1995).

> *But, in accordance with the waves of change that have swept over our country, it became evident, even prior to this review, that the NPB would also have to make significant adjustments to bring it in line with new economic and political trends.*

Despite having prioritised the NRS (NPB Annual Report 1994-1995), and replacing it with the SEU (Dladla 1995), the NPB found the term 'neighbouring communities' difficult to define (*Custos,* May 1995:18). Ironically, 90% of state PAs in South Africa border local communities (Els 1996a). Frustrated by lack of changes, the ANC-aligned senior managers wrote to Dr Robinson, and copied the Minister of Environment and Tourism. In September 1995, the Minister appointed a new Board (*Custos,* November 1995). Correspondingly, the Chief Executive's review (NPB 1995-1996 Annual Report), stated that:

> *With the appointment of a truly representative Board during the year under review, the NPB crossed the threshold into South Africa's new democracy by becoming a legal institution of the Government of National Unity. As with all other government-related organisations, the NPB too needs to undergo a restructuring and transformation process.*

In contrast to the apartheid Board of 12 trustees, the post-apartheid Board comprised 18 trustees, nine nominated by the provinces and the rest by the public. The 1995 Board had a good gender and racial mix. The previous Boards, since 1926, comprised only white elderly males who were closely aligned with apartheid views of racial domination (Carruthers 1995). While the 1995 Board comprised expertises on social sciences, human rights, business, and conservation, it was the political profile of the trustees that qualified them for appointment. Indeed, the key priority of the new Board was to change the public image of the NPB. Yet, the NPB's top management was still wondering whether 'to change or not to change' (van der Merwe 1996). Clearly, such a clash of ideals was bound to create problems.

The SEU was created ostensibly to involve local communities adjacent to all national parks so that they could, in turn, support its national conservation mandate. The NPB also had to change its 'current employee corps, culture and organisational policies' to reflect government thinking (NPB Annual Report 1995-1996). In theory, the NPB "committed itself wholeheartedly to the basic principles of the government's RDP[4]"

[4]The RDP (Reconstruction and Development Programme) was a radical strategy developed by the government's majority party, the African National Congress (ANC 1994).

(Havenga 1996:8), stating: "good fences don't make good neighbours" (Roderigues 1996:8). If documents were the yardstick of progress, the NPB appeared to be on track. Beyond documents, implementation remained a daunting task. Although new initiatives with the neighbours of national parks had to be implemented 'with the urgency needed at this late stage' (Robinson 1996), what was being 'implemented' remained unclear to both the SEU and to the managers of all national parks.

In 1996 the Board approved that the public be consulted to change the name of the NPB as part of a strategy to improve public ownership of the organisation. Concerned that changes would be limited to the name only, the majority of the black employees called for changes in everything that resembled apartheid South Africa, including staff uniform and its kudu bull head logo enclosed in an emblem labelled *Custos Naturae* or 'custodian of nature'. The uniform was partly changed from military style to casual clothing, but only staff at head office mostly enjoyed this change, particularly senior black employees who had always rejected the khaki-style uniform.

Eventually, the kudu bull head logo was 'freed' from the enclosure emblem, symbolic of new freedom in post-apartheid South Africa. The NPB started to internalise its new vision of making its national parks the pride and joy of all South Africans. While waiting a name change, the Board pushed for more transformation measures than Dr Robinson could handle. Within a year of appointing trustees, Board meetings became arenas of conflict on almost all strategic issues. Both *de jure* and *de facto*, the Board took active charge of the NPB, and often bypassed Dr Robinson by obtaining information from his key staff. Dr Robinson reacted by centralising power in his office. Unknown to Dr Robinson, transforming the public service was a powerful force in the post-apartheid South Africa (Maganya & Houghton 1996).

As stated by (Munslow *et al.* 1997:10):

> *Symbolically as well as functionally there was an evident need for the structures of the state to be seen to reflect an appropriate diversity of South African communities at all levels. The exclusive and sectarian nature of the inherited apartheid service needed to be rapidly and decisively addressed.*

The imperatives of change in the post-apartheid South Africa required that the various forms of social development be combined with a strategy to transform public service organisations (McLennan 1997). This was largely because the abilities and capacities suited to a previous political order did not automatically translate into a democratic and diverse South Africa (Munslow *et al.* 1997). Accordingly, the SEU outlined its key strategic plans (Table 7.4), but the park managers scuppered their implementation.

Table 7.4. Strategic plans outlined for the SEU in 1999 with functions and objectives.

Function	Objective
Community facilitation	To develop and nurture good relations with park neighbours by promoting their involvement, through advisory structures, in the overall management and philosophy of the park. Both parties benefit from mutual appreciation of values, aspirations and views.
Economic empowerment	As a resource-rich player in regional development, the SANP should provide economic opportunities for previously disadvantaged communities bordering its parks. The SANP adopted an economic empowerment policy in order to establish 'mutually beneficial partnerships' that were economically viable and sustainable.
Environmental education	Programmes were created to enable both local communities and other South Africans to acquire, or rekindle, a knowledge and pride in natural and cultural heritage. The focus was primarily on the your as the future custodians of the environment. Regional and national Environmental Youth Symposiums involved children from parks' neighbouring communities in action projects.
Cultural heritage	To protect and promote cultural heritage is an important way in which national parks can become the pride and joy of previously marginalized South Africans, through presenting a fuller picture of the country's distorted cultural history.
Research and monitoring	To collect and collate socio-economic baseline data and information from community projects in the parks. Assess results so that social ecology guidelines can be established and incorporated into park management plans.

Source: Adapted from Social Ecology Business Plan

The SEU claimed that it could not create relations between national parks and adjacent local communities because the NPB was still untransformed (Dladla 1998). Dr Dladla insisted that the SEU should be a key part of the NPB's transformation strategy. With a knee-jerk reaction, Dr Robinson charged Dr Dladla, head of the SEU, with the huge task of transforming the NPB. As stated by Dr Dladla: "I don't think he expected me to take up the challenge" (*Timbila* 1(4):62). Indeed, Chief Executives should drive

strategic functions, such as transforming the *modus operandi* of organisations. Hence, Dr Robinson's managerial neglect further alienated the SEU from park managers who argued that SEU knew insufficient about national parks to influence them.

Towards the end of 1996, the relationship between the Board and Dr Robinson became dysfunctional because of alleged irreconcilable differences over the splitting tourism activities from the control of park mangers in order to improve income (*Africa Environment & Wildlife* (5 (1) 1997). Dr Robinson opposed the Board, insisting that tourism was an adjunct of conservation and should, as a result, report to the park manager. Consequently, Dr Robinson was peremptorily forced to resign. However, some people agreed with Dr Robinson's claim that he did transform the NPB because he 'brought it screaming into the new South Africa' (*Keeping Track*, March 1997).

7.3.2 **Transformation attempts, 1997-2002**

In 1997, the NPB was renamed South African National Parks (SANP), and the ANC-aligned Mr Mavuso Msimang replaced Dr Robinson as Chief Executive. As the first black person with a high political profile in the ANC to be appointed to SANP, Mr Msimang's appointment demonstrated the altered priorities of the Board, a key step in improving the public image of the SANP. As secretary to the ANC's president, Oliver Tambo (*Getaway*, November 1997), Mr Msimang had the much-needed political clout. With his dislike for khaki uniform (*Keeping Track*, August/September 1997), Mr Msimang re-enforced casual wear at the head office. As is often wont to happen, appointing a political leader made supporters of the SANP question the commitment of the ANC to protecting South Africa's national parks system. However, within a year of his appointment, Mr Msimang's gentle nature won him public admiration.

In 1998, the SANP agreed to settle a second land claim, but this time it involved the Makuleke people and the apartheid icon of conservation in South Africa, the Kruger National Park. Unlike, the relatively unknown Riemvasmaak claim, the Makuleke claim, involving 250 km^2 of the 20,000 km^2 Kruger, is well documented (Steenkamp 1998a-b; de Villiers 1999; Steenkamp & Uhr 2000; Reid 2001; Cock & Fig 2002;

Magome & Murombedzi 2003; Fabricius *et al.* 2004). In stark contrast to readily accepting the Riemvasmaak claim, the SANP had originally protested the Makuleke claim, which was lodged in 1996. As was the case with the Nama (Richtersveld) agreement, the Makuleke land claim was resolved after 18 months of prolonged conflict over land rights and land use options.

The Makuleke's rights were restored on condition that: 1) no mining or prospecting may be undertaken and no part of the land may be used for agricultural purposes; 2) no part of the land may be used for residential purposes other than for tourism, and these must meet the requirements of an environmental impact analysis; 3) the land be used solely for conservation and its related commercial activities; 4) a servitude be granted to SANP to ensure that it can perform its duties in terms of the agreement and the National Parks Act; 5) no act shall be performed that is detrimental to the obligation of the state should the area be declared a RAMSAR site; and, 6) that SANP has the right of first refusal should the land later be offered for sale.

Under these strict legal conditions, the Makuleke are only entitled to limited tourism developments on their land with highly controlled harvesting of high value wildlife species such as elephant and buffalo. Essentially, the Makuleke leadership anticipated that owning a portion of Kruger would meaningfully 'trickle-down' tourism benefits to their disenfranchised constituency. For the Makuleke, being part of Kruger was like 'wining at lotto' (Magome & Murombedzi 2003). Unknown to the Makuleke, the northern part of Kruger was the most marginal for mass tourism. Indeed, they were surprised to realise that the ecotourism bandwagon that they had jumped was very slow in reaching their remote area because private investors did not 'rush in' with bags full of money (Magome & Murombedzi 2003).

The conflict between the Makuleke and SANP reached a breaking point, in December 2003, when the Makuleke alleged to the Minister of Environment Affairs and Tourism that the senior staff of Kruger were mismanaging their land. The Makuleke are now attempting to manage their land. The Makuleke case study showed that the SANP was still dominated by the 'old era' approach that was largely concerned with protecting

national parks while neglecting other the needs of local communities. Accordingly, the myth of pristine wilderness and its consequent human exclusion, exacerbated national divisions along racial lines, and this had to change (Msimang *et al.* 2003). Under apartheid, the co-managed 'Contractual National Park' model was not, initially, meant for disadvantaged majority of black people. Therefore, SANP did not know how to deal with communal land under the existing co-management model (Magome & Murombedzi 2003). This dual and unequal treatment between private and communal landowners was a new form of 'ecological apartheid' in the democratic South Africa. It can be deduced from the Richtersveld and Kruger case studies that the joint or co-management model involving local communities lacked conceptual clarity.

It was not clear what such a partnership model meant, and how it was supposed to benefit each of the partners involved. In situations of abject poverty, it is difficult to reconcile long-term protectionist goals of PAs, with short-term livelihoods strategies among local communities. For local communities, co-management is not a preferred model as it represents the imposition of a top-down preservationist ideal on their historic rights, current expectations, and future aspirations (Reynolds 1996). Given all these key transformation challenges, both *de jure* and *de facto*, the Board started to assume greater executive functions than was expected by Mr Msimang, and this strained the relationship between the Board and its ANC Chief Executive.

The Board approved guiding values for transformation SANP (Table 7.5), and rapidly started to dictate the pace of the process. A transformation task team was appointed to establish new values. The identified values were so vague that the executive management often found itself confused about what to do. Ultimately, the confusion caused unmanageable conflict. However, the Board's transformation statement was emphatic, stating that (*Custos*, 1998:14):

> *South African National Parks is striving to transfer power and control of resources from the minority that had been appointed and privileged by an undemocratic system, to the majority that participates in the new democratic process. It is also directing the benefits of its activities to providing for all South African, rather than the more wealthy and privileged sections of society.*

Table 7.5. The values outlined in 1998 for guiding transformation of SANP.

Values	Key drivers
Environmental ethics	We uphold environmental ethics with regard to the protection and conservation of natural and cultural resources.
Quality service	We strive to provide a high-quality service to all our guests and clients.
Transformation	We are committed to the transformation process with regard to organisational development and our relations with external stakeholders.
Respect	We respect individuals of all cultural backgrounds and social standing.
The community	We believe in a dynamic engagement with the larger community on whose behalf we are stewards of the nation's natural and cultural heritage.
Communications	We are committed to maintaining a culture of transparency through information sharing and good communications with internal and external stakeholders.
Honesty	We are guided by honesty in our dealings within and outside the organisation and professionalism in the execution of our duties.
Initiative	We value individual initiative in the advancement of organisational goals.

Source: Tema (1998).

The Board argued that the former SANP had worked against national unity because it reflected and maintained the privileges of the minority white people. To demonstrate its commitment, in 1997 the Board promoted the SEU to the level of a full directorate, the Social Ecology Department (SED), and charged the SED with the implementation of projects affecting local communities in the management of national parks. With the directive of the Board, SANP established a five-year Corporate Plan (1998-2001) sub-titled 'a framework for transformation'. Although the corporate plan was flowed from consultations with staff, conflicting mission statements emerged (Table 7.6). This was partly because, under the multilateral talks that created the post-apartheid era, 'sunset clauses' were negotiated for the rights of white people, including secured civil service jobs (De Villiers 1994). The buzzword was 'elite-pacting' in order to demonstrate that the two racial elites had formed a new pact (O'Meara 1996:405). However, all these political compromises delayed transformation efforts. Slowly but inexorably the Board of the SANP began to address the exclusion and alienation of black people from influencing the strategic direction of the organisation.

Table 7.6. Conflicting transformation statements articulated in 1998 from SANP.

Source	Statement
Corporate Plan (1998)	The process is driven by the overriding need to shed organizational principles, policies and practices that have for decades been nurtured by the apartheid philosophy of the ancient regime.
Custos (1998:52)	The transformation mission of SANP is to transform an established system for managing the natural environment to one which encompasses cultural resources, and which engages all sections of the community.
Custos (1998:53)	SANP is striving to transfer power and control of resources from the minority that had been appointed and privileged by an undemocratic system, to the majority that participates in the new democratic process. It is also directing benefits of its activities to all South Africans, rather than the wealthy and privileged sections of society.

In September 1998, the magazine *Timbila* (named after a musical instrument) replaced *Custos*, with its first issue praising the SANP for 'entering a new era'. Unconvinced, the Board insisted on the involvement of local communities (Dladla 1998). Vaguely, Msimang (1998:13) saw transformation as a 'defining characteristic and motivational force in contemporary post-1994 South Africa', adding that:

> *In a nation that has, through its Constitution, committed itself to democracy, freedom of association and the protection of human rights, it is a moral and business imperative that the SANP, as the country's leading conservation and environmental agency, be at the forefront of this transformation.*

However, Msimang (1998:13) shirked the responsibility to the SED, stating that:

> *In the SANP the engine for transformation is the Social Ecology Department, which was established to develop and nurture good relations with communities adjacent to national parks.*

With such managerial neglect, park managers increased resistance to the SED, forcing Mr Msimang to rescind his decision. As a result, Mr Msimang half-heartedly took charge of the transformation process, and the SED was forced to re-focus on its initial strategic plans (Table 7.4). The re-focus meant going back to the Board approved corporate plan, which also vaguely described SE as:

A strategy and process that conveys the philosophy and approach of the SANP to neighbouring communities by establishing mutually beneficial dialogues and partnerships with these communities. The process ensures that the views of the communities are taken into account to the largest possible extent and are acted upon, that the park's existence is a direct benefit to neighbouring communities and that, in turn, communities adjacent to parks welcome the conservation efforts of the SANP.

