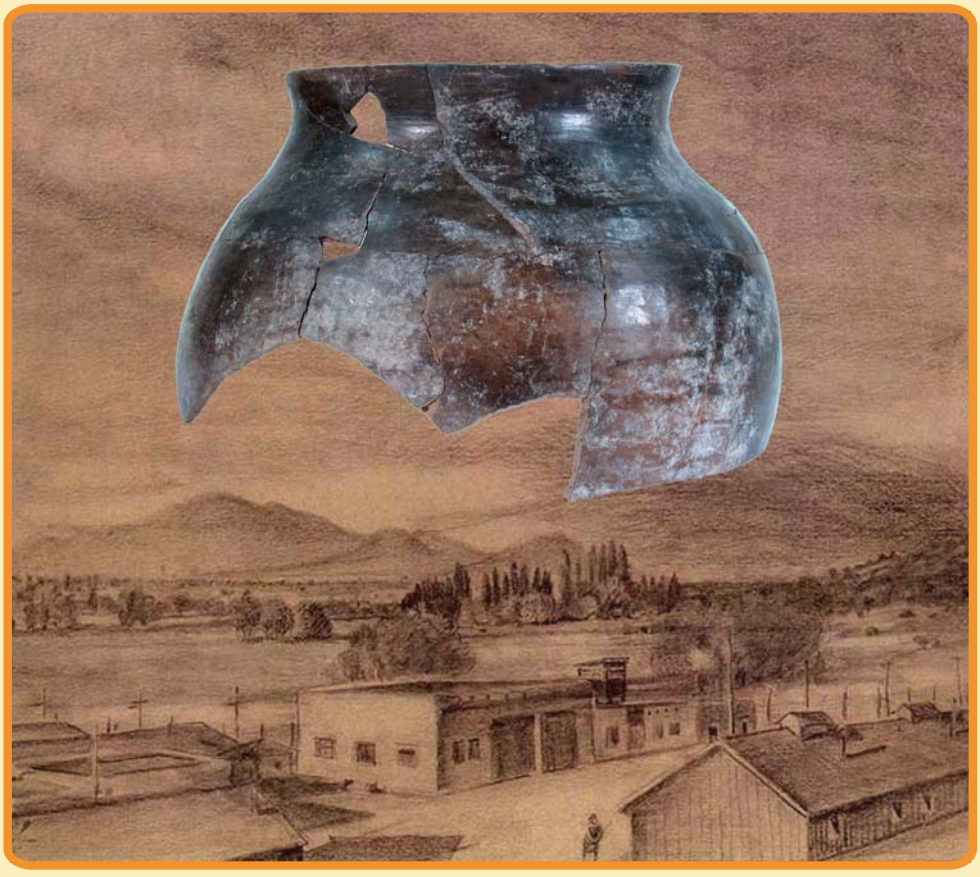
Excavations at Gonzales Elementary School, Santa Fe, New Mexico

Stephen C. Lentz



Office of Archaeological Studies

Museum of New Mexico

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MUSEUM OF NEW MEXICO

OFFICE OF ARCHAEOLOGICAL STUDIES

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with a contribution by

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Administrative Summary

The Office of Archaeological Studies (OAS), Department of Cultural Affairs, conducted a limited mechanical testing program on a portion of LA 134297, within a proposed construction zone at Gonzales Elementary School, West Alameda Street, Santa Fe, New Mexico. The testing program was undertaken at the request of Mr. T. Easterton-Bond of the construction firm *WoodMetalConcrete* ARCHITECTURE, representing the Santa Fe School District. The school district is planning new building areas, a new road, and gym demolition.

The purpose of this study was to determine if significant buried cultural deposits were present within the project area and to document their spatial extent, depth, integrity, and potential for addressing research questions about prehistoric and historic Santa Fe. These include chronology, social and economic organization and interaction, changing land-use patterns and practices, and cultural association.

Between May 4, 2009, and May 12, 2009, the OAS undertook mechanical test trenching of over 2 percent of the proposed project area. The backhoe trenches (BHT) were numbered sequentially. Originally, the 2 percent figure amounted to 13,000 square meters, or 260 linear meters. However, a total of 270 linear meters were excavated, 10 meters in excess of the original estimate. The extra 10 meters were necessary to thoroughly investigate a possible thermal feature. In addition, 45 meters of trench were used to define a cobble foundation, bringing the total of subsurface investigations to 315 linear meters. The cobble alignment was visible on the surface in 2009 and in aerial photographs from the 1980s.

Four potential features were identified.

Feature 1, first thought to be an acequia, turned out to be a natural water channel.

Feature 2, the most conspicuous feature in the project area, is a limestone cobble foundation. It may have originally been a Civilian Conservation Corps facility dating to the twentieth century. Subsequently this structure may have been reused by the officials who guarded a Japanese internment camp in Santa Fe during World War II. The feature was investigated further through ethnographic and archival research, including interviews with informants.

Feature 3 consisted of three historic post foundations, one of which contained the remnants of wooden posts.

Feature 4, a burned stratum, may have been a thermal feature or lens. It yielded two radiocarbon dates with extremely wide standard deviations, suggesting mixed prehistoric and modern materials.

No properties listed in the *National Register of Historic Places* (October 15, 1966) or the *State Register of Cultural Properties* (No. 27) are within the project area. Other than the historic alignment, no substantive cultural resources were encountered in the area. The OAS believes that in-field description, including qualitative and quantitative observations, photography, and placement of the feature on a USGS 7.5′ map, constitutes adequate treatment of the resources, consistent with standards set forth by the New Mexico Cultural Properties Review Committee in 4.10.15 NMAC, 4.10.16 NMAC, and 4.10.17 NMAC.

Work performed by the OAS complies with the provisions set forth in Section 106 of the National Historic Preservation Act (36 CFR 800), Executive Order 11593 (1972), the National Environmental Policy Act of 1969 (91 Stat 852), and the State Cultural Properties Act of 1969 (as amended).

The OAS recommends that no further archeological work be performed at this location and that *WoodMetalConcrete* ARCHITECTURE proceed with its undertaking.

MNM Project No. 41.899.
NMCRIS No. 113472.
Archaeological Excavation Permit No. NM-09-027-T.

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Introduction

At the request of Mr. T. Easterton-Bond of the construction firm *WoodMetalConcrete* ARCHITECTURE, representing the Santa Fe School District, the Office of Archaeological Studies (OAS) performed mechanical testing of LA 134297 (Fig. 1 and Appendix 1). The project area is within a proposed construction zone at Gonzales Elementary School, Santa Fe, New Mexico. The school district is proposing to construct new building areas and a new road, and to demolish a gym. Since the Santa Fe Public School District is considered a subdivision of the State of New Mexico, an archaeological testing program was performed prior to construction.

The undertaking complies with standards for testing as set forth by the Cultural Properties Review Committee (CPRC) for mechanical test excavations under the current general permit, and complies with "Test Excavations under a General Permit" (NMAC 4.10.16.9) and "Mechanical Excavation of Archaeological Sites" (NMAC 4.10.14).

The crew consisted of Stephen Lentz, Guadalupe Martinez, Susan Moga, Isaiah Coan, and Gerald Lujan. The principal investigator was Stephen Post. Nick Ruiz Paving and Excavation Co. was the backhoe contractor. Our thanks to Mr. Michael Lee, the school principal, who lent his enthusiastic support to the project, and a special thanks to volunteers Mimi Burling and Kathy McRee, who artfully reconstructed the major portion of the Tewa jar illustrated in this report.

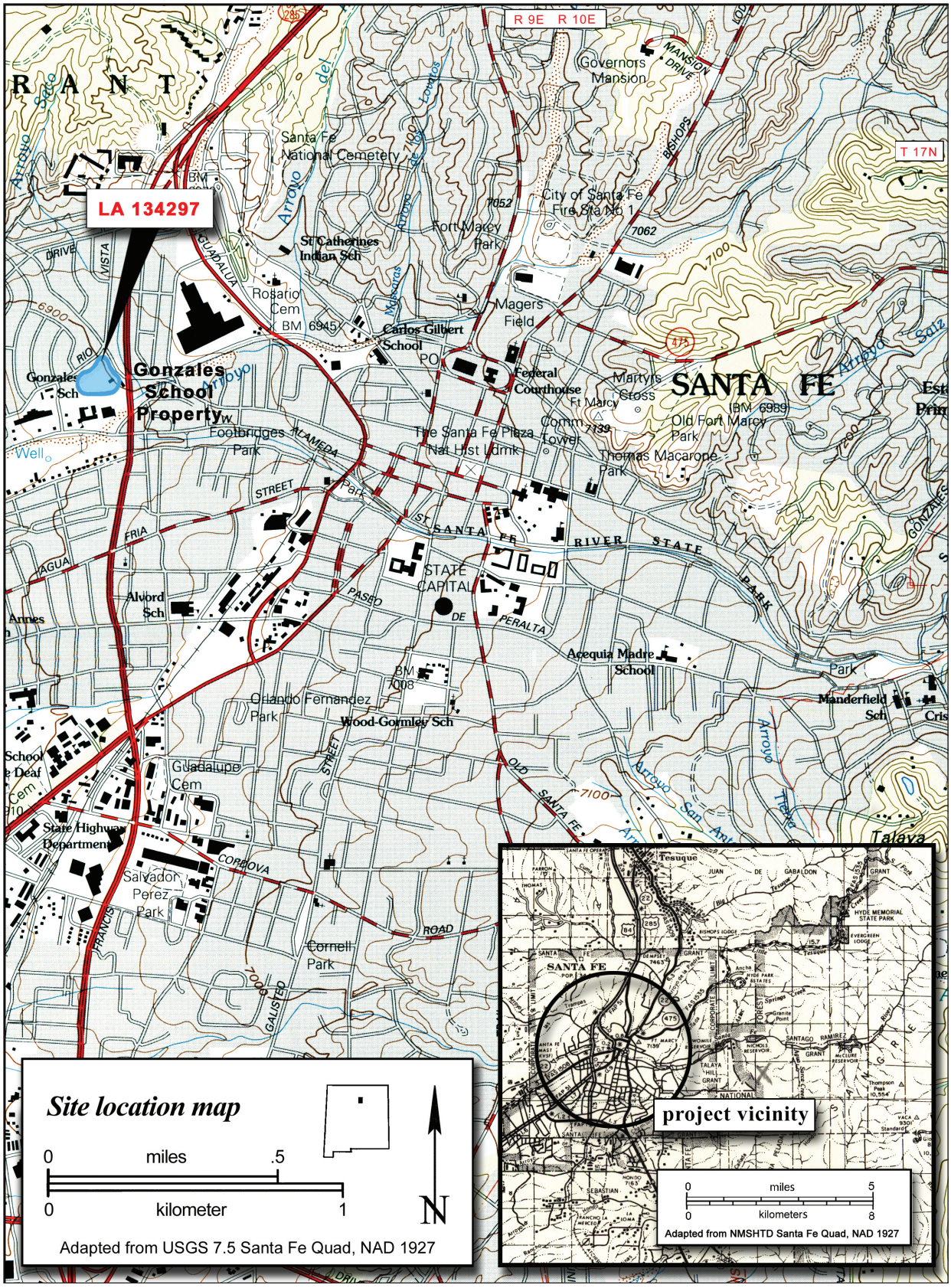

Figure 1. Project vicinity and site location map.

Environment and Setting

Physiography

Santa Fe is in a fault-zone feature within a structural subdivision of the Southern Rocky Mountain physiographic zone known as the Española Basin, one in a chain of basins composing the Rio Grande Rift, extending from southern Colorado to southern New Mexico (Kelley 1979:281). This basin, which is considered an extension of the Southern Rocky Mountain Province, is enclosed by uplands of alternating mountain ranges and uplifted plateaus, and the Rio Grande flows along the long axis of the feature (Kelley 1979:281). The northern boundary of the Española Basin is composed of the eroded edge of the Taos Plateau. The Sangre de Cristo Mountains form the east edge, and the southern boundary is marked by the Cerrillos Hills and the northern edge of the Galisteo Basin. The La Bajada fault escarpment and the Cerros del Rio volcanic hills mark the southwestern periphery. The basin is bounded to the west by the Jemez volcanic field, and the Brazos and Tusas Mountains form the northwestern boundary. Elevations along the Rio Grande through the basin vary from 1,845 m in the north to 1,616 m in the south, and altitudes in the surrounding mountains reach 3,994 m in the Sangre de Cristos, 3,522 m in the Jemez Mountains, and 2,623 m in the Brazos and Tusas (Kelley 1979:281).

Local topography alternates among nearly level plains, rolling terraces, and steep, rocky slopes. The main drainage is the Santa Fe River. Major tributary drainages include Arroyo de la Piedra, Arroyo Ranchito, and Arroyo Barranca. These tributaries have wide, level floodplains, while smaller tributary arroyos have cut deeply into the alluvial plain. Much of the riparian zone adjacent to the river has rich soils and sediments that are ideal for agriculture.

