Landmark and Landscape: A Contextual Approach to the Management of American Indian Resources

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Introduction

Raising the possibility that two historically polarized factions—American Indians and the U.S. government—may come to join forces in the conservation of natural and cultural resources appears at once utopian. Similarly, the proposition that anthropology could lend valuable insights to resource management seems at odds with the current of contempt that permeates interactions between American Indians and Western social scientists. Yet, present government emphasis on natural resource conservation and stewardship and increased anthropological awareness of the importance of "native" concerns and categories regarding cultural resource preservation (e.g., Carmichael et al. 1994; Doll 1994; Reeves and Kennedy 1993; Stoffle and Evans 1990; Stoffle, Halmo, and Austin 1997) can lead to the implementation of management strategies that address the needs of all interested parties. Management of natural resources in a broader context, too, should benefit from strategies based on systematic research and detailed knowledge about traditional views of land and resource use.

Current legislation that provides for the protection of American Indian cultural resources, such as the National Historic Preservation Act of 1966, has promoted the systematic inventory of archaeological and historical sites and other culturally significant places known as "traditional cultural properties" (TCP) (Parker and King 1990). However, numerous other resources of cultural significance must be considered in management and preservation efforts. To accomplish this task, a deeper understanding of traditional land and resource use practices should be gained, and this knowledge must be incorporated into management and preservation plans.

Thus, central to the development of comprehensive resource management strategies is the definition of management units that (1) embody traditional American Indian land and resource use behaviors and (2) satisfy current concerns of tribes and government agencies. Anthropology can provide conceptual and practical links between traditional views and government interests. This paper outlines criteria for developing a "contextual" resource management model that incorporates historical, ecological, and geographical variables with knowledge about how social groups interact with the landscape. Two analytical units that convey American Indian views on culturally significant resources are examined—landmark and landscape—and the articulation of these units with the management of public lands is discussed.

The paper begins with an overview of fundamental differences in the conceptualization of land and resource use between American Indians and the U.S. government. Historical and ethnographic information is then used to build a case for a contextual approach to resource management that focuses on human-land interactions that transform nature into culturally significant landmarks and landscapes. Ethnographic cases illustrate this model.

Changing Western Perspectives on Traditional Land and Resource Use

From the creation of Indian reservations to the criteria imposed by the U.S. Indian Claims Commission for adjudicating lands to the tribes, government policy decisions regarding access to and preservation of Indian resources have been based on Western principles of exclusive use and property. Because fundamental differences exist between Indian and Western worldviews (see Martin 1987), these decisions have posed a serious threat to the preservation of native culture and society. The prevalence of Western notions of land and resource use on the management of public lands is thus the most difficult obstacle faced when attempting to reconcile American Indian, scientific, and official approaches to management and preservation. In this section we review prevailing frameworks and contrast them with traditional land- and resource-use practices. We approach this discussion from a behavioral perspective that emphasizes the history of American Indian land use and its role in the transformation of the natural landscape into culturally significant places.
Property, Land Tenure, and Bounded Space

The idea of "bounded space," as conceived in geopolitical maps, brings about an immediate sense of territoriality or ownership of a particular space and everything that lies within its boundaries (Tuan 1977:4). In the United States, bounded spaces—states, counties, cities, public parks, reservations, and private lands—define and constrain the interactions between citizens and the resources contained in the national territory. The European concept of exclusive property rights over land and resources has been actively enforced since the adoption of the Constitution in 1787 (Rose 1994:71), even when enforcement impinged upon aboriginal land-use patterns of American Indian tribes.

What the Founding Fathers and, later, the federal government did not account for when setting the territorial foundations of the nation was the presence of American Indians—the earlier occupants and true "natives" of the country—whose conceptualization of land did not fit the notion of bounded space as a discrete geopolitical entity. This conflict was evident throughout the American expansion into the western wilderness, when the U.S. Boundary Survey Commissioners set out to systematically map newly purchased territories that included lands occupied by Indian tribes. For example, J. W. Fewkes (1900), an ethnographer working for the Bureau of American Ethnology, described how difficult it was for boundary surveyors to translate the agricultural tenure system of the Hopi Indians of Arizona into a conventional map. Similarly, the Hopi were increasingly distressed by the surveyors' apparent inability to grasp the "natural logic" of Hopi fields that for centuries had been strategically placed to decrease crop failures.

Seasonal and logistic mobility, practiced by numerous tribes but most prevalent among big game hunters, proved to be a resource-use strategy completely incompatible with Euroamerican settlement systems and property-right policies established by the U.S. government during the expansion period. Ownership claims to water, surface, and underground resources, and exclusive use of those resources, contrasted sharply with traditional strategies that favored extensive use of large territories over intensive exploitation of nuclear areas. These vast logistic territories were, in many instances, shared by more than one tribe.

