

ern Oklahoma) indicating human activity in that area of the state a little later.

By 8,000 *ya*, Oklahoma was undergoing drastic environmental changes, and warm, dry weather was becoming prevalent. Bison herds became fewer, and people increasingly turned to hunting smaller game and gathering plants. Band territories became smaller as groups developed seasonal hunting-gathering patterns in favored localities. Among Oklahoma's notable sites that bear witness to this lifeway are the 5,500-year-old Scott site in LeFlore County, the 5,000-year-old Kubik site in Kay County, and the 4,500-year-old Lawrence site in Nowata County. These sites have yielded a diverse array of chipped or ground stone tools along with remains of roasting ovens made from stones. In western Oklahoma the 5,500-year-old Gore Pit site in Comanche County, would indicate the spreading of these cultures across the area.

Between 1937 and 1940, WPA archaeological crews working along Grand River exposed partially stratified habitation deposits in many terraces and rockshelters, yielding information about the Middle Archaic Period, 6,000 to 4,000 *ya*. Sixteen eastern Oklahoma sites and two in western Arkansas yielded evidence of hunter/gatherers about 5,000 to 6,000 *ya*.

During the Late Archaic Period, several regionally different societies emerged, including Summer culture and bison hunters in the western part of the state. About 4000 *ya*, Oklahoma began undergoing pronounced ecological change, and about 2,000 *ya*, it is believed timbers and plant communities attained their historic compositions and distributions. About 2,500 *ya*, Oklahoma's climate began to become more like that of today. As plant and animal communities emerged, Oklahoma's people began to become farmers and traders. The bow and arrow was in use by 2,500 *ya*, and 1,800- to 2,000-year-old clues to pottery making and farming are known from small Lawrence Phase and Wister Phase villages studied in Delaware, Kay, Osage, and Ottawa counties. And as the environment changed, so did the cultures and practices of the people living here.

WOODLAND PHASES

Plains Woodland (2,000 to 1,200 ya)

The mobile Woodland hunters (2,000 to 1,200 *ya*) concentrated on deer and small mammals, moving to new camps when the local availability of these animals decreased. These cultures included the Fourche Maline people and the western bison hunters.

Earliest Woodland occupations of north central Oklahoma are believed to be 1,900 to 1,700 *ya*, and by 1,200 *ya*, sites display characteristics more common in post-Woodland occupations. In the south-central part of Oklahoma, it seems likely that the transition from the Archaic to Woodland occupations occurred some time prior to 1,550 *ya*. Evidence suggests continuous, relatively permanent occupation throughout the Woodland and into the post-Woodland times is probable.

In the eastern part of the state, cultures such as the Wister and Fourche Maline developed along the Poteau River and its tributaries, as well as along the Arkansas River.

Village Farming and Plains Village (1,200 to 500 ya)

Village Farming and Plains Village are names archeologists use to describe life styles which spread across much of the central U.S. from about 1,300 to 1,100 *ya*. Although food was still obtained from hunting and



WPA Archeologists 1930s.



Modern day archaeological site in Oklahoma.

gathering, people lived in permanent houses and grew crops in small family gardens. These crops included squash, beans, corn, and tobacco. The most intensive gardening took place in eastern Oklahoma, where a moister climate made possible abundant crops. In the western half of the state, where the period is called Plains-Village, the drier, harsher climate created conditions under which hunting provided a greater part of the food. Corn and other crops were successfully cultivated in the western part of the state, however.

The Custer Phase, 1,200 to 750 *ya*, developed from southern plains Woodland manifestations, and were followed by the Washita River Phase in western Oklahoma. The Custer peoples involved themselves in river-bottom gardening activities and hunting deer, elk, bison, turkey, and smaller game.

By around the beginning of the Paoli phase, also approximately 1,200 to 750 *ya*, more sedentary horticultural societies had evolved in the central Washita River basin and elsewhere on the Southern Plains. The move from the mobile hunting/gathering economy of the Woodland period to a hunting/horticultural economy is reflected in the presence of permanent houses and large storage pits at Paoli phase sites. Bison were butchered where killed and only portions brought back to the village. Femurs and pelvises are not found in any of the Paoli phase collections and lower fore limbs, humeri, feet, and vertebrae are found in small amounts. Skull, scapula and lower hind limbs are the most common elements represented in these samples. This evidence suggests the bison kills were relatively close to the villages.