Geology

The Rio Grande Rift was established during the late Oligocene epoch (ca. 30 million years BP) when a cycle of crystal downwarping and extensional faulting succeeded a period of regional uplift (Kelley 1979:281). As the subsidence of the Española Basin proceeded through the Miocene and Pliocene epochs (ca. 3 to 25 million years ago), erosion from the Nacimiento, Jemez, and Brazos uplifts to the north and northwest, and the Laramide Sangre de Cristo uplift to the east, provided most of the sediments for what is known as the Santa Fe Group, the prominent geologic unit within the Española Basin. Other sources of sediments of this geologic unit include volcanic fields in the Jemez, Brazos, and Sangre de Cristos (in an area northeast of the Española Basin). Formations within the Santa Fe Group, such as the Tesuque Formation, consist of deep deposits (over 1 km thick) of poorly consolidated sands, gravels and conglomerates, mudstones, siltstones, and volcanic ash beds (Lucas 1984).

Alluvial deposits of ancient and modern gravels are found in arroyos and on adjacent terraces. Tertiary volcanic deposits, Cenozoic sediments, and Precambrian rock are exposed in surrounding areas. When combined with these alluvial deposits, they provide most of the materials needed for flaked stone artifact production. In particular, chert is available in the Ancha Formation (Kelley 1979:11–12), and sandstone, siltstone, andesite, basalt, and silicified wood occur in other nearby formations. The most commonly used chert in the study area outcrops in the Madera limestone formation and occurs in local gravel deposits. Small amounts of obsidian are found scattered along the basalt-capped mesas west of Santa Fe (Kelley 1979:12). A detailed soil map shows that the project area is dominated by the Bluewing Series (Folks 1975:15–16), which consists of level to gently sloping terrace soils of gravelly sandy loam.

The project area is at an elevation of 7,000 ft (2,133.6 m).

Climate

Santa Fe has a semiarid climate. Latitude and altitude are the two basic determinants of temperature; however, altitude is the more

powerful variable in New Mexico (Tuan et al. 1973). In general, mean temperatures decline faster with increased elevation than with increased latitude. Cold-air drainage is a common and well-known feature of New Mexico valleys (Tuan et al. 1973). Narrow valleys create their own temperature regimes by channeling air flow: the usual patterns are warm, up-valley winds during the day and cool, down-valley winds at night. In contrast, shifts in temperature over broad valley floors are influenced by the local relief (Tuan et al. 1973).

The Santa Fe weather station is at an elevation of 2,195 m. The mean annual temperature reported by the station is 48.6–49.3 degrees C (Gabin and Lesperance 1977). The climatological data further indicate that the study area conforms to the general temperature regime of New Mexico, that is, hot summers and cool winters.

The average frost-free period (growing season) at Santa Fe is 164 days. The latest and earliest recorded frosts are May 31 (in 1877) and September 12 (in 1898) (Reynolds 1956:251). Although a frost-free season of 130 days is sufficiently long to allow the growing of most indigenous varieties of maize through dry farming (Schoenwetter and Dittert 1968; Hack 1942), the unpredictability of late spring and early fall frosts creates agricultural risk.

Precipitation can fluctuate widely in Santa Fe. A maximum of 630 mm of precipitation was recorded in Santa Fe in 1855, compared to a minimum of 128 mm in 1917 (Reynolds 1956). The amount of precipitation is even more variable for any given month in successive years. Late summer is the wettest season in the annual cycle of the Santa Fe area; June is one of the driest months. Precipitation records indicate that more than 45 percent of the mean annual precipitation falls between July and September (Gabin and Lesperance 1977). Although October is drier than September, it is nevertheless the fourth wettest month of the annual cycle. Significant precipitation (7.6 percent of the annual total) also falls in Santa Fe during this month. Late summer and fall moisture is derived from the Gulf of Mexico, when air masses from this region push inland to bring the economically important monsoons (Tuan et al. 1973:20). Summer rains tend to be violent and localized. They saturate the ground surface in the beginning of a storm, resulting in the loss of much of the moisture through runoff.

Flora

Local flora are typical of Upper Sonoran grasslands. The piñon-juniper grasslands, which support a variety of plant and animal species, are the most common habitat. The characteristic vegetation includes piñon, juniper, prickly pear, cholla, yucca, and several species of muhly and grama grass (Pilz 1984). The piñon-juniper community thins as it descends from the Sangre de Cristo foothills and grades into shortgrass plains containing scattered juniper midway between the foothills and the Santa Fe River (Kelley 1979:12). The open, grass-covered valleys contain grama grass, muhly, Indian ricegrass, galleta grass, soapweed yucca, one-seed juniper, Colorado piñon, Gambel's oak, and small stands of mountain mahogany. Arroyo bottoms contain various shrubs such as four-wing saltbush, Apache plume, rabbitbrush, big sagebrush, and wolfberry. The riparian/wetlands habitat is found only along the perennial streams, such as Rio Pojoaque and Rio Tesuque. Modern vegetation includes willow, cottonwood, salt cedar, rushes, and sedges (Pilz 1984). In the wider valley bottoms, ditch irrigation is practiced, including the area north of the study area.

Fauna

Fauna found within the project area includes coyote, badger, porcupine, black-tailed jackrabbit, desert cottontail, spotted ground squirrel, prairie dog, and many species of birds. Mule deer and black bear are known to occur in low numbers (Pilz 1984). Use of the area by elk, black bears, and grizzly bears may have been more common before 1900 (Carroll 1984:2). Plains animals such as buffalo and pronghorn may have also been present or within a few days access.

Prehistory and History of the Project Area

This overview of prehistoric and historic developments in or in the vicinity of the project area is intended to place past cultural developments of the Northern Rio Grande and the Santa Fe Basin in perspective. The discussion is confined to the periods relevant to the components discussed in this report, that is, the Rio Grande Coalition and Classic periods. Materials from these periods were encountered during the testing at Gonzales Elementary School, as well as Colonial-period artifacts.

The Prehistoric Period

Researchers in the Rio Grande area have perceived the developments in that area as departing from the traditional Pecos Classification (Kidder 1927). In 1955 Wendorf and Reed redefined the Pueblo I–V periods in the Rio Grande Valley based on the occurrence of ceramic types, changes in settlement patterns, and economy. The principal temporal intervals outlined by Wendorf and Reed (1955) include the Developmental, Coalition, and Classic periods.

The Developmental Period (AD 600–1175)

Sites from the Developmental period in the Northern Rio Grande are comparable to the late Basketmaker III and Pueblo I periods of the Pecos Classification. A growing number of Developmental sites are being recorded in the Rio Grande Valley. These early villages tend to be small with a ceramic assemblage composed primarily of Lino Gray, San Marcial Black-on-white, and various plain brown and red-slipped wares. The majority of the documented early Developmental sites are in the Albuquerque and Santa Fe districts (Frisbie 1967; Reinhart 1967; Peckham 1984).

The settlement of the Rio Grande drainage is the subject of much debate. The population of this area has been attributed to immigration from either the southern areas (Bullard 1962; Jenkins and Schroeder 1974), the Four Corners/San Juan area (Judge 1991; Stuart and Gauthier 1988:49; Lekson and Cameron 1995:185), and, more recently, from the Mesa Verde area (Ortman 2009). However, arguments for an in situ population that absorbed small groups of immigrants from elsewhere is currently gaining currency (Boyer 1999; Lakatos 2007; Lentz 2005; Moore 2009).

Archaeological sites in the Santa Fe area with Developmental components include Pindi Pueblo (LA 1), in the Agua Fria area of south Santa Fe. LA 1 is a Coalition-period site overlying a Developmental-period component represented by a single jacal room and a pithouse. Kwahe'e Black-on-white ceramics were recovered, and a tree-ring date of 1218+vv was recovered below the jacal structure (Stubbs and Stallings 1953:24–25; Robinson et al. 1972:38).

LA 618, a pithouse site with extramural features, is on East Palace Avenue behind the old Fischer brewery and dates to the late Developmental period (Elliott 1988:17). Other developmental sites within the Santa Fe city limits include the KP Site (LA 46300), on top of a ridge along the north side of the Santa Fe River Valley near Fort Marcy. Here, a single trash-filled burned structure was tested (Wiseman 1989). The pottery types recovered during testing included Red Mesa Black-on-white, Kwahe'e Black-on-white, and other Pueblo II/Developmental types. Obsidian chipped stone predominated, although local chert types, particularly red jasper, were also used. Eleven tree-ring and two radiocarbon dates indicate that the occupation of the structure occurred in the mid to late 1000s, and the accumulation the fill in the early 1100s. Tree-ring cutting dates of AD 1116, 1117, and 1120 are associated with the Kwahe'e Black-on-white pottery (Wiseman 1989:139).

Not far from the KP Site, Mariah Associates recorded a Pueblo II village near Fort Marcy Hill (Acklen et al. 1994). Heavily disturbed, the possible remains of structures and features dating to the Developmental period were recorded. Finally, in downtown Santa Fe, five pits from the

Developmental period were exposed at El Pueblo de Santa Fe (LA 1051; Lentz in prep.).

The Coalition Period (AD 1175 to 1325)

The Coalition period (AD 1175 to 1325) in the Northern Rio Grande is marked by substantial increases in the number and size of habitation sites coinciding with population coalescence and expansion into previously unoccupied areas. This includes a shift from mineral pigment to organic paint (primarily Santa Fe Black-on-white) in decorated pottery.

In the beginning, the Coalition period in the Northern Rio Grande was distinguished by an increase in the number of village sites, suggesting an overall increase in population, and the replacement of semisubterranean structures with surface dwellings consisting of rectangular rooms arranged in small roomblocks. Although above-ground pueblos were built, pit structure architecture continued into the early phases of this period. Rectangular kivas, which are incorporated into roomblocks, coexisted with subterranean circular structures (Cordell 1979:44). Frisbie (1967) notes the shift away from less optimal upland settings and a return to the permanent water and arable land adjacent to the major drainages.

Demographically, this period is characterized by two interdependent trends in population and settlement reflected in population growth. Whether this growth is due to immigration or indigenous population expansion is not fully understood. The Chama, Gallina, Pajarito Plateau, Taos, and Galisteo Basin districts, which had been the focus of little Anasazi use prior to AD 1100–1200, are settled (Cordell 1979). In excess of 500 Santa Fe Black-on-white sites are listed for the Pajarito Plateau, although many of these sites are poorly documented (New Mexico Cultural Records Information System, Historic Preservation Division). Representative sites of the Coalition period include LA 4632, LA 12700, and Otowi, or Potsuwii (LA 169).

Artifacts used to identify early Coalition sites include slab metates, side-notched projectile points, Santa Fe Black-on-white ceramics, and a variety of indented corrugated gray wares (Lang and Scheick 1989:5). Anschuetz and Scheick (1999), after Lang (1989), identify four significant Coalition habitation settlement clusters in the Santa Fe Basin. These include the Santa Fe downtown area at the contact between the Sangre de Cristo Mountains foothills and the lower piedmont, the Rio Santa Fe Valley near present-day Agua Fria, the Arroyo Hondo locale at the southern limits of the contact between the mountain foothills and the lower piedmont, and the lower Rio Santa Fe Canyon upstream of La Bajada Mesa escarpment. Each of these clusters is near a sizable spring (Anschuetz and Scheick 1999).

Coalition populations made extensive use of an extremely broad range of environmental settings In recent years alone, archaeologists working in the Santa Fe Basin have documented hundreds of sites, including a wide variety of resource extraction and processing activity loci, agricultural fields and features, and small dwellings in the hinterland areas of large villages near major drainages (Cordell 1979:44; Cordell 1984:202–204) Frisbie 1967; Lang and Scheick 1989).

The Classic Period (early, AD 1325–1450; late, AD 1450–1600)

The Classic period postdates the abandonment of the San Juan Basin by sedentary agriculturalists. It is characterized as a time when regional populations may have reached their maximum size, and large communities with multiple plaza and roomblock complexes were established (Wendorf and Reed 1955:13). The Classic period in the Northern Rio Grande coincides with the appearance of locally manufactured red-slipped and glaze-decorated ceramics in the vicinity of Santa Fe, Albuquerque, Galisteo, and Salinas after ca. AD 1315, and Biscuit wares on the Pajarito Plateau, Santa Fe, and Chama areas slightly later (Mera 1935; Warren 1979).

Sites of the Classic period are characterized by large communities associated with small structures, fieldhouses, or seasonally occupied farmsteads. This contrasts with the preceding Coalition period, when a greater range of site types characterized the settlement pattern.

The first glaze-painted pottery, White Mountain Red Ware, was made in the Acoma and Zuni areas (Wingate Black-on-red, AD 1050–

1200); Puerco Black-on-red, AD 1000–1200; and St. Johns Polychrome, AD 1175–1300). Rio Grande copies of Nutria-phase polychromes began with the introduction of Los Padillas glaze wares and polychromes around AD 1300.

