

NATIVE AMERICAN USE OF THE SOUTH KAIBAB NATIONAL FOREST

An Ethnohistoric Overview

by

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FOREWARD

This overview of the historic Native American use of the south Kaibab National Forest and the area of the Coconino Plateau has been prepared primarily for use by Forest Service managers, cultural resource professionals and other specialists. While by no means an exhaustive survey, this information is central to understanding the historic development of the groups who exploited the resources of the area after its probable abandonment by its prehistoric inhabitants.

The document represents, perhaps more importantly, an outreach attempt by the Kaibab's cultural resource professionals to the Native American groups described and discussed within these pages. We are hopeful this will lead to close cooperative efforts with them. Through these, we hope to fill in the gaps so obviously present in the following narrative. We are seeking information that will better enable the Kaibab National Forest to preserve, protect and understand the historic cultural resources of these neighbors and forest users.

The volume is organized in five sections and an appendix. The general introduction was prepared by Assistant Forest Archaeologist Teri Cleeland, who also wrote the section on the Navajo. The general introduction to the Upland Yumans-Northern Pai as well as sections on the Havasupai and the Hopi were written by Archaeologist Lawrence Lesko. Archaeologist Neil Weintraub authored the section on the Yavapai. Forest Archaeologist John Hanson provided overall direction and technical editing.

KAIBAB NATIONAL FOREST

NORTH KAIBAB
RANGER DISTRICT

US 89A

AZ 67



GRAND CANYON NATIONAL PARK

GRAND
CANYON
VILLAGE

GRANDVIEW

TUSAYAN

AZ 64

TUSAYAN
RANGER DISTRICT

US 180



KEY MAP

Flagstaff

PHOENIX

AZ

CHALENDER
RANGER DISTRICT

US 180

WILLIAMS
RANGER DISTRICT

AZ 164

WILLIAMS

140 (Route 66)

ASHFORK

Parkinsville
Road



NATIVE AMERICAN USE OF THE SOUTH KAIBAB NATIONAL FOREST

INTRODUCTION

On the Coconino Plateau, as elsewhere, the early historic period is poorly understood. The apparent departure of the Cohonina by A.D. 1150 seems to have left a cultural void in the region that lasted about 200 years. When the semi-sedentary Cohonina abandoned the plateau, they left the area open for use by other aboriginal groups, who may have followed a more transitory lifestyle. Lifeways of protohistoric and historic Indian groups are revealed from two sources: archeological evidence and journal entries of foreign observers. It is the latter source that concerns us here.

Historic Documentation

Our earliest knowledge of the plateau's historic inhabitants comes from the reports of Spanish and American expeditions. Yet these documents themselves can be interpreted in various ways. Locations of reported Indian sightings are sometimes unclear because the exact routes of explorers are not always known. Chroniclers often failed to differentiate the names of the various native groups, so it can be difficult to determine which is referenced in journals. For example, Spanish explorer Garces wrote in his diary: "The space between the Rios Colorado and Gila is all occupied by the Yabipais. To the south of the Moqui [Hopi] is all Yabipais, noting that the name Yabipais is the same as Apaches. . . . in the names I set down there may be variation, seeing that the Indians call by different names one and the same nation" (quoted in Coues 1900: 445). The Havasupai were then known as Jabesuas, Yabipais, or Kohninas. Despite these problems, the Spanish and American narratives provide interesting and useful information on aboriginal lifestyles and movements. A summary of relevant excerpts from these accounts follows.

Spanish Documentation

The Spaniards did not travel extensively in the area of the south Kaibab National Forest. [For a more detailed discussion of Spanish expeditions, see Putt 1991.] Only two Spanish expeditions are important to this overview: the 1540 "discovery" of Grand Canyon by Cardenas and the 1776 journey to the Cataract Canyon Havasupai village by Father Garces.

When the Coronado expedition arrived at the Hopi Mesas in 1540, their hosts told them of a large river lying to the west. The Hopi said that people with very large bodies lived several days journey down the river. They were referring to the Colorado River and the Havasupai people, who have large statures relative to the Hopi. Several Hopi offered to lead Don Pedro de Tovar and a contingent of soldiers to meet the Havasupai.

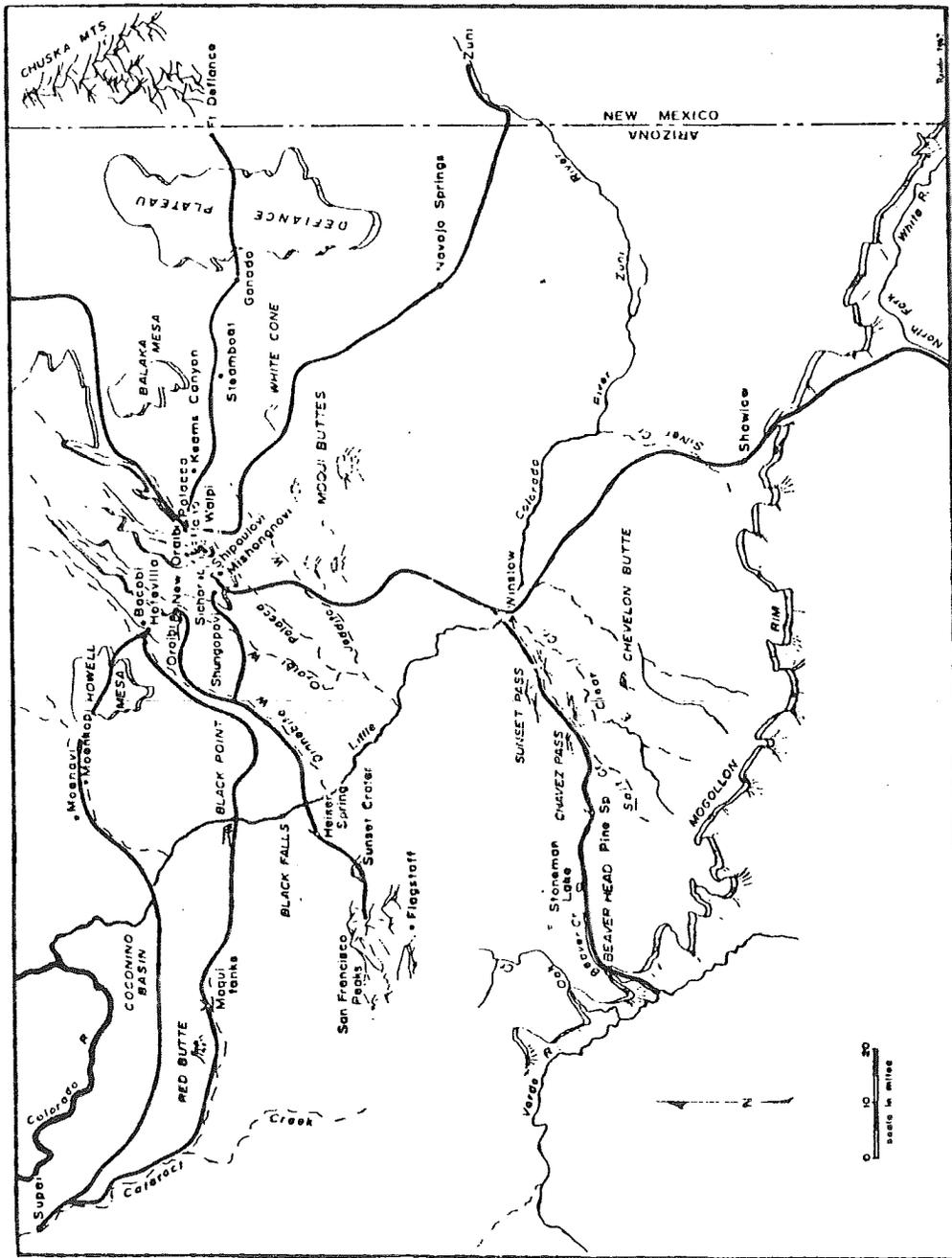
They traveled west to the rim of Grand Canyon, reportedly taking nearly 20 days to go about 120 miles. Encumbered by their heavy equipment, the Spanish moved slowly, taking about twice the time it normally took the Hopi. Although their exact route to the canyon is not known, Bartlett suggests two possibilities (1940: 43). Both traverse the northern part of the Coconino Plateau: one across the Coconino Basin and along the south rim, and the other south of Red Butte (figure 1). These ancient trade routes, documented by other researchers (Colton 1964; Euler 1974; Spier 1928), continued in use until after the turn-of-this-century. The Spaniards heeded Hopi warnings of a long waterless distance to the west and did not proceed to the Havasupai settlements. Women burdened with water-filled gourds usually accompanied the Hopi men on trips to Havasupai, and without them, the men balked at continuing (Bartlett 1940: 40). One also suspects that the Hopi had tired of showing the slow-moving Spaniards around.

Thus, the Spanish did not “discover” Grand Canyon, but were led to it by a people who had long revered the chasm. To the Spaniards, the canyon was a disappointment. It was too rugged to cross, and the Colorado River could not easily be reached. Their dream of finding an accessible waterway to navigate in this part of the arid southwest was not fulfilled.

Pedro de Casteneda, a member of the Coronado expedition who did not journey to the canyon himself, wrote the narrative of this journey 20 years after it took place. Although the account contains little ethnographic information, it is significant because it confirmed the existence of a trading relationship between the Hopi and Havasupai along a well-established route at an early date.

More than 200 years passed before another Spaniard entered the overview area. In July 1776, Father Francisco Garcés became the first European to enter Cataract Canyon and see the Havasupai’s village. His journal records observations of the canyon’s inhabitants, which at that time numbered about 34 families, some 200 people. He called the Havasupai “Jabesuas”, a Yuman word for the Havasupai, yet later in his journal he referred to the Cataract Canyon settlement as “the largest of all the Yavipai rancherias” (quoted in Galvin 1965: 66). The Havasupai owned many items obtained through trade with the Hopi, including cows, red cloth, and tools such as hatchets, hoes, and digging sticks. They dammed Cataract Creek and farmed by irrigation. During his stay, Garcés was fed venison, beef, corn, mescal, and beans.

After a pleasant five-day visit, Garcés left the canyon and traveled east along the old Hopi trade route. On the Coconino Plateau, he encountered a “Jabesua rancheria where they had come to pick juniper berries” (quoted in Galvin 1965: 67). One of that group accompanied him on his journey. He and his companion later met three Havasupai families, who joined them in their travels. Several days later Garcés arrived at another Indian camp on Moencopi Wash (Euler 1974: 5). He referred to it as “a rancheria of about thirty Yavipais” (quoted in Galvin 1965: 68) but goes on to say that their leader was a brother of the Havasupai who accompanied Garcés on his journey. With these observations, Garcés showed that the Havasupai ranged across the Coconino Plateau and used its resources in the summer.



A map of northern Arizona showing principal Hopi trails

Figure 1. Hopi trails across the Coconino Plateau. From Colton (1964).

Garces also saw evidence of other Indians on his journey east. The families that Garces had encountered on the plateau were fearful of traveling alone “because of hostilities with the Tejua Yavipais and the Napacs.” It is unclear to whom Garces referred, but he went on to state that “these Napacs live in a mountain range of the same name which, starting from that of the Puerto de Bucareli [Grand Canyon] and running west is in some places very high; it was still covered with snow” (quoted in Galvin 1965: 67). This probably refers to the mountains of the San Francisco Volcanic Field, so the group may have been Yavapais. The Napacs could have been an Apachean group, because Yavapais and Apaches sometimes formed aggressive alliances against the Hualapai and Havasupai (Schwartz 1983). The Navajo would not have lived so far west at that time.

The Havasupai showed Garces tracks of the “Tejua Yavipais” heading in a northerly direction, where they journeyed to trade with their friends the Chemeguavas. There is no indication of who this group was, although the reference may have been to the Chemehuevi of the Mojave Desert. Garces also met two Hopi east of the Little Colorado River who had come to trade with the Havasupai. Rather than journey all the way to Supai Village, the Hopi intended to meet their trading partners halfway (Galvin 1965: 68).

Garces thus painted a sketchy but useful picture of aboriginal movements on the Coconino Plateau in the late 1700s. The Havasupai used the entire plateau, although the tribe, being so few in number, did not intensively inhabit it. Activity was probably centered along trade routes, as Garces’ frequent encounters suggest. The plateau also served as a travel way for other groups like the Yavapai, who used a north-south trade route. The Yavapai also occupied the plateau to some extent, and apparently raided camps of the Havasupai, who feared them. In contrast, the Havasupai and Hopi enjoyed a friendly and well-established trade relationship.

With the departure of Garces, Spanish exploration in the area ended. It was not until 1851, when the first of several American expeditions entered the region, that we gain another glimpse of the Native Americans on the south Kaibab.

American Documentation

The routes and dates of the various American military expeditions across the Coconino Plateau are discussed in Putt (1991). Some of the explorer’s observations of the plateau’s native inhabitants are detailed below.

The prevailing attitude of American explorers and settlers toward Indians during the period of Manifest Destiny was not favorable and highly ethnocentric, for Native Americans were generally perceived as an impediment to westward expansion. An extreme example of that attitude is portrayed in the following excerpt from Baldwin Mollhausen, who accompanied Edward Fitzgerald Beale on his 1857 expedition to survey a wagon road along the 35th Parallel:

There can be scarcely any human beings in existence who stand on a lower grade than the Indians between the San Francisco mountains and the great Colorado of the west. They are generally reckoned as belonging to the race of the Apaches, or, at all events, as akin to them; they are equally shy and mistrustful, and have the same thievish propensities. . . . [T]hey are utterly destitute, and distinguished from the beasts of the forest only by the faculty of speech. Their forms are dwarfed and ugly . . . (Mollhausen 1858: 165-6).

The American expeditions were organized and ordered to accomplish specific tasks. Observations about the appearance and behavior of the native inhabitants was generally a secondary consideration. Thus, references to Native Americans in expedition accounts were often made in passing. Most explorer's journals record few encounters with those who lived on and used the Coconino Plateau.

The 1851 expedition of Lieutenant Lorenzo Sitgreaves encountered a "large encampment of Yampai or Tonto Indians" on the eastern side of the San Francisco Peaks (quoted in Euler 1974: 8, 9). They do not mention any further signs of Indians until after they left the Coconino Plateau. In the vicinity of Truxton Canyon, west of Mount Floyd, Sitgreaves' guide Antoine Leroux related a tale of ambush by "Cosnino" and "Yampay" Indians (Mollhausen 1858: 167). These may have been Yavapai or Mohaves, who were especially hostile toward Anglo encroachment on their territories.

Lieutenant Amiel Weeks Whipple crossed the plateau in the winter of 1853-54. In the vicinity of New Year's Spring north of Bill Williams Mountain, Whipple wrote: "[there] are indications of other springs to the right, with many Indian trails leading in that direction" (Whipple 1941: 179). Whipple further noted of the Coconino Plateau: "It seems to be a well-watered region, and a winter retreat of Indians, for several smokes were seen here" (Whipple 1941: 179). He thus saw evidence of Indians, but not the individuals themselves. He did, however, establish that the plateau was inhabited in the winter months.