Naively, Msimang (*Timbila* 3 (5)) thought that he epitomised change, stating that 'the newness of SANP' related to his appointment, adding: 'I am not a conservationist by training, and I'm black'. However, the 'Employee attitude survey' (see *Kiwiet* 2000), revealed that most employees were unhappy that head office was not following the 'corporate plan' and that transformation was vague. Realising that his view of change was incongruous with that of his employees, Mr Msimang stated that change was an ongoing process, but that he preferred 'to see it as affirmative action positively applied rather than simply as a matter of transformation for transformation's sake' (*Africa — Environment & Wildlife*, August 1997). When Dr Anthony Hall-Martin, then Director of Conservation Development retired from SANP in June 2000, he further exposed the tensions in the leadership of the SANP by stating that his priorities had always been purely biological, and that he was 'not particularly concerned about communities and people and all that stuff' (*Getaway*, September 2000:55). Although Mr Msimang was disappointed with the article, he later accepted that Dr Hall-Martin echoed deep-seated sentiments of other senior managers who had opposing views on transformation in the SANP (Supplement to *Financial Mail*, November 2000).

To implement the SE strategy, DANCED (the Danish Cooperation for Environment Development) provided a three-year grant, from 1998 to 2001, of R12 million (US$2 million) for 'capacity building' which was based on: 1) South Africa's impressive network of 20 national parks and their popularity especially the Kruger and Table Mountain; 2) the government's support for community orientated and integrated approaches to conservation; and 3) the rapid growth of tourism in the country that offered a window of opportunity for socio economic development at local community

levels. Against, the DANCED project as originally conceived had all the ingredients for speedy and successful implementation. However, during the implementation of the project, unforeseen constraints became apparent at both corporate and park levels. At the park level, SE was called a fad, and at corporate level Dr Dladla felt the pressure and resigned in mid 1999. The resignation was welcomed by downgrading the SED back to SEU, but left it without a head until April 2000 when I appointed the head of the SEU. Finding myself in an invidious position, and not wanting to polarise either side, I arranged a 'best practice conference' (Magome 2000; SANP 2000), followed by an audit of SEU as part of DANCED's midterm review. The conference report concluded that SEU was 'vulnerable' because of conceptual flaws (Box 7.1).

Box 7.1 Lessons learnt from the Social Ecology capacity building programme.

The DANCED learnt that:

- In transforming organisations, building relationships with undeveloped local people is slower than anticipated as the road is usually paved with many unforeseen obstacles and setbacks;
- Creating viable business partnerships with underdeveloped rural people is an exceptionally slow and unpredictable process that will often have little chance of succeeding if attempts are made to speed up the process by short circuiting the foundation of laying steps;
- Economic empowerment projects are likely to be sustainable after a foundation of trust and goodwill has been established between each national park and its neighbouring people. Thus, in the initial project design phase more effort should have been put on building relationships of mutual trust, goodwill and respect before attempting to establish economic pilot projects; and,
- SANP should not attempt to take full responsibility for socio-economic development of local people neighbouring its national parks. Rather SANP should merely play a facilitatory role in forming synergistic linkages between neighbouring local people, and other local actors such as NGOs, government departments, and private sector dealing with socio-economic development. In fact, this facilitatory role must only focus on issues or projects that are directly related to potential socio-economic opportunities emanating from national parks.

Source: DANCED (2000).

The review concluded that despite the SANP's international reputation, transformation was shackled by a legacy of ineffective and outdated management practices that lurked beneath the thin veneer of outwardly projected success (DANCED 2000). Thus, the objective of establishing mutually beneficial partnerships with local communities neighbouring national parks was not achieved (Box 7.2). With ongoing and declining morale, the last two senior social ecologists resigned (*Kiewiet*, June/July 2002).

Box 7.2. Main findings from the DANCED midterm review report.

Key conclusions of the review team:

- Although there seems to be a clear vision of and commitment to support the SE concepts at all levels in SANP, this awareness has still not materialised in significant practical support and reallocation of SANP resources required for establishing sustainable partnerships with neighbouring communities.
- A recent survey undertaken by the DANCED project of two thirds of the social ecologists in the parks has revealed that in reality only very little time (about 8% of total work time) is devoted to community facilitation. Park managers have indicated that they find that social ecology staff spends too much time on community facilitation and too little time on environmental education and interpretation for tourists further aggravate this discouraging impression.
- The review team's main conclusion on this aspect is that in reality it will probably take considerably much longer time and competent staff to obtain the project's immediate objective than was anticipated in the 'Project Document'.

Source: Adapted from DANCED (2000).

The review team argued that (Box 7.3) that the strong inertia was caused mainly by management problems, *inter alia*: 1) a strong resistance to change amongst staff and ignorance of participatory approaches, both within the organisation and neighbouring communities; 2) a limited "know how" for cross functional work demanded by the SANP mission generally and the SE plans specifically; and 3) a lack of understanding and experience in other areas of strategic management.

The DANCED (2001) midterm review was a bad indictment on the top management SANP, and concluded that the SANP had failed: 1) to transform its corporate plan into actions and results; 2) to align and integrate departmental and park plans with the corporate plan; 3) to align and integrate plans between parks and other departments within the organisation; and 4) to integrate the commercial strategies of SANP with the SE strategies. Despite many unrealistic assumptions, unforeseen disruptions, and obstacles, there was a broad support for both the concept and relevance of SE within SANP, but much work remained to be done to translate visions and plans into reality, and to articulate the means of achieving these roles (DANCED 2000). Consequently, the Danish government refused to extend funding to SANP.

Box 7.3. Managerial dilemmas that scuppered the implementation of SE.

Other factors that also exacerbated the SANP's weaknesses were:

- The strong and independent personality of the now departed SE Director, which resulted in the SE division becoming alienated from the rest of the organisation.
- **A strong rejection of the concept of SE by a large section of "old school staff", who feared and resisted transformation and viewed SE as being synonymous with transformation.**
- Severe cuts in state funding to directing management focus and resources away from SE towards money-making activities such as interpretation for tourists.
- A paucity of base-line date on socio-economic profiles and attitudes of local communities.
- The scattered geographic location of national parks together with very poor communication (organisational channels and technology) between parks, and between parks and Head Office.
- The very small number of mostly inexperienced and untrained staff operating at park level – together with a lack of "buy in" to SE by park managers.

Source: DANCED (2000).

The challenge facing the SANP, now with its acronym tweaked to SANParks because Mr Msimang felt that the acronym 'SANP' could also be applied to the South African National Police, was how to redeem itself. Given all these problems and resistance to SE, the key challenge facing me as head of the downgraded SE was how to change the prevailing negative mindset. Since the SEU fell under the relatively powerful CSD (Conservation Services Department), I simply waited to be appointed the Director of CSD. Knowing full well that park managers were using legislation to resist change, I started an analysis of the National Park Act, 57 of 1976 (the Act).

Logically, transformation in SANParks should have started with a review of the Act, the legal mandate of the organisation. Since 1982, the Act had been amended 12 times, but there had been no amendment that provided for the post-apartheid era. Amending the Act had been *ad hoc*, and since 1990 had involved tweaking those sections that hampered SANParks from achieving its selected objectives (see Table 7.7). Being responsible for policy research and formulation, I obtained approval to assess the extent to which the Act complied with the provisions of the 1996 Constitution, and its relevance for SANParks in the post-apartheid era. The review showed that the Act that enabled SANParks to manage 20 national parks had left the organisation hamstrung by apartheid legal provisions, and out of kilter with its new challenges.

Table 7.7. Amendments to the National Parks Act, 57 of 1976 since 1990.

Introductory amendment of the National Parks Act:	No. & Year
• So as to amend certain definitions; to further regulate the establishment of parks by the Minister of Environment Affairs and Water Affairs; to change the name of the National Parks Board of Trustees; to delete references to 'provincial council"; to further regulate the powers of the board;	23 of 1990*
• So as to insert certain definitions; to further regulate the establishment of parks by the Minister; to grant the board the power to purchase land or a mineral right to land for purposes of a national park.	52 of 1992*
• So as to make further provision for payment of moneys into the National Parks Land Acquisition Fund;	91 of 1992
• Substitute definition of "Minister"; and to provide for the reconstitution of the National Parks Board;	38 of 1995
• Substitute the definition of "Board"; to change the name NPB to South African National Parks (SANP) to regulate anew its power to borrow money;	70 of 1997*
• So as to allow the of SANP to accept and receive any land or mineral rights in respect of donated or bequeathed to the board for purposes of a national park;	106 of 1998*
• So as to bring the SANP within the ambit of the definition of "association not for gain" contained in section 1 of Value-Added Tax Act of 1991.	54 of 2001

Note: For complete wording of amendment with asterix (*), refer to the statutes.

By envisaging the governance of national parks in isolation from the rest of society, the Act severely restricted the autonomy of SANParks to carry out its core statutory competencies, and to extend them in order to achieve good social responsibilities (Erasmus & Magome 2001). While the 'object' of a national park (section 4) in the Act was irreconcilable with the National Environmental Management Act of 1998, the corporate structure of SANParks did not allow for effective management of national parks (sections 5-11) because the Act restricted the powers and functions of SANParks as corporate entity (sections 12, 13, 14, 14A, 15, 23). The study concluded that the Act was out of kilter with provisions of South Africa's 1996 Constitution, the country's major international environmental obligations, and post 1994 policies (Table 7.8).

Accordingly, Erasmus & Magome (2001) concluded that:

> *Apart from the practical implications of a defective Act, SANParks will remain politically, developmentally and operationally vulnerable unless its enabling Act is brought in line with both the new framework for environmental governance and the transformation activities of its Board of Trustees.*

Table 7.8. Key findings of a 2001 study into the constitutional provisions of the National Parks Act of 1976.

The study found that the Act did not:	Section in the Act
• Reflect SANParks as the only organisation tasked with managing national parks;	(2)
• Define the relationship between SANParks and provincial protected areas;	
• Adequately protect land identified to become part of the national parks system;	(2a, b, & d)
• Make explicit or enable the developmental role of SANParks;	
• Provide for the establishment of enforceable mutually beneficial relationships with disadvantaged neighbouring local communities;	
• Adequately provide for all types of contractual national parks, in particular land belonging to black people;	
• Reflect the obligation of the government to international treaties such as Agenda 21 and the Convention on Biological Diversity.	

Source: Adapted from Erasmus & Magome (2001).

While the Board comprised 18 persons, the quorum required only four members to make decisions valid. Under apartheid, four members of the Board were appointed to represent the four provinces of the republic. With nine provinces under post-apartheid, four members were simply extended to nine, but the quorum of was carried over unchanged, thereby making a mockery of the principle of representiveness under good governance. However, democracy did not bring increased funding for the SANParks, either from government or from the fickle tourism industry. The pressing demands on the public exchequer for providing basic services to those who previously did not have access to housing, water, electricity, and land, were the priorities.

The viability of SANParks as a semi-independent statutory organisation still depends on sound funding. Although the core business of SANParks was stated as biodiversity conservation, the organisation needed money to sustain itself. While Mr Msimang's ANC profile had improved the political image of SANParks, he was reluctant to lobby government to increase funding for SANParks. Within three years of Mr Msimang's tenure, the liquidity of SANParks deteriorated to the extent that political opposition parties called for government intervention. Mr Msimang somehow withstood most of the criticisms, and strategically blamed the historic February 2000 floods in Kruger for cash flow problems. When the finances deteriorated to the extent that the banking facility was overdrawn to its limit of SAR30 million (US$10 million), ABSA bank

warned that it was unlikely to honour salary payments for December 2001. The top management devised knee-jerk strategies to 'save' SANParks, and asked Mr Msimang to secure a government bridging grant of SAR30 million including re-instatement of the 'roads subsidy' of SAR12 million a year.

Concerned about the causes of liquidity problems experienced by SANParks, the Minister instructed auditors 'to assess to what extent these causes are cyclical in nature or whether they are of a more permanent nature' (Deloitte & Touche 2001:2). The analysis reviewed income statements, balance sheets, and the underlying cash flows for a five-year period, 1996 to 2001 (Box 7.4). When Dr Robinson resigned at the end of 1996, the SANP's investments amounted to SAR95.5 million (US$15.8 million) with positive cash flow of about SAR23 million or US$3.8 million (see NPB Annual Report 1995-96). Consequently, the auditor focused on Mr Msimang's tenure and its effect on the financial stability of the organisation.

The audit report was a bad indictment on the leadership of SANParks, and implicated incompetence or 'shortage of staff with the require skill or experience' (Deloitte & Touche 2001). Faced with this indictment, the management of SANParks convinced the government that they could turn the organisation around. Cost cutting measures included reducing numbers of employees from over 4,000 to fewer than 3,000 during 'Operation Prevail', meaning survival. Except for key tourism activities, all operations were frozen for eight months with severe restrictions on all travel, maintenance of infrastructure and capital expenditure. With bridging finance from government, cash flow was improved. However, SANParks remained exposed and therefore financially vulnerable (Moore & Masuku van Damme 2002).

Having followed media reports, McKinsey & Company (McKinsey) approached me and offered to assist SANParks on a *pro bono* basis. McKinsey found that except for human resources policies, SANParks lacked common corporate biodiversity strategy, revenue generation, and broader constituency support. For example, of the tourists that visited Kruger in 2001, black South Africans only accounted for 4% suggesting that black people did not choose national parks in the range of their leisure activities.

Box 7.4. Findings of a financial review of SANParks in 2001.