Large biscuit ware Classic-period pueblo sites exist on the Pajarito Plateau. Initially studied by Hewett (1953) and Steen (1977), they include Rainbow House, Tshirege, Otowi, Tyuonyi, Puye, and Tsankawi.

In the Galisteo Basin, the majority of Classic-period sites were established in the early 1300s and were of short duration. However, this interval witnessed the evolution of some of the Southwest's most spectacular ruins. Many of these large pueblos, such as Pueblo Blanco, San Cristóbal, and San Marcos, were tested or excavated by N. C. Nelson in the early part of the twentieth century (Nelson 1914, 1916). Possibly the first stratigraphic excavation in the United States was executed by Nelson in the roomblocks and midden of San Cristóbal Pueblo (LA 80). Other projects in the Galisteo area include those by Smiley et al. (1953) and the School of American Research at Arroyo Hondo (Lang 1977). By the late 1400s, this area appears to have experienced a substantial decline in population, which has been attributed to environmental instability.

The late phase of the Classic period, bracketed by Coronado's explorations of 1540 and the founding of Santa Fe in 1605 or 1610 (Chávez 1992; Snow 1992), is characterized by population decline. Many farmsteads and fields were abandoned following droughts in the AD 1400s and early 1500s. Population centers shifted to areas along the major river valleys. In the Santa Fe area, few pueblos remained occupied even into the 1500s. Pindi was abandoned early (ca. AD 1370), and Arroyo Hondo and Agua Fria Schoolhouse were abandoned by AD 1425. Cieneguilla was abandoned in the late 1400s or early 1500s, although some researchers believe it was reoccupied, possibly until 1680 (Schroeder 1979; Elliott 1988). With 500 rooms, the pueblo was the largest in the area at that time.

Historic Occupation of the Project Area

(from Post and Snow 1992:39)

The property transfers cited in the following paragraphs are documented in records of the New Mexico State Archives (NMSA), the Santa Fe County Office (SFCO), and the New Mexico State Records Center and Archives (SRCA).

The Gonzales School and adjacent properties have been known historically as the Torreon Area because a defensive tower, or *torreón,* once stood in the project area. In 1703 the torreón belonged to Juana and María Griego (NMSA I:294). Its location was vaguely identified as 1/4 league (3/4 of a mile) from the plaza as "the crow flies," which would place the structure east of present-day St. Francis Drive. In 1813 Doña Juliana Fernandes sold a piece of planting land in the place called the torreón to Don Ygnacio Ortiz (SFCO E:240–241).

In a land conveyance dated 1827, Gregorio García sold a piece of unimproved land to Gregorio Trujillo (SRCA, Donaciano Vigil Papers No. 15; SFCO B:230).

As the result of a settlement in District Court in 1878, Trinidad Alarid was able to purchase property at a sheriff's sale that had been purchased by Vicente Garcia from José Ygnacio Silva II (SFCO H:233–235).

In 1966 José Ygnacio Silva, grandson of José León, sold a portion of a ranch that had belonged to Juliana Fernandes.

A portion of a house belonging to José Ortiz Y Alire had probably been owned by Francisco Javier Ortiz y Alire (SFCO V-Misc:362–363). The house remain unoccupied. In 1900 the heirs of Luis Gold, a well-known speculator, sold the property to H. B. Cartwright. The house was described as the "ruins of a five room adobe house and an adobe wall corral" (SFCO K-1:479–480). By the time Cartwright finished acquiring land in the eastern end of the project area, he owned 73.11 acres in the area, including the modern Torreón Addition (SFCO 12:130; SFCO I-1:8–9). All other purchases were clearly for irrigated farmland owned by the Ortiz families.

Cartwright died without developing the land. In 1933 a deed for sale of the 73.11 acres to E. Y. Moore was filed with the county clerk (SFCO 12:130). Two years later Ephraim Moore sold a

26-acre parcel of the vacant land to his brother, Samuel Moore. While the modern Torreón Addition was platted in the late 1930s, actual construction did not occur until World War II (Post and Snow 1992:39).

> After Japan bombed Pearl Harbor, Hawaii on 7 December 1941, Americans blamed the event on espionage committed by Japanese Americans instead of the lack of preparedness by American military forces. The federal government actually had proof that no espionage had occurred, but chose not to contradict the circulating rumors. Indeed before Pearl Harbor, Curtis B. Munson, a special representative to President Roosevelt, had studied whether the Japanese Americans of the west coast posed a threat to the country, but had concluded that they did not. Nevertheless, officials in the administration chose to ignore the evidence and succumbed to war hysteria. The federal government operated on the assumption that Japanese-Americans would form a fifth column and aid in the expected Japanese invasion. Hence the government believed that people of Japanese ancestry needed to be removed from the west coast. Secretary of the Department of War, Henry Stimson, and Secretary Frank Knox of the U.S. Department of the Navy advised the President to intern Japanese-Americans. Attorney General Francis Biddle opposed the plan citing concerns about the violation of individuals' constitutional rights. Stimson and Knox prevailed, however, and Franklin D. Roosevelt signed Executive Order 9006, declaring the western coast a military zone and that all people deemed suspect be removed.
>
> The Wartime Civil Control Administration (WCAA) ordered Japanese Americans to report to assembly centers. The first internees arrived in Santa Fe on March 14, 1942, and were placed in what is now the Casa Solano neighborhood and at an abandoned Civilian Conservation Corps (CCC) site. The WCAA allowed them to bring what they could carry in a suitcase. The quick removal forced many to sell or store their properties on short notice, and their subsequent economic losses reached an estimated 400 million dollars. Many properties and businesses were seized by the government and not returned to their rightful owners after the war was over. Once the government realized how many soldiers would be needed to handle the relocation process, it created the War Relocation Authority (WRA), a civilian operated organization. The WRA built ten relocation centers to imprison Japanese-American families. The authorities in charge of the relocation efforts believed that some Japanese-Americans posed greater danger than others and decided to isolate these men in internment camps or in camps for prisoners of war. (Stamatov 2004)

These detainees were mostly Issei men, first-generation immigrants who had been born in Japan. Their children, born in the new country, are referred to as Nisei (second generation) and their grandchildren as Sansei (third generation). "The Immigration and Naturalization Service (INS) of the U.S. Department of Justice ran four internment camps. A total of between 110,000 and 120,000 Japanese-Americans were sent to internment camps throughout the United States between 1942 and 1946" (Post and Snow 1992).

The detention camp in Santa Fe held 4,555 detainees and extended over 28 acres (not 260 acres, as stated during the interview quoted below) in the current Casa Solana neighborhood and an abandoned Civilian Conservation Corps camp about a mile from the center of Santa Fe (Fig. 2). The Santa Fe internment camp began operating on March 14, 1942, when it accepted its first Japanese "alien enemies." A number of fifty-man barracks were erected.

Between March and September 1942, the government held hearings to determine the extent of the loyalty to the United States of the 826 prisoners held at the camp. Of those, the government deemed 303 men "undesirable enemy aliens," and sent them to army prisoner of war camps. The remaining prisoners received permission to join their families in the relocation camps or to live away from the military zone (SRCA).

> After the last prisoner left on 24 September, the camp accepted another wave of internees on 23 March 1943. By 30 June the camp held 1,894 men. The internees from 1942 had

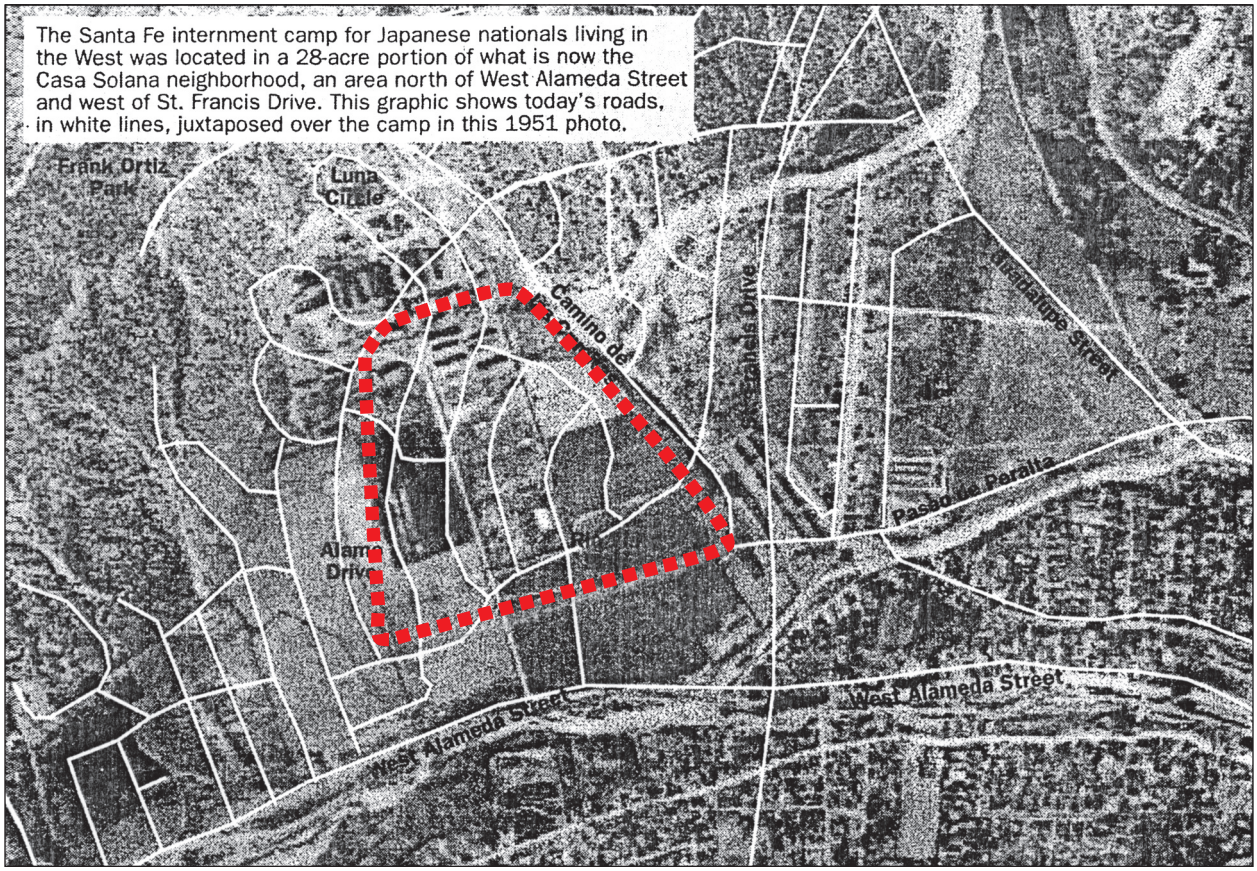

Figure 2. An aerial photo taken in 1951 of what is now the Casa Solana neighborhood, with a street map superimposed. The dashed line shows the approximate location of the internment camp. Courtesy of the Santa Fe New Mexican.

> mostly been farmers and fishermen, but in the second wave of internees, there were men from a greater variety of occupations, including college professors, doctors, actors, and journalists. Twelve of the new internees of Japanese descent came from Central and South America. The average age of the internees was fifty-two years old. (Stamatov 2004)

The Casa Solana area shows little evidence of the camp. Although many of the older trees in the neighborhood were planted at that time, there are scarce records and landmarks. In 1999 a monument to the Japanese interned at the camp was proposed. It was to be located on Ortiz Hill. However, there was vigorous opposition from the Bataan Death March survivors, many of whom came from New Mexico, manning the 200th and 515th Coast Artillery. They were captured in the Philippines and had to endure the Bataan Death March. Although the exact figure is not known, "hundreds" of soldiers succumbed to the cruel conditions. Thus the survivors of the march felt that a monument to their wartime enemies desecrated the memories of their fallen comrades. The monument, a granite boulder with a bronze plaque, was dedicated on April 20, 2002. Mayor Larry Delgado cast the deciding vote (SRCA).

> Separated from their families, the men made the best of life in prison. One in four men had the opportunity to pursue some type of employment in the camp, serving as bakers, plumbers, carpenters, mechanics, barbers, tailors, and firemen. Others found ways to lessen the boredom and enforced incarceration by caring for pets, growing gardens, and attending informal internee-taught classes. The camp had a small library where men borrowed magazines, books and newspapers. The camp personnel censored

all of the library's material that "could tend to incite the internees against the [US] Government and its policies." Nevertheless, the enforced imprisonment proved very hard on these industrious men. One internee, Yoshiaki Fukada, described their time behind barbed-wire fences as akin to "fencing a thousand free-spirited mustangs." This was the first evacuation of an entire people—the first since the Indian Removal of the mid-nineteenth century—to occur in the United States. Few questioned the legality of the removal, let alone the moral implications. The California press championed the policies of the government and lent the policies legitimacy. War hysteria and race prejudice prevailed over common sense and decency. The same atmosphere existed in New Mexico with only a few New Mexicans expressing their outrage at the racism and disregard for American citizens' constitutional rights. (Stamatov 2004)

For the most part, the camp ran smoothly because of the experience and tolerance of the camp administration. The camp officers, Immigration and Naturalization Service veterans such as Ivan Williams, Bundy Avant, and Abner Schreiber, made no attempt to penalize the internees for their cultural heritage and showed them respect (Fig. 3). Camp officials often supported the internees' desires to practice their Japanese customs. The officials allowed Japanese baths to be constructed and made efforts to purchase favored foods for the mess-hall meals. They also permitted internees to celebrate Emperor Hirohito's birthday. The administration recognized that their tolerance led to cooperation from the internees, and it rejected the idea that the officials might be "coddling" the prisoners. Although some conflicts occurred in the Santa Fe internment camp during its four years of operation, overall it ran smoothly, and prisoners, never complacent about their plight, had little to complain about regarding their treatment (SRCA).

