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Archaeological Monitoring Of Fiber Optic Line Installation within San Pedro Springs Park, San Antonio, Bexar County, Texas

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Archaeological Monitoring Of Fiber Optic Line Installation within San Pedro Springs Park, San Antonio, Bexar County, Texas

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**Archaeological Monitoring Of Fiber Optic Line Installation within San Pedro
Springs Park, San Antonio, Bexar County, Texas**

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Prepared for:

NX Utilities

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**Final Report
Redacted**

Prepared by:



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Texas Antiquities Committee Permit Number: 8123

ASF17-110-02

November 7, 2017

Management Summary:

In July 2017, NX Utilities (**CLIENT**), on behalf of AT&T, contracted **Raba Kistner Environmental, Inc. (RKEI)** to conduct archaeological monitoring of activities associated with the installation of new fiber optic lines within San Pedro Springs Park. Archaeological monitoring of the proposed project was requested by the City of San Antonio's Office of Historic Preservation (COSA-OHP) due to the location of the project within a previously recorded archaeological site (41BX19) which is listed as a State Antiquities Landmark and is designated as the San Pedro Springs Park National Register of Historic Places District. The project is located in central San Antonio, Bexar County, Texas and occurred on lands owned or controlled by the City of San Antonio, a political subdivision of the State of Texas. As such, the proposed undertaking is subject to review under the Antiquities Code of Texas (ACT) and the Historic Preservation and Design Section of the City of San Antonio's Unified Development Code (Article VI 35-360 to 35-364). All work was performed in compliance with the ACT under Texas Antiquities Committee Permit Number 8123.

The project is located within a public park and consisted of the monitoring of five locations. The undertaking involved the excavation of a handhole and four bore pits. Size of the excavations varied from 1 to 5 feet in length and 1 to 4 feet in width. Depths of the excavations ranged from 2 to 3 feet below surface. For archaeological purposes, the direct Area of Potential Effect (APE) for the project were the locations where the components were excavated.

During the investigations, a majority of the APE showed evidence of disturbance. Disturbances included park development, existing utilities, walkways, and landscaping. Monitoring of the excavations revealed that the upper 1 to 1.5 feet of the excavations were disturbed, in some cases disturbances reached the terminating depths of the excavations. One fragment of aqua glass and a chert flake were encountered at a depth of 2 feet below surface within BP 1. The cultural materials were encountered within a disturbed context and deemed non-significant.

Based on the archaeological services provided, investigations, **RKEI** does not recommend any further archaeological investigations within the areas monitored. However, should additional ground disturbing activities occur within San Pedro Springs Park, further work may be required. All field records and photographs produced during investigations are curated at the Center for Archaeological Research at the University of Texas at San Antonio.

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Introduction

Raba Kistner Environmental, Inc. (RKEI) was contracted by NX Utilities (**CLIENT**) on behalf of AT&T, to conduct archaeological monitoring of the excavation of bore pits and a handhole associated with the installation of new fiber optic lines within San Pedro Springs Park in San Antonio, Bexar County, Texas (**Figure 1**). The project is located on lands owned or controlled by the City of San Antonio, a political subdivision of the State of Texas. As such, the proposed undertaking is subject to review under the Antiquities Code of Texas (ACT) and the Historic Preservation and Design Section of the City of San Antonio's Unified Development Code (Article VI 35-360 to 35-364).

Archaeological monitoring of the proposed project was requested by the City of San Antonio's Office of Historic Preservation (COSA-OHP) as the undertaking is located within archaeological site 41BX19, also known as San Pedro Springs Park, a National Register of Historic Places District and State Antiquities Landmark (SAL). The purpose of the investigations were to identify, if possible, any archaeological deposits that may be located within the project area. Work was conducted on August 10, 11, and 15, 2017 by Project Archaeologist Kristi Borzea. Kristi Miller Nichols served as the Principal Investigator. All work was performed in compliance with the ACT under Texas Antiquities Committee Permit Number 8123.

Project Description and the Area of Potential Effects

The archaeological monitoring was situated along the east side of North Flores Street within San Pedro Springs Park. San Pedro Springs Park is the second oldest park in the United States and is known for significant Prehistoric and historic cultural remains. The proposed undertaking was located south of the park entrance on North Flores Street and involved the excavation of a handhole along North Flores Street. From the bore pit south of the park entrance, a directional drilled bore traversed the park grounds to the swimming pool changing area and restroom facility. Along this path four bore pits were excavated. For archaeological purposes the Area of Potential Effects (APE) are the locations where the handhole and 4 bore pits were excavated (**Figure 2**). The handhole measured 5-x-3 feet and reached a depth of 3 feet below surface. Sizes of the bore pits varied, ranging from 1 to 5 feet in length by 1.5 to 2 feet in width. The direct APEs is 0.0016 acres; the combined total of each component. Depths of each component varied, measuring approximately 2 to 3 feet below surface.