During Edward F. Beale's two trips across the plateau in 1857 and 1858-9 he failed to see any Indians between the San Francisco Peaks and Mount Floyd. He wrote: "On the entire road, until our arrival at the Mohave Villages, we did not see, in all, over a dozen Indians, and those of a timid and inoffensive character" (Beale 1858: 3). This statement is in stark contrast to Mollhausen's diatribe, yet both men were on the same expedition. Apparently, Mollhausen got his information on the native inhabitants second-hand from Antoine Leroux, who guided both the Beale and earlier Sitgreaves expeditions. About 20 miles southwest of Bill Williams Mountain, Mollhausen wrote:

We are now passing through the territory where Captain Sitgreaves had been so continually tormented by [the "Cosninos"], but we never so much as caught sight of one, or ever came upon any fresh traces of them; the cause of the difference being doubtless that

his journey was made three months earlier than ours, at the season when the natives were getting their harvest of nuts in the woods, instead of being driven away by frost and snow (1858: 166).

Lieutenant Joseph Christmas Ives crossed the plateau from west to east in the winter and spring of 1858, while Beale was heading west on his second wagon road expedition. Mohaves assisted Ives in his navigation by steamboat up the Colorado River as far as Black Canyon, near today's Hoover Dam. They left the river and traveled east along Beale's tracks in search of a way into the depths of Grand Canyon. Somewhere just west of the Coconino Plateau, they encountered some Hualapai "huts of the rudest construction" (Ives 1965: 60). They continued up to the pine-clad Coconino Plateau, led by two Hualapai guides. The guides soon abandoned the expedition, but it eventually found Cataract Canyon without them. Of the group, only the topographer, Baron F. W. Egloffstein, made his way down the precipitous trail to the Havasupai's village. Eighty-two years after Garces' visit, Egloffstein saw a very similar settlement. He described ". . . a narrow belt of bottom land, with fields of corn and a few scattered huts. . . ." (Ives 1965: 73). As the party continued on south and east to Beale's Road, Ives wrote: "The handful of Indians that inhabit the sequestered retreats where we discovered them have probably remained in the same condition, and of the same number, for centuries. The country would not support a large population" (1965: 75). Ives made no further mention of Indians on the Coconino Plateau.

In 1863-64, the US Army established a route known as the Overland Road that led from the vicinity of today's Flagstaff to Prescott. A way station was established at Dow Springs in the southwest corner of Garland Prairie, about 13 miles southeast of Williams. Fred Hughes, a member of an expedition stationed there in about January 1864 later recalled that ". . . while hunting we would see Indians almost daily, and being as we now were in Tonto or Hualapai Apache country, we know them to be Apaches, and really expected each day that our camp would be attacked" (quoted in Byrkit 1988: 28).

Another account of travel on the Overland Road in the winter of 1864, by Judge Joseph Pratt Allyn, also mentions Indians. At Dow Springs, his party discovered a note in a tree written by an advance scout. "It informed us briefly that the road ahead was nearly impassable, that the Tonto Apaches had stolen forty of his mules and were in open hostilities. . . ." (quoted in Byrkit 1988: 33-34). Fred Hughes, the soldier stationed at Dow Springs, had evidence to suggest that the mule thieves were Navajo. This would have been an early, but not unlikely date, for Navajos to be in the area. They were being uprooted by the roundup campaign of Kit Carson at the time. However, the Navajo did not appear in significant numbers on the Coconino Plateau until after 1900.

All the accounts of the American military expeditions are similar regarding sightings of Native Americans on the Coconino Plateau. Most obvious is the fact that they were rarely seen, although their presence was sometimes indicated by abandoned abodes, smoke, and trails. Given their transitory lifestyle, low population, and fear of intruders, this is hardly surprising. The observers were often confused over the cultural identity of Indians they

encountered. This may be indicative of a pervasive prejudice against the natives, a lack of interest in their cultures, or both. Most written accounts are not favorable—indeed, many are outright insulting—and reflect the pervasive the Manifest Destiny attitude of the era.

Exploration of the country continued throughout the latter half of the 1800s. In 1862 and 1863, Mormon missionary Jacob Hamblin made two brief trips through Havasupai territory on his way to the Hopi Mesas from Utah. With Hopi guides, he traveled down the same path to Supai village that Garces and von Egloffstein had taken. According to Hamblin, “this singular location is the place chosen by the Co-ho-ninnas because of its natural advantages as a place of defense. On these bottoms they cultivate corn, beans, and Indian squash, irrigating their crops. They have a few peach trees” (quoted in Euler 1974: 16). The Havasupai may have first retreated into the canyon to defend themselves from Yavapai attacks, but by 1863, they probably also feared Anglo intrusion. Hamblin met one Havasupai who spoke the Ute language, suggesting a possible trade relationship with northern tribes. An account of General George Crook’s 1884 visit comments on an abundance of American and Hopi trade goods in Havasupai (Casanova 1968).

Travel by Americans into Havasupai and Yavapai territory increased in the 1870s and 1880s, and observations about the native inhabitants remained similar to those of the past. Maps produced by General Land Office surveyors in the 1880s sometimes show the presence of Indian trails, particularly those used by the Havasupai near the south rim of Grand Canyon, and occasionally record their dwelling locations. The maps helped pave the way for intrusion by homesteaders, and the U.S. government would set aside much of the traditional use areas as Forest Reserves in 1893 and 1898. By 1882, the pattern of aboriginal land use on the plateau had been irretrievably changed by Anglo encroachment. The Yavapai were removed to a reservation near Camp Verde by 1873, and the Havasupai were confined to a small reservation within Cataract Canyon in 1882.

After that time, the native cultures of the Coconino Plateau became the purview of ethnographers. The following section summarizes sources of general ethnographic information on the various cultural groups that are discussed in the remainder of this overview.

Ethnographic Source Material for the Overview Area

Frank H. Cushing (1882) published the first ethnographic account of the Havasupai. However, the definitive work on Havasupai culture was published by Leslie Spier in 1928. Carma Lee Smithson updated many of Spier’s topics in a 1959 monograph on the Havasupai woman. Alfred E. Whiting conducted extensive ethnographic work among the Havasupai in the 1940s; his findings were published posthumously (Weber and Seaman 1985). John F. Martin (1966, 1968) investigated the economic and social organization of the tribe. Douglas W. Schwartz (1955, 1983) and Robert C. Euler (1958, 1974, 1981) discuss Havasupai origins. Popular accounts of the Havasupai abound in books and magazines.

The standard ethnographic reference for the Hualapai is Kroeber (1935). Other important works on Hualapai culture and history include Euler (1958) and Coult (1961). An additional valuable document relating to the Hualapai is a collection of historical reports, Army and Department of Indian Affairs correspondences, and documents relating primarily to 19th century Hualapai published by the U.S. Congress (1936). Some of the material is summarized in McGuire (1983). [The official spelling, "Hualapai", preferred by the tribe and the Bureau of Indian Affairs, is used here. In anthropological literature, the term is often spelled "Walapai".]

There are relatively few reference works for the Yavapai. Gifford (1932, 1936) published two ethnographic reports on the Yavapai based on fieldwork conducted in the early 1930s. Corbusier (1969) provides insight into Yavapai life from the perspective of a U.S. Army surgeon in the latter part of the 19th century. Schroeder (1974) describes Yavapai traditional land use boundaries and presents documents which were to be used as evidence in legal proceedings to determine Yavapai aboriginal land rights. A good overview of Yavapai culture and history can be found in Khera and Mariella (1983). Stein (1981) discusses the Yavapai's traditional use of the Verde Valley. Peter Pilles (1981) has investigated Yavapai archaeology.

In contrast to the paucity of literature on the Yavapai, publications about the Navajo are numerous. It is not possible to cite all of the sources here, and the reader is referred to a bibliography by Iverson (1976) for more information. Brugge (1983) also summarizes many important works on the Navajo. A good overview of Navajo history is presented by Underhill (1956). The standard reference work on Navajo ethnography remains Kluckhohn and Leighton (1962). Recent overviews of Navajo culture and history can be found in Ortiz (1983) and Bailey and Bailey (1986).

As with the Navajo, reference works on the Hopi abound. Laird (1977) is a comprehensive and annotated bibliography of literature regarding Hopi life and culture. Additional material relevant to the south Kaibab can be found in the Hopi section of this overview.

Excellent introductions to native southwest cultures are in Volumes 9 and 10 of the *Handbook of North American Indians* edited by Ortiz (1979 and 1983).

Forest Service Historical Records Relating to Native Americans

Although a substantial number of Forest Service reports relating to Native American use of the forest were written in the historic period, only a small number have been located and are on file at the Kaibab National Forest Supervisor's office. Years ago, historical records, when saved, were boxed and sent to Federal archives in Denver, Colorado and Laguna Niguel, California. Dissimilar records were often packed together, so that a small file on Havasupai Reservation boundaries might be found packed in with homestead entries, grazing permits, or timber plans. Thus, it is very difficult to locate Forest Service archival records on Native Americans. The records now on file seem to have been saved by chance.

Years after the Navajo and Havasupai Indian Reservations were first established, in 1868 and 1882 respectively, some of the land between them was withdrawn from the Public Domain. The initial withdrawal was the 1893 Grand Canyon Forest Reserve, a twenty-nine thousand square mile block that included both the north and south rims of the Grand Canyon. In 1898, more land was set aside in the area around Flagstaff and Williams as the San Francisco Mountain Forest Reserve. In a series of name and boundary changes, the Tusayan National Forest was created in 1910. In 1934, Tusayan National Forest lands were combined with Forest Service land north of the Grand Canyon to form today's Kaibab National Forest.

The Tusayan National Forest (essentially the current south Kaibab) shared boundaries with the Navajo Reservation to the east and Havasupai Reservation to the west. Early Forest Service records reveal that Indians often "trespassed" onto adjacent National Forest lands, primarily to graze stock. National Forest boundaries were (perhaps carelessly) drawn by officials who did not recognize the existence of native traditional use areas. They were rarely and poorly fenced. Another factor in the "trespass" situation was increasing populations, primarily among the Navajo, who expanded to the west. Forest Service officials did not want to deal with continual encroachments on land they found undesirable, and recommended the transfer of certain Forest Service lands to the Navajo and Havasupai Reservations.

Only three old files (totalling some 2 inches thick) relating to these land transfers are on file at the forest. One file has information on a 1930 bill to transfer some 116,000 acres of land from the eastern boundary of the Tusayan Ranger District to the Navajo Reservation. Another file contains correspondence dating from 1913 to 1915 regarding a transfer of 152,000 acres to the Havasupai Reservation. This file also contains a map of the original 518 acre "Yava supai Reservation" (figure 2) and descriptions of the tribe and area. A third file is for a special use agricultural permit for Havasupais dating to 1916. Representative examples of file contents are found in Appendix A.

Historical information on Native American use of the forest can also be gleaned from other sources. General land office maps from the turn-of-the-century show locations of some "Indian Huts" and trails (figures 3 and 4). Ranger Clyde P. Moose relates anecdotes about Navajo pinon collectors and a Havasupai lookout in his memoirs (Moose 1990). Other, similar references, however, are rarely found.

With this background, the following sections present overviews of known information about how Native American cultures influenced the cultural history of the south Kaibab National Forest.