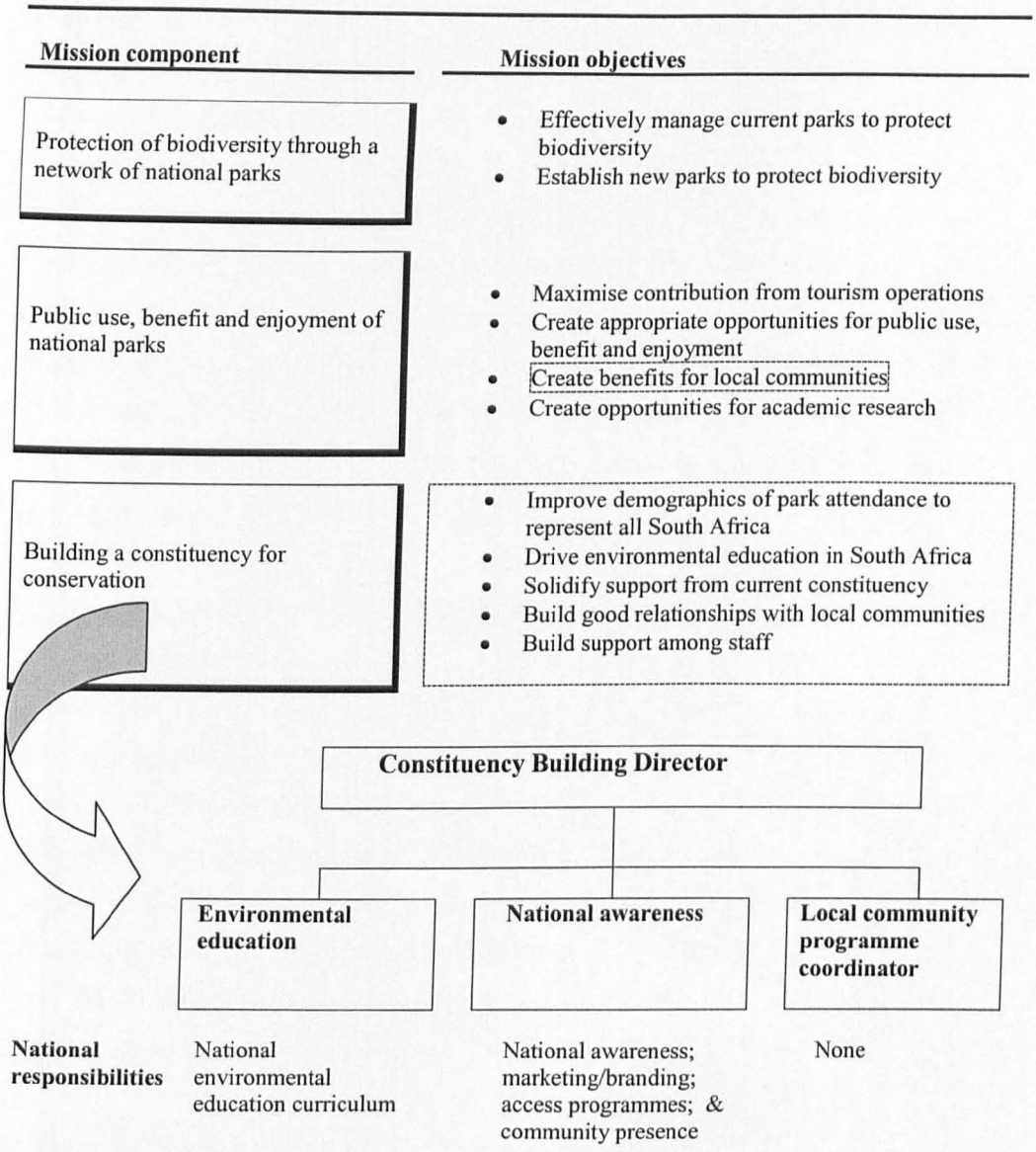
Key summaries of the general income and expenditure at SANP between 1996 and 2001.

- Until March 1996, income exceeded expenditure and an operating profit of SAR6,217 million was realised.
- Since the 1996/7 financial year, operating expenditure has exceeded operating income. These operating losses, which have varied between R12 and R25 million, average SAR19 million over the last four years, amounting to SAR89,431 million since 1996/7. **This trend appears to be firmly entrenched and is likely to persist if no action is taken to normalise the situation.**
- Up to the 1999 financial year, the SANP were given a road subsidy by the Department of Transport. The loss of the Road Subsidy (approximately SAR10 to SAR12 million per annum) in 1999 is not the primary reason for poor financial health of SANP as expenditure had already exceeded income before this loss of revenue occurred. **The loss has compounded an already financially weak situation.**
- Finance costs have remained relatively static (average finance cost over the period is R12 million) and are not a significant cost driver. However, with continued operational losses this may well become a problem if these are financed from borrowings or continued use of the bank overdraft.
- **The change from an operating profit in 1995/6 of SAR6,217 million to a loss of SAR12,595 million the very next year is primarily the result of a significant increase in labour costs over this period, which increased from R126,749 to R157,873 (an increase of R31,124 million or 24%).**
- "Other Expenses" which includes "Depreciation", "Office and Operating", Electricity and Water", and "Subsistence and Travel, have **increased by 177% over 5-year period, from SAR34,965 million to SAR97,096 million.**
- We have analysed "Other Expenses" in great detail in an attempt to explain the significant increase in this cost and have found that it is primarily as a result of an increase in "Office and Operating" expenses. This category has increased by more than 300% over the 5-year period, and now accounts for 18% of total SANP cost. "Office and Operating" expenses are those that cannot be readily be classified and do not clearly fit into any other cost category. **What this trend indicates is that SANP appear not to have sufficient cost control mechanisms in place, or that these do not work as intended or that they may have a shortage of staff with the required skill or experience.**

Source: Adapted from Deloitte & Touche (2001:3-6). **Note**: 1US$ averaged SAR6.5.

The vague SE concept was changed to a long-term strategy of 'constituency building' (Figure 7.1), which was also changed to 'people and conservation' (PaC) because Mr Msimang felt politicians could misconstrue 'constituency building'. In mid 2003, a Director with extensive experience in environmental education was appointed to head PaC. By end of September 2003, Mr Msimang was 'hand-picked by government to fix SITA, State Information Technical Agency' (*Financial Mail*, March 2004:22). Front paged as 'Mr fix it' for supposedly 'fixing' SANParks, Mr Msimang was somehow expected to 'fix' the multi-billion Rand SITA.

Figure 7.4. Constituency building as a primary component of the SANParks mission.



Source: Adapted from McKinsey & Company (2002).

In August 2003 SANParks released a book I had commissioned ostensibly to review its key strategic achievements (Hall-Martin & Carruthers 2003). In line with the theme *benefits beyond boundaries* for the 5th World Parks Congress in Durban in 2003, SE was supposed to be a stand-alone chapter in the celebration book. Although SANParks had notable progress on some aspects of biodiversity management (Biggs & Novellie 2003; Carruthers 2003; Fearnhead & Mabunda 2003; Hall-Martin 2003; Hall-Martin & van der Merwe 2003; Hall-Martin *et al* 2003; Knight & Castley 2003; Randall *et al* 2003a-b), the draft chapter on SE was so weak that it had to be abandoned. Since hope is the essence of humanity, the book concluded that SE remained the future challenge for SANParks (Moosa & Morobe 2003). Sadly, failure to make progress on SE only exposed inherent weakness in the leadership of SANParks (Magome 2003a) rising all the way to the level of its Board (Deloitte & Nkonki 2004).

7.3.3. **Transformation attempts, 2003-2008**

In November 2003, Dr David Mabunda, the first black person to manage Kruger from 1997, replaced Mr Msimang. Dr Mabunda believed that directing Kruger was like two baptisms: first with water and second with fire. Kruger was 'drowned' by the February 2000 floods, and then 'burnt' by the September 2001 fires that killed, *inter alia*, 23 people and four elephants. Some critics argued that had Dr Mabunda not retrenched experienced white staff; the fire might have been stopped. Despite this, Dr Mabunda was credited with transforming Kruger to reflect the racial profile of the post-apartheid era. Immediately after his appointment, Dr Mabunda re-introduced the khaki uniform.

Coincidentally, the staff newsletter *Kiewiet*, the Afrikaans name for the noisy plover (now renamed lapwing), was replaced by *Go Wild*, perhaps a sign of returning to order. While it is too early to assess Dr Mabunda's performance, he is the first Chief Executive of SANParks to state that transformation must address 'gender equality, affirmative action, and equal opportunities (Mabunda *et al.* 2003:14). With a PhD in tourism management, Mabunda (2004) is rethinking the wisdom of 'if it pays it stays' by asking if 'it is realistic to expect conservation agencies to be self-supporting without forcing them to go out begging' (Earthyear 2004:46).

7.4. **Discussion**

The success or otherwise of attempts to transform SANParks is strongly linked to the politics of making a transition from a revolution. During any such transition period, the length of which is often determined by the new elites, or the 'inner circle' of the leading political party, transformation is entrusted with certain key positions (Lenin 1918). In the *Lesson of this century*, Popper (1997:2) re-quoted Karl Marx's post-revolutionary statement that:

> *It is necessary that the productive powers already acquired and the existing social relations should no longer be capable of existing sided by side.*

While Marx implied 'total revolution and heralded the end to all antagonism' (Popper 1997:2), South Africa did not experience a 'total revolution' but a negotiated political compromise (Lee 1997). Indeed, the former ANC Minister of Environmental Affairs and Tourism, Dr Pallo Jordan, reminded the elite South African public that the anti-apartheid struggle is 'an unfinished revolution' (*The Star*, 3 September 1997) because instead of seizing total power, the ANC negotiated its partial transfer, and instead of transforming the government, the ANC 'found itself assimilated into it' (Marais 1998:12). To circumvent this quandary, the ANC appoints its senior public servants who understand its political agenda and are unreservedly committed to it (Bernstein 1999). However, the ANC has a responsibility to govern for the interests of all South Africans, including the former oppressors (ANC 2001).

Entangled in struggles for power, the leadership of SANParks could not resolve the conflict. For example, although Dr Robinson had pioneered change in SANParks, his perceived association with the apartheid regime implied that the new Board could not trust him to carry out their mandate. However, while the Board wanted to transfer power from the previously advantaged minority of white citizens to the previously disadvantaged black citizens, how the power was to be transferred, remained unclear even to the ANC-aligned Mr Msimang. The strained relation between the Board and its executive directors made strategic implementation of policies a daunting task, and this ultimately compromised the financial health of the organisation.

As suggested by Bernstein (1999:41), it might be appropriate to ask:

> *Has the ANC in government thought through the differences between a public service that reflects the population of the country (a desirable goal) and one that actually does its job competently and honestly?*

While this question can only be answered by time, the challenge facing the ANC is the choice between political expediency and economic stability. For SANParks, part of the answer can be inferred from the experience of two key liberal board members who served in the first post-apartheid Board (Cock & Fig 2002:152):

> *However, in several respects, transformation* [in SANParks] *has been supplanted by a restructuring that reflects the incorporation of the liberation movement into institutions serving the elites.*

Since 1994 transformation in SANParks reflected 'a shallow restructuring rather than a fundamental transformation' (Cock & Fig 2002). While Dr Robinson's 'shallow restructuring' could be attributed to his perceived association with the 'old order', Mr Msimang's 'shallow restructuring' reflected his inability to fully understand processes of effecting meaningful change in a highly bureaucratic state agency. In this context, the quote from Nelson Mandela (in Sparks 2003:29) is relevant:

> *We were taken from the bush, or from underground inside the country, or from prisons, to come and take charge. We were suddenly thrown into this immense responsibility of running a highly developed country.*

The complexity of SANParks overwhelmed Mr Msimang who indeed asked: 'how do you transform a Cinderella?' (Msimang *et al.* 2003). In the United States National Park Service (USNPS) showed that efforts to transform an established oligarchy were incidental, and as such were not accommodated in by its management in the mission of the agency (Foresta 1984). Part of the problem is that wildlife managers have a unique professional culture (Kennedy 1985) that makes them reluctant public servants when it comes to transformation (Magill 1988). The Vail Agenda of 1993 concurred; stating that USNPS 'will not be transformed quickly or easily because confronting challenges that were long-standing' meant addressing problems that a reluctant UNPS

had never confronted wholeheartedly (Sellars 1997). The parallels are instructive because South Africans often compare SANParks with its US counterpart in terms of history (Beinart & Coates 1995), visitor experience (Cock & Fig 2002), and scientific management (Mabunda *et al.* 2003). Despite these parallels, comparisons beyond park boundaries are hardly explored. To understand the daunting task of transformation SANParks, and the ineptness of its leadership to effect successful change, it is important that the experiences of corporate organisations are revisited so that the pitfalls that confronted SANParks can be fully appreciated.

On why transformation efforts fail, Kotter (1998:3) points out that:

> *The change process goes through a series of phases that, in total, usually require a considerable length of time. Skipping steps create only the illusion of speed and never a satisfying result'.*

Organisations that enjoy enduring success have a core purpose and core values that remain fixed while their strategies and practices endlessly adapt to a changing world (Collins & Porras 1998). In this context, the failure of SANParks becomes apparent because both the core ideology and envisioned future were not identified. Although SANParks had a Transformation Task Team (TTT), the TTT first reported to the SEU and the to the Chief Executive Officer (CEO). As suggested by Duck (1998), the TTT should have comprised established managers from within SANParks who should have committed all their time and energy to managing change. Consequently, the success or otherwise of transformation in SANParks reflected leadership weakness.

Had both Dr Robinson and Mr Msimang known that 'reinvention is not changing what is, but creating what isn't' (Gross et al 1998:85), they could have aggressively used the 'sink-or-swim' strategy. Instead of creating the right conditions for the 'caterpillar' (the NPB) to become a 'butterfly' (new SANParks), both Dr Robinson and Msimang created more of a caterpillar. Hence, the 'caterpillar' was not given the opportunity to make the transition to a butterfly. However, their inability to act decisively could have been hampered by a belief that the organisation was already a 'butterfly'. Even if it was indeed a butterfly, evolutionary biology dictates that butterflies and moths should

adapt to their changing environments. The peppered moth is a good example. In the corporate world, successful agencies invent and re-invent themselves. Perhaps Dr Mabunda has the opportunity to do what Martin (1998:117) advises:

> *The collective leadership of the company needs first to look back, to find out the good reasons why they have come to act the way they do. They get control of their future by examining their past. They change by looking in, not out.*

The collective leadership of SANParks must understand why employees resist change, and must find ways to change this. To executive managers, change means opportunity; both for the business and for themselves, but for many employees change is seen as disruptive and intrusive (Strebel 1998). Finally, SANParks must avoid the pursuit of activities that sound good, look good, and allow managers to feel good, but contribute little or nothing to bottom-line performance (Schaffer & Thomson 1998).

7.5. **Conclusion**

The instructive book *South Africa: the limits to change* contains the quote: *There is nothing unanimous about social transformations; its meaning depends on the meaning it is assigned by the various actors involved* (Marais 1998:1). The debate on whether SANParks is, or is not, transformed, will always be the preserve of various elites, both within and outside the organisation who, irrespective of race and creed, will review transformation from their own perspective. While one view holds that 'transformation has not been sufficiently quick and the legacy of apartheid remains too vivid' (Beinart 2001:290), another asserts that transformation serves 'elite interests' (Cock & Fig 2002). The strength of the conservation movement in the 20th century was its capacity for criticism, to pick over the past, and derive lessons from it (Adams 2004). However, the conservation movement is still not well structured to adapt to change (Child 2004a). The challenge on how PAs can adapt is the focus of the next chapter.