Documentation of the internment area is scant (possibly due to security issues), although many Santa Feans have vivid memories of the incarcerated Japanese. They recall walking past the camp, as schoolchildren and teens, on their

Figure 3. Japanese American prisoners at the internment camp in Santa Fe, 1942 or 1943. Names were withheld at their request. Courtesy of the New Mexico State Records Center and Archives.

way to high school (Arlene Alarid, personal communication, 2009). Soon the camp became commonplace, and most people lost interest. Although the Feature 2 alignments were probably associated with the camp, they could not be identified by locals who were alive during that era.

According to an interview with a man who lives adjacent to the project area, the Detention Center enclosed 260 acres; it ran north up the hill to what is now Alamo Street but did not go south as far as West Alameda. He also stated that one or two of the larger buildings in the CCC camp were used as the headquarters for the guards. Indeed, a sketch made by a guard in a watchtower depicts a flat area, much like the school playground where the excavations took place, and not the hilly area of Casa Solana, where the main part of the camp was located (Fig. 4). Moreover, the configuration of the building in the center of the sketch, with a two-car garage, might very well be the alignment tested by the OAS. The wooden doors would explain why there were no south cross walls, and the enclosed area was open ended. It appears to be an adobe structure, which could very well have been resting on a cobble foundation similar to Feature 2. The room to the west could have been the tool shed or livery rumored to have been at that location (Michael Lee, personal communication, 2009). According to maps of that time, the facility existed in what is now the Casa Solana area between 1942 and 1946. The camp was torn down and is now the location of a residential community.

> In March of 1942 a plan by Mr. L.E. Detwieler of New York began circulating in New Mexico. Mr. Detwieler proposed buying land to help colonize between forty and sixty thousand Japanese-Americans in Maxwell, New Mexico. An immediate outcry from the citizens of New Mexico began, and letters flowed into the governor's office protesting the proposal. A petition signed by 111 people stated: "We the people of Maxwell and vicinity do hereby petition the Honorable Governor John E. Miles that we the people do not want a colony of Japanese on our peaceful community. As most of our boys are in the army fighting the Japs, we do not feel that we want the Japs to take their place." Another citizen wrote: "All Japs are skunks. And no matter where a skunk is born, or under what star or flag, he is still a skunk—same stripe, same odor, same charcterists [*sic*]. (Miles 1942)

A group of 36 owners of large tracts of land, on the other hand, approved the plan and sent a petition to the governor: "The undersigned property owners of the Maxwell Irrigation District in order to make our position clear on the question of locating a colony of Japanese farmers on the Maxwell tract, do hereby certify that we have no objection to the sale of land in said Maxwell tract to Japanese farmers who are American citizens now being evacuated from California and we feel that such sales will benefit the community." They also claimed that many of those who had signed the petition opposing the plan were not property owners in the vicinity. One might speculate that these landowners wanted to create a cheap labor pool. One of them, F. A. Brookshier, wrote, "During my twelve years of teaching school including nine years here as superintendent, I have taught racial tolerance and the rights and duties of American citizens. This is a part of the democratic process."

More people opposed the plan than approved it, and Governor Miles took immediate steps to prevent the colony. In a letter to Attorney General Edward P. Chase dated April 24, 1942, he wrote,

> In view of the fact that I, as Governor, am opposed to any plan of colonization by persons of the Japanese race and am opposed to such persons acquiring any interest in real estate in New Mexico, I therefore request you to institute necessary legal proceedings to test the right of persons of the Japanese race to acquire or hold any interest in real estate in New Mexico and, if necessary, to carry a case to the Supreme Court of the United States in order to give that Court an opportunity to modify or reverse its former decisions. (Miles 1942)

The press also fought the colonization project. In an editorial in the *Santa Fe New Mexican* dated March 6, 1942, the editors noted that the objections of New Mexicans to the plan had been loud and long:

Figure 4. A sketch of the guards' quarters at the internment camp in 1943 from the perspective of a guard tower. The artist's signature is illegible. Courtesy of the New Mexico State Records Center and Archives.

> There are many reasons why New Mexico and especially Santa Fe does not want Japanese residents and the foremost is the fact that such colonization would in truth kill the goose that lays the only golden egg this section knows—color and atmosphere. Santa Fe is at the present time getting many residents from the coasts, people of substance and influence. Those people are coming to Santa Fe mainly because of its history, its background and the old world flavor. It is true they are seeking safety, but safety can be found in hundreds of other places. With the influx of Japanese such an atmosphere as that which attracts visitors and residents would be permanently lost.

Governor Miles killed the plan by the summer. Nevertheless, the atmosphere in New Mexico remained tense. In the spring of 1942, when news of the Bataan Death March reached Santa Fe, an angry mob of Santa Feans, armed with shotguns and hatchets, converged on the Santa

Fe Internment Camp. The camp commander convinced the mob that any violence against the prisoners would result in retribution against New Mexican prisoners of war in the Philippines and Japan. After that incident, the interned men requested that the administrators raise the height of the perimeter fence by one foot. Ironically, many of the internees had sons who eventually fought in Italy in the 442nd Regimental Combat Team. The regiment was the most-decorated unit in US military history; the troops received 18,143 medals, including 3,600 Purple Hearts.

New Mexicans born in Japan, Italy, or Germany had to register at the Post Office as enemy aliens and turn over their shortwave radios, guns, and camera equipment. Yet only Japanese men lost their jobs, suffered the humiliations of not being able to support their families, and faced imprisonment. On February 13, 1942, James Matsu, a junior at the University of New Mexico, wrote Governor Miles, asking why the government was persecuting his father, a Japanese man who had lived in the United States for forty years. "My father has never done anything against the law, for during the 40 years in this country he has never been arrested on any charge. His record is clean as anybody's could be. There is no just reason for clamping down on innocent people. I believe, and I am sure you agree that this isn't the American way. This is the Axis method and it is one of those things which belong to those whom we are fighting. Yes, it is war, and my father and mother are aliens from an enemy country, but this doesn't mean that they are enemies." Governor Miles did not respond to James Matsu's letter.

Although, like Miles, most government officials remained silent, some citizens stood up and protested against the unfair treatment of their neighbors. In an affidavit to the governor sent by James Matsu's father, Tom Matsu of Belen, he included a petition signed by 31 Belen citizens. In his report, Curtis Munson emphatically stated that the Japanese-Americans should not be judged as a group, and he duly noted the differences between the various generations. But the government totally disregarded the report and viewed all people of Japanese descent as enemy aliens. In 1980 the congressionally appointed Commission on Wartime Relocation and Internment of Civilians released a report stating that the historical causes of the evacuation did not arise from the officially stated reasons of "mutual self-protection" and "military necessity," but from "race prejudice, war hysteria and a failure of political leadership."

During World War II, many Japanese Americans tried to display their loyalty and patriotism by enlisting in the armed forces. Over 300,000 served in uniform. The 442nd Regimental Combat Team was an all Japanese American unit, and became famous for being the most highly decorated unit in the armed forces. Many Japanese American officers were awarded the Congressional Medal of Honor (SRCA).

Hiroshi "Hershey" Miyamura was a New Mexican who served in the 442nd. Following World War II, Miyamura reenlisted in the army and fought in the Korean War. After spending two years as a prisoner of war, he was awarded the Congressional Medal of Honor for his heroic actions, which saved many American lives.

Excavations at Gonzales Elementary School

Previous Archaeological Work

In 2003 the OAS performed mechanical trenching and hand excavation in the portion of LA 134297 in the area of a proposed library addition at Gonzales Elementary School. Previous archaeological projects (e.g., Baletti et al. 2001) included a background assessment (mainly historical) and test excavations revealing a possible thermal feature (Dorshow 2002). A subsequent OAS data recovery program revealed that this feature was not a formal hearth (Hannaford 2003). The library site showed no further indications of subsurface deposits, and construction of the building proceeded.

Two kilometers west of LA 134297 is LA 48639, currently covered by a residential subdivision. It was described as an extensive Late Developmental– to Classic-period buried deposit along the ancient Santa Fe River floodplain (NMCRIS files). This site was observed by Stewart Peckham, then with the Laboratory of Anthropology, who emphasized its importance because it suggested there were extensive deposits along the ancient floodplain and because of its implications for settlement and subsistence in this important time period.

The Gonzales School Testing Project

The main goal of the OAS project in 2009 was to define the extent and nature of the cultural deposits within the previously defined site boundaries. Between May 11, 2009, and May 19, 2009, the OAS undertook mechanical test trenching of the proposed project area as specified by in the testing plan (Lentz 2009) and in accordance with provisions outlined in "Test Excavations under a General Permit" (NMAC 4.10.16.9) and "Mechanical Excavation of Archaeological Sites" (NMAC 4.10.14).

The amount of disturbance, as specified in Paragraph A (NMAC 4.10.16.9), was limited to less than 5 percent. Based on the project dimensions, it was calculated that the total area to be tested was 13,000 sq m. Initially, this sample amounted to 260 linear meters, or twenty 10 and 20 m backhoe trenches (BHTs). However, some modifications to this formula were made as in-field conditions required (see below). Prior to mechanical excavation, a utility-location subcontractor found and marked active lines and pipes within the project area. An electric utility line stretched from a telephone pole switch box on the north along a cinderblock fence to a utility box on the south (Fig. 5). This was the only active utility line within the project area.

Two backhoes were used for three days, and one backhoe was used for one additional day. Since the area was an active schoolyard, the trenches covered the maximum extent of the project area while not interfering with recreation activities or playground equipment. The following field methods were employed:

- Site maps were produced using a Nikon total station. A scaled map for the site was produced to depict the datum and all test trenches, artifact concentrations, and features.
- Surface artifacts were collected prior to excavation.
- The excavations conformed to OSHA (1985) safety standards as set forth in 29 CFR 1926, Subpart P, particularly trench depth and safeguarding areas of mechanical activity.
- Trench profiles were hand cleaned ("faced") to inspect for features and material remains.
- Except when the loose soil became hazardous to the archaeologist, all trenches were profiled with drawings and photographs, and described in scientific methodology, including Munsell terminology.
- Each bucket load was monitored for artifacts, and the resulting backdirt was examined for artifacts.
- Artifacts were opportunistically retrieved from the trenches and collected from strata and features exposed within the backhoe trenches.
- All trenches were mechanically backfilled after recording and mapping.

