

Introduction

LANDSCAPES ARE LIBRARIES whose information is ignored by most academics. Approaching the history and future of a place through its landscape provides unique perspectives and opportunities. The Kingdom of Lesotho has traditionally been considered in the context of southern African regional political and economic structures and forces. In contrast, this book evaluates Lesotho's past and development plans from the vantage of its own landscape over time. The resulting earth-centric analysis identifies previously unknown processes, reveals belief masquerading as science and emerging in the form of ideology, and confirms that economic and political decisions have clear—and often highly destructive—environmental consequences.

The story of soil erosion and soil conservation in Lesotho is a tale of environmental change and environmental destruction, of a conversation among cultures that never happened, of the persistence of ideas about landscape problems and their technological solutions in the face of obvious failure and, finally, of a misunderstood resistance. Unraveling these

complexities was facilitated by the construction of a history of the landscape. Evidence from oral sources and archives proved to be complementary, providing both alternative perceptions of particular events and validation of the utility and reliability of oral history in the reconstruction of past environmental processes. This book presents the resulting historical environmental reconstruction in an attempt to understand what happened and why, so that more realistic approaches to the serious contemporary problem of soil erosion might be identified.

When the research included in this book began in 1978, Lesotho was widely regarded as one of the most eroded landscapes in the world. Rural Basotho were characterized as uncaring, bad farmers whose livestock management and farming practices had caused massive erosion. So pervasive was this belief that it had become part of common descriptions of the nation. The jacket of a 1985 record album of Sesotho music stated that

Lesotho, with few natural resources and no significant industrial development, is one of the world's least developed nations. It is economically dominated by the Republic of South Africa. Major problems are the acute shortage of fertile land, soil erosion and lack of employment opportunities. The country's large trade deficit is partly offset by remittances from migrant workers in South Africa and by overseas aid, particularly from Britain. All land in Lesotho is vested in the Basotho nation and no foreigner is allowed to purchase land. Grazing land is regarded as communal and can be claimed by all livestock owners; this has led to overgrazing and consequent soil erosion. (Seema and Tau ea Linare 1985)

Although sheet erosion (uniform soil removal from a surface) was rampant, it was the deep and dramatic gullies (called "dongas" in southern African English) that were notorious. In the late 1970s handbooks of soil conservation existed, soil conservation was taught in all the schools, and soil conservation had been the major activity of the Ministry of Agriculture since the mid-1930s. International advisers guided development aid to combat erosion. But no effort had been made to determine the causes or mechanisms of erosion. Why had gullies developed so rapidly? Why were they in farmland? And, perhaps most importantly, when had they begun?

Not only had the origins of soil erosion not been fully considered, but the effectiveness of the soil conservation engineering approach used

since the 1930s had never been assessed. Independent Lesotho's internationally funded and nationally implemented soil conservation programs were, therefore, operating in the present, looking to the future, and ignoring the fact of a thirty-year history.

Parallel to the lack of information about landscape processes was an equally vast ignorance of the land users' assessments of these conservation programs. Surveys implemented in conjunction with a range of development projects had confirmed the opinion of the international community that the Basotho were ignorant of, and uncaring about, their landscape. Respondents had generally provided noncommittal answers or affirmed the need of an existing project. Despite a reported desire to have soil conservation programs, the Basotho's minimal participation was well known. But no one had asked why. It was simply accepted—by both international advisors and educated Basotho—that rural Basotho were ignorant and apathetic, and that they employed destructive land use practices.

Both the unasked questions and the unquestioned assumptions come into focus when landscape processes are examined over time. Historical analysis demonstrates clearly that the condition of Lesotho's landscape in the 1970s was the result of events that had occurred in the previous hundred years. Basotho and international concerns about soil erosion and interest in soil conservation engineering become clearer. Causality can be distinguished from chance co-occurrence, and coherent logic systems can be identified. The Basotho emerge as victims of a failed technology, whose efforts to resist or mitigate the implementation of destructive conservation works had been thwarted, and who were then blamed for the consequences of technical failure. Basotho attitudes had been formed by these experiences. So, too, had these experiences formed the opinions of European missionaries, travelers, and British officials. The construction of an environmental history is thus essential to an understanding of cultural and social perceptions and actions. Historical perspective also facilitates distinguishing between environmental change and environmental destruction, so that agency—not blame—can be assigned.

Knowledge of landscape function proved to be fundamental to constructing its history. Chapters 2 and 6 examine the difficulties archival sources present for environmental historians. Writers of nineteenth- and twentieth-century descriptions did not always view the landscape as it was. Rather, they saw it as a variation of somewhere else, a "somewhere" that was more normal and less problematic. Even those who tried to examine

the landscape may not have had the information required to understand its processes, since both soil science and conservation engineering were new disciplines in the early twentieth century (this is briefly sketched in chapter 8). The written record is, therefore, quite subjective and often contradictory. Systematic study of one place through an annual cycle of use and climate, as described in chapters 4 and 5, allows us to understand landscape dynamics well enough to be able to make sense of the written record of misunderstandings. It was this landscape familiarity that enabled the researcher to comprehend the Basotho's environmental perceptions and land use system when collecting the oral histories of the landscape discussed in chapters 5 and 7. Analysis of landscape function and processes also provides essential background for chapters 5, 7, and 8: assessments of conservation programs and their technical failure. Finally, knowledge of the landscape starkly reveals the tragedy that results from a lack of dialogue between land users and those who would intervene to protect and conserve landscapes. Chapter 7 (oral history) suggests the extent to which voices were unheard and unheeded.

However, there is more to environmental history than an analysis of landscape function. Land use practices and interventions in the landscape must also be documented, analyzed in chronological order, and assessed in terms of their interactions with landscape processes. Chapter 1 surveys changes in land use technologies and human pressures on the landscape in order to provide the social and cultural context of changing soil-water relations that culminated in dramatic gully erosion. Rural Basotho had a range of perceptions and beliefs about soil erosion (chapter 7), as did the European travelers and residents on mission stations and in government settlements (chapters 6 and 8), and as did the post-Independence international community (chapter 8). The "battle" against soil erosion had many fronts. Each needed to be documented in order to write its history.

Conventional explanations for the eroded condition of the Lesotho landscape center on the farming and livestock practices of the Basotho. Programs were implemented to change Basotho attitudes and behavior. Chapters 2, 6, and 8 show that for more than sixty years a range of international organizations and experts spent millions of dollars implementing conservation programs. Various types of structures were built in farming and grazing lands, and tree planting, agricultural, and grazing schemes were implemented—without any monitoring or evaluation. Yet, at the end of the twentieth century, Lesotho was recognized as the most eroded country in Africa. Field observations and interviews with land

users in the late 1970s, reported in chapters 4 and 5, suggested a causal relationship between soil conservation structures and gullying processes. In the absence of historical measurement or other field data to support either this heretical proposition or the conventional explanations for soil erosion, a multifaceted approach was taken to data collection for the construction of an environmental history of Lesotho's lowlands landscape, to provide a context for interpreting data from the 1978–80 field study. Chapters 1 and 6 through 8 present the resulting evidence and argument.