Chapter 8

Law reform, protected areas, and rural development: implications for policy guidelines

8.1. *Introduction*

Unlike much of colonial Africa, South Africa was first influenced by colonial laws (1652-1912), and thereafter by apartheid laws (1913-1993). Of the two political eras, apartheid's racist laws and policies had by far the most negative impact on the psyche of all South Africans irrespective of their race and creed. Following the post-apartheid elections of 1994, the African National Congress (ANC) led government of national unity (GNU) had to revisit and reform apartheid's racist laws, policies, rules, and regulations. As South Africa's first black president, Nelson Mandela put a great thrust on nation building by creating the 'Truth and Reconciliation Commission' (TRC).

The TRC was a major step in healing an extremely racially divided nation. According to the chair of the TRC, Nobel Prize winner Reverend Desmond Tutu, 'in order to speed up the healing process the festering racial wounds had to be opened to expose the puss, cleanse the wounds, and apply healing balm'. However, the perpetrators of apartheid were allowed to apply for amnesty and, if their acts were proven to have been politically motivated, they were legally exonerated. With an evil system like apartheid, there was a thin line between political and criminal acts. In fact, some legal and political scholars argued that apartheid was a criminal act in itself and attempts to separate political and criminal acts are a *non sequitar* and border on the absurd.

The importance of the TRC cannot be overemphasised. Two years after the democratic elections there was concern that 'South Africa's breezy post-apartheid self-confidence has crumbled' (*The economist*, October 12th–18th 1996:27). Despite his iconic status, President Mandela was often criticised by non-ANC aligned liberation parties for taking reconciliation too far (Venter 1998). Some senior ANC members shared similar

sentiments, but it was unwise for them to disagree publicly with President Mandela (Bernstein 1999; Sampson 1999), because of both his extraordinary statesmanship and unique role in bringing a spirit of reconciliation to a country on a brink of anarchy and civil war (Dubow 2000). Strategically, drastic reform measures were left to Mandela's hands-on successor, President Mbeki. Having returned from exile in 1990, President Mbeki was relatively unknown to the vast majority of black people, and his political career partly depended on wining their support by providing basic social services.

To provide social services, the government has followed two macroeconomic policies (Schoeman 1998:297): 1) the RDP (the reconstruction and development programme) that focuses on the demand side of the economy by dealing with how black people expect wealth to be redistributed by the government; and, 2) the GEAR (growth, employment and redistribution strategy), which deals with the supply side of the economy by stimulating growth in order to provide the services envisaged by the RDP. Although mixing the socialist-based RDP (ANC 1994) with the market-based GEAR was supported by big business, it was also seen as readiness by 'ANC leaders to catch up with the finer tastes of their former masters' (Adam *et al.* 1998:165-6). Mbeki (1998), was aware of these criticisms, including being accused of emphasising 'the need for white South Africans to share their wealth with blacks' (*The Economist*, June 12th –18th 1999:80), President Mbeki knows that while former President Mandela was credited with triumph, he will blamed for mistakes (Sampson 1999). Nonetheless, market-led development is seen as the only way to improving livelihoods (CDE 2001).

In the post-apartheid era, catch phrases like 'unbundling assets', 'speeding up black economic empowerment', 'fast-tracking development', and 'vivifying[5]' change, have been popularised by the new elites (Magome & Murombedzi 2003). Such jargon is durable because high expectations were also of concern to former President Mandela who warned his constituency against having unrealistic expectations. However, fully aware of the necessity to improve livelihoods, former President Mandela had on many occasions called for the creation of 'jobs, jobs, and jobs' (Parsons 1999).

5 Derived from 'vivid'. 'Vivifying' is the act of making things vivid.

South Africans are reminded that President Mbeki was called to (Parsons 1999:80):

> *Achieve economic growth; improve quality of life of ordinary South Africans and in short to effect transformation. How well he will succeed will no doubt depend on many factors, some of them not even remotely under his control, others perhaps a direct result of his personal and professional qualities and abilities.*

Under the short-lived (1994-1996) power sharing arrangement between the ANC and the National Party (NP), the environment portfolio was allocated to the NP. Giving the NP such a key portfolio suggested that it was not a priority to the ANC. Following the departure of the NP, the ANC re-allocated the portfolio to Dr Pallo Jordan, previously removed from the Ministry of post and telecommunications. Unenthused with the environment portfolio, Dr Jordan did little to reform environmental laws. After the 1999 elections, Mr Valli Moosa replaced Dr Pallo Jordan. Although environmental governance in the post-apartheid era comprised patchwork of inherited, interim, and intended legislation and policy (Glazewiski 2000), Valli (as affectionately known) and his Director General, Dr Crispian Olver, started a law reform programme (LRP) that, within two years, surpassed even the efforts of the apartheid government.

In this Chapter, I outline how the LRP: 1) affects the management of state PAs in the post-apartheid era; 2) links state PAs with rural development; and 3) as a result, policy guidelines, and study recommendations ought to be formulated.

8.2. **The Constitution and environmental protection**

As previously mentioned (Chapter 7), the South African Constitution of 1996 (the Constitution) states that nature conservation should remain a dual mandate between national and provincial governments. This duality has translated into uncoordinated efforts to effect terrestrial conservation (Table 8.1). Except for consolidating the nine provincial conservation agencies, the split mandate between national and provincial departments was carried over, as it was, from the apartheid era. Hence, a profusion of new laws and lack of co-ordination between government departments has continued to hamper effective management of PAs.

Table 8.1. Government agencies responsible for managing PAs in South Africa.

Agency in charge	Legal mandate
Ministry of Environmental Affairs and Tourism	Administers sites under the World Heritage Act 49 of 1999, RAMSAR, and the Environment Conservation Act 73 of 1989. • Administers Marine Reserves and Marine Protected Areas. • The Minister ultimately oversees both South African National Parks and National Botanical Institute.
South African National Parks	An independent statutory board established under the National Parks Act 57 of 1976. • Manages 22 NPs including Kruger and Cape Peninsula NPs. • Co-manages transboundary parks affecting its NPs.
National Botanical Institute	An independent statutory board established under the National Forest Act 84 of 1998. • Manages 7 national botanical gardens, including Kirstenbosch Botanical Garden in Cape Town, and 4 Flower Reserves. • Undertakes biodiversity planning.
National Heritage Resources	Managed by various agencies created under the National Heritage Resources Act 25 of 1999. • Responsible agency is the South African Heritage Resources Agency (SAHRA). • Affects the management of cultural and historic sites in PAs.
Provincial Environmental or Nature Conservation Departments	Operate in 9 provinces under nature conservation ordinances. • Some are statutory boards, e.g., Mpumalanga, North West and KwaZulu-Natal. • However, some Homeland Nature Conservation Acts have not been repealed e.g., Bophuthatswana (Bop) Parks.
Local Authorities	Establish and administer a variety of PAs ranging from green or open spaces to nature reserves.

Note: This table excludes protected forests, watersheds, and land under the National Defence Force.

The first attempt to address uncoordinated mandates was by gazetting the 1997 *White Paper on Environmental Management Policy* ostensibly to create: 1) an effective, yet properly-resourced, and harmonised framework for environmental management; 2) an integrated system of laws; and, 3) capacity at all levels of government to implement the environmental management policy. The second attempt to address institutional arrangements for managing the country's 70,000 km^2 of PAs was by commissioning an inquiry led by Judge Kumleben in 1998. The Kumleben Commission (as it was known in the country) investigated appropriate legal arrangements for managing both

PAs and biodiversity in South Africa (Box 8.1a). Despite this broad mandate, the Kumleben Commission recommended that *the existing multiple-management of PAs should not to be replaced by one central authority or converted to an entirely decentralised provincial structure* (Box 8.1b), and this was interpreted as advocating for the *status quo*. Consequently, many South African environmentalists consider the Kumleben Commission as a non-event in terms of shaping the institutional landscape in the post-apartheid South Africa.

Box 8.1a. Terms of reference for investigating the management of South Africa's PAs.

To investigate and make recommendations on the:

- Management of national parks as part of the State's responsibility of nature conservation.
- Functionality of the division of administrative competencies between the SANP and the provincial conservation authorities and its effect on service provisions.
- Future management of South Africa's system of national parks and other PAs with specific reference to bringing decision-making and benefits closer to local communities.
- Role of provinces and the SANP in the management of existing national parks and in the identification and proclamation of future national parks.
- Constitutionality (if any) and institutional arrangements as well as legislative and financial measures required for the most appropriate alternatives.
- Application of existing criteria for the classification of PAs in South Africa in the light of current constitutional dispensation, present and international trends.

Source: Adapted from Kumleben *et al.* (1998).

Box 8.1b. Key recommendations of the Kumleben Commission.

The Commission recommended that:

- There be a scientific appraisal of all existing PAs to determine those that qualify for national protection, and such areas be known as Nationally Proclaimed Protected Areas (NPPAs).
- The state bears ultimate responsibility for the welfare and preservation of NPPAs and such areas be properly and specifically funded.
- The existing multiple management networks of the PAs is not to be replaced by one central authority or converted to an entirely decentralised provincial structure.
- The involvement of local communities in the management of, and the sharing of economic benefits from PAs is essential for their well-being and is in the interest of conservation.
- There is merit in the establishment of statutory boards in the provinces to assist in the management of PAs and nature conservation generally.

Source: Adapted from Kumleben *et al.* (1998).

In 2001, SANParks initiated the process of replacing its National Parks Act of 1976 and regulations, both of which still reflected apartheid-style views (Chapter 7). Since national parks were managed despite the Act, rather than in terms thereof, a new Act with new regulations was required (Erasmus & Magome 2001). Accordingly, a draft framework was presented to the Minister of Environmental Affairs and Tourism, so that he could approve the formulation of a new Act. In the meantime, the Department of Environmental Affairs and Tourism (DEAT) had started an environmental LRP into which the preparatory work of SANParks was to be accommodated. DEAT's LRP was the first in the country to envisage a single integrated governance of PAs in which the national parks featured as an integral part of the overall conservation landscape.

The first version of the draft bill that emerged from DEAT was, however, not what SANParks had expected. Instead of reaffirming SANParks as the national authority for managing national parks, the LRP focused on biodiversity conservation and proposed the virtual disappearance of SANParks in a new dramatically changed institutional arrangement — from a flexible statutory body to a bureaucratic state department, managed by DEAT. SANParks was under siege, and this forced the Board to appeal to Minister Moosa for a meeting in December 2001. Following the meeting with the Minister, I was formally appointed to help DEAT draft a Bill that accommodated the corporate needs of SANParks. By using: *A guide to legislative drafting in South Africa* (Burger 2001) and legal advice, I secured significant changes in the draft Bill such as sections that recognised the role and national status of SANParks. Between January 2002 and May 2004, I helped DEAT and SANParks to craft a Bill that could ultimately legally justify the transformation efforts of SANParks (Chapter 7). Since the protection of both fauna and flora enjoyed historical support within the country, my top priority was to ensure that the Bill legitimised the rights of local communities.

The Bill eventually accommodated most of the legal sections that were needed to make SANParks functional. However, DEAT's bullish crafting of the initial Bill escalated into unmanageable conflict with all the provinces. Ultimately, the original Bill that was envisaged to provide the legislation for biodiversity conservation was later split into two Bills. One dealt with biodiversity, and the other with PAs. After

parliamentary approval of the new Bills and subsequent signing into law by the State President, environmental governance then comprised a range of overlapping laws that view national parks part of a broader system of PAs that collectively form the core of the country's coherent environmental conservation strategy. The challenge facing DEAT is to ensure that the new acts are implemented. In SANParks, processes are in place to acquaint the managers of national parks with the new Acts.

To be relevant in the post-apartheid South Africa, SANParks must comply with the provisions of the amended National Environmental Management Act of 1998, including both its new Protected Areas Act of 2003, and the Biodiversity Act of 2004. Simultaneously, SANParks must manage its finances and assets in line with the Public Finance Management Act (PFMA) of 1998, and the Local Government Municipal Structures Act of 1998, read together with the Local Government Property Rates Act of 2004. Accordingly, it is imperative that national state agencies and nine provincial agencies must first understand all these new Acts, and thereafter incorporate them in their policies and strategies.

8.3. **National Environmental Management Act of 1998**

NEMA, the National Environmental Management Act 107 of 1998 (Box 8.2), is the cornerstone and the "umbrella" law that establishes principles applicable to all aspects and sectors of environmental governance including specific legislation such as recent acts such as the Biodiversity Act of 2004 and the Protected Areas Act of 2003. In the event of conflict, the provisions of NEMA supersede those of other environmental laws. As a result, all the various sectors of the country are now obliged to observe the provisions of NEMA and its subsequent amendments.

The purpose of NEMA is to provide for:

> *Co-operative environmental governance by establishing principles for decision-making on matters affecting the environment; agencies that will promote co-operative governance; procedures for co-ordinating environmental functions exercised by organs of state; and, to provide for matters connected therewith.*

Box 8.2. The principles governing all national environmental management in South Africa.

The principles set out in this section apply throughout the Republic of South Africa to the actions of all organs of state that may significantly affect the environment and —

(a) shall apply alongside all other appropriate and relevant considerations, including the State's *responsibility* to respect, protect, promote and fulfil the social and economic rights in Chapter 2 of the Constitution and in particular the basic needs of categories of persons disadvantaged by unfair discrimination;
(b) serve as the general framework within which environmental management and implementation plans must be formulated;
(c) serve as guidelines y reference to which any organ of state must exercise any function when taking any decision in terms of this Act or nay statutory provision concerning the protection of the environment;
(d) serve as principles by reference to which a conciliator appointed under this Act must make recommendations; and
(e) guide the interpretation, administration and implementation of this Act, and any other law concerned with the protection or management of the environment.

Source: National Environmental Management Act, 108 of 1998.

NEMA provides a legal framework for environmental governance that is intended to:

- Redefine the environment in development-centred terms. This focus enforces a paradigm shift in which the exclusive promotion of the natural non-human environment is replaced by promoting a balance between the needs of the natural environment and the human needs that impact thereon;
- Establish a set of principles for environmental management in South Africa;
- Link environmental governance in South Africa to the international agreements such as Agenda 21 and the Convention on Biological Diversity; and
- Demarcate the arena within which PA authorities can carry out their statutory obligations as the country's viable conservation agencies.

Based on the amendment, environmental management inspectors (EMIs) will carry out environmental law enforcement by ensuring that different kinds of law enforcement officers such as field rangers, law enforcement officials, and key special investigative officers, have appropriate legal powers, NEMA requires that each EMI have a specific mandate on appointment. From SANParks' operational perspective, the governance issues that flow from the NEMA amendments are: 1) facilitating delegation of powers

to appoint EMIs from the Minister to the Board of SANParks, and from Board to park management; 2) development of appropriate mandates for all categories of EMIs; 3) training of EMIs in respect of the new statutory framework; and, 4) securing statutory authority in order to deal with emergency incidents in terms of NEMA, section 30(1).