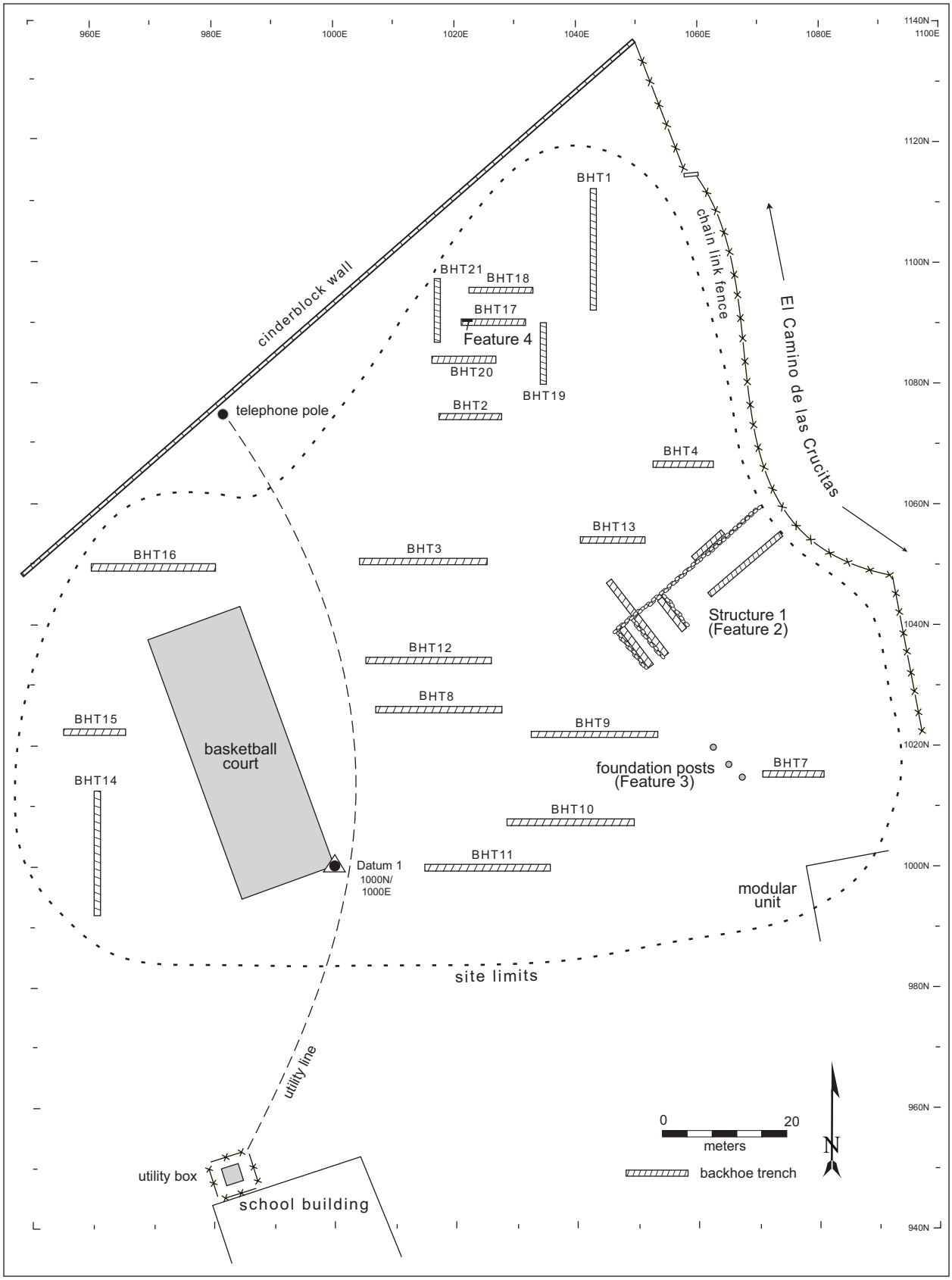

Figure 5. Plan of LA 134297 and backhoe excavations.

Stratigraphy

A total of 270 linear meters were excavated, 10 meters in excess of the original 2-percent estimate. The extra 10 meters were necessary to thoroughly investigate a potential thermal feature in Backhoe Trench 17. Each backhoe trench was given a sequential number. In compliance with OSHA safety standards (29 CFR 1926, Subpart P), no trench exceeded 4 feet (1.5 m) in depth.

Nine 20 m trenches were excavated. Each trench was 20 m (65.62 feet) long, 1.0 m (39.37 inches) wide, and 1.5 m (4 feet) deep.

Twelve 10 m trenches were excavated. Each trench was 10 m (32.80 feet) long, 1.0 m (39.37 inches) wide and 1.5 m (4 feet) deep.

One 15 m trench was excavated. It was 15 m (49.2 feet) long, 1.0 m (39.37 inches) wide, and 1.5 m (4 feet) deep.

An additional 45 meters of trenching were used to define a masonry foundation (Feature 6), bringing the total of subsurface investigations to 315 linear meters, or a sample of 2.42 percent (Fig. 6).

Subsurface stratigraphy was relatively consistent throughout the trenches, with the exception of BHTs 14 and 16. The upper strata was dominated by Strata 1 and 2, but at their bases (at 1.5 m) occurred what is referred to colloquially as "Santa Fe muck." This dark, marshy, viscous A soil horizon is found throughout Santa Fe. These subsurface attributes bear out the observation that the project area was once part of the ancient Santa Fe River floodplain.

All artifacts and soil horizons were provenienced in terms of depth below ground surface (bgs).

Stratum 1

Stratum 1 averaged 50 cm thick across the site and was defined in BHT 4 (Figs. 7 and 8). The top 10 to 20 cm of this stratum was disturbed by mechanical activities, and cultural inclusions were a mix of modern, historic, and prehistoric materials. It consisted of slightly compacted medium-grained sand with small pebbles and gravels. The color of Stratum 1 was 7.5YR 5/4 brown.

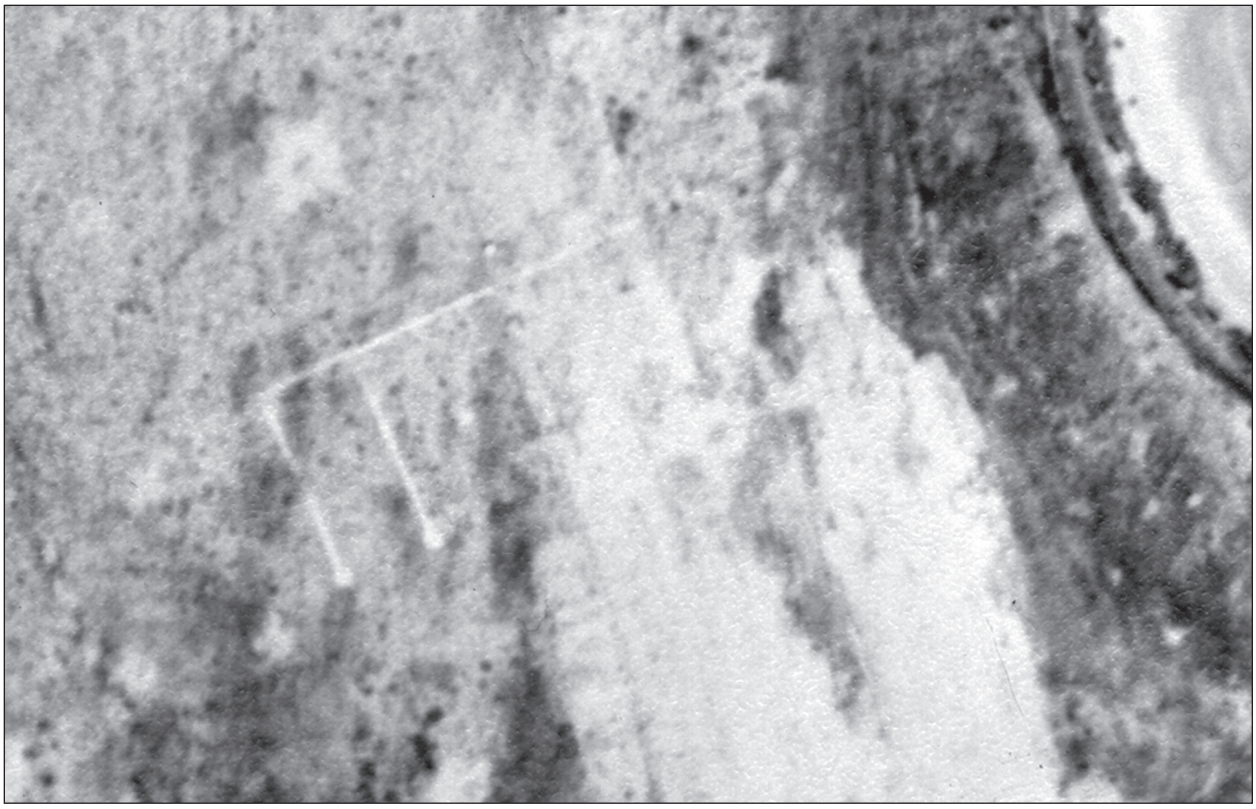

Figure 6. Aerial photo showing foundation adjacent to El Camino de las Crucitas.

Figure 7. BHT 4, showing Strata 1–3.

Stratum 2

Stratum 2 averaged 10 to 20 cm thick across the site and was defined in BHT 4. It was characterized by compacted fine sand, slightly moist, with no gravels or artifact inclusions. The color of Stratum 2 was 7.5YR 6/4 light brown.

Stratum 3

Stratum 3 averaged 10 to 40 cm thick. Like Strata 1 and 2, it was defined in BHT 4. Stratum 3 was composed of compacted brown, fine- and coarse-grained sandy soil horizon with small pebbles and occasional cobbles varying between 10 to 20 cm in diameter. The color of Stratum 3 was 7.5YR 5/4 brown.

Stratum 4

Stratum 4 consisted of alluvially deposited sand found in a low-energy water channel or arroyo that traversed the site along a northeast-southwest trajectory. It is characterized by nonplastic coarse-grained sands with pebbles, gravels, and small to medium-sized cobbles. The color of Stratum 4 was 7.5 YR 3/4 dark brown.

Stratum 5

Stratum 5 was a highly compacted clay with some sand averaging 15 cm thick (particularly in BHTs 10, 17, and 19) with occasional charcoal, small ash, and artifacts. The color of Stratum 5 was 7.5YR 6/4 light brown.

Stratum 6

Stratum 6 was an alluvially deposited series of laminated sands and pebbles. These lenses contained nonplastic fine-grained and coarse-grained sands. A majolica sherd was found at the base of this stratum in BHT 11. The color of Stratum 6 was 7.5YR 6/4 light brown.

Stratum 7

Stratum 7 consisted of a 20 to 30 cm thick undisturbed layer of massive laminar coarse-grained sand with copious amounts of small

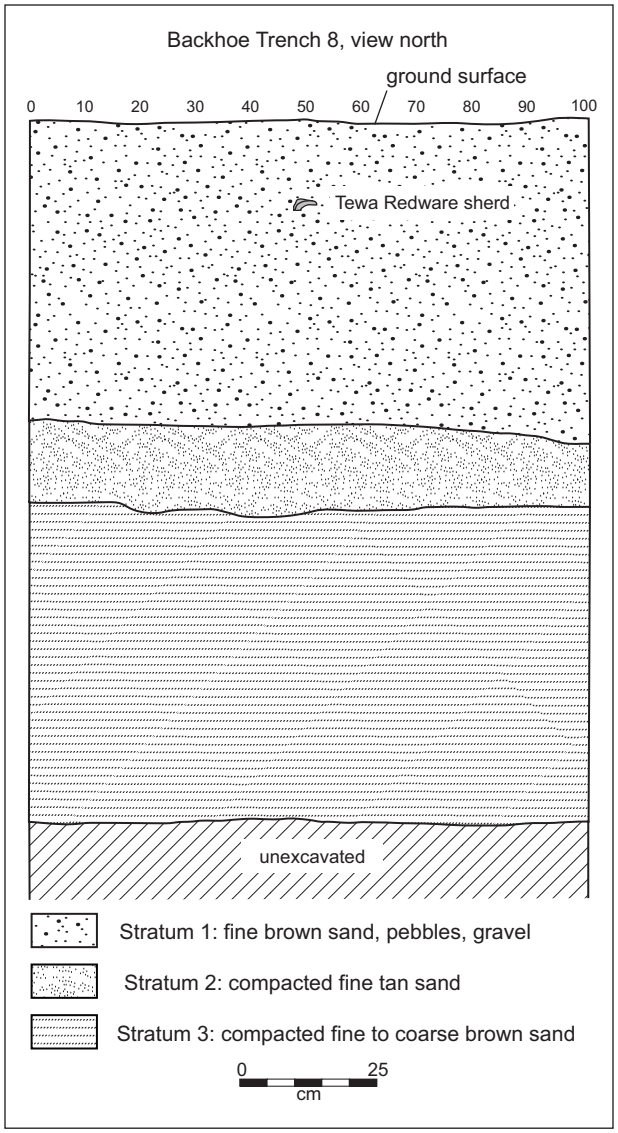

Figure 8. Profile of typical stratigraphic sequence in all trenches except BHTs 14 and 16.

gravels. The color of Stratum 7 was 7.5YR 6/4 light brown.

Stratum 8

Stratum 8, a dark, marshy, viscous A soil horizon known colloquially as Santa Fe muck, occurs throughout Santa Fe (Fig. 9). It was observed only in BHTs 14 and 16 at a depth of 1.5 m. It may be the result of percolating detritus from centuries of human occupation, since it frequently contains cultural materials. Hannaford (2003:31) described it as Stratum XI after Dorshow (2002:18). This stratum occurred frequently in the library-addition component, south of the current project area, and infrequently in the proposed northern construction area. According to Dorshow (2002), this stratum contained concentrations of charcoal and artifacts and possibly a thermal feature. The possible feature was investigated by Hannaford (2003:31); concentrations of artifacts were identified, but no intact features were encountered. The color of Stratum 8 was 10YR 3/3 dark brown.

Trench Descriptions

Twenty-two 20 m, 10 m, and 15 m long trenches were placed in large vacant areas free of buildings or playground paraphernalia. In general, the stratigraphic sequence at LA 134297 consisted of various thicknesses of Strata 1, 2, and 3. BHTs 14 and 16 varied from the standard stratigraphy in that they contained a swamp-deposit stratum at the bottom.

BHT 3

BHT 3 had 30 cm of disturbed sandy overburden, followed by 27 cm of Stratum 2, underlain by Stratum 3. Bisecting Stratum 3 was an alluvial channel which at first was interpreted as an acequia but which, upon further investigation, turned out to be a natural water course (a small arroyo) characterized by 18 cm of alternating sand laminae and waterworn gravels (Stratum 4). No artifacts were encountered.