PLAT OF THE YAVA SUPAI INDIAN RESERVATION

Containing 518.06 Acres
Scale 1 inch = 40 chains

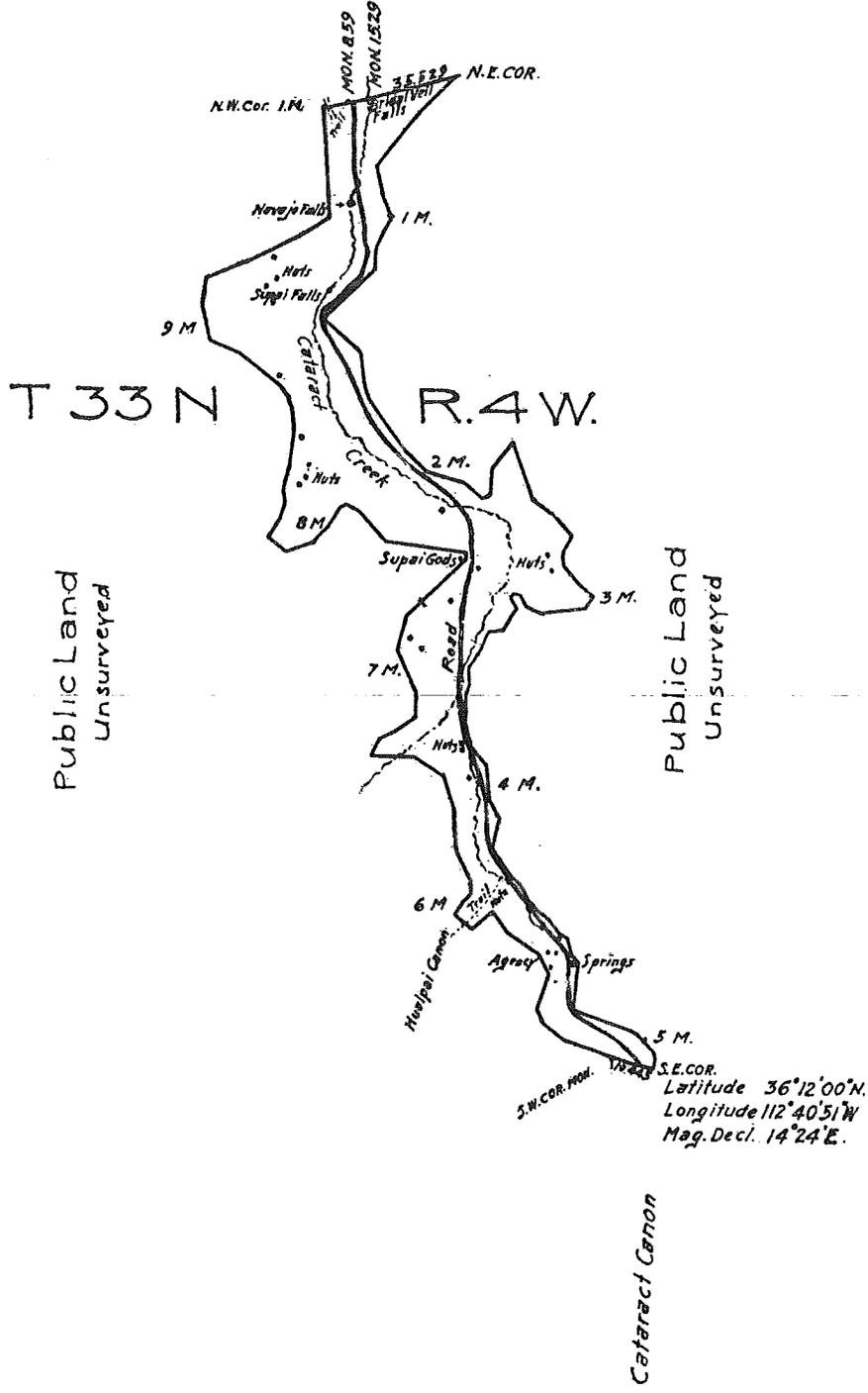
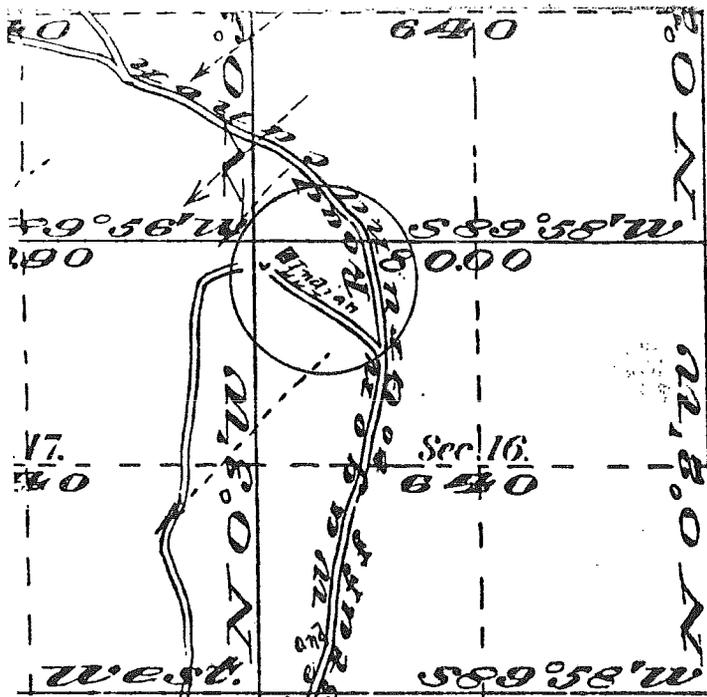
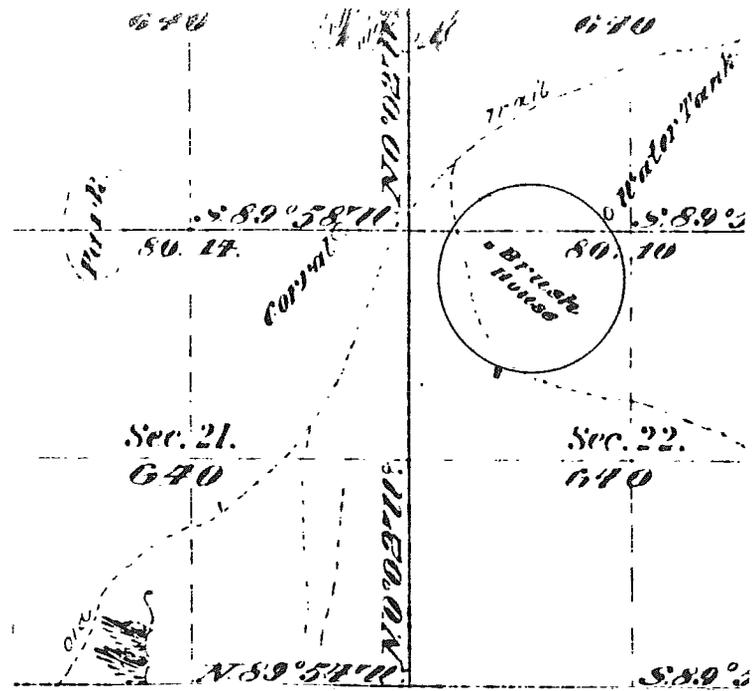


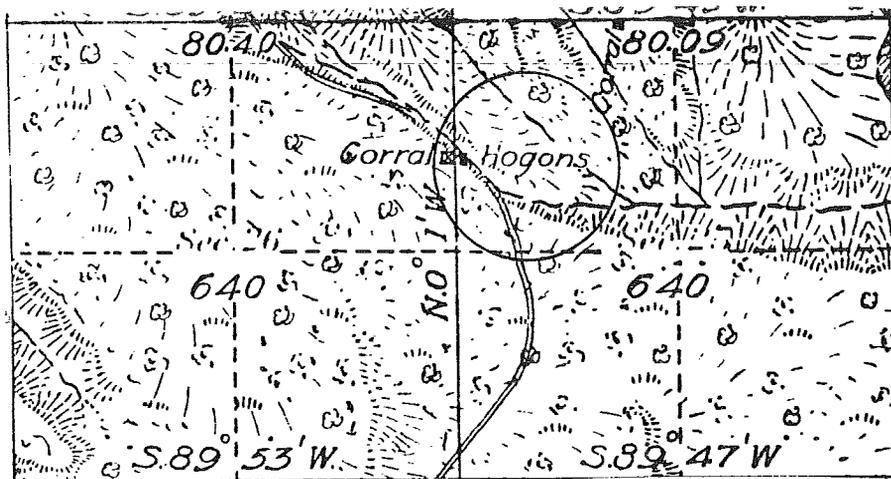
Figure 2. Circa 1915 survey map of the "Yava Supai" [Havasupai] Reservation. (From Kaibab National Forest Historical Files.)



"Indian Hut"
T28N R4E, 1900



"Brush House"
T29N R5E, 1900



"Hogons"
T29N R6E, 1916

Figure 3. General Land Office maps depicting native abodes.

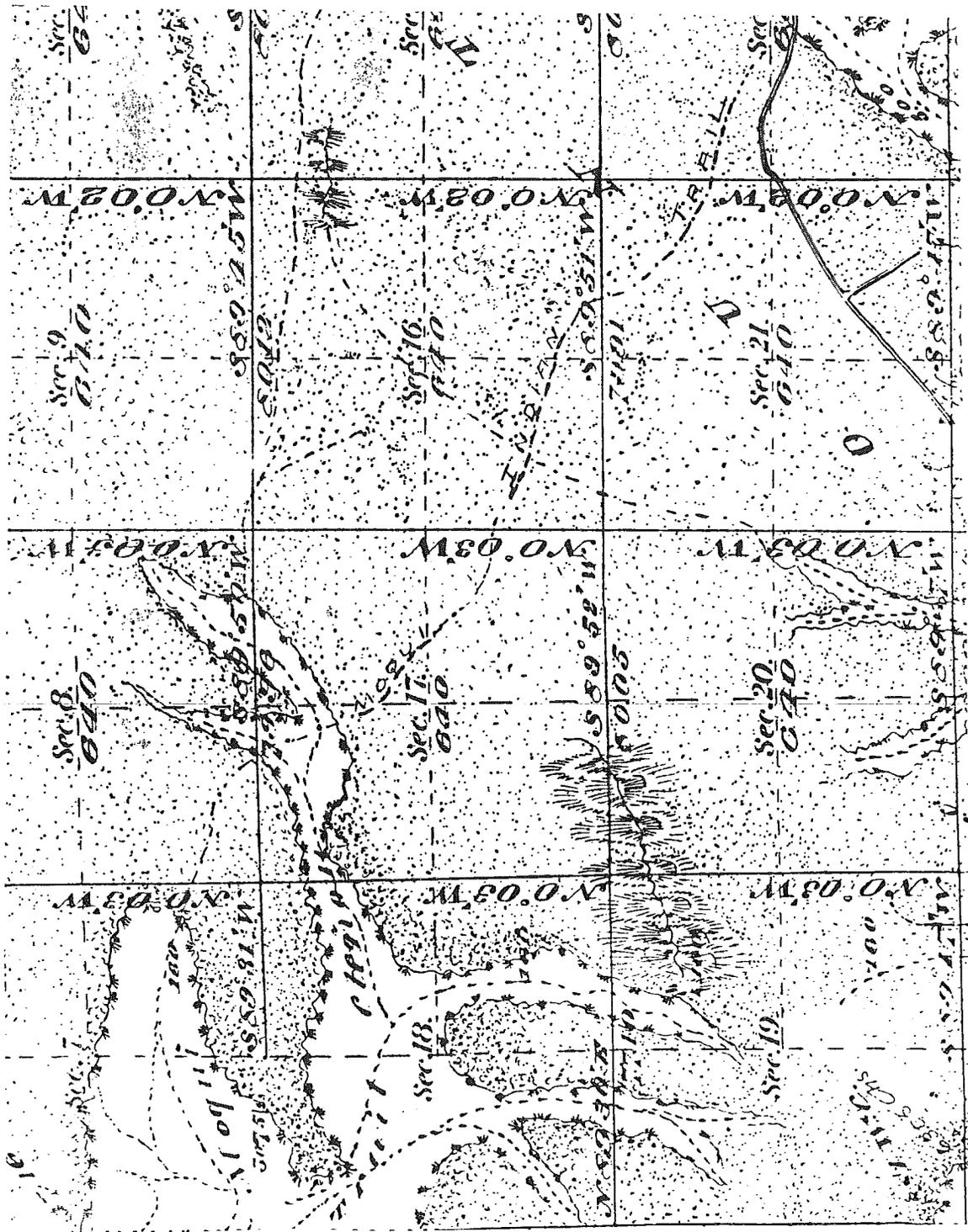


Figure 4. General Land Office map showing "Moqui Indian Trail" near Cataract Canyon, T31N R2W, 1900.

THE UPLAND YUMANS (NORTHERN PAI)

The natives encountered by the American expeditions as they passed across the Coconino Plateau were likely Yuman speaking, northern Pai groups (Mollhausen 1858:167, Whipple 1941:179, Beale 1858, Ives 1965:60,73, Euler 1974:8,9, Schroeder and Thomas 1974). The Yuman speaking tribes are classified into three broad cultural groups (Kroeber 1943, Kendall 1983:4). The Riverine Yumans occupied the Lower Colorado River Valley, where it forms the boundary between California and Arizona and also the Gila River east to what is today Phoenix. The California Yumans resided west of this area from the Lower Colorado to the West Coast, to what is now the San Diego area and northern Baja California. Northwest and central Arizona was home to the Upland Yuman tribes, also known as the northern Pai: the Hualapai, the Havasupai and the Yavapai. It is these peoples, especially the Havasupai and Yavapai that are the concern of this overview (figure 5).

There is a lack of consensus among anthropologists as to the prehistoric antecedents of these groups and various models have been presented. Schroeder's (1983) Hakataya were a distinct, indigenous, Yuman-speaking, prehistoric culture separate from their contemporaries such as the Hohokam, Anasazi and Great Basin peoples. From branches of the Hakataya, such as the Cerbat, Cohonina, and Southern Sinagua arose groups which we know as the Hualapai, Havasupai and Yavapai. Variations of this hypothesis are presented in Pilles (1981) and Schwartz (1959, 1983). An alternative explanation by Euler (1958), Euler and Green (1977) and Dobyns (1974) suggests a later (post-AD 1200) migration from the west with no direct genetic relationship between the northern Pai groups and prehistoric cultures such as the Cohonina and Southern Sinagua. Whiting (1958) postulates a mixing of migrating Pai groups with the remaining Cohonina creating what we call the Havasupai.

Historically, northern Pai practiced limited agriculture in favorable localities, but subsistence emphasis was primarily oriented towards hunting and gathering (Spier 1928, Gifford 1936, Kroeber 1943). As is typical of Great Basin hunting-gathering societies, a vast territory was needed to support a number of small mobile bands who roamed throughout the territory to exploit resources according to a seasonal round.

Northern Pai habitations were generally circular and dome shaped with thatch and dirt covered sides (Stewart 1983). Mobility necessitated that belongings be limited so they are not known for the manufacture of material goods except for utilitarian items such as basketry. Band chiefs were men who had natural leadership ability; they did not derive authority from the social system. Ceremonialism was likewise decentralized, shamanism being the prominent religious expression (Spier 1928, Kroeber 1935, Weber and Seaman 1985). Shamanism is highly individualistic, with powers often coming to individuals in dreams. Power, or at least knowledge, can be passed on, but is not given to or used by the entire tribe. Curing, and to a lesser extent, weather control were the main concerns of shamans (Spier 1928).

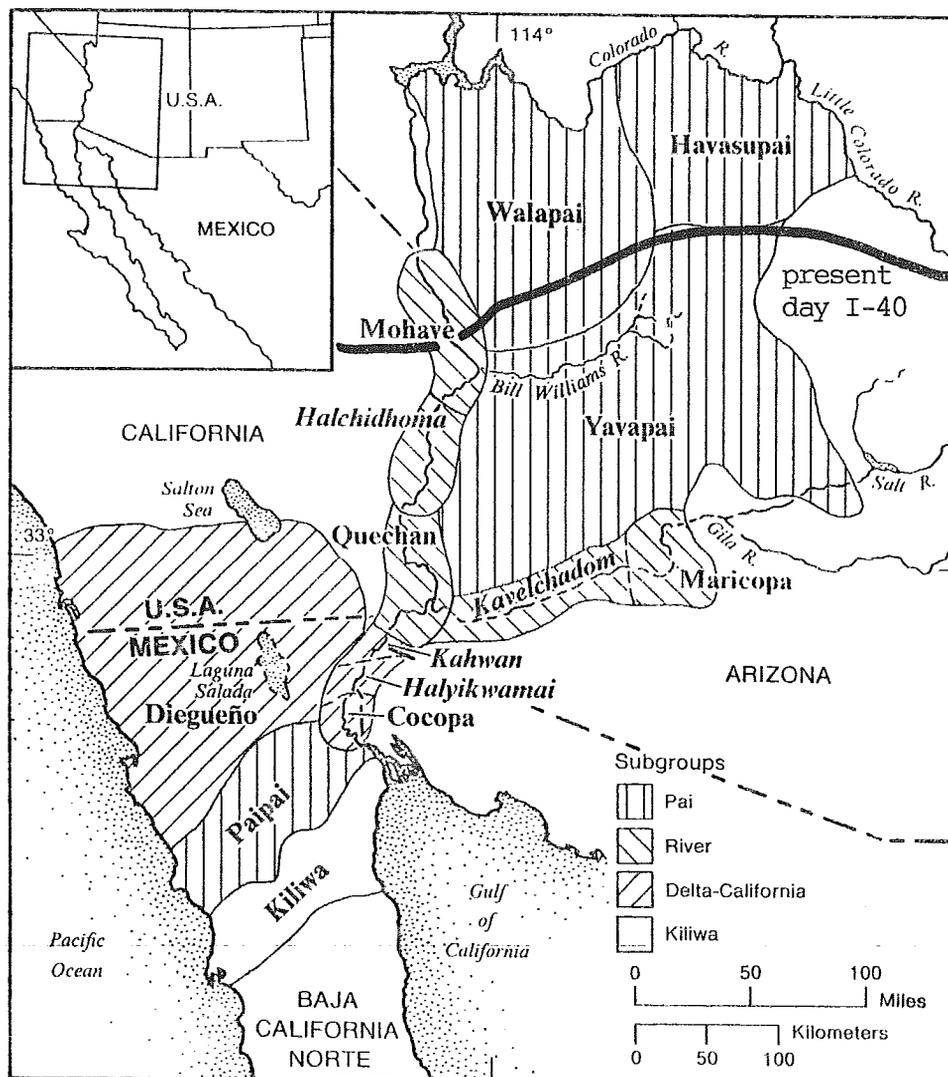


Figure 5 . Approximate distribution of Yuman languages at the time of European contact.
(from Kendall 1983)

The Havasupai and Hualapai are now politically separate groups with their own respective reservations but they are closely related and in the past considered themselves to be one people (Kroeber 1935, Weber and Seaman 1985:4, Schwartz 1983:14, Manners 1974:37, Stewart 1983:2). Language and culture are nearly identical between these groups (Dobyns and Euler 1960, Kendall 1983:5, Martin 1985). Intermarriage was frequent in the past, and this strengthened social bonds, as did alliances for raiding and defense (Spier 1928). The names of these groups are derived from the territory that each occupied. The Hualapai bands lived to the west of the Coconino Plateau. Much of this land is in the higher elevation ponderosa pine ecological zone, from which the translation of Hualapai: "the pine tree people" originates (Kroeber 1935, McGuire 1983). Whiting (Weber and Seaman 1985:3) challenges the popular translation of the name Havasupai with this interpretation:

The word *Havasupai* means "the people who live at the place that is green."