Overall, NEMA emphasises that environmental management must: 1) place people and their needs at the forefront of its concern; 2) serve their physical, psychological, developmental, cultural and social interests equitably; and, 3) that all developments must be socially, environmentally and economically sustainable. As a result, managers of provincial PAs and SANParks will have to do more than just meeting the basic legal requirements of the law. As a national agency, SANParks is expected to provide a good example by showing leadership.

8.3.1. NEMA: Protected Areas Act of 2003

The Protected Areas Act, 57 of 2003 repeals the National Parks Act, 57 of 1976, and its regulations, by establishing an integrated typology of national, provincial, and local PAs, with SANParks designated the national agency for managing its current national parks. The power to make regulations now vests in the Minister or the provincial MEC (Member of the Executive Council, equivalent to national deputy Minister) and not SANParks or provincial conservation agency. However, all the management authorities of the state are empowered to make internal rules for PAs under their management in order to regulate day-to-day operational matters.

The new PAs Act (Table 8.2) provides a framework for what matters a management plan may contain —

(a) *development of economic opportunities within and adjacent to the protected area in terms of an integrated development plan framework;*
(b) *development of local management capacity and knowledge exchange;*
(c) *financial and other support to ensure effective administration and implementation of the co-management agreement; and*
(d) *any other relevant matter.*

To ensure compliance, section 43 (1) of the Act states that 'the Minister may establish indicators for monitoring performance with regard to the management of national protected areas and the conservation of biodiversity in those areas', and that —

(2) The MEC may establish indicators for monitoring performance with regard to the management of provincial and local protected areas and the conservation of biodiversity in those areas.

(3) The management authority of a protected area must —

(a) monitor the area against the indicators set in terms of subsection (1) or (2); and;

(b) annually report its findings to the Minister or MEC, as the case may be, or a person designated by the Minister or MEC.

(4) *The Minister or MEC may appoint external auditors to monitor a management authority's compliance with the overall objectives of the management plan.*

Failure to manage according to prescriptions can lead to termination of the mandate to manage PAs which is provided for by section 4(1), stating that if the management authority of a protected area is not performing its duties in terms of the management plan for the area, or is under-performing with regard to managing the area or its biodiversity, the Minister or the MEC, as the case may be, must—

(a) notify the management authority in writing of the failure to perform its duties or of the under performance; and

(b) direct the management authority to take corrective steps set out in the notice within a specified time

Since the new PAs Act repeals the National Parks Act of 1976, the main governance issues for SANParks that flow from the PAs Act are:

- Finalisation of regulations and internal rules. So far, SANParks has developed a draft set of new regulations in consultation with DEAT and these will be presented to the Board and thereafter submitted to the Minister.
- Ensuring that the key employees of SANParks at all levels are adequately acquainted with and trained in the working of the new laws and regulations and how they relate to each other.

Table 8.2. Key provisions of the Protected Areas Act, 57 of 2003, with specific reference to the management plans for PAs and showing emphasis added by the author.

Provision	Relevant sections of the Act
Objectives	2. The objectives of this Act are— (a) to provide within the framework of national legislation, including the National Environmental Management Act, for the declaration and management of protected areas; (b) to provide for co-operative governance in the declaration and management of protected areas; (c) to effect a national system of protected areas in South Africa as part of a strategy to manage and conserve its biodiversity; (d) to provide for a representative network of protected areas on state land, private land and communal land; (e) to promote sustainable utilisation of protected areas for the benefit of people, in a manner that would preserve the ecological character of such areas; and (f) **to promote participation of local communities in the management of protected areas, where appropriate.**
Preparation of management plan	39. (1) The Minister or the MEC may make an assignment in terms of section 38(1) or (2) only with the concurrence of the prospective management authority. (2) The management authority assigned in terms of section 38(1) or (2) must, within 12 months of the assignment, submit a management plan for the protected area to the Minister or the MEC for approval. **(3) When preparing a management plan for a protected area, the *management authority concerned must consult municipalities, other* organs of state, local communities and other affected parties, which have an interest in the area.** **(4) A management plan must take into account any applicable aspects of the integrated development plan of the municipality in which the protected area is situated.**
Management plan	41. (1) The object of a management plan is to ensure the protection, conservation and management of the protected area concerned in a manner which is consistent with the objectives of this Act and for the purpose it was declared. (3) A management plan must contain at least— (a) the terms and conditions of any applicable biodiversity management plan; (b) a co-ordinated policy framework; (c) such planning measures, controls and performance criteria as may be prescribed; (d) a programme for the implementation of the plan and its costing; **(e) procedures for public participation, including participation by the owner (if applicable), any local community or other interested party;** **(f) where appropriate, the implementation of community-based natural resource management**; and (g) a zoning of the area indicating what activities may take place in different sections of the area, and the conservation objectives of those sections.

Source: National Environmental Management Act: Protected Areas Act, 57 of 2003.

8.3.2. NEMA: Biodiversity Act, 2004

The Biodiversity Act, 10 of 2004, is of major importance to SANParks as it provides a framework for biodiversity conservation planning and benefit sharing. If the principal purpose of PAs is to protect biodiversity, then the Biodiversity Act can be regarded as a key piece of legislation for achieving this. The Act lists "restricted activities" which constitute criminal offences such as the illegal harvesting of protected species. These restricted activities will have to be policed by all organs of state including SANParks.

From a governance perspective the following issues flow from this Act:

- Law enforcement implications of "restricted activities" are now listed;
- The proactive development and championing of norms and standards;
- Integration of requirements for biodiversity management plans into planning and management frameworks of all national parks;
- Implementation of invasive species management and reporting requirements;
- Delegation of powers and functions to ensure that SANParks is appointed an "issuing authority" for permits for restricted activities in national parks.

8.4. Financial Acts

Section 213, and sections 215 to 219 of the Constitution lay the foundation for good fiscal management of national and provincial governments. Furthermore, sections 151 and 155 of the Constitution provide for local government and the funding thereof. As a result, general treasury measures instruct organs of state against 'fruitless and wasteful, unauthorised and irregular expenditure' (section 76 (2)(e)). Accordingly, managers of PAs must avoid unsustainable spending, as it may constitute 'fruitless and wasteful' expenditure. As a national agency adhering to constitutional guidelines and provisions, SANParks must manage its finances and other associated state assets according to the procedures and standards set by the Constitution. The managers of PAs including SANParks must, within constitutional mandates, establish which rural development activities it is allowed to fund so that there is no overlap of mandates, which can easily lead to duplication and wasteful expenditure.

8.4.1. **Public Finance Management Act of 1999**

The PFMA or Public Finance Management Act 1 of 1999 gives effect to sections 213, 215 and to 219 of the constitution, by adopting a financial management approach that focuses on outputs and responsibilities, rather than the rule-driven approach of the old Exchequer Acts. The PFMA is part of a broader strategy to improve fiscal discipline in the public sector. In terms of the PFMA, the Board of SANParks, as a juristic person, is accountable for the financial management of the organisation. However, the Board meets only four times in a year, and so the efficiency of SANParks could be severely compromised and constrained should the Board hesitate to act in a timely manner. However, the Chief Executive of SANParks as an ex-officio Board member, can be delegated some of the management responsibility while the Board retains full statutory accountability.

8.4.2. **Local Government: Property Rates Act of 2003**

The recently adopted Local Government Property Rates Act has enormous financial ramifications for the all PAs including SANParks. In each instance, these will have to be negotiated with the municipality concerned. In terms of Section 17(2)(e) of that Act, a prohibition is placed on the rating of all land in national parks except those parts that have been developed or are used for residential, agricultural or commercial purposes. Each municipality is required to develop a rating policy and to generate revenue through this process, but a municipality is entitled to grant rebates and exemptions. As a result of this, all PAs could be required to pay property rates for such areas at a tariff to be determined by each municipality.

The Property Rates Act does, allow municipalities to determine differentiated rating tariffs, to give rating rebates and to exempt certain categories of landowners or certain categories of land from the payment of rates. The major difficulty is that there is no single overarching rating policy applicable to all municipalities. Therefore, SANParks will have to engage each of the municipalities covered by parts of a national park, on a basis that is appropriate to that particular authority and the local community it serves.

Municipal rates are the key mechanism through which local authorities can generate revenue. The main reason for levying rates is to provide municipalities with steady income to provide social services including rural development. In some instances, the national parks within such municipalities may constitute one of few reliable sources of revenue and there are certain elements in the municipalities wishing to maximize this opportunity. Consequently, it will be necessary for SANParks to develop an integrated and multi-faceted approach that will ensure that the impact of rates on the organisation generally and on individual national parks in particular is minimised. This will have to include engaging all levels of government, comprising national, provincial and local and will require a fairly broad range of expertise. The process of developing rating policies is envisaged in the Property Rates Act to take place over 4 years, and this should provide sufficient time to rationalise all land holdings.

For each of the national parks, a park specific presentation/position must be developed indicating: 1) the extent of the national park's contribution to the local and regional economy; 2) the impact that rating would have on the financial viability of the national park and conservation generally; and, 3) motivating why exemption ought to be granted. Issues that come into play in this regard include the extent to which a national park does, or does not, make use of bulk services provided by the local authority, the extent to which the national park renders services on behalf of the local authority, the number of direct and indirect jobs created, and so on.

In the past SANParks was exempt from property rates and taxes. Apart from the financial implications, the biggest challenge of Property Rates Act for SANParks lies in dealing simultaneously with 13 different municipalities (Table 8.3) spread across the country because each municipality will is legally allowed to develop its own rating policy after valuation surveys, and to negotiate rebates. This provides SANParks and organs of state the opportunity to negotiate rates payable. The situation in terms of the applicable laws is straightforward. All national parks and provincial PAs fall within either metropolitan or district municipalities and will not only be subject to the rating policy of such municipalities, but will also be required to pay rates unless exemptions can be negotiated.

Table 8.3. Municipal status of national parks under SANParks as at 22 April 2004.

Province & relevant National Park	Municipality with legislative authority
Northern Cape	
Tankwa-Karoo	Namaqua District Municipality (DC 6) under the DMA: NCDMA 406.
Augrabies Falls	Siyanda District Municipality (DC 8) under DMA: NCDMA 08.
Kalahari	Siyanda District Municipality (DC 8) under the DMA: NCDMA 08.
Richtersveld	Namakwa District Municipality (DC 6) and has not been declared a DMA.
Namaqua	Namakwa District Municipality (DC 6) and has not been declared a DMA.
Vaalbos	Frances Baard District Municipality (DC 9) under DMA: NCDMA 09.
Western Cape	
Agulhas	Overberg District Municipality (DC 3) and has not been declared a DMA.
Bontebok	Declared a DMA and forms part of Overberg District Municipality (DC 3) in which De Hoop Nature Reserve has been declared a DMA: WCDMA03.
Karoo	Central Karoo District Municipality (DC 5) under DMA: WCDMA 5.
West Coast	Part of a DMA (WCDMA02) and falls within the "West Coast District Municipality" (DC 1).
Wilderness	Eden District Municipality (DC 4) and has been declared a DMA.
Knysna	Eden District Municipality (DC 4) and has not been declared a DMA.
Table Mountain	Cape Town Metropolitan Municipality and has not been declared a DMA.
Eastern Cape	
Mountain Zebra	Chris Hani District Municipality (DC 13) under DMA: ECDMA 13.
Addo Elephant	Cacadu District Municipality (DC 10) under DMA: ECDMA 10.
Tsitsikamma	Cacadu District Municipality (DC 10) under DMA:ECDMA 10.
Free State	
Golden Gate	Thabo Mofutsanyane District Municipality (DC 19) under DMA: FSDMA19.
Limpopo	
Marakele	Waterberg District Municipality (DC36) but under the Thabazimbi Local Municipality (NP361)
Gauteng	
Groenkloof	City of Tshwane Metropolitan Municipality and has not been declared a DMA.
Kruger	Bohlabela District Municipality (CBDC 4), which is a cross border district municipality. The Kruger forms part of district management area CBDMA 4.

Note: Municipalities are political structures and are indeed themselves still in transition. In fact various political constituencies often contest their boundaries.

Accordingly, managers of national parks are expected to keep track of all changes that may include:

1) Ministerial pronouncement of new demarcations. For example, the Minister of Local Government has announced possibilities of scrapping cross border district municipalities, and this is likely to affect Kruger National Park.
2) Depending on the status of a municipality, an affected national park may qualify for financial assistance. A case in point is Table Mountain National Park. Accordingly, Groenkloof National Park may qualify for subsidy from the Tshwane Metropolitan Municipality.

8.5. Constitutionality of rural development

The post-apartheid era brought with it fundamental changes to the form and function of the governance such as the restructuring of intergovernmental relations and the re-alignment of responsibilities between all the three spheres of government, namely national, provincial and local (Chapter 3 of the Constitution). According to section 40 (2) all spheres of government must observe and adhere to these principles and must conduct their activities within the parameters of this chapter.

In terms of governance principle, section 41 (1) of the Constitution states that all spheres of government and all organs of state within each sphere must —

(f) *not assume any power or function except those conferred on them in terms of the Constitution.*

(g) exercise their powers and perform their functions in a manner that does not encroach on the geographical, functional or institutional integrity of government in another sphere.

The constitution promotes co-operation between all the three spheres of government. Describing the different levels of government as 'spheres' rather than 'tiers' was a conscious attempt to move away from notions of hierarchy with all the connotations of subordination (Levy & Tapscott 2001). The constitutional provisions of municipalities in co-operative government are very clear. According to section 154 (1), the national and provincial governments must use legislative and other measures to support and strengthen the capacity of municipalities to manage their own affairs, to exercise their powers, and to perform their functions in terms of the Constitution.

Under the constitutional provision, if a municipality fails to implement its socio-economic development function, pro-active managers of PAs could help it to build its capacity, but not take over its functions. Based on good governance, an overview of how the South African Constitution views the issue of rural development is important so that confusion in terms of who ultimately takes responsibility for this function is reduced once and for all. Chapter 7 of the Constitution deals with Local Government, and clearly states that its object or major functions (Box 8.3).

Box 8.3. Local government and its responsibility for rural development

Local government is the elected government body:

- that takes ultimate responsibility for service delivery;
- with which Community Based Organisations (CBOs), representatives and other stake-holders consult for the purpose of assessing needs and priorities;
- that mediates competing interests in resource management, project planning or the provision of services (this role falls to the district level, i.e. Category C, where the priorities for the district are set and funding negotiated);
- that sets Land Development Objectives under Section 27 of the Development Facilitation Act (67 of 1995) that bind all land development decisions and policies in their area of jurisdiction;
- whose function it is to coordinate the work of the different departments and follow through requests for funding or implementation to the appropriate provincial and national bodies – the most important will be the Provincial Interdepartmental Committee, chaired by the Provincial Director General;
- with responsibility for ensuring that the needs of poorly organized local people are taken into account.

Source: Adapted from DLA (1997).