Paoli phase sites are characterized by a variety of artifacts, and, because these are semi-sedentary villages, artifacts and debris are usually abundant. Pottery and projectile points styles are clues to identifying the various peoples who lived at this time. Stone and clay elbow pipes are considered characteristic of Washita River phase sites, but they are also found at several Paoli phase sites. If Paoli phase sites represent an intermediate period between Plains Woodland and Washita River phases, then projectile points from early Plains Village sites should reflect a mixture of traits characteristic of Woodland and Washita River phase projectile point assemblages. Evidence suggests a gradual change from dart points and corner-notched arrows in the

Woodland to primarily side and unnotched arrows in the Washita River phase. Paoli phase assemblages are characterized by a variety of both dart and arrow points. This is expected with increasing use of the bow and arrow through time. The decreasing use of dart points during the Plains Village period reflects the hunting effectiveness of the bow and arrow over the spear or atlatl. With respect to agriculture, the distribution of corn in samples from Paoli phase sites indicates that corn cultivation was an important activity in Oklahoma by at least 1,000 *ya*.



Ruins of a Plains -Village dwelling, found along the Beaver River in the Oklahoma Panhandle. The ruins are unique in Oklahoma prehistory because of the use of stone in the housing. Large rectangular rooms with stone foundations were flanked by smaller rooms which may have been used for storage. (Oklahoma Archeological Survey).

Two small beads made from Pacific Coast shells were found at the Roy Smith site in Beaver County in 1979. These seem to indicate that people living in the Oklahoma Panhandle participated in a trade network that extended to the Pacific Ocean. Trade may have increased slightly from the Paoli phase to the Washita River phase, but there is little artifact evidence of extensive exchange that might include foods during either period.

Ranging from about 1,000 to 600 *ya*, the Washita River people maintained villages of between two to a dozen houses, with fewer than 100 people. These villages were permanent base camps. Radiocarbon and archaeological dates for Plains Village sites in the central Washita River basin range from 1,180 *ya* to 220 *ya*. The

lack of evidence for extensive cultivation of corn in this area before 1,200 *ya* corresponds with studies in eastern North America and the Central Plains which indicate that corn was only present in limited amounts before about this time. Cultivation of marshelder, corn, and other crops was probably only a seasonal or supplementary strategy in a Woodland period subsistence system that emphasized the collection of nuts and other wild plants and hunting deer and other game. Fish are only found in significant amounts from one Washita River phase site, catfish being the most abundant, and also drum and sunfish were found. Reptiles are common throughout the Plains Village period. Some of the aquatic turtles may have been an important meat source during the winter when they could be collected from the soft mud at the bottom of streams or cutoff lakes. A variety of birds are present, including waterfowl, turkey, prairie chicken, Canada goose, and duck reported at both Paoli and Washita River phase sites. These are important game birds today, and they appear to have been an important secondary or seasonal meat source throughout this period.

Creeping cucumber and morning glory seeds found may have been used as medicines or as hallucinogens. Morning glory and creeping cucumber seeds are abundant at Arthur, but they have not been recovered at other Plains Village sites in Central Oklahoma. Morning glory seeds are found at a Plains Village site in north central Oklahoma, indicating that this plant may have been widely used on the Southern Plains, at least after about 700 *ya*.

Many researchers suggest that bison herds increased dramatically on the Southern Plains around 700 *ya*, near the beginning of the Washita River phase, but few studies have adequate data to examine the changes in bison use during the Late Prehistoric period. Drier conditions farther west may have led these Southern Plains groups to specialize more on bison hunting over corn horticulture, but on the eastern margins of the southern prairie plains, intensive bison hunting could be incorporated into a horticultural economy. The early historic Wichita adaptation documented by French and Spanish explorers indicate that the bison hunting/horticultural economy was in place among eastern Plains groups by at least the protohistoric period (see below).