It is often translated as "the people of the blue-green waters," in direct and conscious parallel to Charles Cadman's "Land of the Sky-blue Water," a reference which is as euphonic and romantic as it is incorrect and unjustified.

Linguistic evidence and tribal legend indicate that the Yavapai are also related to the Havasupai and Hualapai. The Yavapai language has diverged from that of the Hualapai-Havasupai but it is still mutually intelligible, suggesting a relatively recent split but one that occurred prior to the Spanish arrival in the Southwest (Kendall 1983). Tribal oral histories (Spier 1928, Manners 1974, McGuire 1983) relate a feud that began in the not too distant past as a result of an argument that grew from a dispute among children. This dissension eventually led the Yavapais to move south. From this new home territory they frequently engaged in raiding their former relatives. The primary goal of these raids was to kill Hualapai or Havasupai and not for plunder, although women were sometimes taken as captives (Gifford 1936). The Havasupai response was usually limited to defense but they often joined larger Hualapai groups for raids on the Yavapai (Schwartz 1983). Father Garces recorded these hostilities in his journal in 1776 and other historic accounts are related in Spier (1928) and Illif (1954).

The boundary between these traditional enemies bisects the south Kaibab roughly in an east west line represented today by Interstate 40 (see figure 5). Among the Upland Yuman groups the Havasupai and Yavapai are most germane to this overview because their traditional use areas more closely coincide with the south Kaibab. A more in-depth discussion of these two groups follows.

HAVASUPAI

From AD 1300 and perhaps earlier, to the late 1850s, the Havasupai utilized resources throughout the Coconino Plateau, except for the extreme south, which was used by their traditional enemies, the Yavapai (Spier 1928, Martin 1985, Weber and Seaman 1985). On the west the Havasupai were bordered by their ethnic relatives, the Hualapai. To the east they traditionally ranged as far as the Little Colorado River and south to the Flagstaff and Ash Fork areas (Euler 1979:14). Land north of the Grand Canyon was occupied by the Southern Paiute and apparently was off limits to the Havasupai (Spier 1928, Weber and Seaman 1985, Kelly 1934, 1964). Figure 6 depicts this former Havasupai territory.

Spier (1928) represented the Havasupai primarily as agriculturalists who farmed in their canyon homes but left in the winter months to hunt and forage on the Plateau. Whiting (Weber and Seaman 1985) presents a somewhat different view of Havasupai subsistence. The Havasupai that Whiting interviewed utilized three distinct types of land during their seasonal rounds. The village in Cataract Canyon and other smaller farming plots were used by some families but not by all Havasupai. The Esplanade, a wide shelf within the Grand Canyon, was exploited seasonally for collecting plant foods, especially agave. However, according to Whiting, the real home of the Havasupai was on the Plateau, particularly on the South Rim, where game, wild plant food and firewood were abundant. Martin (1985) suggests that the "truth" may lie more towards Whiting's position. He speculates that historically the Havasupai relied on hunting and gathering for up to 60 or 70 percent of their total subsistence. Further, he claims that farming might be abandoned totally if seasonal conditions indicated a poor harvest.

Extended family groups are the primary social unit in Havasupai society. There was much variation in group movements but each family had a particular route that they followed from season to season. In this way, different groups were able to find each other when necessary (Weber and Seaman 1985). Given the decentralized nature of Havasupai society, it is understandable that ethnographic data may vary according to which bands or families are studied.

While these groups were spread out during much of the year, they were not necessarily isolated. The Havasupai were an active link in a trading system which included tribes living both to the east and west. A trade route ran from the Pacific coast to the Rio Grande. Although it generally followed the course of the present day Santa Fe railroad, on the south Kaibab the route passed to the north, closer to the water resources (Colton 1941:308).

The Havasupai exchanged goods with the Navajo, Hopi, and Zuni to the east and the Hualapai and Mojave to the west (Ford 1983). Trade with their immediate neighbors, the Hualapai and the Hopi developed into deeper relationships. The Hualapai and Havasupai thought of themselves as one people and frequently intermarried. Among the trade items exported by the Havasupai were tanned buckskins, figs, agave, and red pigments that were obtained in the Grand Canyon (Spier 1928:196, Wray 1990:21).

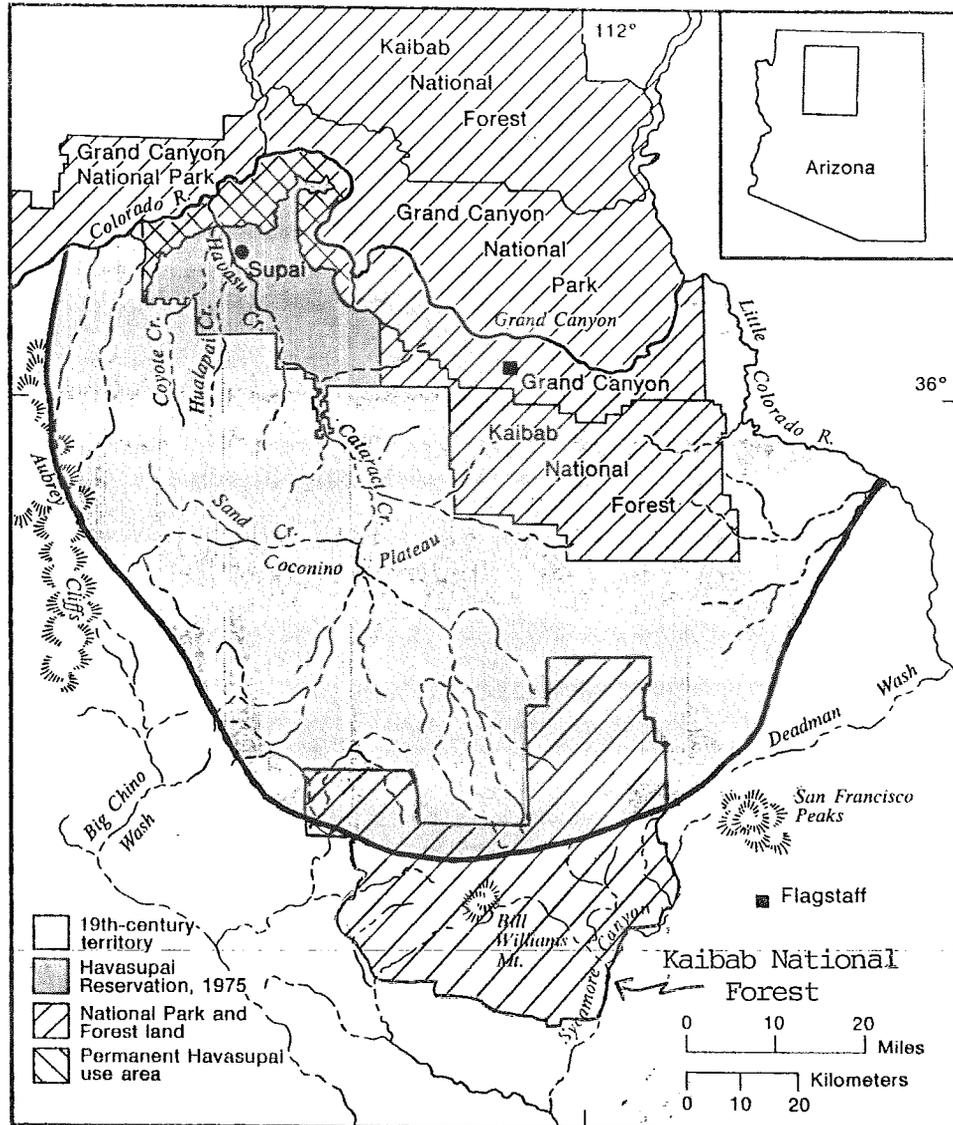


Figure 6. Havasupai tribal territory in the 19th century. (from Schwartz 1983)

This red ochre was an important commodity to the Hopi as it was used to make red paint for ceremonial use. Transfer of this and other trade items was frequent between the Hopi and Havasupai. The necessary long distance travel was facilitated by trails which existed all over the Coconino Plateau. The majority of these trails joined the semi-permanent seasonal camps of the Havasupai but a few were linked to the major travelways (see figure 1). Marriages between Havasupai and Hopi were rare, but some families from both tribes grew quite close. Some families and individuals often lived with their hosts for extended periods. When the Hopi experienced a severe drought in 1780 it was reported that hundreds sought refuge with the Havasupai, where they were graciously accepted (Spicer 1962).

Among Whiting's unpublished notes (n.d.) are references to trails, routes and camps that relate directly to known places on the south Kaibab. A number of trails descend into Cataract Canyon from the east and west. On the Plateau these trails were usually directed towards water sources and often ran through canyons for easier traveling. Little Rain Tank is mentioned as one of these water sources. Rain Tank, now a part of Grand Canyon Airport, is mentioned frequently as a natural perennial water source which had been used by generations of Havasupai (and probably Hopi) both for subsistence camps and as a watering stop for long distance travel not only in Whiting's notes but also by Wray (1990), and Manners (1974:105). Wray also relates Havasupai camps at the location of the present day Moqui Lodge, "the pinon harvesting area near Hull Tank", at Cecil Dodd Tank, Homestead Tank, and of cave sites along Coconino Wash. Whiting mapped trails extending east of Rain Tank that ran to the north and south of Red Butte, through Red Horse Wash, where Bucklar, Russell and Red Horse Tanks are listed as camps. These water holes have since been enlarged with heavy equipment for livestock use. Little Rain and Rain Tanks had already been disturbed when these water sources were mentioned to Whiting. Eventually this route led to Gray Mountain, dropped to the Little Colorado and climbed to the Hopi Mesas.

Another route east from Rain Tank passes through Long Jim Canyon near present day Tusayan, where a mythical old woman was said to live in one of the caves along the limestone walls. Smoke-blackened overhangs suggest that these same caves also provided shelter for travelers. Long Jim Canyon led to the South Rim where travel proceeded past Grapevine Hill, Grandview Point, and down the Coconino Rim into the Upper Basin. The Upper Basin was used as a wintering area for the Havasupai when the snow was too deep on the Rim. Deer Tank was mentioned as a water source utilized by the Havasupai in the Upper Basin. For travel further east it was possible to take a detour to the salt source near the Colorado-Little Colorado confluence or to take the more direct route east to Hopi.

Although the water tanks referred to by Whiting may have been natural water holes, historic references infer that at least some of these tanks may have been constructed by native peoples. While traveling from Ash Fork to the Grand Canyon, James (1900) reports that "Twelve miles out [from Ash Fork] Indian tanks are reached, where the Havasupai Indians long years ago built a rude dam

to catch rainwater, that they might not be waterless when out hunting...". The historic reservoir associated with Hull Cabin on the South Rim was originally constructed long before Anglo use of the area (Cleeland 1987). Johnson and Hewitt (1977) describe a "small retention tank" in the Pasture Wash vicinity which consisted of a rock alignment before a pool in the bedrock. Although they are rarely found, aboriginal well excavations have been documented in the region (Colton, 1952:19-20). In an area so devoid of springs or other natural water sources it is likely that this form of water control was used by the Havasupai to enable them to survive in a seemingly waterless land.

The remoteness of the Havasupai territory resulted in only slight acculturation until the late nineteenth century (Schwartz 1983). The Hualapai bands were not as fortunate. Cattlemen took control of their water holes at gunpoint, an intolerable act to the Hualapai (Spicer 1962). The murder of an important Hualapai leader precipitated violent resistance, known as the Hualapai-Anglo-American War of 1866-1869. The Havasupai bands were not directly involved in this altercation because of their isolated location. This enabled them to escape the eventual fate of the Hualapai-deportation to a reservation at La Paz, on the Lower Colorado River. The Hualapai endured the heat and disease of the La Paz reservation for only one year before escaping and returning to their aboriginal land (Dobyns and Euler 1960). By this time, the Hualapai and Havasupai were regarded as two separate tribes by the Federal Government. Following the designation of a Havasupai Reservation in 1882 (see below), the Hualapai were given their own reservation on a small portion of their former lands (figure 7) in 1883. The formation of these two distinct reservations by the Federal Government officially separated the Hualapai from the Havasupai and ensured that their traditional lifeways would be forever changed (Martin 1986).

The Havasupai could not prevent the same kinds of Anglo encroachment that aroused the Hualapai. However, instead of defiance they yielded and gradually lost most of their traditional lands. When Anglo cattlemen moved into the area in the 1860s and 1870s they appropriated water holes and fenced off large portions of the plateau, driving the Havasupai from the greater part of their range (Martin 1986). This intrusion intensified with the construction of a railroad through the area in 1881-1882, which opened the region to a growing Anglo population and an expansion of the ranching industry. In addition, the Navajo began occupying portions of the eastern Coconino Plateau as they were in turn displaced by Anglo settlers (Weber and Seaman 1985). Even Havasu Canyon itself proved not to be safe from invasion when Anglo miners discovered silver and lead deposits downstream from the village in 1863 (Spicer 1962). In 1881, the army began a survey to establish a reservation for the Havasupai. When the survey was complete and modified in 1882, the Havasupai were restricted to 518 acres within Havasu Canyon. This parcel was limited to the area surrounding the irrigable farm plots and did not include the mines (Euler 1979).