Briefly, the object of local government is to:

- provide democratic and accountable government for local communities;
- ensure the provision of services to communities in a sustainable manner;
- provide social and economic development;
- promote a safe and healthy environment; and
- encourage involvement of communities and community based organisations (CBOs) in the matters of local government.

It follows, therefore, that local government is constitutionally charged with providing rural development for their local communities. To achieve this, local government now has municipalities, which must strive, within both their financial and administrative capacity, to achieve the objects set out in Chapter 7 of the Constitution. According to Chapter 7 of the Constitution, a municipality must:

- structure and manage its administration, budgeting and planning processes to give priority to the basic needs of the community;
- promote the social and economic development of the community, and;
- participate in national and provincial development programmes.

According to the Department of Land Affairs (DLA), the government's framework for rural development emphasises the constitutional responsibilities of both the national and the provincial governments as follows (DLA 1997:10):

- help local government to recognise and define the needs of local people;
- to encourage local government to involve local people in planning and in the actions necessary to satisfy their needs; and,
- to enable local people, to be suitably organised to access national programmes, so as to assume increasing responsibility for these actions.

Given the constitutional provisions on who is responsible for rural development, it is now appropriate to set the context in which PAs in the post-apartheid era can be linked to local government in order to contribute to rural development.

8.6. PAs and rural development

During the apartheid era, PAs were rigorously policed in order to preserve spectacular landscapes and some populations of large mammals (Botha & Huntley 1989). Equally, rural development during apartheid South Africa was neglected because black people did not have the political vote. It is now broadly accepted that PAs do not exist in isolation because they are nested within heterogeneous social, economic, and political matrixes that influence their origin and development (Pollard *et al.* 2003). In the post-apartheid South Africa, environmental policy initiatives are attempting to balance the pressing needs and aspirations of the previously disenfranchised, but now politically powerful majority of black people, and the requirements of the highly politicized, but equally powerful global environment (Magome & Murombedzi 2003:108).

The role of PAs in terms of involving local communities and also of contributing to local economic development has been articulated (sections 8.3 & Table 8.2). Equally, the key question of who is responsible for rural development has been sufficiently addressed (section 8.5 & Box 8.3). Therefore, the major challenge facing PAs in the post-apartheid South Africa is how to design 'reformed' policies that can merge with those of local government, in order contribute to rural development (Atkinson 2003).

8.7. **Policymaking**

Having provided the legal framework for organs state under the post-apartheid reforms (Sections 8.2-8.6), I now focus on policy guidelines for linking South African PAs with rural development. Applied policy research, as with the present study, must strike a balance between theory (the ideal) and practice (reality). However, such a balance is difficult to achieve because policy implementation depends on factors that are often outside the control of policy makers. In the context of the present study, policy guidelines flow from both the legal context and study results. Policy could be 'any course of action adopted as expedient and advantageous' (*Oxford Dictionary*). In the public arena, technocrats or elites write policy (Bell 1984a). Indeed, policy often reflects the prevailing views of the elites (Dye 1992), although it may be viewed as a response by the state to socio-economic demands (Anderson 1997; Hill 1997). In fact, there can be no politics without policy (Booysen & Erasmus 1998).

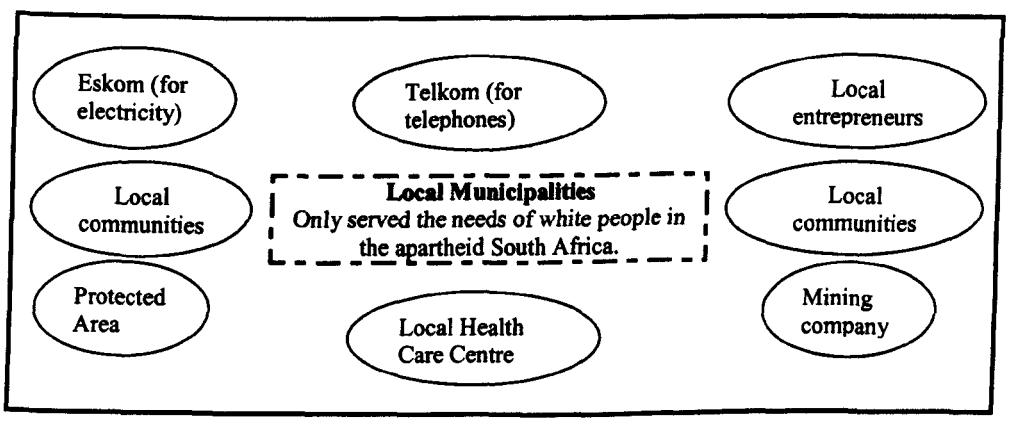
While policy statements are often regulatory, they may also be symbolic. In the post-apartheid era, policy guidelines flow from the Constitution that commits all organs of the state to: 1) redressing historically received inequalities; 2) committing to the reconstruction and development of the country as a whole, and; 3) to the eradication of poverty. Against this background it needs to be stated that poverty is the single largest threat to good environmental management in South Africa. With some few exceptions, notably the departments of finance, transport, trade and industry, welfare, and housing, the government's policy design has been enthusiastic but weak (Bernstein 1999).

For the post-apartheid government to overcome the view that PAs are playgrounds of the affluent few, it will require more than enthusiasm. The relationship between the country's PAs and the local communities is still exclusive and adversarial. The major challenge facing the country's PAs is to create and sustain good relationships with the adjacent rural local communities. It is often stated that local communities will embrace PAs only if they contribute to sustaining their livelihoods. However, from a symbolic perspective, PAs must first be removed from their racist, exclusive past and be located within the post-apartheid's landscape of developmental organisations.

8.8. **Policy guidelines**

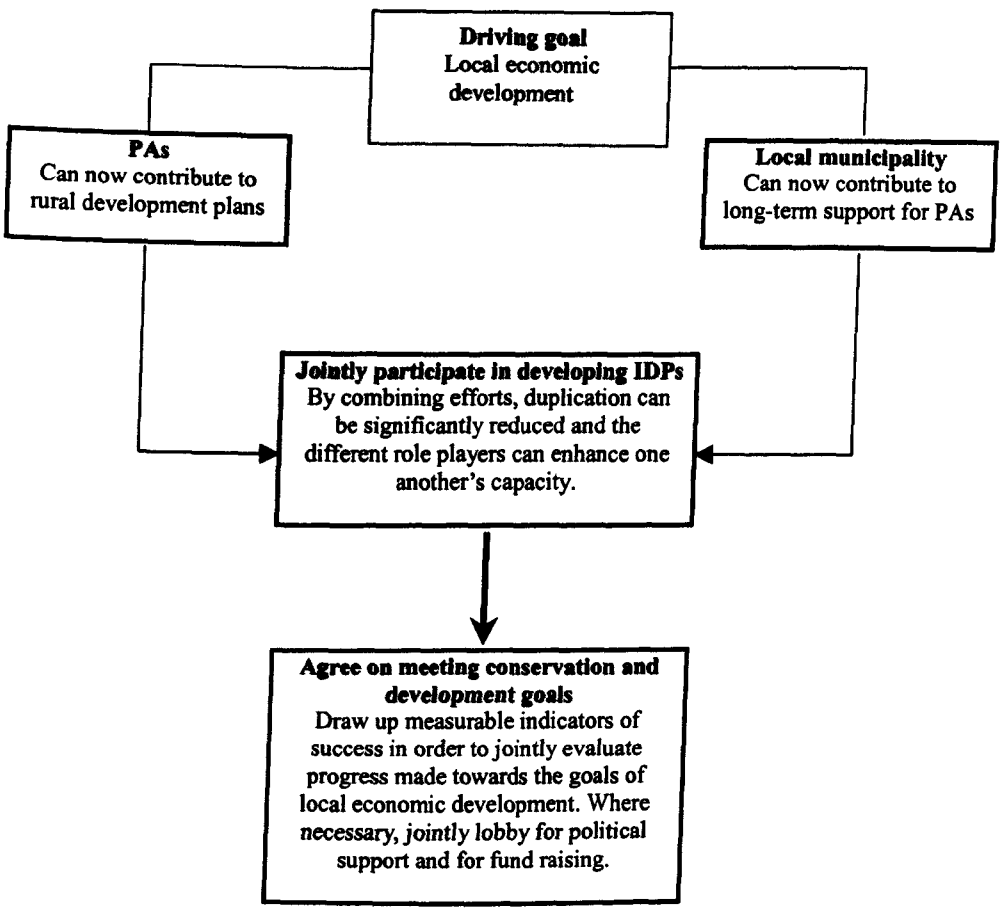
The South African Constitution is supreme to all the country's laws. While there is no direct legal obligation for PAs to assume responsibility for rural development, the preamble to the Constitution calls on organs of state to heal the racist divisions of the past, and to create a society based on democratic values, social justice, and respect for human rights. With emphasis on social justice, the post-apartheid South Africa provides 'microwindows' for policy innovation (Keeler 1993) that drastically affect the content and direction of policy (Booysen & Erasmus 1998). During apartheid era, local government mainly served the interests of white people (Figure 8.1). However, section 20(1)(d) of the PAs Act of 2003, requires all PAs to contribute something towards local economic development efforts of the government.

Figure 8.1. The uncoordinated role of local municipalities during the apartheid era.



In the post-apartheid era local government is charged with service delivery for all South Africans. The challenge facing PAs is how to work with the local government without assuming sole responsibility for social development (Figure 8.2). In engaging local communities and other organs of state, particularly local authorities, managers of PAs must define and develop the management policies of PAs in resonance with the purpose for which their were created. As previously explained, the management plans for PAs must now form part of IDPs (integrated development plans) of their local municipalities. Equally, all local municipalities are required to produce IDPs.

Figure 8.2. The developmental role of local municipalities in post-apartheid South Africa.



While a key feature of policy is the scope and intent of legislation (Clarke & Bell 1984), policy guidelines tend to be used as blue prints rather than as tools for learning new skills for best practice. Thus, the key issue for design and evaluation of policy is how to cope with the uncertain, the unexpected, and the unknown (Holling 1978). As a result, policy should be used as experiments that planners and implementers can learn from (Lee 1993). Similarly, a guideline or framework is a set of assumptions or fundamental principles (Popper 1994b). Within current political, social, and economic situation in post-apartheid South Africa, policy guidelines for all PAs are proposed (Table 8.4), but these should not be seen as a blue print. Ultimately, what works and what does not, can only be determined by practice.

Table 8.4. Guidelines for social responsibility of PAs at different organizational levels.

Agency level	Responsibility
Community	Community members and organizations accept some responsibility for environmental management and biodiversity conservation, as well as for the success of mutually beneficial partnerships. Local people are assisted to make a real contribution to park management, local knowledge is incorporated into management activities, and beneficial business partnerships are facilitated.
Park	Managers of PAs drive the collaborative management process, guide community project planning and management, spearhead local baseline studies, develop collaborative management plans, and promote mutually beneficial business activities. They promote linkages between PAs and other government, private sector and NGO role players, manage and guide monitoring, and provide technical advice.
Corporate	Policies are made, funds are solicited, lobbying is done, social ecology is promoted as a way of working, and research programmes are developed.
Executive Management	Top management supports community projects as one of the cornerstones of the organization, and builds this into the performance criteria of all staff.

Source: Adapted from Magome & Fabricius (2002).

8.8.1. **Policy framework for all PAs**

Building a constituency for PAs should be the primary function of top management in all PAs in order to gain support from the broader South African population. Linking PAs to local communities should redress unjust historical racial policies and practices in line with national development efforts. Such initiatives should incorporate both long term and short-term benefits. Alliances with other organizations should be explored and used to the fullest, and should ultimately promoting economic empowerment, environmental education, cultural heritage, restitution of land rights, and resource use.

8.8.2. **Policy framework for SANParks**

The importance of extending the impact of national parks beyond their boundaries without simultaneously increasing the financial load on the organisation is critical for their long-term survival. A framework for SANParks is suggested based legislative mandates and trial and errors of the last decade (Table 8.5).

Table 8.5. A framework for managing National Parks in post-apartheid South Africa.

Type of relationship	Rationale
Contractual	In terms of the Restitution of Land Rights Act of 1994, communities that have reclaimed land in national parks such as Kruger, Kalahari, Tsitsikamma, and Vaalbos, have different legal agreements that have to be implemented.
Non-contractual	Each national park is unique, and is located in a unique political economy, but the common thread is the need to heal relationships and to build rapport with local communities. The approach here is based on building relationships with ordinary local people who do not have de jure claims on national parks. SANParks must initiate projects that seek to alleviate the high levels of poverty prevalent among some communities living adjacent to its national parks.
Local government	SANParks now accepts that national parks can make a significant contribution to rural development, and in some instances they are the only engines of rural development. In many rural situations, national parks are the only major productive land use option, which can be harnessed to contribute to rural livelihoods. In terms of government policy, local governments are the organs of state that have the statutory responsibility to plan, facilitate, and co-ordinate all development efforts in their areas of jurisdiction.
Broader constituency	In 2002, McKinsey & Company revealed that only 4% of visitors to Kruger National Parks were black South Africans, suggested that NPs are not part of their preferred destinations or are not part of their culture. Furthermore most black South Africans cannot afford the luxury of visiting NP.

Source: Adapted from Magome (2003b).

8.9. **Conclusion**

PAs can contribute to local planning initiatives, and such an effort could be a major important element in ensuring that their operations result in environmental justice for neighbouring communities. However, the success or otherwise of such effort requires that clear and measurable outcomes should be in place. Most importantly, progress must be monitored with specific focus on whether SANParks can attain objectives of environmental justice rather than mechanical assistance to local communities.

Chapter 9

Recommendations and conclusions

9.1. Introduction

Recommendations from socio-political studies can be the most difficult part of policy studies because: 1) managers of operations are either unaware of recommendations, or where they are aware, they often tend to ignore them, opting instead for to do business as usual; and, 2) the political ecology of human-environment systems is that they tend to change from the time 'snap shot' results were analysed. The major challenge is to reduce uncertainty, while being relevant to different stakeholders involved at different levels of influencing the outcomes of PAs. In the quest to reduce uncertainty, Holling (1978:9) advises as follows:

> *But if not accompanied by an equal effort to design for uncertainty and to obtain benefits from the unexpected, the best of predictive methods will only lead to larger problems arising more quickly and more often. This view is the heart of adaptive environmental management — an interactive process using techniques that not only reduce uncertainty but also benefit from it. The goal is to develop more resilient policies.*

By 'resilience', Holling (1978) meant treating interventions as 'experimental probes' (Lee 1993) or the ability of a system, natural or human-made, to absorb and to use change (Mitchell 1997).

9.2. Recommendations

In terms of the South African legislative functions, most statutes delegate power to officials (usually Ministers) to make further legislation in the form of regulations (Kidd 1997). The key success factor here is for all state officials involved with PAs to champion or to drive key process of integrating PAs with local communities.