BHT 8

BHT 8 consisted of 55 cm of Stratum 1. A Tewa Red sherd was found at 15 cm bgs. Stratum 1 was followed by 12 cm of culturally sterile Stratum 2 and compacted Stratum 3 to the base.

BHT 9

BHT 9 resembled BHT 3 in that the arroyo was partly present. The fill of the arroyo in BHT 9, designated Stratum 4, was composed of the same combination of sand, gravels, and waterworn pebbles as BHT 3. The long axis of Stratum 4 measured 50 cm and overlapped into Stratum 3. One meter to the west, at 40 cm bgs, was a cluster (n = 16) of large Tewa black jar sherds and

Figure 9. BHT 14, showing the dark stratum known colloquially as Santa Fe muck.

a single sherd of historic Tewa micaceous plain ware pottery.

BHT 10

Unlike the other trenches, the overburden of the south profile of BHT 10 was formed from Stratum 5 deposits. The overburden was a highly compacted clay with some sand, occasionally charcoal, small ash, and artifacts, averaging 15 cm in thickness. This was underlain by Stratum 6, a 1 m thick alluvially deposited series of laminated sands and pebbles. These lenses contained both nonplastic fine-grained and coarse-grained sands. The sequence was completed by a lens of Stratum 7, an undisturbed layer of massive laminar coarse-grained sand with copious amounts of small gravels. Approximately 25 bones, 10 ceramic artifacts, and 1 lithic artifact were encountered in Stratum 1.

BHT 11

BHT 11 was along the extreme southern margin of the project area. It displayed the usual depositional sequence. However, more artifacts were encountered along the north and south faces of the trench. It appears that the deposits had undergone some low-energy alluvial activity when it was an active floodplain. BHT 11 yielded numerous artifacts, including ceramics (n = 8), saw-cut cow bone, and a lithic core, all confined to Stratum 1. At the base of compacted Stratum 6, a historic Spanish majolica (Aranama) sherd was encountered at an elevation of 1.45 bgs.

BHT 14 and BHT 16

As discussed above, the stratigraphy of BHT 14 and BHT 16 departs substantially from that of the others. Along the west edge of the project area, BHTs 14 and 16 were some distance from those on the east side. This geographic separation may account for the distinctive stratigraphy found in their profiles. This area is lower and, as such, may have accumulated more moisture than elsewhere, resulting in the cienega deposits that dominated the bases of these trenches. These deposits consist of a dark marshy viscous "A" soil horizon. It may be the result of percolating detritus from

centuries of human occupation, or floodplain alluvium. In Hannaford's (2003:31) excavation, he described this soil horizon as similar to Stratum XI, defined by Dorshow (2002:18). Dorshow's and Hannaford's cienega deposits had artifacts, whereas those investigated during the current project did not. However, close examination was impossible because of a highly unstable, sandy, loosely consolidated Stratum 1 overburden, which precluded entering the trenches.

Feature Descriptions

Four features were encountered, two of which turned out to be natural rather than cultural phenomena.

Feature 1

When Feature 1 was encountered in BHT 9, we thought it was an irrigation ditch (acequia). However, further investigation revealed it was a natural water channel. Consequently its status as a cultural occurrence was voided.

Feature 2

Feature 2 was the most conspicuous feature within the project area. It consisted of a rectangular foundation along the eastern margins of the site (see Figs. 5 and 6). The foundation was visible on the surface, and it is recorded on various aerial photographs and topographic maps dating back several decades. Its presence has been noted locally since at least World War II (Michael Lee, personal communication, 2009). These alignments were exposed through surface scraping and mechanically tested with additional trenching. The scraping revealed a north wall 30 m long, which appeared to continue outside of the project boundaries and under Camino de las Crucitas.

No occupational surface was found. The construction was of unmodified angular limestone elements, laid in a trench excavated into sterile sand, averaging 50 cm deep and 60 cm wide (Fig. 10). While the subsurface elements were placed in random orientation, the surface of the foundation was flattened and bonded with mortar, suggesting it had supported adobe walls. Three associated cross walls were exposed (Figs. 11 and 12).

The corner of the northwest cross wall and the northern base wall was cut using a diamond-bladed rotational saw. This technique proved effective in exposing a profile of the corner of the structure, showing that the masonry was interlocked (Figs. 13 and 14). Interlocked walls, as opposed to abutted walls, indicate that the entire structure was constructed in a single episode. The building elements—primarily the masonry and mortar—indicate that the feature dated to the first half of the twentieth century. There were no artifacts in association.

Feature 3

Feature 3 is undoubtedly from the same time period as Feature 2. It consisted of three historic masonry post foundations, two of which contained rotted wood remnants (Figs. 15 and 16). The post foundations were each 50 cm in diameter. The southernmost foundation had an upright wooden element both inside and outside of the masonry. These post foundations averaged between 14 and 32 cm high. The construction materials were identical to those in Structure 1, and it was concluded that the two features were contemporaneous.

Feature 4

Feature 4 consisted of what was initially thought to be a thermal feature (Figs. 17 and 18). It was revealed in BHT 17. Despite close monitoring, the backhoe may have removed a portion of the feature, although no traces were found in the backdirt. The feature was in Stratum 3, a hard clay layer in the lower portion of the trench. One ceramic artifact, a historic Native micaceous utility ware, was protruding from the thin lens of ash and charcoal comprising the feature. No oxidized soil was observed, and no other artifacts were found.

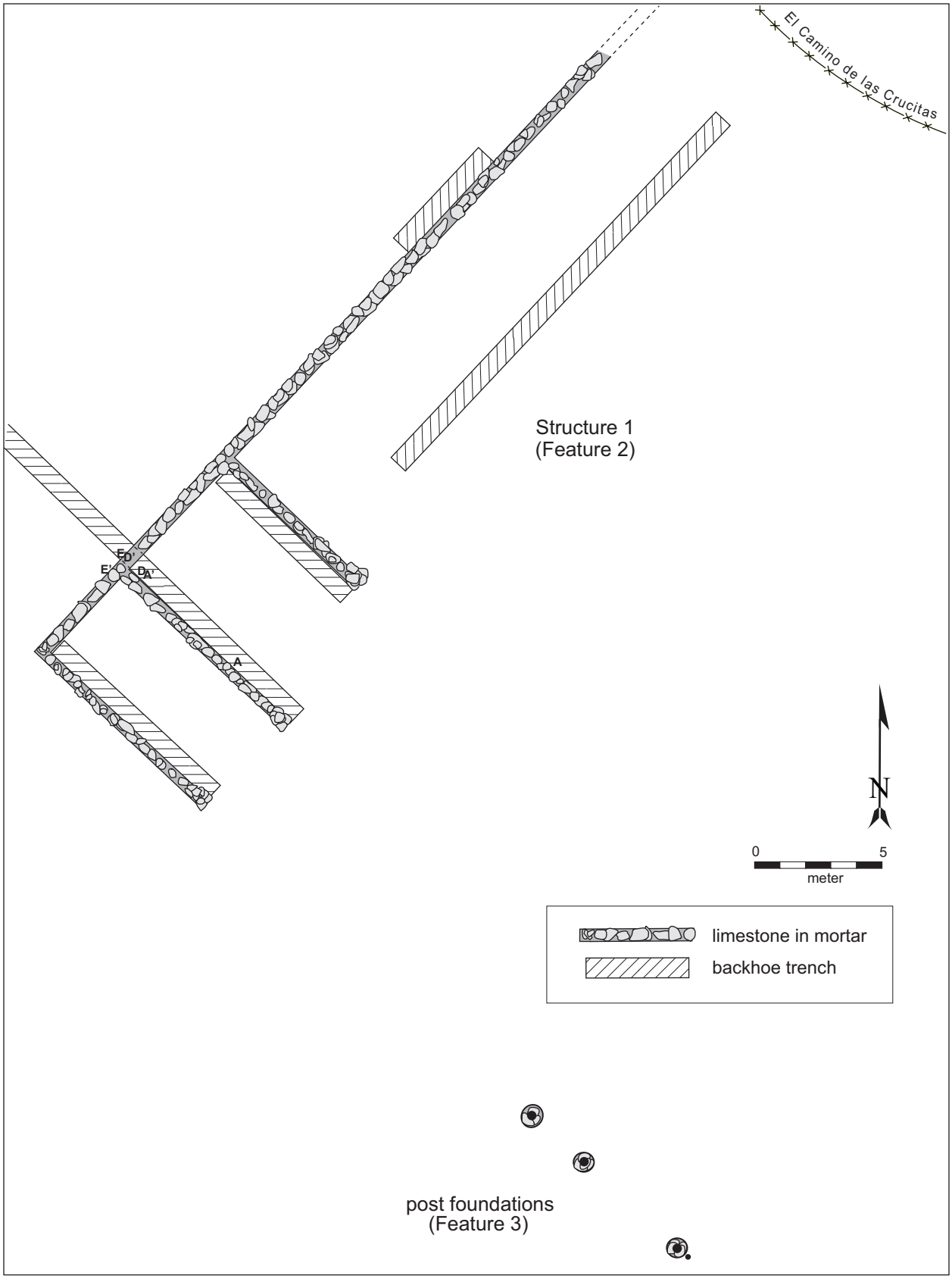

Figure 10. Plan of Features 2 and 3.

Figure 11. West and center cross walls, Feature 2.

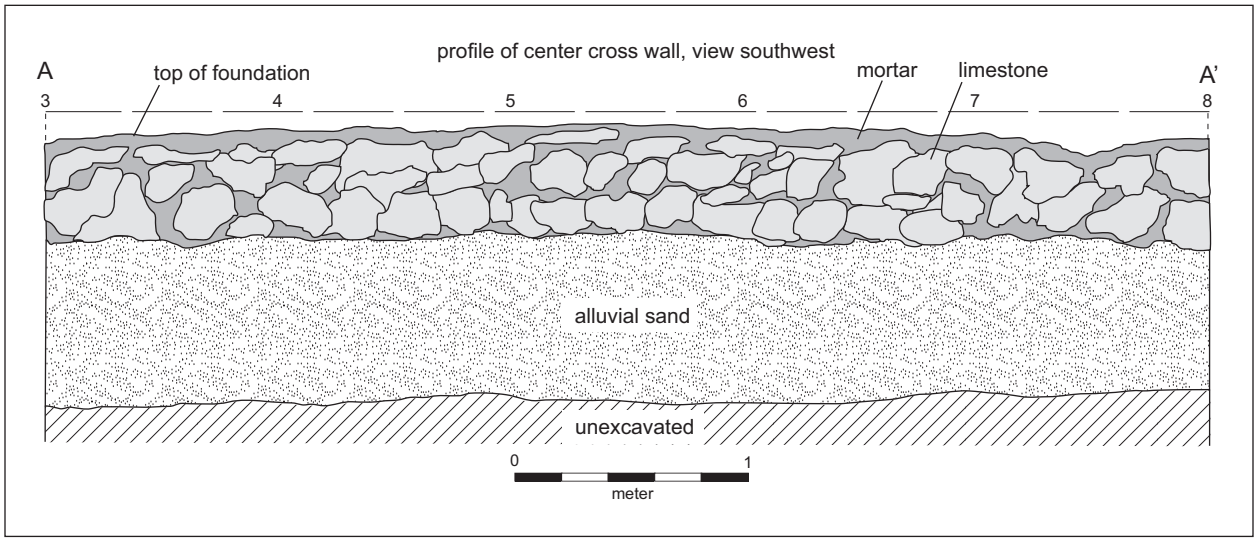

Figure 12. Profile of cross wall, Feature 2.

Figure 13. Corner of base wall and northwest cross wall.

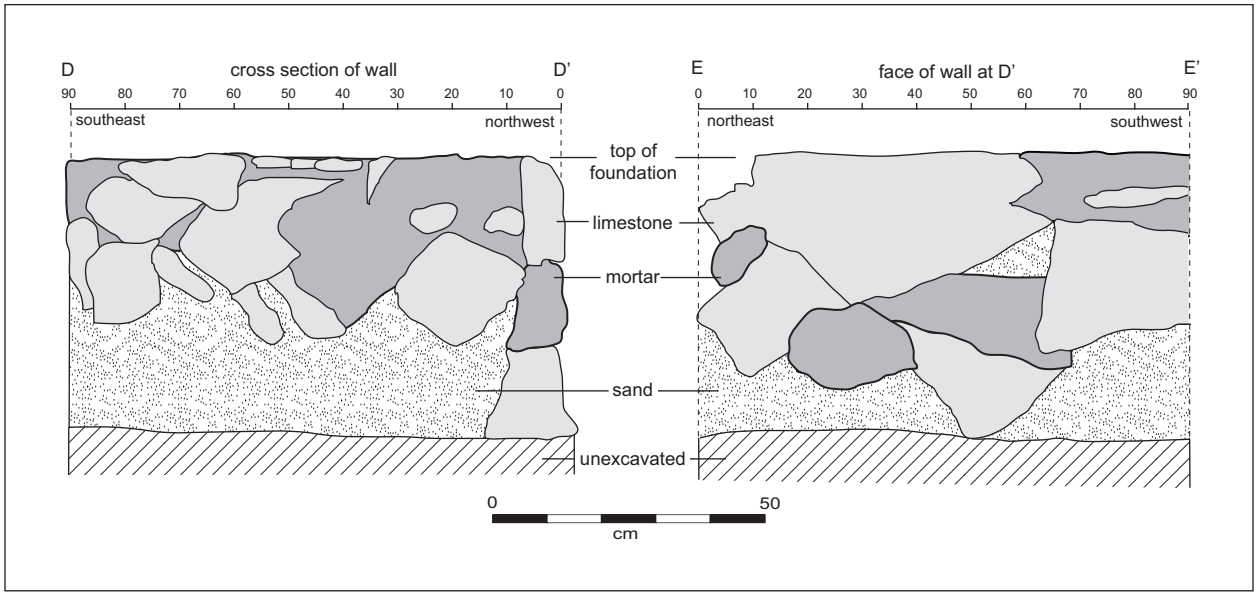

Figure 14. Profiles of wall corner.