By 1900, much of the traditional use land of the Havasupai was under the jurisdiction of the Federal Government. The Havasupai had lost almost all of their aboriginal hunting and gathering subsistence base and to survive they intensified their agricultural efforts (Martin 1986). Indian Service (later to become Bureau of Indian Affairs) agents encouraged farming by introducing new

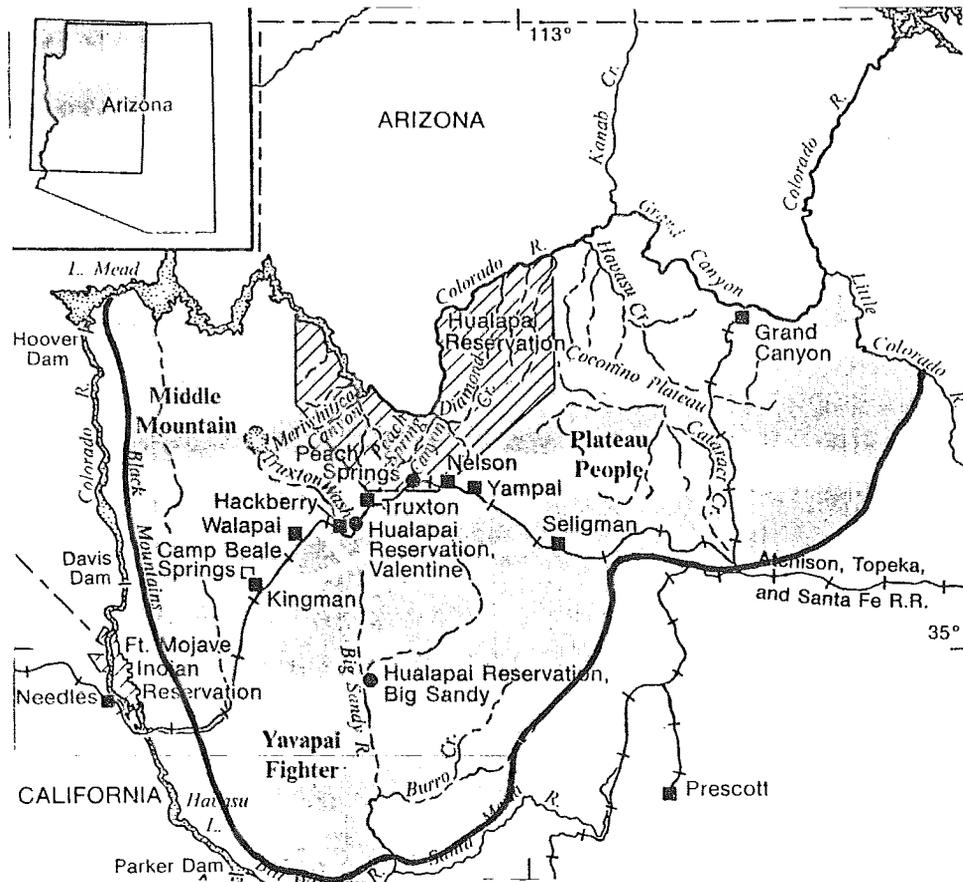


Figure 7 . Hualapai Reservation and 19th century tribal territory. (from McGuire 1983)

crops, new tools and facilitating the issuance of special use permits for cultivation on the National Forest (Kaibab National Forest Historical Files, Kaibab National Forest, see Appendix A).

Wage labor was another important replacement for hunting and gathering. As early as the time of the first mines in Havasu Canyon, Havasupai were hired by the miners. When the federal government instituted programs on the reservation, additional jobs were created until wage labor eventually outgrew agriculture as a primary source of income. Federal wages helped some Havasupai to acquire cattle which they grazed by permit on Forest Service land on the plateau. Wray's (1990) thesis describes the period of Havasupai acculturation at the South Rim of Grand Canyon through oral interviews and examination of Park Service documents.

The Indian Reorganization Act of 1934 led to increased government funding and involvement with the reservation. It became necessary for the Havasupai to create a tribal government which could represent the interests of the entire tribe. A Tribal Council was formed in 1939 but it remained largely ineffectual as a governing body until the late 1960s. The 1960s began a new era for the Havasupai as tourism rapidly grew as a major income source. The increase in tourism and a change in federal fiscal policies strengthened the power of the Tribal Council by providing it with more funding and control over tribal government expenditures. A campaign was begun to expand the reservation to include former use land on the plateau. Anthropologists supplied evidence pertaining to traditional use claims (Dobyns and Euler 1960, Manners 1974). Lawyers and lobbyists were retained and in 1975 Congress expanded the reservation to its present size of approximately 185,000 acres. This addition was mainly plateau land which had been under the jurisdiction of the Kaibab National Forest. An additional 93,200 acres of Grand Canyon National Park was designated as Traditional Use Land (figure 6). Havasupai may use this land for grazing livestock, hunting, gathering, and other "legitimate traditional purposes" except those that are inconsistent with Park values (Wray 1990:99). Hirst (1976) provides an excellent background of Havasupai history including this struggle to regain aboriginal lands.

Havasupai Archeological Sites on the South Kaibab National Forest

Havasupai use of what is now the south Kaibab National Forest is well documented (Spier 1928, Weber and Seaman 1985, Hirst 1976, Manners 1974, Wray 1990). All three southern Ranger Districts were used by the Havasupai in their annual rounds. Whiting's notes (n.d.) contain a detailed list of Havasupai names of geographical features such as mountains and cinder cones. Many of these locations are landmarks on the Chalender Range District north of and including Sitgreaves Mountain. As previously mentioned, the Tusayan Ranger District is within the heartland of traditionally used land, as is to a lesser extent, the portion of the Williams Ranger District north of Ash Fork. Kaibab National Forest cultural resource surveys have documented and confirmed the existence of Pai occupation in these areas. However, Pai sites on the plateau are difficult to identify. By nature these sites are ephemeral, reflecting the mobile nature of Pai subsistence.

There are, however, some diagnostic artifacts which may be used for recognizing Havasupai occupation especially when found in combination. "Pai-projectile points" are described as "small, triangular, pressure flaked, of chert or obsidian, usually with a deep concave base, single or double side notched, although occasionally not notched" (Euler 1958:147). Although this type of point (see figure 8) is often associated with the Havasupai and Hualapai, it is also commonly found on Yavapai sites (Pilles 1981). In fact, this style point is known throughout the west as Desert side-notched and may be more useful as a temporal (late prehistoric-*proto* historic) than a cultural marker (Baumhoff and Byrne 1959). Used in conjunction with other artifacts, or in areas known to be historic tribal homelands, these "Pai-points" may still have value as diagnostics. Lithic material is generally varied on Pai sites and obsidians from the Mt. Floyd area (Lesko 1989) in particular, are commonly observed on Havasupai sites. This may also be indicative of the wide ranging mobile lifestyle of the Pai.

Tizon Brown Ware ceramics were made by the Havasupai but not exclusively. The other northern Pai groups, the Hualapai and Yavapai, having essentially the same material culture, produced the same pottery (Pilles 1981) with perhaps some minor variations (Euler 1958, Dobyms 1974). Once again, if the historic territories of these groups are known, one can assume the cultural affiliation of a site based on the geographical location. However, this approach must be used with caution. According to Manners (1974), the land around and between the present towns of Ash Fork and Seligman were used by all three northern Pai groups, The Hualapai, Havasupai, and Yavapai.

Spier (1928) reports that the Havasupai replaced ceramics with metal products about 1870. Therefore, it may be reasonable to assume that sites with Tizon Brown Ware in the historic range of the Havasupai are Havasupai sites, or at least have a Pai component, used before the 1870s. As mentioned, this began the era of Anglo encroachment on the plateau. Havasupai use still continued but with decreasing importance, into the 1940s (Martin 1966). Identification of these later Havasupai sites may be more difficult because a lack of diagnostics may make these sites indistinguishable from Navajo or Anglo camps.

In a 1977 sample survey of the newly re-acquired reservation land, Johnson and Hewitt describe the numerous Havasupai historic sites found in the Pasture Wash area of the plateau. Among the features described are "tee-pee" hogans, corrals, sweat lodges, sweat lodge middens, trash piles and hearths. Artifacts observed included large containers with improvised wire handles, food tins and tobacco tins. These features and artifacts may sound familiar to those used to recording Navajo "pinon camps". Euler (personal communication) suggests that in the absence of diagnostics, geographical location may be the best way of determining cultural affiliation for this type of site. Although the Havasupai ranged throughout the entire plateau, the west side of the Tusayan Ranger District and the west side of the Williams Ranger District north of Ash Fork likely contain the most historic Havasupai sites.

Kroeber (1935) reports that Pai sweat lodges are constructed by inserting branches in the ground, then bending and tying them at the top. They are

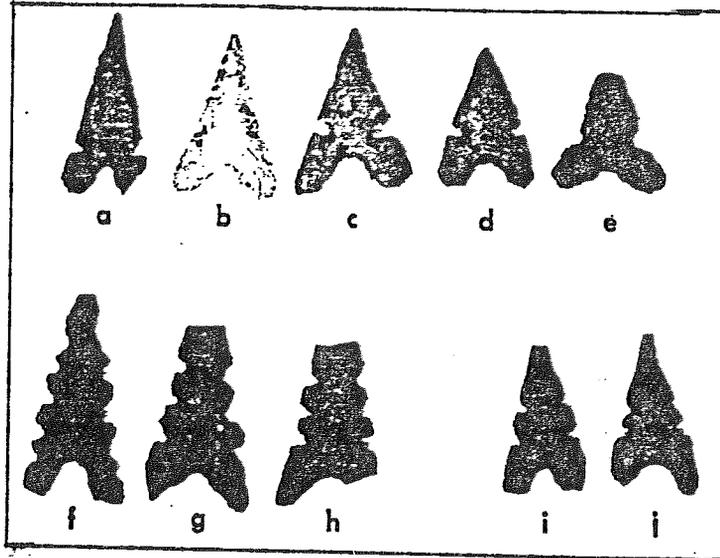


Figure 8. Pai style points. Points a, e and f are from Olla Negra Caves; b, d, h and j are from AR-03-04-05-322; c is from AR-03-09-03-151; g is from AR-03-04-06-299; and i is from AR-03-04-01-201. Length of a is 2.4 cms.
(From Pilles 1981:173)

rarely covered with earth but there may be local variations for Havasupai sweat lodges. Spier (1928) indicates that there may be features that differentiate Navajo from Havasupai sweat lodges. According to Spier, Navajo sweat lodges are usually sub-conically shaped, piles of stone "are always on the north side, the lodge usually facing west" (1928:344). Havasupai sweat lodges differ by being "typically" dome shaped with the stone pile to the immediate left of the door (when entering) and with entrances facing in any direction. These diagnostic features were considered by Johnson and Hewitt (1977:58) when recording two sweat lodges in the Pasture Wash area which had "rocks placed to the left of the door as one enters". It may be helpful to consider these features when recording sites with sweat lodges especially in areas used by both Navajo and Havasupai such as the Tusayan Ranger District, south of Grand Canyon National Park.

Generally, Cohonina and Havasuapi habitation sites on the plateau are found in similar environments, often on pinon-juniper covered ridges with benches or slight slopes (Johnson and Hewitt 1977). Prehistoric sites with Havasupai components are to be expected due to the preference of certain locations, such as ridges and rock shelters. Tizon Brown Ware sherds are sometimes observed on Cohonina sites in the Tusayan area. This may indicate either a Havasuapi component or pre-AD 1150 tradeware from western Cerbat peoples to the Cohonina (Westfall 1986). While denying a Cohonina-Havasupai continuum, Euler and Green (1978) confirm that both groups probably adapted similar settlement and subsistence patterns at least in the Tusayan and South Rim areas. Mixed artifact assemblages are generally common at protohistoric sites (Pilles 1981, Stewart 1942, Fowler and Matley 1979, Kelly 1964, Fowler and Fowler 1981:141, 145) and common specifically on protohistoric sites recorded on the Kaibab National Forest (Kaibab National Forest Survey Files).

Rock art, especially pictographs, are noted in rock shelters in Havasu Canyon (Euler and Green 1978), the South Rim (Brook 1974), and the Tusayan Ranger District (Kaibab National Forest Survey Files). Some historic inscriptions, including personal names are identifiable but beyond this no stylistic or other analyses have been conducted which would enable distinction between Havasupai and earlier rock art (Euler and Green 1978). Spier (1928:288) was told that pictographs were made by ancient mythical beings and that Havasupai did not draw them.

Havasupai Sacred Areas

Although there is much ethnographic documentation of Havasupai use of the plateau (Spier 1928, Weber and Seaman 1985, Euler 1974), very little information has been presented concerning Havasupai religious sites or sacred areas that may exist on the plateau. According to Whiting (Seaman and Weber 1985), religious practices of the Havasupai conformed to the pattern of other Yuman speaking tribes such as the Mojave and Yumas. This religious expression is referred to by Whiting as the shamanistic complex. The shamanistic complex is characterized by three components: dream power, song power, and witchcraft. These components are highly individualistic, often coming to individuals in dreams. Powers, or at least knowledge, can be passed on, but

are not given to or used by the entire tribe. Curing, and to a lesser extent, weather control, were the main concerns of shamans. Powers were usually specific and varied with individuals. Other researchers confirm that shamanism was the dominant Havasupai religious expression (Spier 1928, Hirst 1976, Dobyns and Euler 1971).

Perhaps because of the individualistic nature of Havasupai religion, there is little consensus among tribal members regarding the nature and locations of sacred sites. Specific Havasupai sacred areas are not generally identified in the existing literature. An exception is Smithson and Euler who report that "Virtually every spring known to the Havasupai contained spirits, offerings . . . were made to these water sources . . ." (1964: 2).

Religious beliefs can often be difficult to express to persons of other cultures, assuming that it is even desirable to do so. Shamanistic beliefs, concerned with personal powers, may be secrets even within the tribe. For this reason, it is also likely that anthropologists have not learned of areas that have religious significance to some or all Havasupai. This has been strongly suggested in the recent past during legal proceedings regarding the proposed Canyon uranium mine located just northwest of Red Butte.

YAVAPAI

The Yavapai Indians once ranged across a vast territory from southwest Arizona into the central Arizona mountains, and northward to the San Francisco Peaks near Flagstaff (see figure 9). These hunters and gatherers seasonally exploited a wide diversity of environments to ensure an adequate food supply. The Yavapai nomadic tradition necessitated a rather loose social organization. The band leader was often an elder whose responsibilities included settling disputes, accepting new members, choosing band movements and selecting camps. Younger men normally headed hunting and war parties. Group decisions were made by a council of elder band members. In marriage, a man would join the band of his wife (Gifford 1936:291-297).

Historically, the Yavapai divided themselves into three autonomous groups known as the Northeastern, Southeastern and Western Yavapais, each recognizing their own territories. However, as Anglos rapidly encroached westwards in the 1870s, they forced the Yavapai onto reservations. This movement from a hunting and gathering lifestyle to a sedentary existence destroyed the traditional Yavapai subsistence pattern. The Northeastern Yavapai, who probably once utilized the southern half of the south Kaibab, now have descendants living on or near the present day Clarkdale and Prescott reservations. The south Kaibab encompasses the northeastern portion of the traditional hunting and gathering range of the Northeastern Yavapai.