As a result, settlers encroached to what they perceived to be unoccupied lands, eventually leading to conflict, war, and the creation of Indian reservations. Treaties were, in theory, intended to include tribes in the Euroamerican system of property rights by granting them access to critical resources, albeit in areas far smaller than their ancestral lands and often in regions that tribes had never before used. In practice, the development of government and private industries based on surface, underground, and water resources resulted in belied treaties, costly land disputes, and frequent relocation of Indian communities (Deloria 1974). By the first decades of the 20th century, most Indian tribes had lost access to traditional resources located beyond the boundaries of their reservations.

The Notion of Place-Bound Tenures

In-depth knowledge of American Indian land- and resource-use strategies was gained through extensive ethnographic research conducted during the Indian land-claims trials. From the signing of the Indian Claims Commission Act by President Truman in 1946 to the early 1980s, the U.S. Department of Justice and the Indian tribes sought the expert advice of anthropologists to gather background information on aboriginal land and resource use that would support their competing claims. Eminent anthropologists, such as Alfred Kroeber and Julian Steward, participated as expert witnesses and collected a wealth of information on land and resource use with the assistance of Indian elders, archaeologists, historians, geographers, and wildlife biologists (Beals 1985:142; Sutton 1985:91-113). Although "aboriginal" territories as determined by the Indian Claims Commission or the U.S. Claims Court represent exclusive land use at a specific point in time, the expert witness research covered a much broader time period, beginning with prehistory.

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The intellectual and legal debate carried out during the land-claims process and in its aftermath demonstrates that the key to piecing together evidence of aboriginal land use and ownership rested on the conceptualization of territory (Beals 1985:149-153; Price 1981:18; see Layton [1995] for analogous land-claims cases from Western Australia). Western common-sense notions of territories as homogeneous, clearly bounded, and stable geopolitical spaces did not fit the available evidence of American Indian land-use strategies. In the absence of "tribal legal titles" to aboriginal lands, judges, attorneys, and expert witnesses needed to solve the practical problem of delimiting territorial units based on material evidence of the history of land use as well as on ethnohistoric documents and oral tradition.

In examining the configuration of land claims, Imre Sutton (1985:111) points out that, although each Indian land
A contextual approach to resource management is rooted in traditional land- and resource-use practices and entails focusing on concrete human-land interactions that transform places and resources into landmarks and landscapes. This approach echoes Vayda's (1983:265) "progressive contextualization" in human ecology research, which advocates the analysis of one type of resource or interaction, widening progressively as interconnections between resources and interactions become manifest. The fundamental characteristic of a contextual approach, which distinguishes it from other research methodologies, is its independence from arbitrarily bounded units such as ecosystem, culture area, or settlement system. Alternatively, this approach requires the identification of two place- and resource-bound analytical units: landmarks and landscapes.

Landmark, or The Historical Transformation of Place

Places, in terms of human behavior, may be defined as discrete loci of human-land interactions (Tuan 1977:6). Landmarks, in principle, are locational markers that indicate places where interactions and activities occurred. Landmarks include stationary features of the natural landscape, such as rock formations, tree stands, and water holes, or features of human manufacture, such as permanent buildings, trails, burial mounds, and petroglyphs. What makes landmarks significant is that they have been transformed, through human activity, into reminders of the history of land and resource use by a particular people. Landmarks are historic places of great significance for societies lacking formal writing systems, for they are used in transferring knowledge about past events, everyday activities, social and ritual conduct, and moral lessons. Landmarks, therefore, are essential for shaping the future of generations in accordance to traditional lifeways.

In Wisdom Sits in Places, Basso (1996:32) recounts how vividly a Cibecue Apache can recall past events and moral teachings in the presence of a place bearing a descriptive name. Landmarks are called upon in every occasion when some specific form of behavior must be learned from past experience and accumulated knowledge. "Place-making," or the transformation of an activity locus into a landmark, is at the core of cultural-reproduction strategies among American Indians (Mohs 1994; Momaday 1974; Theodoratus and LaPena 1994) and other place-dependent societies (e.g., Ingold 1986; Layton 1995; Morphy 1995).