Figure 15. Post foundations and posts, Feature 3.

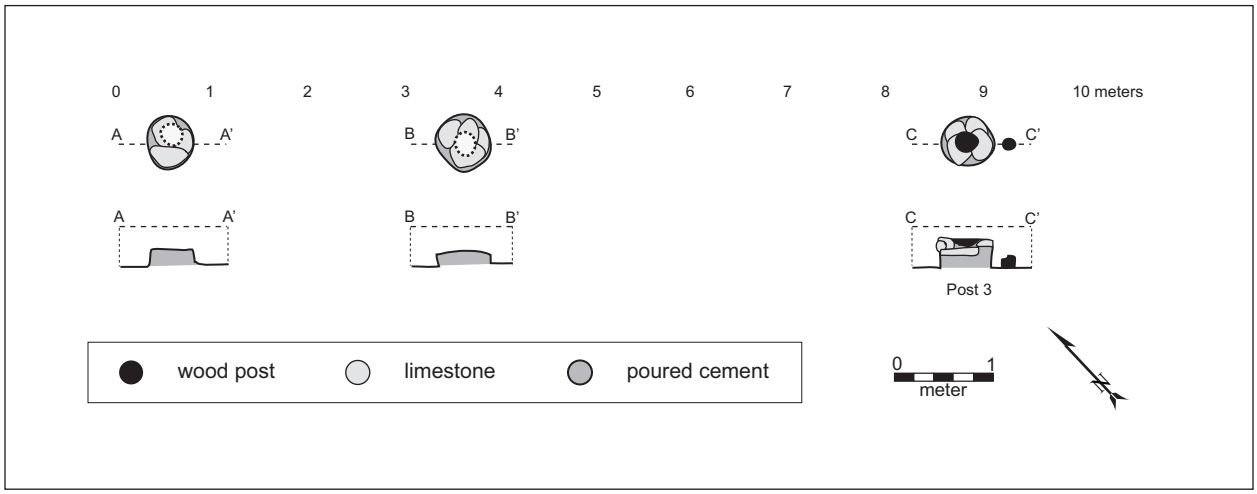

Figure 16. Plan and profile of post foundations and posts, Feature 3.

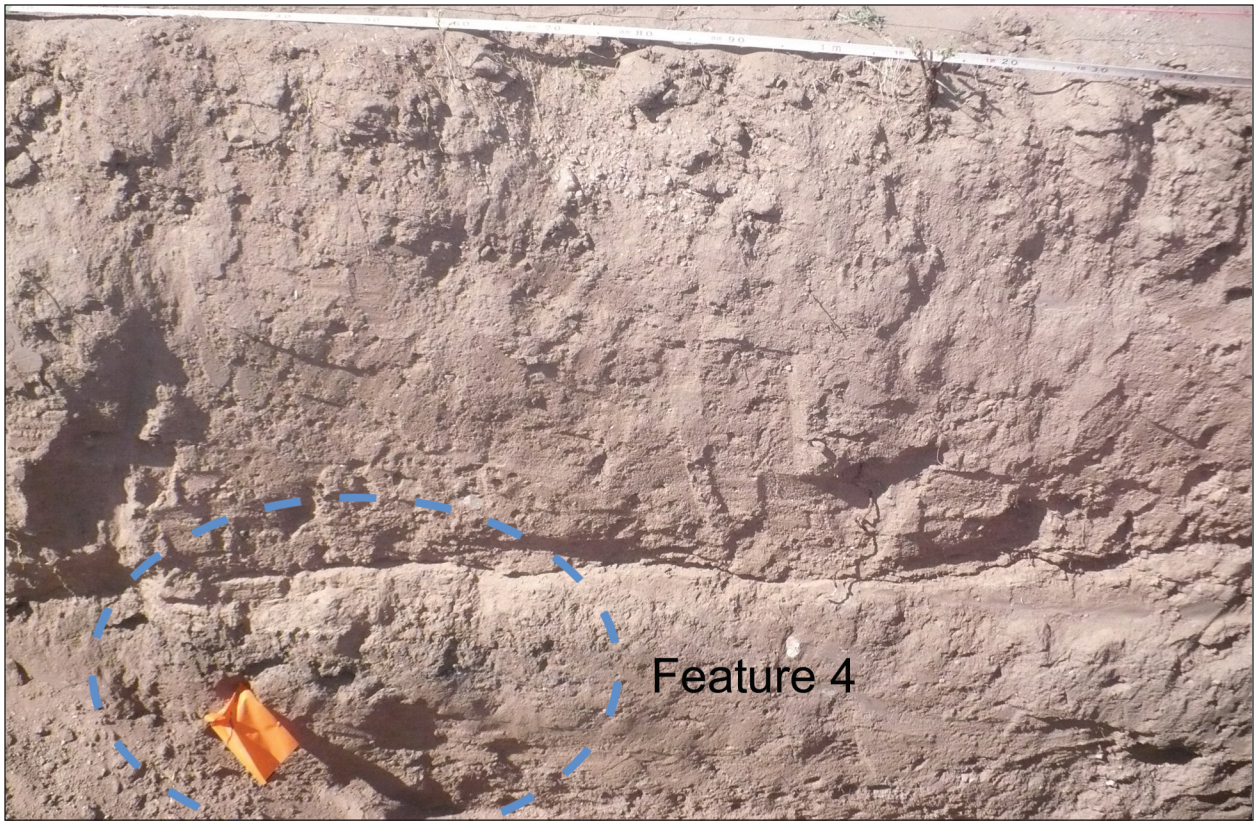

Figure 17. Feature 4, BHT 17.

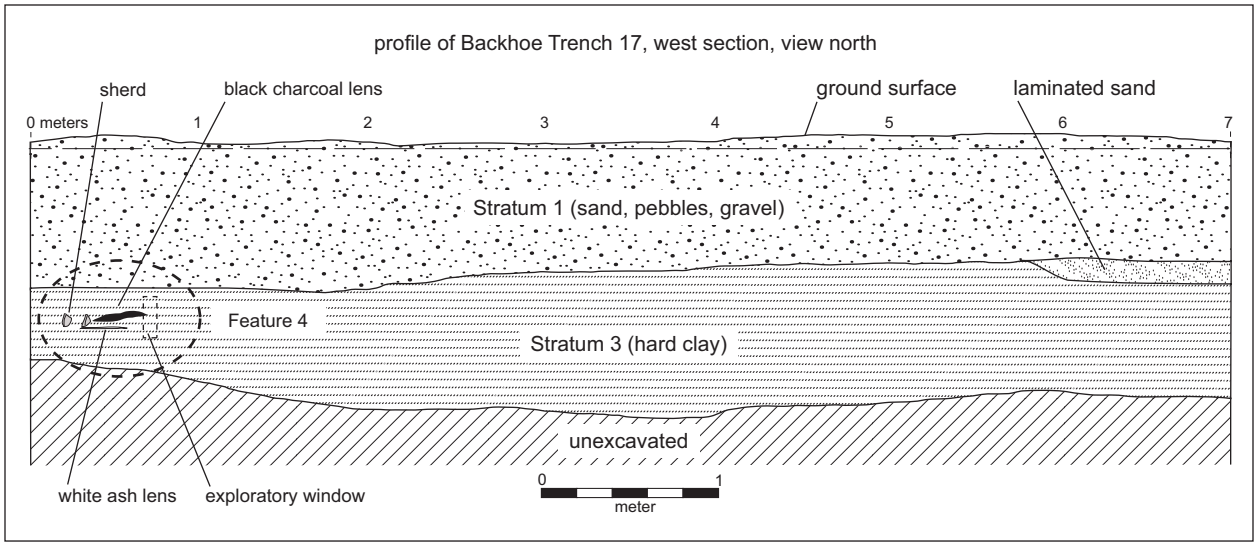

Figure 18. Profile of Feature 4, BHT 17.

Artifact Analysis

A total of 82 artifacts were opportunistically collected from the surface prior to excavation and during trenching. Surface and subsurface deposits were widely dispersed across the site. They included 38 ceramic artifacts, 28 pieces of cow and sheep/goat bone, 9 items of ground stone, 1 lithic artifact, 1 majolica (Aranama) polychrome, 1 core, 1 hammerstone, and 3 pieces of corroded metal.

Ground Stone

Nine items of ground stone were recovered from LA 134297, primarily from mixed contexts or collected from the surface prior to the excavation of a backhoe trench, as specified in the testing plan (Lentz 2009).

FS 9-1 is a two-hand mano of fossiliferous chert. It is the broken end of a mano, ground on both sides, with no striations, adhesions, or evidence of burning. It measures 126 by 75.81 by 21 mm and weighs 310.3 g.

FS 9-2 consists of a circular, whole, shaped one-hand mano of micaceous schist. It is bifacially ground and shaped and measures 140 by 130 by 19 mm. It weighs 2.2 kg.

FS 9-3 is a polishing stone made of white chert. All five facets are polished. It measures 37.33 by 28.3 by 18.6 mm and weighs 26 g.

FS 9-4 is a cylindrical chert pestle, whole, with the distal end ground with some black adhesions, and some reddening (ochre or fire reddened) measuring 58 by 26 by 19 mm and weighing 40.1 g.

FS 9-5 is a one-hand mano reused as pecking stone. Originally it was a medium-grained gray quartzite river cobble. Indirect percussion has produced two negative flake scars. It has one pecked, ground surface. It measures 66.19 by 58.06 by 50.26 mm and weighs 180.5 g.

FS 9-6 is a whole, circular, one-hand biscuit quartzite mano, bifacially ground, with one surface pecked. It is reddened on one side. It measures 83 by 73 by 40 mm and weighs 500.2 g.

FS 9-7 is a hammerstone of red Madera coarse-grained chert. Originally it was fire-cracked rock and was subsequently reused as a hammerstone. Four edges displayed battering from percussion. It measures 47.26 by 40.79 by 39.41 mm and weighs 80.8 g.

FS 9-8 was one-half of a circular hammerstone made from gray quartzite with battering along two edges. It measures 54.82 by 27.23 by 21.65 mm and weighs 35 grams.

FS 9-9 is the shaped-end portion of a one-hand granite mano, with an irregular outline and one ground surface with striations and charcoal adhesions. It measures 105 by 80 by 20 mm and weighs 300 g.

Few conclusions can be drawn from this small assemblage, primarily due to the artifacts' lack of contextual integrity. The majority of the ground stone was located in ambiguous, mixed contexts, that is, the surface, a few centimeters below the surface, or within Level 1, which was also disturbed by mechanical activities and wind and water erosion. For years, this area has been mechanically bladed to clear weeds or to level the surface.

Despite disturbance to the upper levels, some information can be gained from the analysis. The morphology of these tools implies specific behaviors and activities. Foremost is their role in reducing grain by grinding, pounding, or mashing domesticated crops like corn and wild foodstuffs and perhaps the processing of animal hides and the production and maintenance of weapons. The presence of ground stone artifacts suggests systematic use of this area for centuries. Given the presumed agricultural use of this area, one would expect to find ground stone in the vicinity.

Euroamerican Artifacts

Matthew Barbour

Euroamerican artifacts were not available in the American Southwest prior to the establishment of European settlements in the sixteenth century. These assemblages typically include a variety of artifact types such as bottle glass, can or metal

fragments, and wheel-thrown ceramics.

Six Euroamerican artifacts were recovered and analyzed as a result of archaeological testing at LA 134297. They consist of a single majolica soup plate sherd, a barrel-hoop fragment, and four can fragments. I analyzed these artifacts with standard methods outlined in Boyer et al. (1994) to quantify Euroamerican assemblages.