Historic Accounts of the Yavapai on the South Kaibab National Forest

Geographically, Yavapais on the south Kaibab exploited an area that extended from the western slopes of the San Francisco Peaks, west to Ash Fork and then south across the southern half of the forest. The Northeastern Yavapai's neighbors included the Havasupai to the north, the Hualapai to the west and the Apache to the east (see figure 9).

Espejo depicted the Yavapai as "wanderers" or "mountain people" when he encountered them near the Verde Valley in 1583 (Spicer 1962:265). Spanish expeditions into the southwest continually identified many Native American groups, including both the Yavapai and Apache, according to these vague labels (Schroeder 1974:64). After 1690, maps and records labeled the two tribes as "Mohave-Apache", and this confusion perpetuated itself during the reservation period when the Government combined the tribes on the San Carlos Apache Reservation.

After Spanish explorations of the Southwest ceased, non-Indian ethnic groups avoided the south Kaibab until the 1840s. Reports of gold discoveries near the south Kaibab in the 1840s prompted Anglo explorers to visit the Bill Williams Mountain area and there they found a stronghold of Northeastern Yavapais (Schroeder 1974:119). At their Camp 21, the Sitgreaves railroad surveying expedition encountered Yavapai on the southwest side of Bill Williams Mountain in 1853 (Schroeder 1974:107). Just to the east, on the west slopes of the San Francisco Peaks, one of Sitgreaves' guides provided one of the few early Anglo

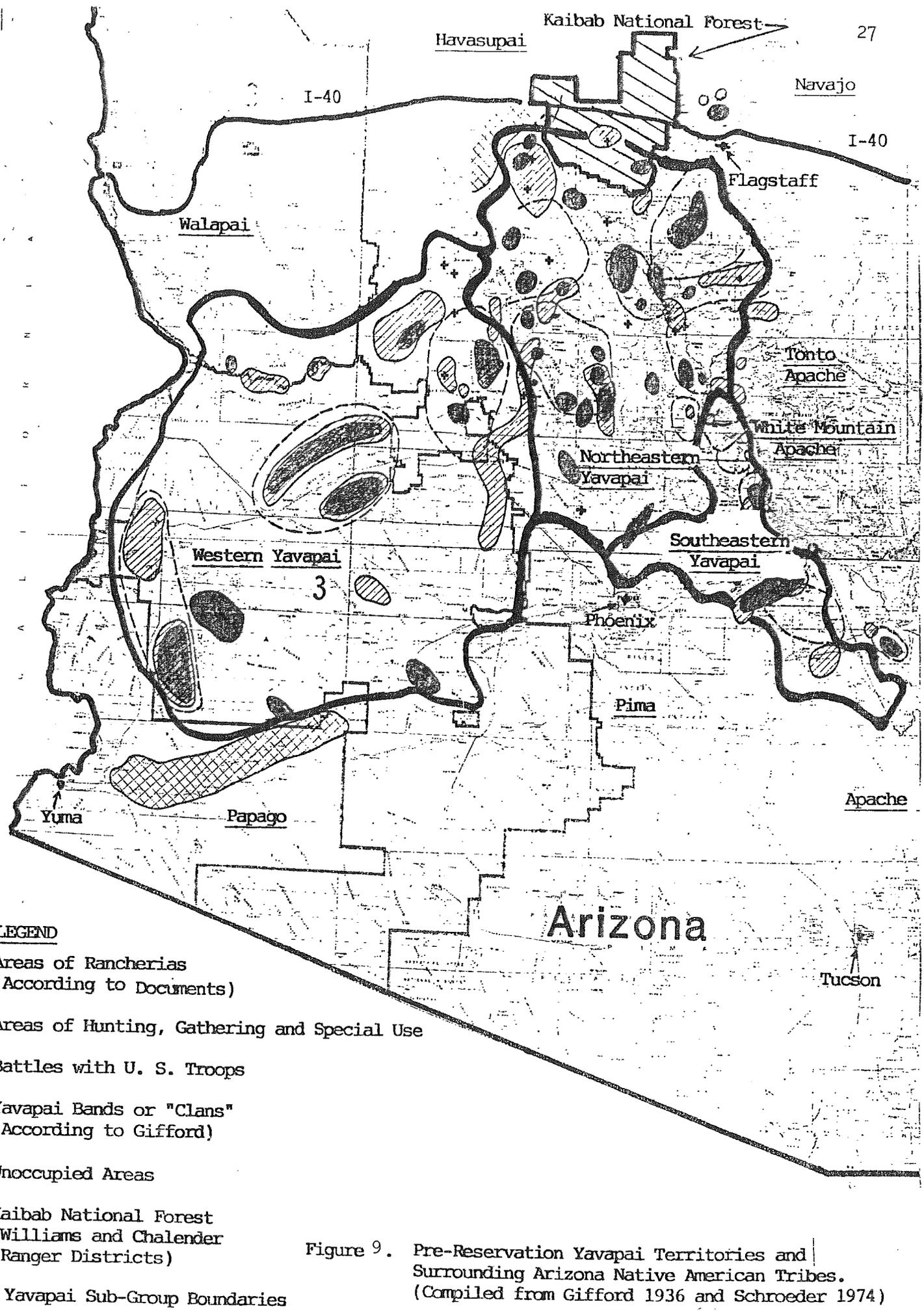


Figure 9. Pre-Reservation Yavapai Territories and Surrounding Arizona Native American Tribes. (Compiled from Gifford 1936 and Schroeder 1974)

descriptions of a group of Yavapai: "The women and children were gathering pinyons and grass seeds. They had baskets of close weave that held water, a wicker jar coated with pine gum, mesquite bread, a cake of mescal, and pieces of kaolin in their lodges" (Schroeder 1974:107).

The traditional Yavapai nomadic subsistence pattern remained intact until the 1870s, when Anglo-American settlers encroached on their homelands and forced them onto military reservations. On December 21, 1871, Gen. George Crook ordered that all "roving Apache" (also referring to Yavapais) were to be on the Rio Verde Reservation in the middle Verde Valley by February 15, 1872, or be treated as hostile (Schroeder 1974:93). Within a few short years, hundreds of Yavapais had been killed or captured (see Schroeder 1974: Appendix II). By 1873 most Yavapais were confined to the Rio Verde Reservation, despite epidemics and other adverse conditions. Remarkably, they successfully grew crops and became self-sufficient (Corbusier 1969:17). However, Anglo suppliers fearful of the increasing Yavapai independence, forced them to relocate to San Carlos, an Apache Reservation 180 miles to the southeast (Corbusier 1969:260).

By the 1880s, Indian agents allowed Yavapais to return to their homelands. Many Northeastern and Western Yavapai settled either near Camp Verde in the Verde Valley or by Fort Whipple near Prescott. Southeastern Yavapais settled at the 25,000 acre Fort McDowell Reservation (est. 1903). In 1910, the Federal Government set aside a 40 acre reservation for those at Camp Verde, however, only 18 acres proved suitable for agriculture forcing most Yavapais to work for wages in the copper mines near Clarkdale. In 1916, many Camp Verde Yavapais relocated to a newly established, fertile, 448 acre reservation at Middle Verde. By 1935, 75 acres were established for the Yavapais living near Fort Whipple, and in 1956, 1320 acres were added to this reservation. In 1969 the Federal Government set aside a 60 acres reservation at Clarkdale for Yavapais who had been living there while working in the mines (Khera 1983:43). The establishment of these reservations reduced the Yavapai's traditional territory from nearly 10 million acres, to presently, only 27,000 acres. This significant dislocation led to the gradual disappearance of many of the practices, particularly in settlement and subsistence, that had long been primary components of Yavapai culture and social organization (Schroeder 1974:33).

Yavapai Land Use on the South Kaibab

The Yavapai probably used the south Kaibab for seasonal hunting and gathering activities. The red rock country near present day Sedona and the mountains and broad valleys near Prescott provided additional resources. According to Schroeder (1974:28):

The Yavapai manner of living in historic times up into the late 1800s was mainly one of seasonal movements. They moved from one gathering or hunting area to another as the various wild food products, upon which they depended, ripened. They made use of caves for shelters or erected dome-shaped houses

of poles, brush, and mud. Corn occasionally was planted by some groups in small quantities along streams where moist bottomlands were available, but not in sufficient amounts to be considered a staple food.

While the primary focus of Yavapai use of the south Kaibab was likely the southern portions of the Williams and Chalender Ranger Districts, they likely passed through the central and northern portions of the south Kaibab, making short encampments during their war paths against the Havasupais and Hualapais. The land around what is today Interstate-40 once delineated a strict land use boundary between Yavapais and Havasupais. Known as a no-mans land, this territory could be passed along, but not crossed over. According to Gifford (1936: 303-305), war parties usually only camped in one locale overnight.

Often traveling outside of their hunting and gathering territory to battle enemies, the Yavapais also traveled across the region for trading purposes. They are known to have exchanged mountain lion skins, buckskins, and mescal for woven blankets, shell beads, and turquoise with the Navajo. This, however, is Gifford's only mention of trade (1936: 253). Hopi trade wares found on protohistoric and historic Yavapai sites suggests some degree of interaction between these two groups. In fact, Yavapai legends and the Hopi oral traditions suggest close cultural ties in the past.

While Gifford's 1936 Yavapai ethnography contains one of the few specific references documenting Yavapai localities in the overview area, Schroeder's account (1974: 250) contains maps showing specific Yavapai battles with Army troops in the southern portion of the south Kaibab. Because the Yavapai resisted being placed on reservations, many of them ran away from military troops. Between the 1870s and 1880s, the Army hunted and massacred renegade Yavapai. In fact, Schroeder lists Army "encounters" with various Yavapai groups (1974: 277-287). One battle site is located on the southern slopes of Bill Williams Mountain. Battles often ended with more Yavapais killed than wounded or captured, so it seems the Yavapai had two choices, surrender or be killed. Eventually, the establishment of reservations in south central and central Arizona ended the Yavapai use of the south Kaibab.

Yavapai Archaeological Sites on the South Kaibab

As a result of their transitory lifestyle and a material culture that Schroeder describes as a "lean assortment" (1974: 28) there is a poorly understood and documented archaeological record for the Yavapai. On the south Kaibab it appears that Yavapais often camped on or very near sites previously occupied by the prehistoric Cohoninas, and used milling stones left on these sites. In fact, the Yavapai have a name for their predecessors, the "Ichikiyuka" (Gifford 1936:252). These previous occupants may have been one of several prehistoric cultures, including the Southern Sinagua, Cohonina and Prescott.

The south Kaibab offers a unique opportunity to study sites that may well be a link between prehistoric and protohistoric or historic times. There remain unanswered questions concerning Yavapai origins. Some believe they came into

the area during migration of Yuman speaking groups from California into Arizona after AD 1300 (Euler 1981, see Upland Yumans section). This argument assumes the prehistoric Cohonina had abandoned the area prior to the arrival of the Yavapai. Others have argued the Yavapai are likely descendants of indigenous Verde Valley prehistoric culture groups such as the Southern Sinagua based on similarities in ceramics (Pilles 1981), although at this time there have been no sites that exhibit a clear stratigraphic relationship between a prehistoric component and a Yavapai component. However, if the Cohonina did in fact abandon use of the south Kaibab by AD 1150, Yavapai sites on the forest may reveal stratigraphic breaks between their occupation and those of the protohistoric and historic Yavapai.

As a result of scant remains left by Yavapais, it is difficult for a cultural resources surveyor to distinguish between Yavapai and prehistoric sites based only on surface remains. In particular, Cohonina and Yavapai camps exhibit many common occurrences including flaked stone scatters and roasting pit features. Ephemeral Yavapai structures probably consisted of stone circles supporting a brush shelter (See photos in Keller and Stein 1985) which are also characteristic of some Cohonina sites. The Yavapai greatly depended on agave and if piles of fire cracked rock or formal roasting pits are encountered a possible Yavapai affiliation may be inferred. Because there are few ways of distinguishing between Hualapai, Havasupai and Yavapai sites, an investigator must first determine whether they are located in a traditional Yavapai hunting and gathering area (figure 9). If such is the case, they must be able to identify the generally scarce remains of diagnostic Pai ceramics and projectile points.

Diagnostic early Pai ceramics found on the south Kaibab are predominantly Tizon Brown Wares. Two primary types, Cerbat Brown and Aquarius Brown, have been described by Euler and Dobyns (1958). They differ from each other only in temper size and quantity, the latter having coarser temper. Tizon Brown Wares were thinned by paddle-and-anvil technique, undecorated, fired in an oxidizing atmosphere that produced a generally uniform surface, and tempered with sub-angular to rounded opaque quartz, feldspar, and occasional mica flakes. Decorated types are extremely rare, and have not yet been identified on the forest. Tizon Wiped is a third type which has the exterior of the vessel wiped with a vegetal bundle that left distinct marks. A final ware is described by Breternitz (1960) who labeled it Orme Ranch Plain. Similar to Tizon Brown Wares it was fired in an uncontrolled atmosphere, with a surface color of black to brown. The exteriors appear to be slightly corrugated although they were described as "roughened and/or indented with intervening scraping."

Tizon Brown Wares are often found associated with the more distinctive Hopi Yellow Wares, including Jeddito Yellow, Jeddito Black-on-yellow and Sitkyaki Polychrome. These distinctive types are usually recognized by their bright yellow color, finely executed designs, and almost invisible quartz sand temper (Colton and Hargrave 1937:151).

A common occurrence in these ceramic assemblages are Desert Side-Notched projectile points, a Great Basin style believed to have been manufactured in the southwest after AD 1300 (Baumhoff and Byrne 1959). Figure 8 shows several

different styles of these points. They are most often made of obsidian or chalcedony. Gifford (1936:285) suggests the obsidian came from a cave in the Bradshaw Mountains area. Yavapais hunting on the Kaibab undoubtedly utilized the fine local obsidians or reworked earlier Cohonina style projectile points.

Yavapai Rock Art

Gifford (1936:252) asserted that Yavapai did not make petroglyphs and did not understand what they meant. More recently, Yavapai rock art sites are being identified in the red rock country of Sedona (Peter Pilles: personal communication). These pictographs depict horseback riders, Crown Dancers, bears, and other mythic figures in Yavapai history. On the south Kaibab, Kaibab National Forest archaeologists have conducted field trips with Yavapai students who have been able to identify rock art figures at prominent sites (Larry Lesko: personal communication). Additional Yavapai rock art can be expected in the Sycamore Canyon drainage system. This area contains sandstone cliffs similar to the environments of the Sedona red rock area.