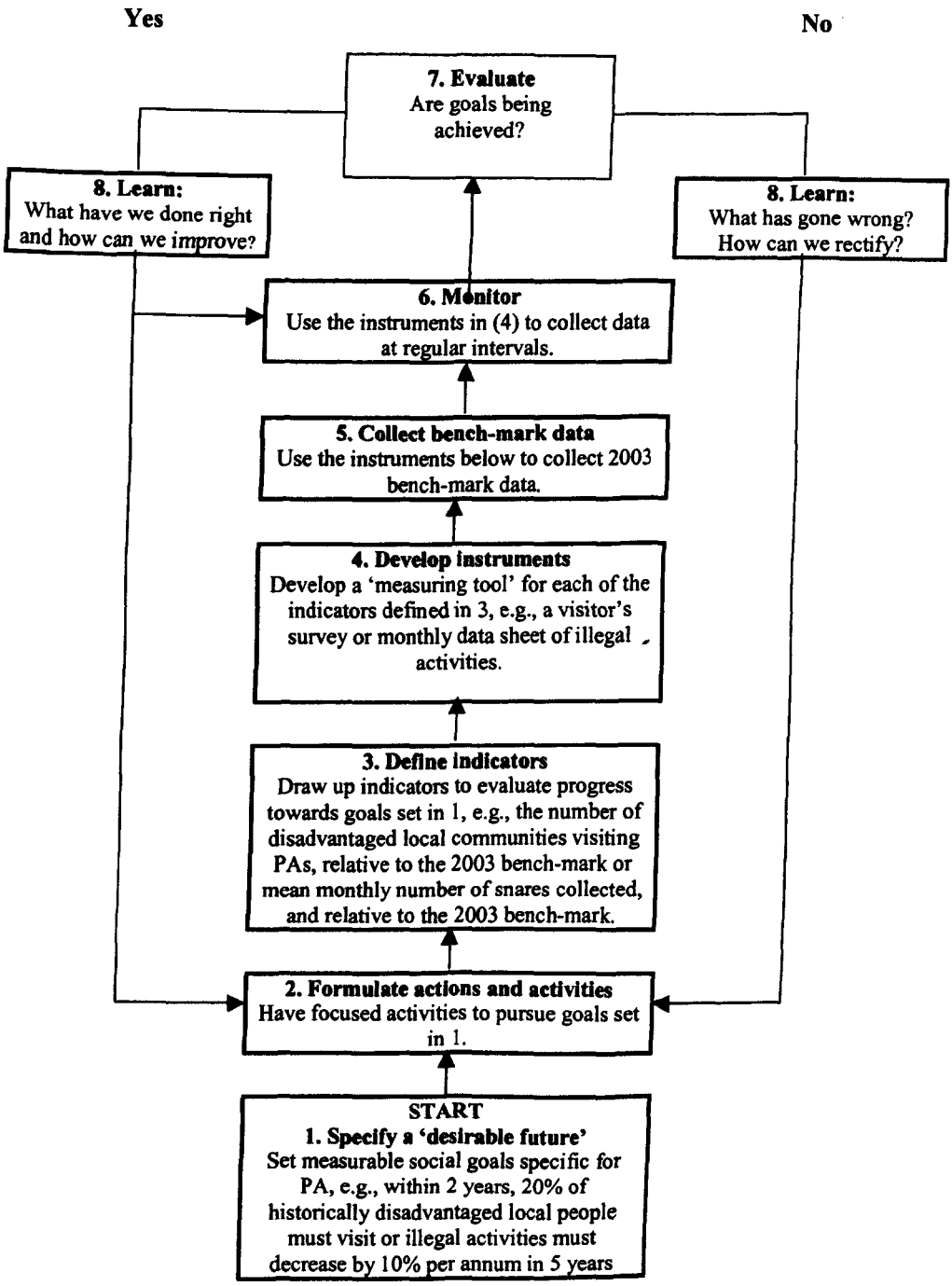
9.2.1. **Recommendations to DEAT**

Having championed the LRP, the responsibility lies with DEAT in terms of ensuring compliance from all the state-owned PAs. However, there is already evidence that the provincial conservation agencies are not readily embracing the PAs Act of 2003. Such 'revolting against change' (Blackwell & Seabrook 1993) might lead to implementation difficulties. Experiences elsewhere with the USNPS showed that managers of PAs resist change. Elsewhere, *The Vail Agenda* of 1993 showed that such reluctance could continue, particularly in the light of the USNPS's "refusal to adhere to the National Environmental Policy Act, considered by many to be the keystone environmental legislation" (Sellars 1997:278). While initially reluctant to embrace the PAs Act of 2003 partly arose from the non-consultative approach of DEAT, other reasons for further remaining resistance should be investigated. In the case of the USNPS, overt resistance was caused by entrenched culture and tradition, which was grounded in the often overstated 'legislative mandates' (Sellars 1997).

9.2.2. **Recommendations for managers of PAs**

The various new environmental management acts bring challenges and opportunities, but this because life requires problem solving skills (Popper 1999). Thus, any teething problems that arise should be seen in terms of reforming the socio-political landscape of the post-apartheid South Africa. For SANParks, integral to effective environmental and corporate governance within the organisation is the promotion and attainment of environmental justice particularly for the disadvantaged local communities. Despite successful claims for the restitution of land, claimant communities have not benefited significantly from restitution, implying that environmental justice has not yet been fully served. While policy makers have a range of options to choose from in managing public problems including the option of doing nothing (Grindle & Thomas 1991), the aims of the Constitution are to resolve conflict and to base development on principles of democracy, social justice, and respect for human rights (Scheepers 2000). Finally, it is the willingness of managers to embrace changes that will ultimately improve the relationship with local communities based on adaptive management (Figure 8.2).

Figure 9.1. Adaptive management approach to implementing social programmes for PAs.



Source: Adapted from the Social Ecology Policy (Fabricius 2000).

9.2.3. **Recommendations for further research**

South Africa is still a country in which historically disadvantaged communities view development and conservation as two diametrically opposed options, because of a long history of alienation from environmental issues (Khan 2002). Therefore, the challenge for post-apartheid South Africa will be how to further the transformation of PAs that builds on the basis of environmental justice (Cock & Fig 2002). While the law can be seen as a system of rules and prescribed procedure, justice cannot be bound to a system (Malan & Cilliers 2003). By developing a strategy for environmental justice aimed at assisting local communities, PAs are likely to gain their support and thereby be able to achieve their core functions. Therefore, further research should look into environmental justice in all PAs including SANParks, and how it relates to each of the local communities under the restitution of land rights such as the Makuleke, the Nama of Richtersveld, the San and the Mier.

Table 9.1. Proposed research framework for environmental justice.

Proposed methodology	Key outputs from the project would be
• Designing a framework for environmental justice within PAs; and • Using case studies of local communities based on original field research.	• A strategy for attainment of environmental justice; and • Framework within which the needs of the communities can be assessed and addressed.

9.3. **Conclusions**

During apartheid South Africa, homelands, provincial governments, and national line departments including parastatal agencies provided social welfare services in rural areas. As autonomous and representative structures with capacity to provide essential social services, local government only existed in the country's towns and cities (McIntosh 1996). In reality, white people mostly enjoyed social services of local government. In the post-apartheid South Africa local government have relatively weak constituencies and, as a result, cannot be expected to have the political authority to pursue local developmental priorities (McIntosh 1996).

It is now accepted that PAs must be viewed within the regional context within which they are situated (McCabe *et al.* 1992). During apartheid era, local municipalities were isolated from the sphere of black people. However, in the post-apartheid era, local municipalities are expected to provide social services and to coordinate economic development (Figure 8.1b). Unfortunately most local municipalities lack the both the capacity and skills to effectively produce IDPs. The government is fully aware of this situation, and is trying to rectify it. In terms of good will, managers of PAs can facilitate the production of IDPs, and this could be a huge cost saving mechanism for local authorities. However, in some rural areas effective local government has yet to be established, and this creates a gap in terms of rural development. A major effort is needed to provide the training, capacity building and the resources needed for local government to function. Such training and capacity building is the prime responsibility of the Department of Constitutional Development and the provinces.

The new framework for environmental governance for PAs is a huge challenge for all state agencies, and is made all the more daunting by the short time-frames envisaged for the transition. One of the keys to successfully meeting this challenge is ensuring an appropriate understanding of, and response to, all the new laws and their implications throughout SANParks as quickly as possible. If SANParks wants to retain its national leadership, it must manage its national parks beyond meeting the minimum prescripts of the LRP. Within the confines of the law, SANParks must be innovative and adaptive (Magome 2003c). The King Report 2002 emphasises the importance of balancing 'performance', taking decisions and actions designed to ensure the creation and protection of value, and 'conformance', demonstrable adherence to due process in coming to such decisions and taking such actions.

In a corporate context, this means that the exercise of management's skill, expertise and flair in running business operations and creating shareholder value should be encouraged, but must be subject to appropriate checks and balances that allow the Board to ensure that management is at all times acting in the interests of the organisation and its shareowners. After the abolition of the apartheid system based of the concept of race, South Africa remains a 'very ordinary country, one which has

come very late to the table of comity of nations' (Alexander 2002:1). It is, therefore, the responsibility of all role players in the South African landscape to ensure that the country becomes prosperous. As South African enters the global community, Cooper (2002:194) emphasised that:

> *The unsettled question in post-apartheid South Africa is not whether the country will remain capitalist or not. It is whether capitalism will be dynamic, growing, and open to inclusion of new capitalists, rather than insular, parasitic, and exclusive.*

The exercise of public power in modern states depends fundamentally on discretionary decision-making by state officials at all levels of government (Corder & Van der Vijver 2002). It is in this context that the notion of 'administrative justice' assumes its importance. This inherent power is regulated by the doctrine of *ultra vires,* which recognises that those to whom parliament delegated powers do not exceed or abuse them (Breitenbach 2002). Since the constituencies of PAs are multiple and dynamic, any policy that ignores the dynamic dimension of these constituencies will be sterile in its ability to deal with unknown future changes (Murphree 2004), and will therefore only perpetuate bureaucratic hurdles for marginalised local communities (Jones & Murphree 2004). Finally, only experience in the field can improve learning and by so doing refine practice (Child 2004b; Cumming 2004).

Appendix 1. **Reflections upon my sometimes independent, and sometimes intertwined, roles as researcher in this study, and my employment by South African National Parks (SANParks) during the various phases of the development of the study, requires reflection. These roles are documented by time line below.**

1994 I was asked by Dr Anthony Hall-Martin, then Executive Director of Southern Parks for the then National Parks Board (NPB) of South Africa, to consider joining the NPB as a senior manager in order to assist the NPB implement strategies for linking national parks to their neighbouring local communities (see Robinson 1994). At the time I was approached, I was Chief Executive of the former Bophuthatswana Parks Board (popularly known as 'Bop Parks'), which had led efforts in South Africa to integrate communities with conservation.

1996 I joined the NPB in February as General Manager responsible for Park Planning and Development. My initial responsibility was to assist in developing policies that would link national parks to local communities in order to enable NPB to fall in line with the changing political landscape of post-apartheid South Africa. However, soon after my appointment, it also became clear that the NPB had appointed me as part of capacity building plan for its human capital requirement to engage more black people in senior managerial positions. Consequently, NPB agreed to my request to use my work towards a higher degree. The NPB encouraged me to register for the present doctoral study at the Durrell Institute of Conservation and Ecology at the University of Kent in September. Funding for my PhD tuition fees and living allowance was gained through independent sources, from the Charlotte Fellows Program of the African Wildlife Foundation in Washington, USA. NPB gave me paid leave to study full time for this PhD over three years.

1997 to 1999 Parallel to my field study of communities outside protected areas in South Africa (Chapters 3 to 6 of this thesis), the NPB started a series of initiatives that were funded by the Danish government as part of a capacity building project aimed at enabling the South African National Parks (SANP) to implement strategies that would involve local people living adjacent to national parks. The strategy became popularly known as *Social Ecology*. The strategy gained directorate status within SANP, and Dr Yvonne Dladla was appointed its first Director in 1997. During her tenure, Dr Dladla gave me support and encouragement to pursue this independent study.

2000 In March, upon returning to South Africa, following my 'draft' analyses of the research data, I was appointed to manage Social Ecology, a vacancy created by the resignation of Dr Dladla, in mid 1999. However, the position was lowered to its former status of a unit and was made part of Conservation Development Directorate headed by Dr Hall-Martin. In September, I was appointed as the Director of Conservation Services, following the early retirement of Dr Hall-Martin. As Director of Conservation Services, I still retained overall responsibility for Social Ecology alongside other policy and ecological functions.

2001 to 2003 From my enhanced position within SANP, it became apparent that it was nearly impossible to implement the results of my independent study, because of the lack of an enabling legal framework. As a result, I initiated a study (see Erasmus & Magome 2001) into the National Parks Act (Act 57 of 1976) which revealed that SANParks was out of kilter with both the constitutional and the changing political landscape of South Africa (Chapter 7 of this thesis). This study was soon followed by the recommendations of McKinsey & Company (2002), and law reform which I had spearheaded for SANParks (Chapter 8 of this thesis)

2004 I started to complete the write up of my research, which by now included the work I had completed both on transformation and legal reform, which finally led to the creation of new sets of Acts that now govern SANParks (Chapter 8 of this thesis).

2005 Following the creation of new Acts and policies, I have been re-contracted by SANParks to oversee the implementation of these policy initiatives (Chapter 9 of this thesis).

Appendix 2. **Conservation objectives for PAs.**

Sample ecosystems	To maintain large areas as representative samples of each major biological region of the nation in its natural unaltered state for ensuring the continuity of evolutionary and ecological processes, including migration and gene flow.
Ecological diversity	To maintain examples of the different characteristics of each type of natural community, landscape and land from for protecting the representative as well as the unique diversity of the nation, particularly for ensuring the role of natural diversity in the regulation of the environment.
Genetic resources	To maintain genetic materials as elements of natural communities, and to avoid loss of plant and animal species.
Education & Research	To provide facilities and opportunities in natural areas for education and research, and the study and monitoring of the environment.
Water & soil conservation	To maintain and manage watersheds to ensure an adequate quality and flow of fresh water, and to control and avoid erosion and sedimentation, especially where these processes are directly related to downstream investments that depend on water for transport, irrigation, agriculture, fisheries, and recreation, and for the protection of natural areas.
Wildlife management.	To maintain and manage fishery and wildlife resources for their vital role in environmental regulation, protein production, and as the base for industrial, sport, and recreational resources.
Recreation & tourism	To provide opportunities for outdoor recreation for local residents and foreign visitors, and to serve as poles for tourism development based on the outstanding natural and cultural characteristics of the nation.
Timber	To manage and improve timber resources for their role in environmental regulation and to provide a sustainable production of wood products for the construction of housing and other uses of high national priority.
Cultural heritage	To protect and make available all cultural, historic and archaeological objects, structures and sites for public visitation and research purposes as elements of the cultural heritage of the nation.
Scenic beauty	To protect and manage scenic resources which ensure the quality of the environment near towns and cities, highways and rivers, and surrounding recreation and tourism areas.
Options for the future	To maintain and manage large areas of land under flexible land-use methods that conserve natural processes and ensure open options for future changes in land use, incorporate new technologies, meet new human requirements, and initiate new conservation practices as research makes them available.
Integrated development	To focus and organise conservation activities in order to support integrated development of rural lands, giving particular attention to the conservation and utilisation of "marginal areas" and provision of employment opportunities.