Variability in Landmarks and Transformation Processes

A pivotal condition for contextualizing land use is the ability to convey the range of human-land interactions and activities that transform places into particular landmarks. In an effort to synthesize the wealth of information about places...
of cultural significance, anthropologists have offered various typologies, many based on native categorizations of different activities, events, and ancestral histories encoded in landmarks. Mohs (1994:192), for example, provides the following classification of sacred sites for the Sto:lo Indians of British Columbia, based on native-elder interviews: transformer sites, spirit residences, ceremonial sites, traditional landmarks, questing/power sites, legendary/mythological places, burials, and traditional resource areas. Many of these categories are widely used by anthropologists involved in making inventories of culturally significant places (e.g., Carmichael et al. 1994; Kelley and Francis 1994; Griffith 1992; Greider and Garkovich 1994); they generally convey oppositional principles, such as sacred vs. secular, that characterize Western object-based typologies (Stoffle, Halmo, and Austin 1997).

Research among the Cibecue Apaches reveals a very different framework for native place distinctions. During a series of field interviews, one of Basso's elder informants told how he had planned the order in which they would visit places so that these would reflect the changing conditions under which the place names were bestowed (Basso 1996:29). This information suggests that landmarks or named places not only reveal the broad developmental sequence of land and resource use by the Cibecue Apache society and confer place-bound identity to its social groups. They also contain a record of transformational interactions and events that occurred at particular activity loci.

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While acknowledging that there may be landmarks bearing single interaction referents, the reconstruction of transformation processes or life histories expands the knowledge on landmark variability to include multiple interaction loci, whose contextual information would be otherwise lost in the midst of a functional typology. It is, therefore, of utmost importance that landmarks' life histories and descriptive place names be recorded before any attempt at classification takes place. Here, we propose using landmark as a unit that refers to discrete human-land interaction loci and that may include places classified as sacred, symbolic, or ceremonial, as well as so-called secular places with historical and behavioral referents.

Landmarks may be viewed as "pages" in the history of land and resource use, but they alone do not represent the full spectrum of land- and resource-use interactions and activities. Landscapes, on the other hand, are analytical units that can be used to define the spatial and historical dimensions of human-land interactions.

**Landscape, or the Contextual Link between Landmarks and People**

We define landscape as the network of interactions between people and landmarks. Landscapes may be characterized as having three basic dimensions: (1) formal: the physical characteristics and properties of landmarks; (2) historical: the sequential network links that result from transformation processes; and (3) relational: the interactive (behavioral, social, symbolic) links that connect people and landmarks. It is important to note that landscapes, whether human or nonhuman, do not exist outside historical (e.g., coevolutionary) and relational (e.g., symbiotic, dominant) links.

Landscape, as a unit of analysis that conveys the integration of natural and cultural environments, was applied in the 19th and the early 20th century (e.g., Sauer 1925). Thereafter, landscape fell into disuse mainly because it was not a unit easily delimited or measured. As Allen and Hoekstra (1992:47) state, landscapes have been generally defined as contiguous spaces that can be comprehended at a glance. This visual characteristic, romanticized in paintings and frozen in artistic photographs, implies that landscapes are the product of human perception and thus they may not be amenable to replicable description and measurement.

The relatively recent resurgence of landscape theory in anthropology, geography, and ecology coincides with an increased emphasis in the study of political, ideological, and symbolic relationships between people and environment (e.g., Baker and Biger 1992; Bender 1993; Carmichael et al. 1994; Cosgrove 1984; Jackson 1984; Tilley 1994; Hirsch and O'Hanlon 1995; see Norton 1989 for a detailed summary of the history and usage of landscape). Despite the rapid growth of anthropological literature addressing the meaning and content of landscapes, little effort has been placed on systematizing the application of landscape theory to field-based research on land and resource use. In cultural anthropology, the material dimensions of landscape are generally treated as poorly defined and mostly unacknowledged backgrounds for human attitudes and actions (i.e., Baker 1992:2). In fact, the main criticism of anthropological applications is that they do not provide a definition of landscape (Lawrence-Zuniga 1996:916). And yet, field research demonstrates that the material dimension of landscape is of extreme importance for understanding people's land-related cognition and practice (e.g., Layton 1995; Morphy 1995; Stoffle, Halmo, and Austin 1997).

The practical application of landscape as a unit that conveys interconnectedness of things and beings requires definition, description, and measurement. This requirement is paramount if the interconnection between people and
"Whose Place Is This?" Breaking Through the Boundaries of Western Thinking

Concern for historic cultural resources has been expressed in North American legislation throughout the 20th century. In 1906, the Antiquities Act (PL 209, 16 USC & 431-433) authorized the President of the United States to declare landmarks, structures, and objects of historic or scientific interest to be national monuments and to reserve land to aid in their protection. In 1935, the Historic Sites Act provided for the preservation of historic American sites, buildings, objects, and antiquities of national significance. The scope of historic preservation as public policy was significantly expanded with the passage of the National Historic Preservation Act (NHPA, PL 89-665, 16 USC & 470 et seq.).