Yavapai Sacred Areas

While tangible remains of Yavapai cultural manifestations are increasingly being identified on the south Kaibab, areas of the forest sacred to the Yavapai are undocumented. It is likely that Bill Williams Mountain held some significance along with the San Francisco Peaks, perhaps as northern boundary markers. Slightly to the southeast of the south Kaibab, the Yavapai claim Boynton Canyon on the Coconino National Forest as a sacred area. Yavapai myths describe the red rock country as their place of origin (Gifford 1936:306-308). Some Yavapai elders recently announced that they have relocated a shrine in Boynton Canyon that they had considered lost since they were moved to the San Carlos reservation in 1875 (Camp Verde Journal 11/1989). Further information from the Yavapai will be useful and necessary to locate and protect these unidentified areas.

THE NAVAJO

The Navajo are an Athapaskan speaking people who originated in west-central Canada and migrated to the Southwest at a relatively late date. Although the date and location of entry into the general area are still debated by researchers, most agree that by about A.D. 1600 the Navajo were in northern New Mexico and southern Colorado (Brugge 1983: 489-90). In succeeding centuries, they gradually moved west and eventually settled on the eastern boundary of the south Kaibab. Figure 10 shows the location of today's Navajo Indian Reservation.

The Navajo quickly adapted to their new home on the high plateaus of northern New Mexico and Arizona. One reason for the successful adjustment was their flexible social system, combining individualism, communalism, and pragmatism (Witherspoon 1983: 533). During their travels, the Navajo likely acquired aspects of Puebloan technology (like pottery manufacture and agriculture) and ceremonialism from the New Mexico Pueblos. Navajo subsistence, based on agriculture, pastoralism, and hunting and gathering, resulted in a mobile lifestyle. Although the frequency and degree of movement varies among families, the Navajo have characteristically maintained at least two substantial residences, which are reused year after year. One might be maintained during the summer for farming, another in winter for grazing. Shorter trips might be made for pinon nut gathering, fuelwood collecting, or to attend dances and ceremonies. Although seasonal migration patterns have likely changed or lessened with the coming of modern times, the Navajo remain a mobile and flexible culture (Jett 1978).

Perhaps the earliest reference to Navajo occupation on the south rim of Grand Canyon comes from a 1937 interview with a Navajo named Peshlakai Etsedi, who was 80 years old at the time. In 1863 and 1864 the Navajo were fleeing from the campaign of Kit Carson, who was rounding them up for exile to a reservation at Fort Sumner, New Mexico. Etsedi said that as a child in the early 1860s he lived on Black Mesa and went pinon nut gathering in the autumn with his family on the Coconino Plateau near Grand Canyon. While attending a Fire Dance near what is now Desert View Point in about 1866, the participants were warned that Carson's soldiers were approaching. To escape, they descended into the canyon with their sheep via what is now the Tanner Trail to the Tonto Platform. They traveled west to the intermittent Havasupai settlement at Indian Gardens and up the route of today's Bright Angel Trail. On the rim in the vicinity of Grand Canyon Village, the group encountered an encampment of several other Navajo families. Scouts soon arrived and convinced the group to go to the New Mexico reservation. After holding an all-night sing (or ceremony), the group left (Brewer 1937: 56-58).

This account establishes an early presence for the Navajo in or near the south Kaibab. The pressure of the military campaign likely pushed them there, and once removed, there is little evidence that they again occupied the area to any great extent until the 1890s (Euler 1974: 11). Once the Navajo were released from the Ft. Sumner Reservation in 1868, they reestablished themselves in their old territory farther east.

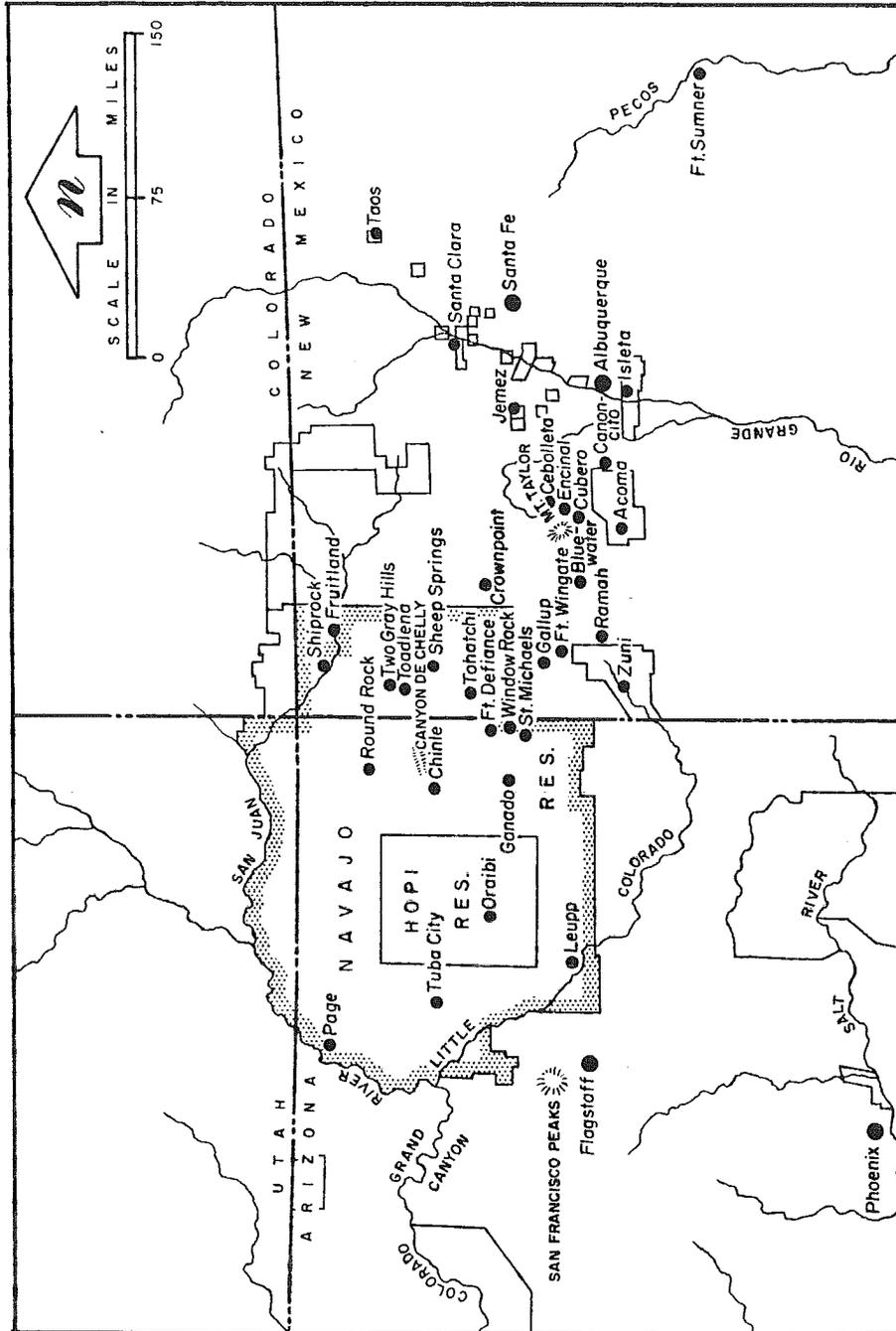


Figure 10. Navajo Indian Reservation, circa 1960. From Spicer (1962).

The Navajo gradually moved westward again after their return, and their Reservation boundary was extended west to the Little Colorado River in 1900. Parcels west of the Little Colorado were added in 1917, 1930, and 1931 (Bailey and Bailey 1986: 114). By 1930, then, the Navajo were firmly established off the eastern edge of the Coconino Plateau. The south Kaibab was rarely, if ever, a place of primary residence for Navajos, but because of the close proximity to the plateau, they often visited it to exploit its resources. The Navajo grazed their sheep, gathered firewood, and picked pinon nuts during specified seasons. The fall pinon nut crop in the woodlands south of Grand Canyon have long been legendary for their abundance. The harvest of 1938 was said to be a particularly good one on the south rim of Grand Canyon (Van Valkenburgh 1939: 31). The most recent "bumper" pinon crop at the south rim was in 1986.

When the Forest Service began restricting grazing and firewood collecting through a permit system, pinon nut gathering became the primary Navajo activity on the plateau. The fall migration to the pinon crop was part of a year-long pattern. The precise location of the crop would vary from to year-to-year, as pinon trees produce nuts only once about every four years. Nearly all of the historic Navajo sites recorded on the south Kaibab National Forest are remains of temporary pinon nut gathering camps. These sites are discussed later in this section.

Sacred Areas

The Navajo regard several locations on the Coconino Plateau as sacred. Our knowledge of Navajo sacred places is limited to published sources, which are few in number, and often contradictory. Van Valkenburgh (1938) wrote a monograph on Navajo sacred places in which he described the physical situations where they are found. Sacred places are often in locations that are geologically distinct from their surroundings: on mountain summits, in canyon bottoms, along the banks of water courses, by springs, and in places where events of historical or mythological significance occurred. They are said to be good locales for praying, and are often visited by medicine men. Shrines erected at sacred places can be found in stone cists or enclosures, walled or unwalled springs or pools, at peculiar rock formations, in caves and rock shelters, or in rooms of prehistoric sites. Various kinds of offerings are made at these shrines (1938: 29, 30).

No features west of the San Francisco Peaks were reported as sacred to the Navajo by Van Valkenburgh in his 1938 publication. A later work (Van Valkenburgh 1941) identified Bill Williams Mountain (*Tsin beel ahi*: Standing Up With the Trees, or Tree Grove Slope) as an important traditional mountain of the Blessingway rite. Van Valkenburgh and an informant collected plant and herb medicine from there in 1933 (1941: 97-8). Red Butte (*Tse zhin e'ahi*: Black Rock Standing Up) was reportedly associated with a tradition of Blessingway hunting rites; two informants identified old Navajo sites in the vicinity of Red Butte in 1952 (Van Valkenburgh and Kluckhohn 1974: 106). The Grand Canyon, rarely mentioned in Navajo lore, was apparently not considered a sacred place to Van Valkenburgh's informants.

Vanette and Fearey (1981) conducted a more recent study of Navajo sacred places on the Kaibab, Coconino, and Apache-Sitgreaves National Forests. Their 55 informants identified a number of sacred places located within or adjacent to the south Kaibab. Those identified (and the number of informants who identified them) include: Kendrick Peak (33), the San Francisco Peaks (31), Gray Mountain (11), Bill Williams Mountain (10), The Colorado River (8), the Little Colorado River (8), their confluence (8), Grand Canyon (2), and Red Lake (1). Red Butte was not mentioned as a sacred place by any of the informants (1981: C9-C11).

Vannette and Fearey state that they were unable to discover "the socio-cultural operations acting on the number and degree of sacredness of places" (1981: 22). The range of informant responses regarding sacred areas on the south Kaibab are indicative of the personal and individualized nature of Navajo religion. Other researchers have found that Navajo medicine men vary in their opinions regarding the sacred status of some classes of Navajo sites. What one medicine man considers to be sacred may not be to another (Doyel 1982). For example, when the Kaibab National Forest requested comments from the Navajo Medicine Men's Association regarding the proposed Bill Williams Mountain ski area, they replied that: "Our Western Sacred Mountain is the San Francisco Peaks. . . . The Bill Williams Mountain area is not an area of special significance for Navajo religion and its practice" (Kaibab National Forest 1984: 254). Other letters from the tribal Forestry Department and DNA-Peoples Legal Services, Inc., reached similar conclusions (Kaibab National Forest 1985: 37). This is in contrast to ten informants in the Vannette and Fearey study who identified the mountain as sacred. Repeated attempts to elicit comments from the Navajo Tribe regarding the Canyon [uranium] Mine located near the base of Red Butte went unanswered, indicating little to no official interest in the geographic feature.

The Vannette and Fearey study revealed that the Navajo regard some geographic features as more sacred than others. Although comparisons are difficult to quantify, it is clear that the San Francisco Peaks are most sacred to members of the tribe, and should remain inviolate from Forest Service encroachment. When questioned about Forest Service management practices, a majority of the informants responded with their approval of timber, range, watershed, wildlife, and recreation management programs. Only special uses and minerals management received unfavorable responses, yet these were conditional. Most approved of existing fire towers and radio and television antennae on mountain peaks because they are useful and may help protect timber resources. However, all respondents stated that none should be allowed on the Peaks. They had similar responses regarding mineral extraction. All of the informants were generally favorable toward low impact activities, like hiking, camping, hunting, and fishing; likewise, they approved the harvest of renewable resources such as fuelwood and timber. However, they were against irreversibly destructive projects including large-scale mining. Due to their pragmatic nature, the Navajo are willing to accept some development because of the benefits it brings to them.

On a smaller scale, the Navajo regard as sacred any place which has been blessed, or where a religious event occurred. According to one medicine man

who served as a consultant on an archeological project on the Navajo Reservation, most permanent and semi-permanent home sites are blessed, as are all ceremonial sites, including sweat lodges. Most camps of a temporary nature (such as pinon nut gathering and herding camps), however, are not blessed and therefore not considered sacred (Cleeland 1982: 238-240).

Navajo Archeological Sites on the South Kaibab National Forest

The remains of pinon nut gathering camps (hereafter referred to as pinon camps) are common in the pinon-juniper woodlands of the Tusayan Ranger District; a lesser number have been recorded on the Chalender Ranger District. The features at pinon camps are always similar and vary little through time and by location on the forest. The primary feature is one or more brush shelters, often with such related features as hearths, ash piles, trash piles, corrals, and sweat lodges, depending on length of occupation.

Brush shelters (*itl-nas-ti*: Branches Standing Up) are generally composed of scavenged dead logs and branches intertwined with living pinon and juniper trees. The walls are about waist-high, but are occasionally higher; some have brush roofing. They are nearly always open to the east, northeast, or southeast. The orientation of the entrance could indicate when the shelter was built. If the entrance opened directly toward the rising sun, the orientation would shift depending on the time of year. However, unlike formal hogans, brush shelters often have wide and informal entrances, so orientation is difficult to measure.

Because these shelters are meant for temporary use as sun shades and windbreaks, little effort is expended in their construction. Occasionally more substantial structures are found, ones built with stacked logs rather than brush, suggesting a longer period of use (perhaps an entire summer or fall) or reoccupation throughout several seasons. Because brush shelters are inherently fragile, they are not preserved for many years. For this reason, most of those found in archeological context date to the 1950s and 1960s, even though pinon camps were probably scattered throughout the forest as early as the turn-of-the-century or before.

Because of the cyclical nature of the pinon crop, families often reoccupied a particular camp in succeeding years. Thus, the size and/or artifactual content of some camps may grow through time. It is also possible that clusters of camps result from a family or group of relatives occupying different camps in a single area through succeeding years. The frequency of pinon camps has apparently declined from the 1970s to the present, and this may be attributed to several factors: a decrease in traditional patterns of mobility, an increase in vehicle use, which allows for one-day collecting trips from the Reservation, and perhaps an increase in use of non-traditional shelters like camper shells and tents. However, pinon camps that are identical in appearance to those made 30 years ago are still being created by the Navajo today. In 1985, Kaibab National Forest archaeologists recorded a pinon camp site near Desert View that was probably used in the fall of 1984. The brush shelter is built in the traditional way, and even the artifacts are similar to those identified on

older sites: cans for coffee, evaporated milk, potted meat, and peaches were noted.