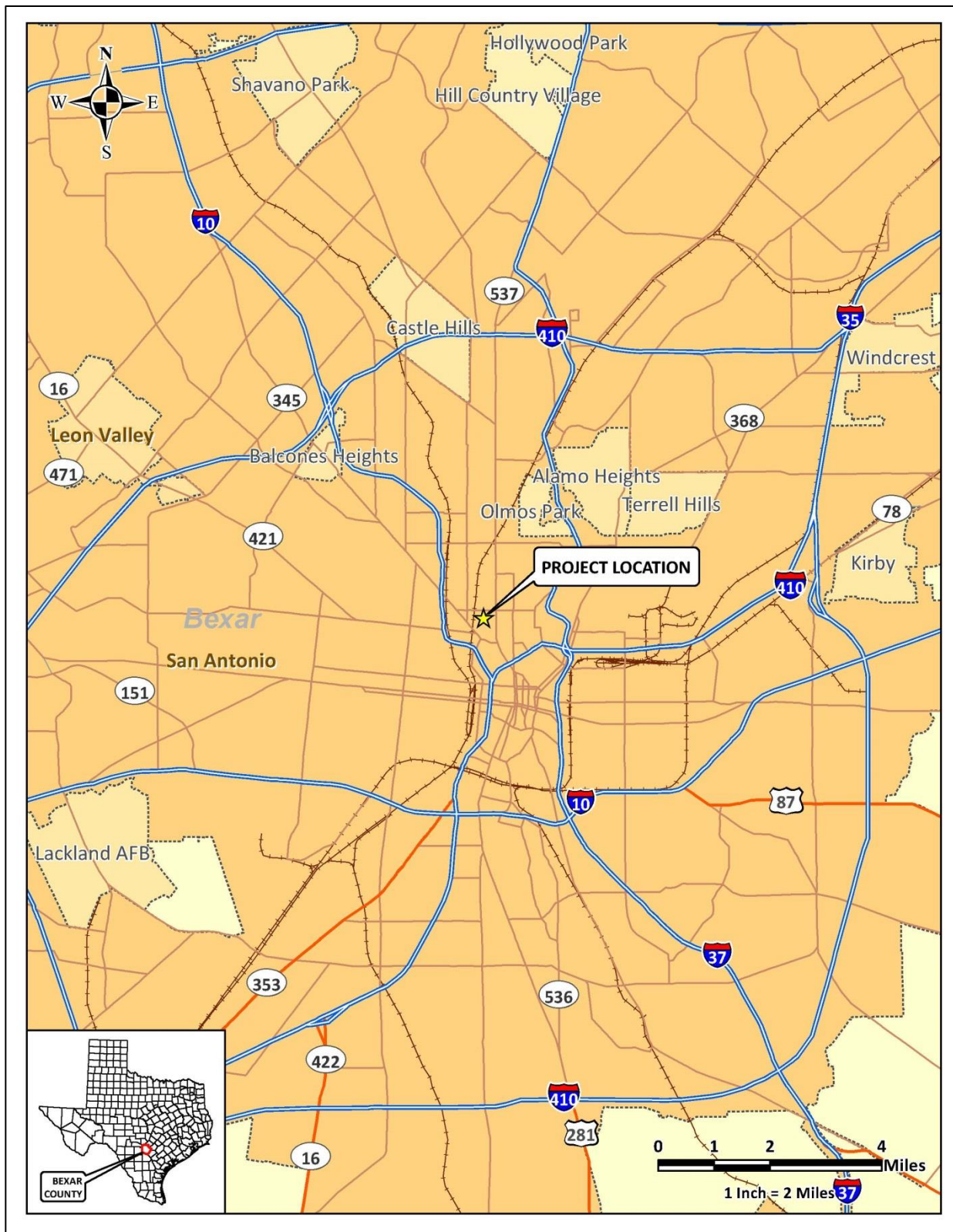


Figure 1. Project location map.