Since its passage in 1966, NHPA has provided assistance to states and established the Advisory Council on Historic Preservation (ACHP), whose duty is to advise the President and Congress on matters relating to historic preservation, encourage public concern on historic preservation, and assist state and local governments in drafting legislation relating to historic preservation. State historic preservation officers (SHPO) are responsible for carrying out Section 106 compliance programs and consultation regarding the historic, cultural, and archaeological significance of specific sites.

Several amendments to the NHPA have expanded to increase the protection of American Indian Traditional Cultural Properties (1980, 1991, 1992), or properties that are associated with customary practices or traditional beliefs of a community and are significant for ensuring the continuation of those traditions. The amendment of 1992 explicitly confers greater authority and assistance to American Indians and requires that all federal agency preservation-related activities be carried out in consultation with the tribes (Advisory Council for Historic Preservation 1993:3-4).

Although created within the Western model of property ownership, these acts actually recognize the "tenure" concept of a particular place and the validity of traditional cognition and practices that transform nature into culturally significant places. Furthermore, the legislation acknowledges the need to reproduce traditional cultural practices by granting practitioners access to traditional lands and resources located beyond the boundaries of reservations. Additional legislation that is significant as a formal reaffirmation of traditional interactions with land and resources is the American Indian Religious Freedom Act (AIRFA) of 1978 (PL 95-341, 42 USC & 1996), which reaffirms the First Amendment rights of American Indians to have access to lands and natural resources essential in the conduct of their traditional religions. This act aims at providing access to sites, use and possession of sacred objects, and the freedom to worship through ceremonies and traditional rites.

More recently, the Native American Graves Protection and Repatriation Act (NAGPRA) of 1990 (PL 101-601, 25 USCA & 3001) makes provisions for the return of human remains, funerary objects, and associated sacred items held in federally funded repositories to American Indian, Native Alaskan, and Native Hawaiian peoples who can demonstrate lineal descent, cultural affiliation, or cultural patrimony. Like NHPA, NAGPRA requires formal consultation with and participation of indigenous peoples. This act has been alternatively criticized and praised by both American Indians and non-Indian anthropologists, archaeologists, and curators (see Clark 1996; Ferguson 1996; Stoffle and Evans 1994). Unlike AIRFA, NAGPRA returns to the Western view of exclusive property rights.

Despite its weaknesses, legislation in its present form is sufficient for developing resource-management plans that include American Indians and benefit from traditional views of land and resource use. Taking advantage of such opportunities requires a carefully designed strategy for incorporating American Indians in the preservation and management of natural and cultural resources. To establish productive consultation relationships, government agencies must first make a determination on who to invite to the consultation table based on information as to past and present uses of land and resources in the area in question. It is at this juncture that recognition of traditional interactions with land and resources must be determined and acknowledged.

The determination of which tribes have an interest in the land and resources under consideration, in many instances, has been made a priori, being limited to tribes whose reservations are adjacent to the public lands, have a history of voicing concerns about resources in those lands, or ceded the lands to the government through treaties or monetary compensation. Aboriginal land-claims maps and traditional culture-area maps are often used to determine which tribes have the ties to public lands.

A priori determinations are likely to cause conflict because they rely on past failures to recognize traditional land and resource interactions and therefore may exclude tribes with ancestral connections to those lands. Systematic background research is essential for identifying all groups with ancestral and cultural connections to the lands and resources under management; it not only satisfies the political environment of consultation procedures, it ensures that a broad range of information on land and resource use will be obtained. Research that focuses only on recent historic uses may not be sufficient for identifying ancestral connections to land and resources (i.e., Wozniak, Brugge, and Lange 1993; cf. Stoffle et al. 1994).
Productive consultation relationships depend on the degree to which American Indians relate to the issues under consultation. The evaluation of places and resources in public lands, in particular, must be conducted using concepts and criteria that are compatible with the cultural context within which traditional knowledge is acquired, practiced, and transferred to younger generations. While research and consultation about a general area—usually an arbitrarily bounded park, forest, or other public property—may initially provide some information about its cultural significance, place- and resource-specific consultation is more fruitful because Indian people relate to place and resource units much more readily than to bounded areas that mean little to them.

Place- and resource-bound research approximates the natural logic of traditional land and resource use and may be supported by independent evidence of occupation and use as well as by specific oral history (Zedeño 1997). This approach provides contextual information that allows managers to evaluate the importance of a place or resource in relation to other places or resources. Finally, a focus on places and resources also helps circumvent pitfalls that result from imposing extraneous land- and resource-use criteria on American Indian cultural resources.

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