Perhaps bison became important in central Oklahoma by 700 *ya* because of drought conditions that created more mixed grass and short grass prairie, preferred by bison. This may have brought the herds closer to the villages. Villagers may have contributed to further herd expansion by burning tall grass prairies to provide new growth and attract herds, which is done today to improve cattle grazing. Bison herds have been restored to the tall grass prairies in Osage County. (see Tourism section)

Regardless, by 1,000 *ya*, Oklahoma had major populations of farming villagers in the panhandle, along the Washita River in Garvin and Caddo counties, along the Arkansas and Grand rivers in Wagoner, Muskogee, Sequoyah, and LeFlore counties, and along Little River and its tributaries in McCurtain County. Some of these villagers constructed ceremonial centers that vied for power with other Southeastern chiefdoms

By 500 *ya*, all of Oklahoma's village societies were undergoing rapid change, in part due to climatic fluctuations, and out of this turmoil came the Wichita and Caddo people who were observed by the first Spanish and French explorers of the area.

MISSISSIPPIAN (1,200 TO 400 *ya*)

The Caddoan occupation of northeast Oklahoma, southwest Missouri and northwest Arkansas in the Western Ozark Highland during the Mississippian stage reflects the close cultural relationship that existed about 1,100 and 600 *ya* between peoples living along the Arkansas River and flanks of the Ozarks, with those living in the interior. The timing and nature of cultural changes throughout the western Ozarks, including the use and eventual disuse of mounds, and the apparent abandonment of frontier areas, point out the relatively synchronous nature of change.

The concept of village as applied to Mississippian Period settlements in the Mississippi Valley or other portions of the Southeast does not fit the pattern observed in the Arkansas Basin study region. The idea of an "extended community" is more appropriate for the observed settlement pattern. The earliest of these cultures are the Harlan and Spiro phases.

The Harlan phase is believed to have lasted from 950 to 750 *ya* and the Spiro phase lasted a few hundred years longer (about 950 to 550 *ya*). The best example of how the extended community is organized comes from the area around the Spiro site, although this locality may also be atypical in that it was probably the most densely populated area at the time. The pattern in this area is one of scattered buildings, occasionally forming small

clusters, stretching along the terrace edge above the floodplain.

The Harlan phase is named after the Harlan site located in Cherokee County in northeastern Oklahoma. Burial mounds were used by at least some of the Harlan people, as well as mound sites that served as local or regional community centers and trade and exchange networks controlled by a religious and political authority centered at the major sites. The higher authority was perhaps at Spiro.

The Spiro Phase was the peak of social complexity and cultural elaboration in the eastern Oklahoma region. Site types are civic-ceremonial centers, villages, and various categories of impermanent camps.

Houses in Oklahoma grew significantly smaller from the Harlan phase to the Spiro phase, suggesting a change in the number of residents. Also, there were more houses per village in Harlan culture. Segregation or compartmentalization of Spiroan society at the level of the household is a common aspect of the continuing process of centralization of authority characteristic of chiefdom level social systems.

Spiro has provided an extraordinary record of its artistic expression in the form of engraved shell work and works in other media including pottery, wood, copper, and stone. Human skeletal material from the various cemeteries of the Spiro Phase indicate a population that was genetically transitional between the peoples of the Great Plains and the Southeast. The society was organized into social ranks, and major differences in health and nutrition existed among the population.

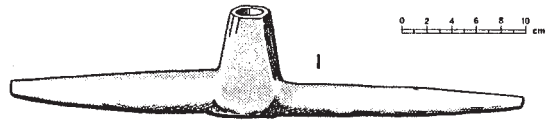
Other cultures in the Arkansas Valley included the Fort Coffee and Neosho cultures. Fort Coffee culture, from 550 to 400 *ya*, contains a few different elements than those found in Spiro Phase sites. Houses were similar, but burials were somewhat different at Fort Coffee sites. For example, sexes were segregated for burial, and all people were buried with their heads to the west in Fort Coffee cemeteries. Broad similarities between the Neosho and Fort Coffee people exist, and it is suggested these peoples interacted closely, perhaps to the extent that leaders were buried at Spiro, and patterns of hunting and agriculture were similar for these groups.