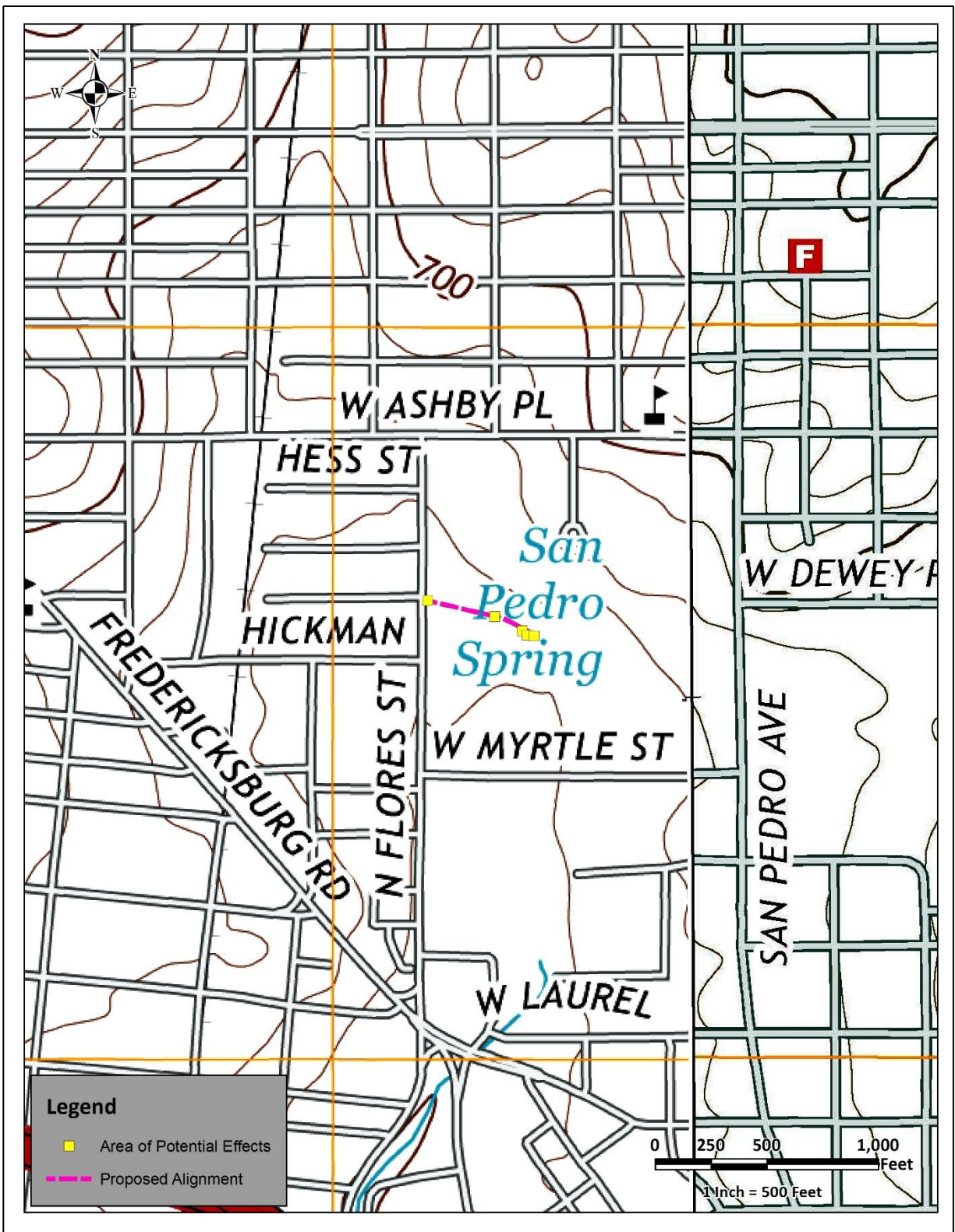


Figure 2. The APE on the San Antonio West, Texas (2998-244) USGS 7.5-minute topographic quadrangle map.

Environmental Setting

Project Area Setting

The project area is located in the south-central Texas geographic region within the Blackland Prairie eco-region. The Blackland Prairie is an area of low topographic relief and poor drainage, prone to frequent flooding (Collins 2004). The Blackland Prairie physiographic region is characterized by gently undulating topography and is generally defined as grasslands punctuated by riparian bands along creeks, rivers, and other drainages. Creation of the Blackland Prairies occurred during the late Tertiary, with the erosions of soils on the Edwards Plateau. These soils were deposited by eolian and colluvial processes across an existing, eroded parent material of the Gulf Coastal Plain, creating a mix of deep Tertiary and Quaternary calcareous clay soils (Black 1989).

Geology

The underlying geology of the project area is composed a small portion of Pecan Gap Chalk (Kgp) in the northwestern portion of the park and Austin Chalk (Kau) formation throughout the rest of the park. Pecan Gap Chalk reaches depths ranging from 100 to 400 feet, becoming thinner as it continues westward. The formation is composed of chalk and chalky marl that becomes calcareous as it thins (Barnes 1983). Austin Chalk reaches depths ranging from 350 to 580 feet, thickening as it continues westward. The formation is composed of chalk and chalky marl (Barnes 1983).

Soils

The soils of the project area are predominately composed of Branyon clay (HtB) (**Figure 3**). Branyon Series soils are characterized as very deep, moderately well-drained soils that are slowly permeable with slopes ranging from 1 to 3 percent. These types of soils are formed in calcareous clayey alluvium derived from mudstone of Pleistocene age deposits. Branyon soils are nearly level to very gently sloping soils typically encountered on stream terraces within river valleys and reaching depths up to 203 (cmbs) (NRCS 2017).



Figure 3. Soils encountered within the project area and vicinity.

Culture Chronology and Previous Archaeology

The project area is located at the cusp of Central Texas and South Texas archaeological regions (Turner and Hester 1999). Based on extensive research conducted by Black (1989), Collins (2004), Hester (2004), Johnson et al. (1962), Prewitt (1981, 1985), Sorrow et al. (1967), Suhm (1957, 1960), Suhm et al. (1954), and Weir (1976), Central Texas has a well-established chronological sequence beginning 12,000 years ago. The sequence for South Texas is less defined, though the project area likely shares many of the attributes identified for central Texas. The chronological sequence of central Texas is divided into four cultural periods: Paleoindian (11,500–8,800 B.P.), Archaic (8,000–1,200 B.P.), Late Prehistoric (1,200–400 B.P.), and Historic (400 B.P. to present).

Although the South Texas Plains archaeological region is generally considered a distinct archaeological entity, much of what is known of the area is in part derived from comparisons and extrapolation with adjacent areas that have been subjected to more intensive investigation, particularly the Central Texas archaeological region. Similar to the cultural chronology provided by the Central Texas region, the South Texas chronology follows the same fourfold divisions. The chronology for South Texas is similar. Following Hester's (2004) chronology, the four prehistoric cultural periods in South Texas include the Paleoindian (11,200–8,000 B.P.), Archaic (8,000–1,200 B.P.), Late Prehistoric (1,200–400 B.P.), and Protohistoric (400–300 B.P.).