In addition to pinon camps, sweat lodges are occasionally found. These are low, conical structures constructed of logs and covered with dirt. The floor is excavated to a depth of several inches, allowing for more interior room than is apparent from the exterior. An ash pile is usually present outside the east entrance of the sweat lodge; this is where rocks are heated. Once heated, the rocks are transferred into the sweat lodge, where water is thrown on them to create steam and bring about the "sweat". Discarded rocks are sometimes thrown out the door, and a discard pile of fire-cracked rocks can often be found just north of the entrance, presumably because it is the easiest direction for a right-handed person to throw. Sweat lodges are usually associated with camps, but may be located some distance away because of modesty or ceremonial prescriptions. They are often found near washes, to take advantage of seasonal water.

Sweat lodges are used for secular (cleansing) or sacred (ceremonial) purposes. The two types cannot be physically distinguished from each other, although association with temporary pinon camps would seem to indicate a secular use for most of the sweat lodges found on forest land. Regardless, according to one medicine man, all sweat lodges are blessed before use, which renders them all sacred structures to the Navajo. In fact, were the physical remains ever destroyed or washed away, the very ground on which the sweat lodge stood would still be considered sacred (Cleeland 1982: 240).

Because of artificial constraints to Navajo settlement in the area brought about by government control of the region beginning in 1893, there are only a few long-term habitation sites (represented by formal hogans) recorded on the south Kaibab. Nor is it likely that archaeologists will find herding camps, as the permit system severely limited this activity. Grazing trespass across the border from the Navajo Reservation onto the Tusayan District has occurred since the turn-of-the-century, and continues to this day. However, because of the secretive nature of this activity, it is doubtful that the trespassers would leave substantive remains.

As noted above, members of the Havasupai tribe are also known to have gathered pinon nuts on the Coconino Plateau in historic times. While it is possible that the Havasupai created structures, including sweat lodges, that are similar to those found on Navajo sites, they have not been adequately documented. Careful and thorough recording of all pinon camps may reveal patterns that can differentiate the two.

*Significance and Management Recommendations for Historic Navajo
Sites on the Kaibab National Forest*

Federal land managers assess the significance of prehistoric and historic sites within rather strict regulations established for the National Historic Preservation Act (NHPA). Recently, the National Park Service issued a controversial document referred to as Bulletin 38, "Guidelines for Evaluating

and Documenting Traditional Cultural Properties.” The following section was written before this bulletin was issued. However, Forest Service interpretation of Bulletin 38 directs managers to consider traditional cultural values within the framework of NHPA, so these recommendations may not change substantially in the future.

National Register criteria for evaluation define a significant property as one that possesses integrity and: (a) is associated with events that have made a significant contribution to the broad patterns of our history, or; (b) is associated with the lives of persons significant in our past, or; (c) embodies the distinctive characteristics of a type, period, or method of construction, or; (d) has yielded or is likely to yield information important to prehistory or history. The criteria specifically exclude properties that are less than 50 years old, unless they are of exceptional significance (36 CFR 60.4).

These guidelines have been successfully used by archaeologists on the Kaibab National Forest to preserve prehistoric and historic archeological sites, which are routinely avoided during undertakings on forest land. Nearly every site on the forest can be considered significant for its information potential, and other criteria may also apply.

Navajo pinon camps pose a management problem primarily because they are usually less than 50 years old and therefore are ineligible for protection under existing Federal guidelines. However, these sites reveal information on a vanishing lifeway and represent one aspect of historic land use patterns. Furthermore, they embody the distinctive characteristics of a type of construction and have the potential to yield information regarding historic Navajo use of the forest.

To further complicate the matter, some sweat lodges may have religious significance to the Navajo people. Although religious properties are normally excluded from eligibility to the National Register, they may be eligible for protection for their value as traditional cultural properties. Aside from the religious aspect, sweat lodges are significant for the same reasons that other Navajo sites are: they are a distinctive architectural type and have the potential to provide information.

Kaibab National Forest archaeologists have struggled for years with the management dilemma posed by Navajo sites. Although most of these sites are ineligible for protection on the basis of age, cultural resource managers have an obligation to extract information from such sites prior to undertakings that could destroy them. A satisfactory solution to the problem involves compromise. Archaeologists now routinely make detailed recordings of such sites when they are discovered during survey activities, but if they lack integrity, are less than 50 years old, or do not meet any of the National Register criteria, the sites are not marked for protection. In this way, valuable information is gained without impeding the progress of the undertaking.

Because Navajo pinon camps contain similar features, and are entirely exposed on the ground surface, they are relatively easy to record. However, because the archaeologist will in all likelihood be the only cultural resource

professional to ever see such sites, it is important that as much information as possible be carefully recorded. Site forms are to be filled out completely and, in addition to standard site data, are to contain the following information:

- * Architectural descriptions that include method of construction, dimensions, and entrance orientation (taken with a compass facing toward the outside);
- * Artifact inventories that include temporally diagnostic artifact descriptions (for example, maker's marks on bottles and pottery, milk can measurements, baking powder can marks), and;
- * An accurate map showing each site feature (including trash and ash piles, roads, and so on).
- * Black-and-white photographs are to be taken when practical. For site settlement analyses, sites must be accurately plotted on aerial photographs and/or topographic maps.

Because of their potential religious significance to the Navajo people, sweat lodges should be protected during project undertakings by marking them for avoidance during survey. Where practical, it is also desirable to protect pinon camps, even if they are less than 50 years old. Pinon camps that are over 50 years old should be protected pending formal evaluation.

A final recommendation regarding Navajo sites is that ethnographic research be conducted to further elucidate patterns of land use, site organization, construction, and layout. As one researcher points out: "the significance of a cultural resource to a particular ethnic group requires an identification of value by the group itself. . . . Individuals among the Navajo population would have to be questioned to determine if these locations have a cultural value assigned to them" (Rice 1979: 12).

HOPÍ

While the Hopi did not occupy land within the south Kaibab during historic times, they nevertheless consider the Coconino Plateau as traditional use land (figure 11). The Hopi Tribe provided public input to the Environmental Impact Statement for the Bill Williams Mountain Ski Area (1985) in which they claimed ancestral ties to what is now the Kaibab National Forest. This document relates Hopi legends that describe many of the routes taken by various Hopi clans as they migrated throughout the Southwest. According to legend, the Bear Clan, the Water Clan, Kachina Clan, Flute Clan and Horn Clan all have ancestral homesites in the vicinity of Bill Williams Mountain. These clans eventually moved east to the Flagstaff area, where after time they separated, only to rejoin and merge gradually with still other clans at the Hopi Mesas.

The Hopi call the land that they migrated through, the Hopi *Tusqua* or Sacred Circle. The area within this Sacred Circle is considered ancestral homeland and it retains religious significance for the Hopi to the present. It is a Hopi belief that *Masaw*, the “super being”, designated the landmarks along the boundary of the Sacred Circle. The Hopi built shrines on these landmarks, to which they make pilgrimages and perform ceremonies.

The western boundary of this ancestral homeland is marked by three shrine sites on or near the Kaibab (see figure 11). One of these shrines, *Pota ve taka*, is located at the Grand Canyon. Another is *Honapa*, near Sycamore Canyon, between Williams and Sedona, and the third is *Dusakchoma* (Grassy Hill), which is commonly known as Bill Williams Mountain.

There is a spring on Bill Williams Mountain which is held sacred by the Hopi Bear Clan. Other clans also have religious duties which relate to *Dusakchoma*. Medicines and herbs used in Hopi religious ceremonies are collected from this mountain.

Information about this sacred area was made known in the course of Forest Service studies on the expansion of an existing ski run on Bill Williams Mountain. Hopi religious beliefs are rarely divulged, as it is felt that disclosure leads to sacrilege. In this case, however, disclosure was preferable to possible disturbance caused by development on the mountain. It is likely that other locations in the study area also have religious significance for the Hopi. The San Francisco Peaks are perhaps the most venerated of Hopi sacred places, being the winter home of most kachinas. Hopi religious leaders chart the path of sunsets from solstice to solstice using mountain peaks as points of reference. Clouds, which bring to the Hopi precious moisture, often build over mountains, thereby adding to their religious significance. Other mountains on the south Kaibab, such as Kendrick Mountain and Sitgreaves Peak may also have religious significance.

The trade relationship between the Hopi and Havasupai is well documented (Cushing 1965, Stephen 1936, Spier 1928, Ford 1983). The Hopis apparently valued the goods offered by the Havasupai, especially prizing red ochre, buckskin and tobacco. Stephen (1936) describes a Hopi kachina that represents

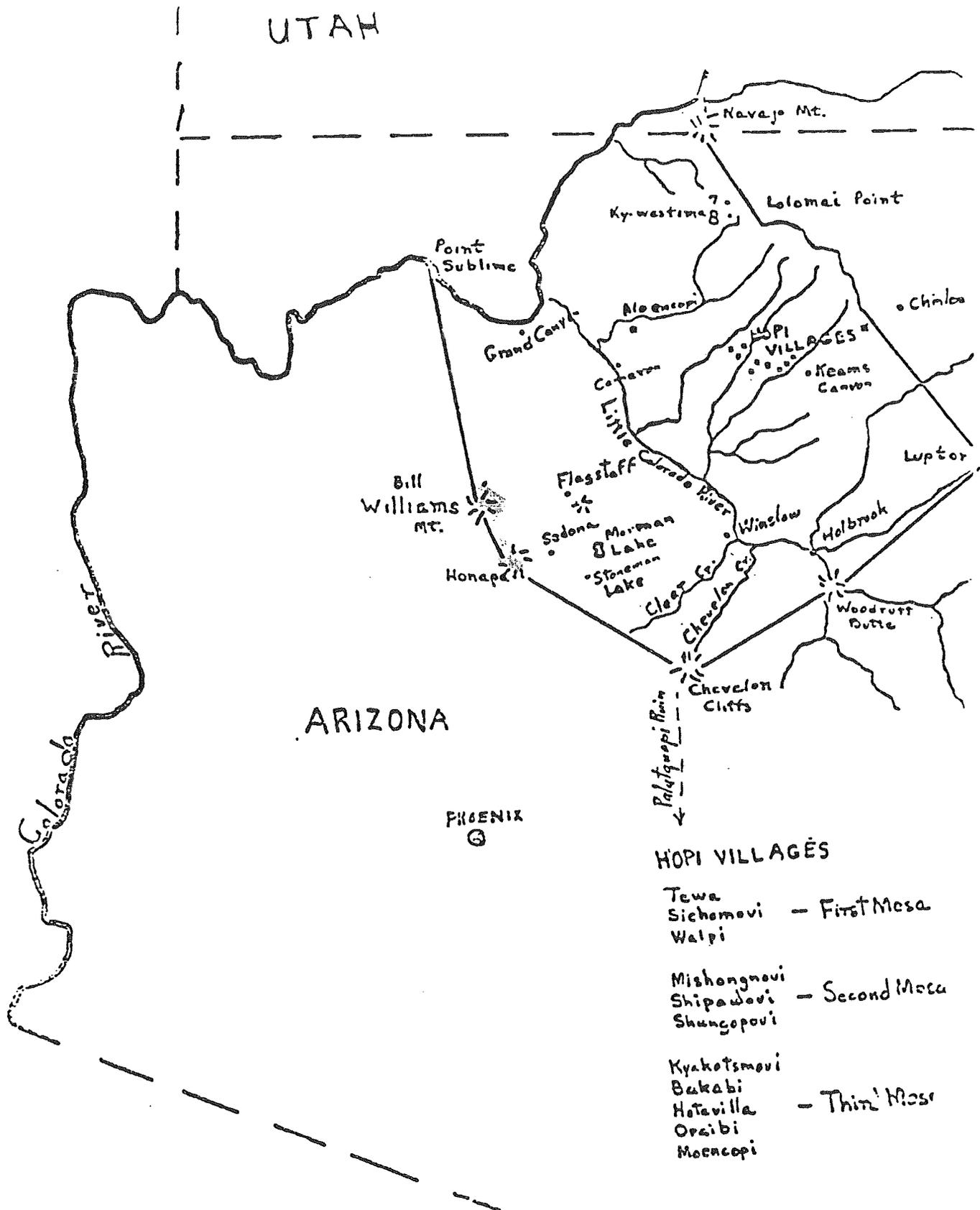


Figure 11. Traditional Hopi land boundaries (from Hopi Tusqua)

the spirit of the Havasupai people, known as the Kohnina (or Cohonino) Kachina. This kachina wears buckskin clothing and his cheeks are painted red. Unlike most kachinas, who winter on the San Francisco Peaks, this one resides in the Grand Canyon. Additional information concerning the Hopi-Havasupai trade relationship can be found in the Havasupai section.

The Hopi apparently also gathered religious materials on the Coconino Plateau. Another reference in Stephen (1936), tells of a Hopi journey to Cataract Canyon where “wood, clay and grass” were collected for use in ceremonies back in the Hopi villages. In addition, it is likely that other religious ceremonial items, eagles for example, and natural resources (pinons, agave, other foodstuffs) were obtained from the Coconino Plateau.

Sites with Hopi pottery sherds are found in the study area, especially on the Tusayan Ranger District, near the South Rim. However, Hopi pottery was widely traded throughout the Southwest. The other tribes that traditionally used the Plateau, the Havasupai, Navajo, and Yavapai, were known to trade for Hopi ceramics. Often, diagnostic artifacts including projectile points and other ceramics, or features such as hogans and sweat lodges, can aid in determining whether a site should be considered Hopi or not.

Hopi shrines and sacred areas may be even more difficult to distinguish. Shrines can be an arrangement of rocks, a cairn, a single rock or natural feature, a rock art panel or other type of prehistoric site, or may even be buried below the ground to avoid detection (Kenny 1990). Obviously, shrines may not be readily detectable during standard archeological survey procedures. However, offerings of *pahos* or prayer feathers at one of the aforementioned locations would strongly suggest recent use as a shrine. Consultations with appropriate tribes will probably be more useful in identifying and protecting sacred places than cultural resource survey.

CONCLUSION

The foregoing essays represent our best attempt to document in a general but systematic way what is known about Native American use of the south Kaibab during historic times. Clearly, there are still numerous gaps in the data available to us which need to be addressed. These are very likely noticeable to even the casual reader. Of particular continuing interest is the changing nature of cultural interaction between and among these peoples in historic times, distinguishing Native American historic archaeological sites by reference to the group whose material remains they are, and the whole notion of the "traditional cultural property" and the guidelines for their evaluation and documentation. Through outreach efforts to the Native American groups discussed in these pages and planned future research by Kaibab National Forest personnel, the Kaibab National Forest intends to continue the process begun with the preparation of this document.

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