The demise of complex social stratification by the beginning of the Fort Coffee phase may have signaled a decentralization phase for the Spiroan social system. The beginning of the Fort Coffee phase signals the end of the participation of Arkansas Basin Caddoans in the Southeastern ceremonial complex. Virtually all mound construction and use in the Basin stopped and the Spiro site was abandoned. These changes seem to co-occur with a slightly drier environment on the central Plains and into northeast Oklahoma probably resulting in poorer agricultural conditions. This environmental trend may be an important factor in the transition from Spiro phase to Fort Coffee phase. The change may also be associated with an overly extended and integrated cultural system.

The general collapse of chiefdoms across the southeast in the 15th and 16th centuries may appear to be the result of a widespread factor such as climate.

Protohistoric 500 to 300 *ya*

Protohistoric occupations included the Wheeler culture, and Wichita, Caddo, perhaps Osage cultures. Protohistoric is defined as the archaeological history in the period immediately preceding recorded history. Protohistoric occupations have been found predominantly in the Washita River basin. Examination of the data for the Washita River phase (750 to 550 *ya*) indicates a similar pattern of bison procurement. Skulls, scapulas, and lower hind limbs predominate and many of these elements can be identified as tools. The low fre-



Spiro phase artifacts include the T-shaped stone pipe and the human-effigy "rattler" pipe (ca. 1000 A.D.). Smoking was an important social activity, and a variety of pipe types were employed, perhaps for different social functions.



quency of vertebral columns, pelvises, and feet reflects butchering at the kill site with these elements left at the kill. Deer on the other hand, were killed very near the villages, and, since they are not herd animals, were usually killed by single hunters. The increased use of prairie resources is related directly to the increasing exploitation of bison, and by 700 *ya*, bison were as important as deer and probably supplied as much or more of the meat for these people. The apparent increase in bison populations in central Oklahoma may be related to the drying trend across the Southern Plains between about 1,000 to 500 *ya*.

THE HISTORIC AGE

Whites first came to western Oklahoma as explorers. Europeans discovered Oklahoma and its people in 1541, when Francisco Vasquez de Coronado led a gold expedition to the area. About 1700, two tribes from the North, the Comanches and Kiowas, migrated to Oklahoma. They settled in the Wichita Mountains where they adopted the horse; hunted buffalo; and raided Spanish settlements in Texas, northern Mexico, and New Mexico.

Next came the French to the eastern part of the state. The first Frenchman to actually visit Oklahoma was Juchereau de St. Denis. He explored land drained by the Red River, searching for places to establish settlements for trading with the tribes. In 1718, Bernard de la Harpe led an expedition to the Canadian River in eastern Oklahoma, which was inhabited by the Wichitas and Caddoes.

Soon after 1803, explorers, soldiers, and private citizens entered Oklahoma. Explorers came to study the land and resources and to map Oklahoma. An expedition in 1806 led by Captain Richard Sparks, the first American official to reach Oklahoma, was turned back by the Spanish. Another expedition that same year, led by Captain Zebulon M. Pike explored the Arkansas River and reached Oklahoma's eastern border on New Year's Day in 1807.

Other explorers who visited the state were George C. Sibley, who, with the assistance of Osage scouts, explored northern Oklahoma and the tributaries of the Arkansas River, including the Salt Fork, Cimarron, and Chikaskia rivers; Stephen H. Long, in 1817, established Ft. Smith, Arkansas, between the Poteau and Arkansas Rivers; and Thomas Nuttall, a scientist, came to Oklahoma in 1819 to study the geology, plants, and animals along the Grand, Verdigris, Cimarron, Poteau, and Arkansas rivers. Nuttall wrote one of the earliest scientific books about Oklahoma. (see History section)

Scientists continue to explore Oklahoma's past, both its pre-historical and historical phases. New findings are made every year, and help explain the nature of Oklahoma today. Oklahoma remains diverse, geologically, geographically, and culturally, with a fascinating history and a fascinating present.