These divisions are not absolute, but represent contrived temporal categories based on perceived cultural expressions reflected in lithic technology, subsistence practices, mortuary behavior, and other sorts of material remains. These material expressions further reflect broader patterns in the environment and human behavior.

The most commonly recorded sites in South Texas are open occupation sites. In some cases, meaningful excavation of these sites has proven to be a challenge to archaeologists (Hester 2004). This vexing situation stems from the exclusively horizontal patterning of many open occupation sites in the region. These sites tend to exist as laterally extensive occupation and use areas where temporally separated components occur on a single surface without overlapping (Hester 2004). Other open occupation sites, especially in upland settings, occur on stable ancient surfaces with very shallow or deflated cultural deposits that are sometimes impossible to conclusively attribute to a particular time period. Comparatively few deeply stratified occupation sites have been excavated in South Texas. Black (1989) posits that this is the result of both settlement patterning and depositional context. Common site types in South Texas include lithic procurement and reduction sites, rock shelters, artifact caches, and burials. By contrast, the Central Texas archaeological region is one of the most intensively studied in Texas (Black 1989). More sites have been recorded and excavated in Central Texas than any other region. Aside from procurement and reduction sites, burned rock middens, located on hilltops or upland settings are the most characteristic prehistoric site type in Central Texas. However, site types also include buried terrace occupation sites, sites in rock shelters, and burials.

Paleoindian

The Paleoindian Period was commonly characterized throughout Texas by nomadic big-game hunters who heavily relied on megafauna of the Pleistocene (e.g., mammoth, mastodon, bison, camel, and horse) for subsistence (*sensu* Willey 1966). However, a more accurate description of this period is presented by Bousman et al. (1990: 22): "...this period may have seen use by small, mobile bands of nonspecialized hunters and gathers occasionally utilizing megafauna perhaps only as the opportunity arose." Thus, according to Bousman et al. (1990), Paleoindians used a wider variety of resources than previously thought. Evidence of this broader resource subsistence is based on the works of Johnson (1977), Collins (1998: 155–156), and Collins and Brown (2000). Johnson (1977) reviewed reports on numerous Paleoindian sites that indicated a range of small and medium fauna were harvested in addition to big game. Investigations at the Wilson-Leonard site (41WM235), the Gault site (41BL323), and Lubbock Lake (41LU1) provide evidence of small and medium faunal remains (i.e., turtle, rabbit, squirrel, snakes, gopher, and deer) associated with megafaunal remains (i.e., bison and mammoth) (Collins 1998: 155–156). Clovis and Folsom points are the primary diagnostic artifacts associated with this period (Turner and Hester 1999; Collins 2004).

Archaic Period

The Archaic Period spans nearly 7,000 years of prehistory. The primary cultural marker of this time period is the burned rock midden (Collins 2004: 119). These piles of burned limestone, sandstone, and other lithic debris represent the remains of multiple ovens that were used, reused, and discarded over time. Their appearance signifies a shift from a big-game hunting subsistence strategy to a less mobile, generalized subsistence strategy. Projectile point technology also changed; lanceolate-shaped points gave way to dart points that were stemmed and barbed (Black 1989). During the Archaic Period the climate changed from wet and mild conditions seen in the Paleoindian Period, to warmer and drier conditions. Researchers believe that the changes in climate influenced prehistoric subsistence strategies (Story 1985: 38–39; Weir 1976).

The Archaic period is typically divided into three sub-periods: early, middle and late. The Early Archaic Period is still relatively obscure in the archaeological record. The majority of Early Archaic sites are distributed around the Edwards Plateau along the eastern and southern margins, suggesting concentrations near reliable water sources with a variety of food resources. These sites are generally described as small with highly diverse tool assemblages. Cultural material associated with Early Archaic sites are points (specifically Angostura, Early Split Stem, and Martindale-Uvalde) (Collins 2004), Clear Fork and Guadalupe bifaces, manos, hammerstones, burins, metates, circular scrapers, and various biface styles (Osburn et al. 2007), suggesting specialized tool usage. Also, burials have been found associated with this period, although very few (Prewitt 1981; Story 1985).

During the Middle Archaic, the climate became very warm and dry. The number and size of burned rock middens from this period increases dramatically, leading many archaeologists to posit not only a population increase but also an intensification in the types of food processing typically done in earth ovens. Types of projectile points that frequently occur on Middle Archaic sites are Bulverde, Langtry, and Kinney dart points (Hall et al. 1986). Other materials found among Middle Archaic assemblages are an

increase of wooden and bone implements, plant processing implements, and the intensive use of large burned rock features. Burials during this period become more frequent than in the previous period.

During the Late Archaic, climatic conditions once again became more mesic. Cultural traditions observed in the Middle Archaic carry over in to the Late Archaic. There is an intensification of the Middle Archaic traditions. Trade is observed during this period with the exchanging of material from different localities. Coastal materials, such as shells used as ornaments, have been reported to have been exchanged in for both finished tools and raw material (Story 1985). Rock ovens and hearths were continuously used as a means to prepare food, and bison once again became available. Ritualized mortuary practice became more common during the Late Archaic, with interments becoming quite elaborate in terms of associated burial furniture. Large cemeteries established along drainages suggested the importance of the location, and perhaps territorial ties by groups to these localities (Story 1985). Location of these cemeteries “are believed to be the result of the same cultural group using a place on the landscape to reaffirm their rights of descent and control/access to critical resources” (Osburn et al. 2007: 15; see Taylor et al. 1995: 627–631 and Taylor 1998).