Source: Adapted from Miller1980 (in McNeely *et al.* 1994).

Appendix 3. **The effect of various intellectual property rights (IPRs) for local people.**

Mechanism	Advantage	Disadvantage
Patents	Can legally safeguard knowledge	Limited term of protection.
Petty patents	• Can legally safeguard knowledge. • More traditional knowledge may be protected than under patent. • Compared to patents, these are less expensive. The application procedure is shorter and is also less stringent than patents • Available in most countries	• Application expensive and require legal advice
Copyright	• Long period of protection. • Easy to obtain • Inexpensive	• Protects ideas but not knowledge itself • Protection period not indefinite. • Subject matter must be in a physical form • Does not protect knowledge *per se*
Trademarks	• Indefinite period, although may have to be renewed periodically. • May attract more customers to products of indigenous trading and their trading organisations • Can be used to protect traditional knowledge with commercial application.	
Trade secrets	• Can protect more knowledge that the other types of IPRs. • Can be traded for economic benefits by contract • Inexpensive to protect	• Available in few countries than patent rights
Breeder's rights	• Less expensive than patents. • Many folklore varieties may be eligible	• Only available in the Union for the Protection of New Varieties of Plants convention signatory countries, which are few in number. • Difficult to demonstrate eligibility criteria.

Note: Petty patents are less stringent than patents. Trade secrets are practical information that gives owners competitive edge as long as few people know them.

Source: Posey & Dutfield (1996).

Appendix 4a. **Location of biodiversity "hotspots" and the number of endemic species.**

Region	Plants	Mammals	Reptiles	Swallowtail Butterflies
South Africa (Cape region)	6 000	15	43	0
Amazon (Upland Western)	5 000	-	-	-
Brazil (Atlantic Coastal)	5 000	40	92	7
Madagascar	4 900	86	234	11
Philippines	3 700	98	120	23
Malaysia & Indonesia (Northern Borneo)	3 500	42	69	4
Nepal, Bhutan & India (Eastern Himalayas)	3 500	-	20	-
South-western Australia	2 830	10	25	0
Western Ecuador	2 500	9	-	2
Colombian Chaco	2 500	8	137	0
Peninsular Malaysia	2 400	4	25	0
USA (California Floristic)	2 140	15	15	0
India (Western Ghats)	1 600	7	91	5
Central Chile	1 450	-	-	-
New Caledonia	1 400	2	21	2
Tanzania (Eastern Arc Mountains)	535	20	-	3
South-western Sri Lanka	500	4	-	2
South-western Côte d'Ivoire	200	3	-	0
Total	49955	375	892	59

Source: Adapted from Johnson (1995).

Appendix 4b. **Profile of basic needs in South Africa.**

Nutrition	• 25% (±3.37 million) of children under the age of five suffer from stunting as a result of chronic malnutrition.
Water	• Nearly 25% of African households do not have access to piped water while over 99% of all white and India households have water laid on.
Energy	• 45% of African households do not have access to grid electricity.
Housing	• Nearly million households live in shacks while over 500000 live in hostels.
Health	• Life expectancy: 73 years for whites & 60 years for African.
Sanitation	• Nearly all white and India households have toilets; • 88% of coloured households have toilets; • 34% of African households have flush toilets; • 41% of African households have pit latrines; • 6.5% of African households have bucket toilets; and • 16% of African households have no form of toilet.

Source: Adapted from Deegan (1999).

Appendix 5. **Study questionnaire.**

Date:

Province:_____ Agency in charge: _____ Name of village:

Male [ ]Female [ ] Your age? _____ years

1. Do you live in this village? Yes [ ] No [ ]

2. Are you currently earning a wage/salary? Yes [ ] No [ ]

   2.1. If Yes, indicate the range of your gross monthly salary ?
   Less than R500[ ]R501 - R1000[ ] R1001- R2000[ ]
   R2001- R3000[ ] R3001- R4000[ ]R4001- R5000[ ]
   R5001- R6000[ ] R6001- R7000[ ]R7001- R8000[ ]
   R8001- R9000[ ] R9001- R10000[ ]Above R10000[ ]

   2.2. If No, do you receive income from other sources, e.g., from a husband/wife or relatives or from selling produce/cattle? Yes [ ] No [ ]

3. Have you visited the PA? Yes [ ] No [ ]
   3.1. If Yes, for what purpose?
   Look at wildlife (plants, animals & landscape) [ ]
   Stay in accommodation [ ]
   Look for work [ ]
   I work there [ ]
   Visit friends in the park [ ]
   Other, (specify) _____[ ]

   3.2. If No, why not? Not interested [ ] Too expensive [ ]
   Other, (specify) _____[ ]

4. After each statement, state whether you are against or in support of the proposed action.
   4.1 If the land in the PA was to be used for mining, agriculture or industrial development, would you vote against such action? Yes/No

   4.2. If the animals were removed from the PA and the land re-distributed to people would you vote against such action? Yes/No

5. Should government fund this PA? Yes [ ] No [ ]

6. Does PA contribute to your livelihood, e.g., by bringing visitors that create employment or economic opportunities? Yes [ ] No[ ] Don't know [ ]

7. Specify how you, or your community, currently benefit from the PA?

8. Specify any other benefits that you, or your community, would like to get from PA?

9. After each statement, circle your answer as agree or disagree.

9.1.	PA protects biodiversity.	Agree/disagree
9.2.	Local people should collect firewood freely from PA.	Agree/disagree
9.3.	Some PA land should be given to the landless.	Agree/disagree
9.4.	Managers protect PA for our benefit.	Agree/disagree
9.5	Fences protect wildlife and people.	Agree/disagree
9.6.	PA should be kept for posterity.	.Agree/disagree
9.7.	PA contributes to the SA economy.	Agree/disagree

Appendix 6a. **The participative resource management continuum.**

Full control by the agency in charge		**Share control by the agency in charge and other stakeholders**		**Full control by other stakeholders**
Collaborative Management				
Actively consulting	Seeking consensus	Negotiating (Involving in decision-making) and developing specific agreements	Sharing authority and responsibility in a formal way (e.g., via seats in a management body)	Transferring authority and responsibility
No interference or contribution from stakeholders				No interference or contribution from the agency in charge

Increasing expectations of stakeholders →

Increasing contributions, commitment and 'accountability' of stakeholders →

Source: Adapted from Borrini-Feyerabend (1997).

Appendix 6b. **A typology of participation.**

Type of Participation	***Description***
Passive participation	People being told what is going to happen or has already happened. Unilateral announcement without any listening to people's responses. The information being shared belongs only to external professionals.
Participation in information giving	People answering questions, questionnaire surveys or similar approaches. People do not have the opportunity to influence proceedings; findings are neither shared nor checked for accuracy.
Participation by consultation	People are being consulted and external agents listen to views. External agents define both problems and solutions; may modify these in the light of responses; do not concede any share in decision making; and professional is under no obligation.
Participation for material incentives	People provide resources – for example, labour - in return for food, cash or other materials incentives. Much in-situ research and bioprospecting falls in this category.
Functional participation	People form groups to meet predetermined objectives; can involve externally initiated committees. Occurs after major decisions have been made. Initially dependent upon external initiators and facilitators; may become self-dependent.
Interactive participation	Joint analysis, leading to action plans and the formation of new local groups or the strengthening of existing ones. Involves interdisciplinary methodologies, multiple perspectives and learning process. Groups take control over local decisions; people have a stake in maintaining structures.
Self-mobilization	Initiatives taken independently of external institutions. May challenge existing inequitable distributions.

Source: Adapted from Pimbert & Pretty (1995)

Appendix 7. **Characteristics of attributes in adaptive management systems.**

Attribute	Property or characteristic of an attribute
Strategy	A conditional action pattern that indicates what to do in which circumstances
Artefact	A material resource that has definite location and can respond to the actions of agents.
Agents	A collection of properties (especially location), strategies, and capabilities for interacting with artifacts and other agents.
Population	A collection of agents or, in some situations, collections of strategies.
System	A larger collection, including one or more population of agents and possibly artifacts.
Type	All the agents (or strategies) in a population that have some characteristics in common.
Variety	The diversity of types within a population or system.
Interaction pattern	The recurring regularities of contact among types within a system.
Space (physical)	The location in geographical space and time of agents and artefacts.
Space (conceptual)	The 'location' in a set of categories structured so that ' nearby' agents will ten interact.
Selection	Processes that lead to am increase or decrease in the frequency of various types of agents or strategies.
Success criterion or performance measure	A 'score' used by an agent or designer in attributing credit in the selection or relatively successful (or unsuccessful) strategies or agents.
Emergent properties	Properties of the system that the separate parts do not have.
Designer	An external actor that introduces new artifacts, strategies or agents. This is related to a policy maker who might deliberately alter the consequences of available strategies
Attribution of credit	Use of a performance criterion by an agent to increase the frequency of successful strategies or decrease the frequency or unsuccessful strategies.
Adaptation	The outcome of a selection process that leads to improvement according to some measure of success
Complex Adaptive system	A system that contains agents or population that seek to adapt.

Source: Adapted from Ruitenbeek & Cartier (2001).

Appendix 8. **Transformation values for South African National Parks.**

Key driver	Rationale
Human relations	To transform current negative relations between employees of South African National Parks, encouraging staff to be positive, productive and supportive of the mission and strategic objectives of South African National Parks.
People development	To facilitate the identification of people who have the potential for growth.
Business development	To ensure that business opportunities and contracts are also open to black entrepreneurs, manufacturers, consultants and suppliers of goods and services.
Affirmative action	To correct the imbalance of the past by recruiting and creating opportunities for blacks, women and the disabled.
Elimination of systems and processes	Which hinder the implementation of the mission and values of South African National Parks.
Alignment of SANP's structure	So that it affirms and confirms the mission and values of South African National Parks.
Corporate image	To address the overall visual corporate identity of South African National Parks (the name of the organisation, parks and camps, the logo, the uniform and publications).
Optimisation of quality of services and hospitality	To develop strategies that will maximise income generated from high quality services provided by South African National Parks.
Gender	To develop a comprehensive gender policy to address issues that affect men and women at the workplace, for example, policies and procedures on maternity and paternity leave and sexual harassment.
Language policy:	To address the question of an official language.
Land claims policy and strategies	To facilitate reconciliation and increase the legitimacy and credibility of South African National Parks amongst communities who in the past have been forcefully removed from their land to create parks.
Cultural resources and heritage management	To formulate policies and strategies to ensure that historical sites and cultural resources within the parks are developed to promote cultural sensitivity, accurate recording and interpretation of their cultural significance.

These values were guided by the Board's transformation vision statement (*Custos* 1998:14):

> *South African National Parks is striving to transfer power and control of resources from the minority that had been appointed and privileged by an undemocratic system, to the majority that participates in the new democratic process. It is also directing the benefits of its activities to providing for all South African, rather than the wealthy and privileged sections of society.*

Source: Adapted from Tema (1998).

Appendix 9a. **Guidelines for SANParks on Social Ecology.**

Key factor	Rationale
Beneficial partnerships	SANParks facilitates and implements initiatives that contribute to the quality of life of local communities. Such initiatives must, however, be clearly and visibly linked to conservation, and must benefit both parks and local people. SANParks is, however, not a development organization and cannot be expected to take the lead in rural development that has no spin-offs for biodiversity conservation.
Coupled function in SANParks	SE is one of SANParks' cornerstones, and is adopted as a new way of working throughout the organization. To compensate for the shortage of SE staff in all the departments and divisions in order to contributes to the success of social ecology.
Alliances and cooperation	SANParks forms alliances with government organizations, NGOs, community-based organizations and the private sector at international, national and local levels to promote social ecology. It participates in, and initiates, collaborative projects wherever this is feasible and acts as facilitator, linking local people to the most appropriate development agency. National parks are managed in the context of integrated local and regional development; SANParks participates in and contributes to integrated planning and implementation processes at the local and regional level.
Adaptive management	SANParks experiments with different approaches to social ecology in a focused and goal-directed manner, and adapts its strategies to suit each park's context. It judges short-term successes and failures in social ecology with caution. Errors and successes are seen as opportunities for learning, and all role players accept that social ecology involves covering new ground, risk taking and experimentation. Realistic, measurable goals are set and constantly monitored to evaluate outcomes, and strategies and actions are adapted accordingly.
Capacity development	SANParks facilitates the development and enhancement of the capacity of its staff and that of local communities, to enable them to meaningfully engage in social ecology activities. All those working in SANParks are capacitated to have a working understanding of the core business of the organization: biodiversity conservation, as well as an understanding of the underlying policies and principles of the social ecology approach. SANParks contributes to local capacity development, and appropriate divisions participate in such initiatives. Links with other organizations who have training as their primary mandate are established and developed.
Sustainability	SE initiatives are ecologically, institutionally, and economically sustainable. The rate of use of natural resources (where appropriate) is renewable; lasting institutions and management structures that are correctly managed and administered are developed; initiatives become independent of external financial contributions and donations; and the management and administrative capacity of local structures to contribute to park management, deal with conflicts and enforce rules is sufficiently developed.
Local participation	SANParks promotes the participation of local people in park management. Each park has a management committee, which provides a basis for sound working relations. The level of participation varies from park to park, depending on the capacity of local role players to participate and contribute, the capacity of SANParks staff to engage with local role players, the history of interactions between the park and neighbouring people, and local political and economic agendas.

Source: Adapted from Fabricius (2002).

Appendix 9b. **Constituency building for SANParks should be driven by capable.**

Position	Responsibility	Skill requirements
Director of constituency	• Manage national awareness, environmental education and local programme coordination • Liaise with senior government officials and potential donors	• Background and skills in either educational policy or marketing*/public relations* • Political experience an advantage
Manager of national awareness	• Improving national demographics of park attendance • Improving national awareness and image of SANParks • Liaise, collaborate and coordinate with marketing division	• Background and skills in marketing, public relations* • Experience in logistics or event coordination an advantage
Manager of environmental education	• Develop national environmental education curriculum in conjunction with other agencies • Liaise with national education agencies, groups, etc. • Develop strategy/policy for park education programmes for schools • Coordinate national system of park school programmes • Develop policies towards visitor interpretation and education centres, cultural sites, etc. and advise park management	• Educational background and skills • Experience in national education policy making an advantage
Local programme coordinator	• Develop best practice sharing process among parks • Advise park managers on programmes, issues	• Social ecology

Source: Adapted from McKinsey & Company (2002).

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