Majolica Soup-Plate Sherd

One majolica soup-plate sherd was encountered in BHT 11, at the base of Stratum 6 and roughly 1.4 m below the present ground surface. Majolica is a wheel-thrown earthenware covered with an opaque glaze that gives it the appearance of porcelain. This glaze color is achieved by adding tin oxide to a lead glaze following the same process by which delft and faience ceramic vessels are produced (Deagan 1987:53). Majolica was originally invented in the eastern Mediterranean sometime before the birth of Christ and made its way into Europe with the invasion of Spain by the Moors in AD 711. From there majolica manufacture dispersed across Europe. By the discovery of the New World in 1492, a variety of independent traditions had arisen in the different regions of Europe, extending into the Spanish colonies, where they were transformed into the various types of New World majolica.

The sherd is Aranama Polychrome, from the Puebla majolica tradition of Mexico (Fig. 19). A multicolor decorated ware on a white background, Aranama Polychrome is thought to be an elaboration of Abo Polychrome (Goggin 1968:196–198). Decoration on Aranama Polychrome is similar to that of Abo Polychrome, with balloonlike or leaflike elements accented with fine black lines. Like Abo Polychrome, Aranama vessels have an orange- or yellow-banded design framed in black near the rim. However, Aranama Polychrome differs from Abo Polychrome in that design elements encompass more of the vessel (less area is left undecorated), and there is no central human or animal motif. Aranama Polychrome was produced between 1750 and 1800 (Deagan 1987:87).

The fragment found at LA 139297 is 5.2 cm long, 4.5 cm wide, and 0.7 cm thick. It weighs 16.5 g.

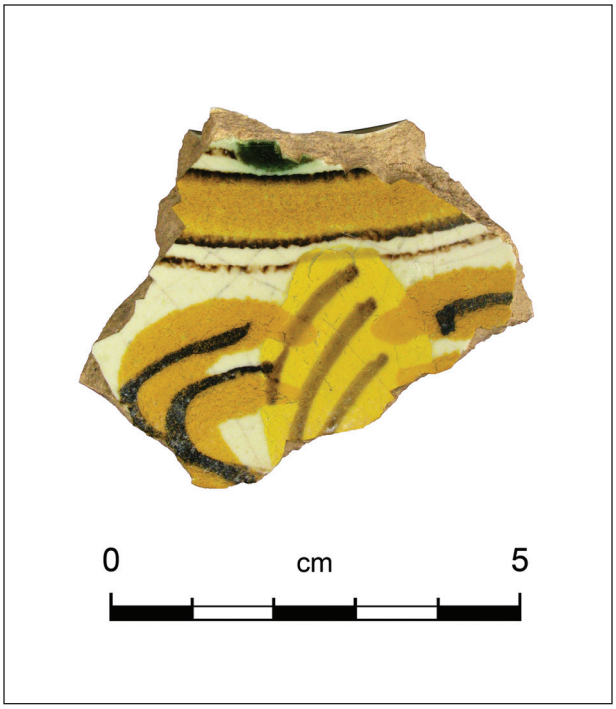

Figure 19. Aranama Polychrome sherd, BHT 11.

Barrel-Hoop Fragment

One barrel-hoop fragment was found in BHT 9. It was presumably cut from iron sheet metal, which was then hammered into shape. It measures 15.4 cm long, 3.9 cm wide, and 0.2 cm thick, and weighs 87.6 g.

Can Fragments

Four can fragments were collected from BHT 9. Solder on two of the pieces suggests the can or cans were manufactured in the late nineteenth or early twentieth century, before the wide-scale adoption of the sanitary can, which required no solder, in 1904 (Rock 1984:105). The fragments are too small to infer can size or shape. Collectively the can fragments weigh 13.1 g.

Summary and Interpretation

Historic use of LA 134297 was well documented throughout the twentieth century. However, the four can fragments and the Aranama Polychrome majolica soup-plate sherd may date to earlier time periods. These artifacts could represent in situ deposition during the eighteenth and nineteenth

centuries, or they may have been transported by alluvial processes onto the site. No Euroamerican materials collected could be directly tied to the Civilian Conservation Corp camp, the Japanese internment camp, or the Allen Stamm housing project, all of which occupied the site at various times throughout the 1930s and 1940s.

Ceramic Artifacts

A total of 38 sherds were opportunistically collected during trenching operations at Gonzales School and analyzed in the laboratory.

FS 1 (BHT 9) is a Chupadero Black-on-white jar sherd, striated on the interior. The paste is gray, and the temper consists of stone and crushed sherd. It dates to AD 1150–1550 (Oppelt 1988:246).

FS 2 (BHT 9) consists of 16 Tewa (Kapo) black or gray jar sherds from the same vessel, which were conjoined (Fig. 20). When partly reconstructed, the vessel appeared to be a short-necked globular olla with thin walls, a high polish, and tuff temper. Some oxidation flares from uneven firing are present on the exterior. The sherds date to AD 1650–present (Wilson 2005:13).

FS 2 (BHT 9) is one sherd of micaceous plain ware pottery, probably dating to between AD 1350 and 1450 (Warren 1981).

FS 3-1 (BHT 10) is one (Tewa?) polychrome bowl sherd, slipped, and painted on both sides. The paste is homogeneous Rio Grande paste with tuff. The sherd is highly carbonized. It dates to AD 1650–1725 (Wilson 2005:42).

FS 3-2 (BHT 10) consists of four sherds of Biscuit A. The walls are thick, with homogeneous paste and some tuff inclusions, and slipped on one side only with small mica content. These sherds are highly carbonized. They date to AD 1375–1450 (Oppelt 1988:242).

FS 3-3 (BHT 10) is one Tewa Micaceous (Petaca?) sherd with angular quartz and mica schist temper. The exterior is mica slipped, and the interior is polished black; it may have been manufactured at San Juan Pueblo). The sherd dates to AD 1800–1895 (Warren 1981: Table 1).

FS 3-4 (BHT 10) is one black utility jar sherd. The exterior surface has a black, slurried, lightly polished slip; the other side is unslipped and pitted. The paste is of coarse arkosic sand temper. The sherd dates to AD 1800–1895 (Warren 1981).

FS 3-5 (BHT 10) consists of two Rio Grande Micaceous jar sherds. They are mica slipped on both sides and have quartz, mica, and schist temper. They date after AD 1500 (Wilson 2005:16).

FS 7 (BHT 11) is one Tewa Black or Red jar sherd with tuff temper. It is polished red on one side and polished black on the other. It dates to AD 1650–present (Wilson 2005:13).

FS 7 (BHT 11) is one micaceous jar sherd (Ocate?), very thin walled, and mica slipped on both sides. The temper is mainly angular quartz and mica. It dates to AD 1550?–1750 (Oppelt 1988:274).

FS 5 (BHT 11) is one sherd of Tewa Buff or Red with a carbon core. The temper is dominated by vitric tuff and pumice. The vessel type is unknown. The walls are thin, and polished and slipped on both sides with identical color. It may date to AD 1625–present.

FS 5 (BHT 11) is one bowl sherd of Biscuit A, polished on one side. It is thick walled with tuff temper and dates to AD 1375–1450.

FS 5 (BHT 11) is one black utility bowl sherd, probably Tewa Micaceous. The temper is composed of angular quartz and arkosic sand. The interior is slipped micaceous, but the overall effect is of polished black. It dates to AD 1450–1700.

FS 5 (BHT 11) is one Tewa Black jar sherd. There is some mica on the interior, applied with a slurry slip. It has homogeneous temper and thick walls. It dates to AD 1650–1760.

FS 6 (BHT 11) is one Tewa Micaceous jar sherd, slipped on both sides, with medium to thick walls. It has hornblende and tuff temper, and dates to AD 1500–? (Wilson 2005:16).

FS 6 (BHT 11) is one Tewa Red bowl sherd, polished red on interior. It has homogeneous paste with large tuff inclusions. It dates to AD 1625–present (Wilson 2005:13).

FS 6 (BHT 11) is one Tewa Micaceous jar sherd. The paste is composed of angular quartz, mica, and tuff. The exterior is unpolished micaceous slip on both surfaces. It dates to AD 1500–? (Wilson 2005:16).

FS 10 (BHT 17) consists of two pieces of Tewa Black, possibly from the neck portion of a jar. The two pieces are from the same sherd, broken in two. Slipped on one side, it has thick

walls and angular quartz and tuff temper. It was associated with Feature 4, a disturbed, ephemeral lens. The sherds date to AD 1650–present (Wilson 2005:13).

FS 11 (BHT 19) is one Pindi Black-on-white bowl (?) sherd, dating to AD 1300–1350 (Stubbs and Stallings 1953).

Since the ceramic artifacts recovered from the Gonzales School project were found in a disturbed context, few meaningful conclusions can be drawn. Most of the pottery is from protohistoric and historic Pueblo times, from the sixteenth century to the present. These dates reflect the primary occupation of the project area.

Figure 20. Conjoined Tewa (Kapo) jar sherds, FS 2-1, BHT 9.

Conclusions

The purpose of this study was to determine if significant buried cultural deposits were present within the previously defined site boundaries. Testing of the 13,000 sq m area required 315 linear meters of trenching, or a sample fraction of 2.42 percent.

Four potential features were encountered, along with associated prehistoric and historic artifacts. An important obstacle to inferring past uses of the collected artifacts was their lack of contextual integrity. The majority of the artifacts were in ambiguous, mixed deposits, that is, on the surface or a few centimeters below the surface. For years, these deposits have been mechanically bladed to clear weeds and maintain the surface of the playground. Adding to the disturbance is significant wind and water erosion, and the likelihood that Gonzales students collected artifacts on the surface. Because the artifacts cannot be linked to any definite provenience, they could only be analyzed as an assemblage.

Artifacts that were opportunistically collected during the course of the testing program were surficial or recovered from secondary deposition. A lack of contextual integrity compromised the information potential of these artifacts. Only a single historic micaceous sherd (FS 10, broken in two) was associated with a possible feature (Feature 4). Subsequent radiocarbon dating proved this feature to be of mixed modern and prehistoric origin (see below). This disturbance precluded obtaining any useful information.

Features

When Feature 1 was originally encountered in BHT 9, it was thought to be an irrigation ditch (acequia). It was subsequently defined as a natural occurrence and did not require further treatment.

Features 2 and 3, a linear foundation and associated post foundations, yielded no associated artifacts and little information beyond architectural composition. Despite archaeological testing, the function and historic role of these alignments remains inconclusive. Intrinsic to early twentieth-century occurrences, the post foundations held little information potential beyond construction details. Further, the deteriorated remnants of wooden posts associated with them precluded tree-ring sampling. Baletti et al. (2001) suggest several historic uses for this property, including a Civilian Conservation Corps facility, probably associated with the barracks south of the river; an internment camp; and a Stamm housing project for returning veterans. The foundation may or may not have been a part of these events; however, its role was not verified during the OAS testing.

Feature 4 proved quite ephemeral, extending only 3 cm deep into the trench profile. It may have been the result of accidental disturbance from the backhoe, or it may have been a small feature to begin with. A small amount of charcoal and the collection of the single ceramic artifact exhausted much of its information potential. Because of the thinness of the ash lens, it was not possible to collect a botanical sample. In our opinion, no additional data could be obtained through further excavation, and the information acquired with testing constitutes adequate treatment of the feature.

A radiocarbon sample (Beta-264752) collected from Feature 4 yielded a pair of two-sigma calibrated dates: 300–60 BP (AD 1650–1890) and 40–0 BP (AD 1910–1950). With such broad standard deviations, it can only be assumed that the area had been disturbed, and what was initially interpreted as Feature 4 was determined to be a mix of modern and prehistoric materials of little interpretive value.

Artifacts

The artifacts that were opportunistically collected during the course of the testing program were surficial, or recovered from secondary deposition. Because of the lack of contextual integrity, the

information potential of these artifacts was compromised. Only one sherd, FS 10 from Feature 4, a historic Native micaceous utility ware, was associated with a possible feature. However, this feature turned out to be noncultural. These materials were processed according to standard OAS laboratory procedures and analyzed by qualified specialists.

Although several prehistoric ceramic artifacts were recovered (Chupadero Black-on-white, Pindi Black-on-white, and Biscuit A), the assemblage as a whole appears to be from the Spanish Colonial period. The location of the project area adjacent to the Santa Fe River may have encouraged ranching, farming, and settlement during the early Euroamerican period (Tigges 1990).

Recommendations

The purpose of this project was to determine the nature and extent of any buried deposits within the defined boundaries of LA 134927. The undertaking complies with standards for testing as set forth in "Test Excavations under a General Permit" (NMAC 4.10.16.9) and "Mechanical Excavation of Archaeological Sites" (NMAC 4.10.14).

The results of the testing program indicated that the data potential of the project area has been exhausted and that the testing program and ethnographic and archival research constitute adequate treatment of the resources within the boundaries of Gonzales Elementary School. No further investigations are recommended.

The OAS recommends that *WoodMetalConcrete* ARCHITECTURE, representing the Santa Fe School District, be allowed to proceed with its project. However, if significant cultural materials are discovered during construction, the Historic Preservation Division will be consulted to determine appropriate management strategies.

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