Late Prehistoric

Of the prehistoric periods, the Late Prehistoric Period is the best defined, marked by the adoption of the bow and arrow and the production of small arrow points (Hester 1981: 122). The emergence of agriculture and ceramics, also occurred in the Late Prehistoric. While incipient agricultural and ceramic use is evident in South Texas, most researchers believe that these technologies diffused into South Texas from other regions (Bousman et al. 1990). Late Prehistoric hunter-gathers exploited a wide range of animal and plant resources. Food processing techniques relied heavily on manos and metates, and earth ovens for cooking. Diagnostic artifacts of this time period include Scallorn, Edwards and Perdiz arrow points. Sites tend to be more closely clustered to creeks, rather than dispersed along other landforms, suggesting intensifying nucleation around reliable natural resources.

Protohistoric Period

The Protohistoric Period (ca. A.D. 1528–1700) is ushered in by the arrival of the Spanish explorer Cabeza de Vaca in 1528 into south and southeast Texas. Hester (2004) generally considers the period prior to 1700 as Protohistoric. Archaeological sites dated to this sub-period contain a mix of European (e.g., metal and glass arrow points, trade beads, and wheel-made or glazed ceramics) and traditional Native American artifacts (e.g., manufactured stone tools). The effect the Spanish presence in Mexico had on Indians in Texas prior to about 1700 is not well-understood. What is known is that the initial arrival of Spanish missionaries and explorers spread severe disease that killed, displaced, and fragmented a huge percentage of the population. As colonization spread from Mexico, some of the Native American groups moved northward to avoid the Spanish. Many others formed extensive confederacies to protect each other, resist against the Spanish settlers, and maintain access to Central Texas bison hunting territories (Tomka, Personal Communication 2017). At the same time, invading Indian groups from the north put pressure on Native American groups in North Texas (Nickels et al. 1997). Historians believe that these pressures led to intense territorial disputes, further destabilizing Native American populations.

Historic Period

The beginnings of San Antonio came about with the establishment of Mission San Antonio de Valero in 1718. Fray Antonio de San Buenaventura y Olivares briefly visited the site several years prior, and petitioned to set up a mission at the headwaters of the San Antonio River to act as a waypoint in the journey to East Texas. The Marques de Valero, Viceroy of New Spain, granted Olivares' request (de la Teja 1995). Mission Valero occupied at least two locations before it settled into its current spot. The final location was in use by 1724.

Five days after Mission Valero was founded, Presidio de Bexar was established. The presidio was to house the Spanish soldiers who had come along with the expedition to found the Mission. Typically, the families that followed the soldiers lived just outside the presidio.

Two years later, in 1720, Mission San José y San Miguel de Aguayo was established on the opposite bank of the San Antonio River, and to the south of Mission Valero and Presidio San Antonio de Bexar. This mission was established to help serve native groups that did not want to reside at Mission Valero because they were not on friendly terms with groups already living there. The original location of Mission San José was along the east bank of the San Antonio River, approximately three leagues from Mission Valero. The mission was then moved to the opposite bank sometime between 1724 and 1729, and relocated to its present site during the 1740s due to an epidemic (Scurlock et al. 1976:222).

In 1722, just two years after Mission San José was founded, Mission San Francisco Xavier de Nàjera was established. The mission was to serve a group of 50 Erviami families that came from the Brazos River area (Schuetz 1968:11). Mission San Francisco Xavier de Nàjera was located on or near the present site of Mission Concepción. The mission was unsuccessful due to a lack of funding. An attempt was made to make the mission a sub-mission of Valero, but this failed as well (Habig 1968:78-81). Its doors closed in 1726 (Schuetz 1968:11). Ivey (1984:13) argued that the closure of the mission was due to the natives' lack of interest in entering mission life.

Within the next few years, three other missions were established within the San Antonio area. The remaining three missions were established in San Antonio within weeks of each other in 1731. These three missions, Mission Nuestra Señora de la Purísima Concepción, Mission San Juan de Capistrano, and Mission San Francisco de la Espada, were originally missions established in east Texas. When each failed along the eastern border, they were moved to San Antonio.

In addition to the five missions, the civilian community outside of the mission and presidio, Villa San Fernando de Bexar was established by the Canary Islanders. Prior to the establishment of Villa San Fernando, Villa de Bexar had been settled by 30 presidial soldiers, seven of whom were married and brought their families. Archival research indicates that upon arrival, the Canary Islanders immediately took over the land surrounding the garrison. This land was used as pasture and was originally property of Mission Valero. There had been a lack of cleared agricultural land at the time, leading Captain Juan Antonio Pérez de Almazán to allow the Canary Islanders use of the property (de la Teja 1995). The initial plan was for additional Canary Island settlers to be sent to San Antonio after the first group was established. Due to high costs to the Spanish Crown, no more groups were brought to Texas. The Canary

Islanders launched a formal complaint against Mission Valero. In 1731, the Canary Islanders established their own villa, named San Fernando de Bexar, with their own church. The arrival of the *Isleños* resulted in the first clearly defined civilian settlement in San Antonio.

Previous Archaeology and Known Historic Resources

San Pedro Springs Park has been the focus of four different archaeological investigations that have been conducted by the Center for Archaeological Research at the University of Texas at San Antonio (UTSA-CAR). The entire APE is located within a previously recorded archaeological site (41BX19) which is listed as a SAL and is designated as the San Pedro Springs Park National Register District (**Figure 4**). San Pedro Springs Park was nominated to the National Register in 1979 (see **Figure 4**).

San Pedro Springs Park is the second oldest park in the United States and is known for significant prehistoric and historic cultural remains within San Antonio, Texas. The location was first visited in 1709 during the Espinosa-Olivares-Aguirre Expedition. The lands were designated for public use in 1729, and have been actively used over the next centuries. Prior to Spanish occupation, the site was used by the Native American groups who frequented the area. An Early Archaic site was encountered within the park (Mauldin et al. 2015). Site 41BX19 is a multicomponent archaeological site, with evidence of occupation ranging from the Archaic Period to the Spanish Colonial and Historic Period.

Examination of a ½-km radius of the APE revealed an additional previously recorded archaeological site (41BX620). Site 41BX620 is a historic-age stone lined irrigation ditch known as the *Alazán Acequia* (see **Figure 4**). The site is considered eligible as a SAL and is also considered eligible for listing on the National Register of Historic Places.

Ten archaeological projects have been conducted, within San Pedro Springs Park. In 1966, San Pedro Springs Park was first investigated and recorded as an archaeological site (41BX19) by Mardith Schuetz (Mauldin et al. 2015). The investigations were then followed by the first excavations in 1977 by Anne Fox of the Center for Archaeological Research at the University of Texas at San Antonio (UTSA-CAR) (Fox 1978). During these excavations, the *Alazán Acequia* was documented and recorded as site 41BX620. Further investigation was conducted in 1991 by a privately owned firm; however no other information in regards to this project is available (THC 2017). In 1996, San Pedro Springs Park was revisited UTSA-CAR. During this visit UTSA-CAR excavated backhoe trenches and shovel tests. Through the use of these excavation techniques as well as historic maps the *Alazán Acequia* was relocated in (Meissner 2000).

In 1998, UTSA-CAR excavated shovel tests and test units at San Pedro Springs Park. Subsurface testing revealed that grading operations which previously occurred within the park had damaged intact deposits (Houk 1999). Again in 1998, UTSA-CAR revisited the park and conducted pedestrian survey, shovel testing, and backhoe trenching. Backhoe trenching results during this visit indicate that the Spanish Colonial dam and *acequia* thought to be located within the surveyed APE had been destroyed by construction activities in the early twentieth century (Houk 1999).

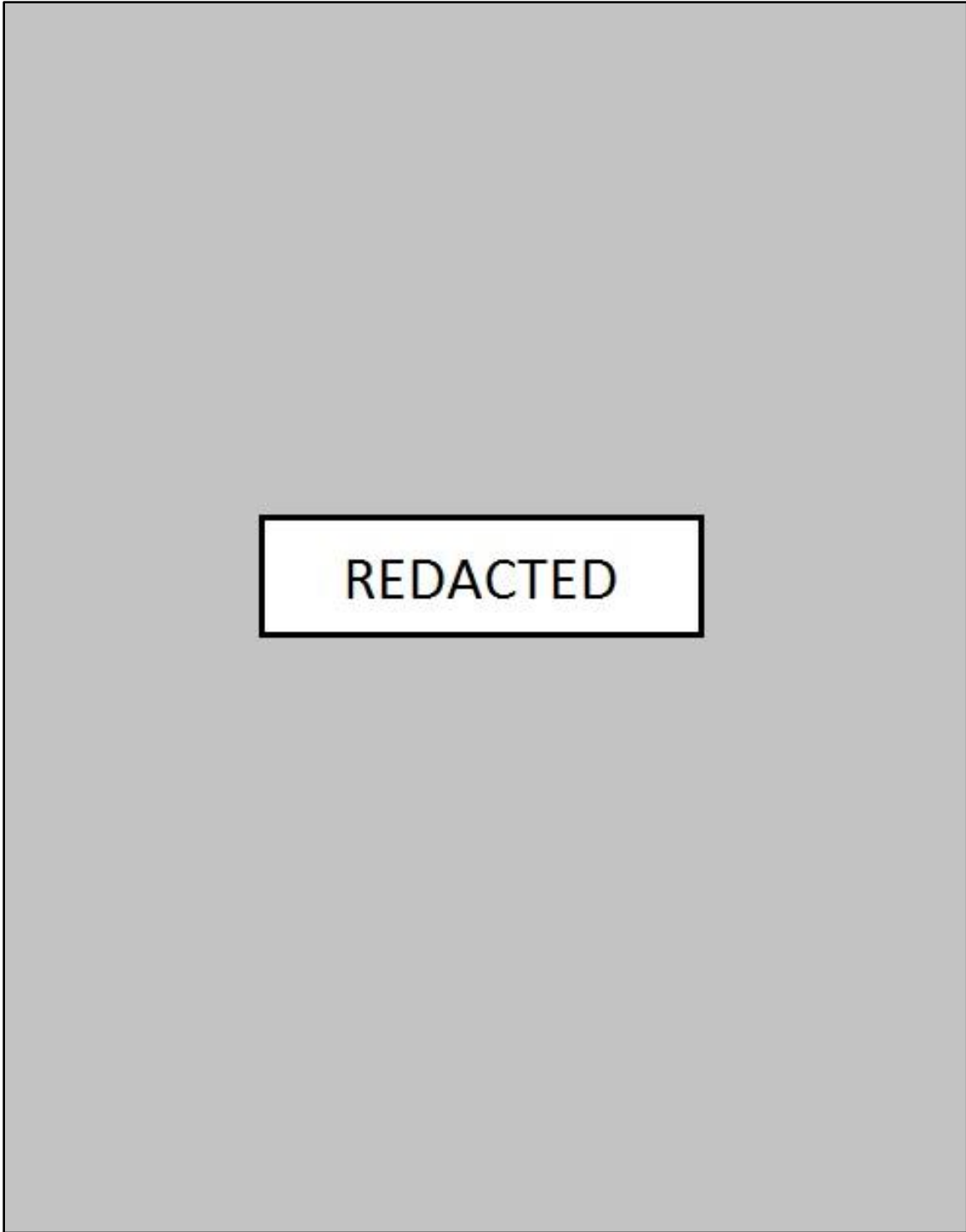


Figure 4. Archaeological investigations within ½-kilometer of the APE.

In 2002, Zapata and Meissner from UTSA-CAR conducted archaeological monitoring of construction activities associated with the installation of a sprinkler system and playground facilities in close proximity to San Pedro Springs Park. In addition to archaeological monitoring, shovel testing was also performed (Zapata and Meissner 2003). In 2004, Uecker from UTSA-CAR monitored the excavation of pits being dug for the placement of trees on North Flores and West Ashby Streets. No cultural materials or features were identified at this time (Uecker 2004). In 2011, UTSA-CAR monitored construction activities occurring within close proximity to San Pedro Springs Park; however no other information in regards to this project is available (THC 2017).

In the winter of 2013 and early 2014, UTSA-CAR conducted shovel tests, backhoe trenches, test units, and auger holes within the park grounds (Wadley and Tomka 2013). Both prehistoric and historic deposits were identified during the investigations. The subsurface testing suggested that deposits within the project area were heavily disturbed (Wadley and Tomka 2013).

In addition to the archaeological projects within the park, Monte Vista National Register District is located to the northeast of San Pedro Springs Park. The Monte Vista neighborhood was listed as a National Register District in 1998. The property is considered to have national significance as the architecture within the area is unique to the late nineteenth and early twentieth centuries. Development in the neighborhood began in 1882 (THC 2017).

Archaeological Monitoring Results

In August of 2017, **RKEI** monitored the construction activities associated with the installation of buried fiber optic lines within the western portion of San Pedro Springs Park. The undertaking included the excavation of a handhole (HH 1) and four bore pits (BP 1–4) (**Figure 5**). The purpose for the excavation of these components was to identify any existing utilities and to facilitate the directional drilling of paths for new buried fiber optic lines. The size of the excavation of these components varied, measuring from 1 to 5 feet in length and 1.5 to 4 feet in width. Depths of each component varied, measuring approximately 2 to 3 feet below surface. All excavations were excavated by hand.

Within the project area, disturbances observed consisted of park development, existing utilities, sidewalk and walkway construction, and landscaping. Disturbances associated with the APEs consisted of walkways and maintained grasses. Vegetation of the project area consists of maintained grasses and trees. Due to grass, ground surface visibility was approximately 30 percent. No cultural materials were observed on the surface.

Handhole (HH 1) was excavated along the western sidewalk of San Pedro Springs Park adjacent to an existing concrete handhole approximately 75 feet south of the western park entrance on North Flores Street (**see Figure 5**). HH 1 measured approximately 5-x-4 feet and was excavated to a depth of approximately 3 feet below surface. Soils encountered during the excavation consisted of a very dark brown (10YR 2/2) clay loam, with approximately 30 percent gravels (**Figure 6**). No cultural material was observed within the matrix of HH 1.

BP 1 was excavated approximately 56 feet west of the San Pedro Springs Park bathhouse. The pit was located on the west side of a north/south trending walkway near a light pole (**see Figure 5**). BP 1 measured approximately 1-x-2 feet and was excavated to a depth of approximately 2.5 feet below surface. Soils encountered within the pit were comprised of a very dark brown (10YR 2/2) clay loam that extended to a depth of 4 inches, underlain by 4 inches of a brown (10YR 4/3) gravel/base. Below the gravel/base layer, a very dark gray (10YR 3/1) loam intermixed with large gravels was present to a depth of 2.5 feet below surface (**Figure 7**). Cultural materials encountered within BP 1 consisted of a fragment of aqua glass (ca. 1880–1930 [Society for Historical Archaeology Inc. 2017]) and a brown tertiary chert flake, mixed in with the large gravels at a depth of 2 feet below surface (**Figures 8 and 9**). Based on the disturbed nature of the soils it appears that these cultural materials are out of context.

BP 2 was excavated directly east of BP 1, on the other side of the walkway (**see Figure 5**). BP 2 measured approximately 1-x-1.5 feet and reached a depth of approximately 2 feet below surface. Soils encountered during excavation were composed of a brown (7.5 YR 5/4) road base in the upper 4 inches, underlain by a very dark brown (10YR 2/2) clay loam mottled with a brown (7.5 YR 5/4) construction base that extended to a depth of 2 feet below surface (**Figure 10**). Gravels were present within the pockets of the very dark brown (10YR 2/2) clay loam. An existing pipe was encountered at depth along the western edge of pit. No cultural material was observed (**Figure 11**).



Figure 5. Location of the excavated handhole and bore pits.



Figure 6. Excavation of the handhole; facing north.



Figure 7. Overview of the excavation of BP 1 and west wall profile; facing west.

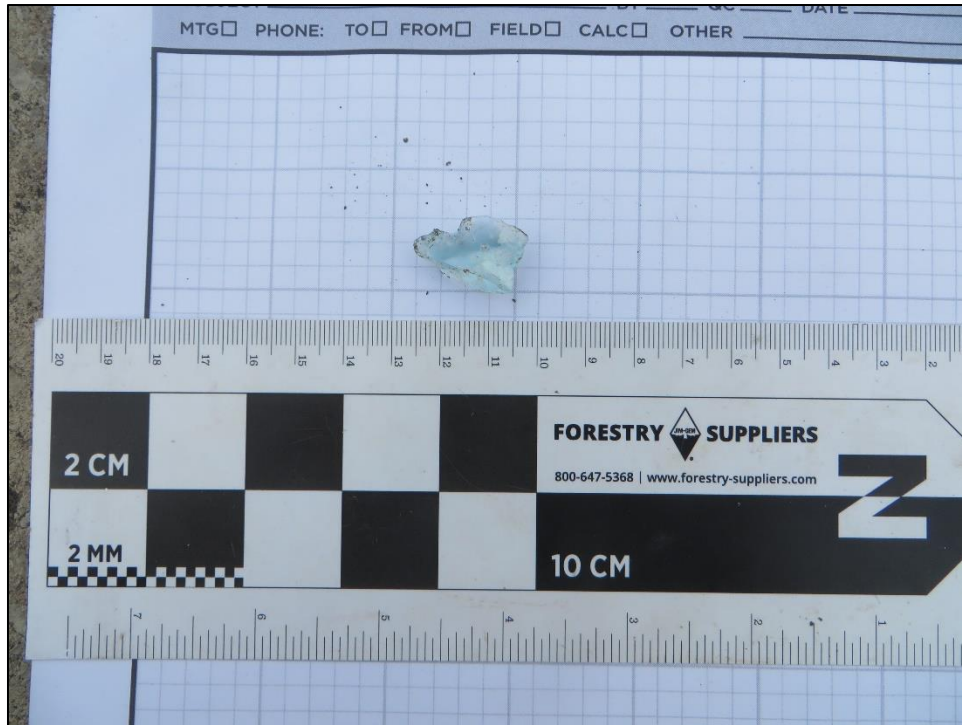


Figure 8. Aqua glass fragment encountered at 2 feet below surface in BP 1.



Figure 9. Tertiary flake encountered 2 feet below surface in BP 1.



Figure 10. North wall profile of BP2; facing north.



Figure 11. Overview of BP 2, showing pipe within the profile; facing east.

BP 3 was excavated to the north side the San Pedro Springs Park bathhouse, approximately 40 feet east of BP 2 (**see Figure 5**). BP 3 measured approximately 1-x-2 feet and was excavated to a depth of approximately 2.5 feet below surface. Soils encountered in BP 3 were highly disturbed due to existing utilities in the area. Soils were comprised of a very dark brown (10YR 2/2) clay loam mottled with a brown (7.5 YR 5/4) construction base (**Figure 12**). No cultural material was observed within BP 3.

BP 4 was excavated approximately 160 feet west/northwest of BP 1 within an open area north of the concrete bandstand west of the bath house (**see Figure 5**). BP 4 measured approximately 5-x-2 feet and reached a depth of approximately 2 feet below surface. Soils encountered within BP 4 consisted of a very dark brown clay (10YR 2/2) loam intermixed with approximately 30 percent gravels (**Figure 13**). No cultural materials were encountered during the excavation of BP 4.



Figure 12. North profile of BP 3; facing north/northwest.



Figure 13. Overview of the excavation of BP 4; facing north.

Summary and Recommendations

The archaeological monitoring for construction activities for the installation of new AT&T fiber optic lines was conducted over a three day period in August 2017. Monitoring was conducted at five locations within San Pedro Springs Park where a handhole and four bore pits were excavated. All excavations were manually excavated and the size of each component varied in size and depth. The size of the handhole measured 5-x-4 feet and reached a depth of 3 feet below surface, while the bore pits measured 1 to 5 feet in length by 2 feet in width, with depth reaching 2 to 2.5 feet below surface.

Disturbances observed within the APE include the installation of park development, existing utilities, walkways, and landscaping. During the monitoring, soils and soil profiles were examined for the presence of any cultural materials. Soils encountered showed some evidence of disturbance from the construction of walkways and existing utilities. Disturbances were mostly observed in the upper 1 to 1.5 feet of the excavations; however, in some cases disturbances reached the terminating depths of the excavations. Cultural materials observed during the excavation consisted of a piece of aqua glass and a chert flake at a depth of 2 feet below surface. Based on the stratigraphy of the excavation these materials were deemed to be out of context due to prior disturbances.

Based on archaeological monitoring, investigations revealed that a majority of the APEs had been disturbed. During the monitoring of the excavation of the bore pits and handhole no temporally diagnostic cultural materials were encountered. With the lack of any temporally diagnostic artifacts, intact cultural materials, or features, **RKEI** does not recommend any further archaeological investigations within the areas monitored. However, should additional ground disturbing activities occur within San Pedro Springs Park, further work may be required.

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