

Volume 2019 Article 106

2019

Archaeological Survey of the Proposed Crawford Memorial Park Improvements Dallas County, Texas

Philip Fisher

Kathryn A. Cross

Follow this and additional works at: https://scholarworks.sfasu.edu/ita

Part of the American Material Culture Commons, Archaeological Anthropology Commons, Environmental Studies Commons, Other American Studies Commons, Other Arts and Humanities Commons, Other History of Art, Architecture, and Archaeology Commons, and the United States History Commons

Tell us how this article helped you.

This Article is brought to you for free and open access by the Center for Regional Heritage Research at SFA ScholarWorks. It has been accepted for inclusion in Index of Texas Archaeology: Open Access Gray Literature from the Lone Star State by an authorized editor of SFA ScholarWorks. For more information, please contact cdsscholarworks@sfasu.edu.

Archaeological Survey of the Proposed Crawford Memorial Park Improvements Dallas County, Texas

Creative Commons License



This work is licensed under a Creative Commons Attribution 4.0 International License.

AR Consultants, Inc.

Archaeological and Environmental Consulting 805 Business Parkway, Richardson, Texas 75081

Phone: (214) 368-0478 Fax: (214) 221-1519 E-mail: arc@arc-digs.com

ARCHAEOLOGICAL SURVEY OF THE PROPOSED

CRAWFORD MEMORIAL PARK IMPROVEMENTS

DALLAS COUNTY, TEXAS

Texas Antiquities Permit Number 8747

Philip Fisher, PhD Principal Investigator and Kathryn A. Cross, MA

Submitted to:

DIPS ENVIRONMENTAL, INC.

530 Carrier Parkway Grand Prairie, Texas 75051

Submitted by:

AR CONSULTANTS, INC.

805 Business Parkway Richardson, Texas 75081

Cultural Resources Report 2019-09 May 7, 2019

ARCHAEOLOGICAL SURVEY OF THE PROPOSED

CRAWFORD MEMORIAL PARK **IMPROVEMENTS**

DALLAS COUNTY, TEXAS

Texas Antiquities Permit Number 8747

Philip Fisher, PhD Principal Investigator and Kathryn A. Cross, MA

Submitted to:

DIPS ENVIRONMENTAL, INC.

530 Carrier Parkway Grand Prairie, Texas 75051

Submitted by:

AR CONSULTANTS, INC.

805 Business Parkway Richardson, Texas 75081

Cultural Resources Report 2019-09 May 7, 2019

ABSTRACT

The City of Dallas is proposing to improve the existing Crawford Memorial Park in central-southeastern Dallas County, Texas. DIPS Environmental, Inc., contracted with AR Consultants, Inc. to conduct an intensive archaeological survey of Crawford Memorial Park under the authority of Texas Antiquities Permit number 8747. Crawford Memorial Park totals approximately 265 acres. However, modern landscape modifications including a number of sports fields, the Crawford Aquatic Center, parking lots, cement walking paths, a playground, pavilion, bathrooms, and a City of Dallas Park and Recreation Maintenance Facility exist within the park boundary and project area. As Crawford Memorial Park has never been surveyed for archaeological resources, the area of the park where these modern landscape modifications have occurred, approximately 105 acres, was subject to a reconnaissance pedestrian survey without shovel testing. Approximately 160 acres of Crawford Memorial Park was subject to an intensive pedestrian survey with shovel testing. In total, 57 shovel tests were excavated during the systematic field inspection on March 5-6, 11, 14, and 19-20, 2019.

The archaeological potential for prehistoric and historic cultural resources had been considered low except for a known earthen berm and floodwater overflow feature that was constructed to dam the old Prairie Creek channel in 1961. This historic site, 41DL549, was the only site recorded during survey. Apart from 41DL549 no cultural resources were identified in the shovel tests or on the surface. Given the results of this survey, AR Consultants, Inc. recommends that further cultural resource investigations are unnecessary for this project, and requests that the Texas Historical Commission and the Fort Worth District of the U.S. Army Corps of Engineers concur with this recommendation. The field notes, photographs, and photo logs are curated at the Center for Archaeological Studies at Texas State University in San Marcos, Texas.

TABLE OF CONTENTS

Abstract		i
Table of C	Contents	ii
List of Fig	ures	ii
_	oles	
Introduction	on	1
Natural Er	nvironment	5
Cultural H	listory	6
	Design and Methodology	
Results		12
Recommen	ndations	32
References	s Cited	33
Appendix	A: Architectural and Historic Resources Survey	35
	LIST OF FIGURES	
Figure 1.	Crawford Memorial Park Improvements project area shown on the Hutchins	
	1:24,000 scale USGS topographic map.	
Figure 2.	Crawford Memorial Park Improvements design	3
Figure 3.	Crawford Memorial Park project area shown on historic aerial photographs from 1953 and 1968.	10
Figure 4.	Erosional gully from the central wooded area. View is to the north	12
Figure 5.	Erosional gully from the central wooded area on the west bank immediately above Prairie Creek. View is to the east.	13
Figure 6.	Erosion of shallow subsoils to bedrock along the east bank of Prairie Creek. View	
	is to the north.	13
Figure 7.	Areas with modern landscape disturbances in the northern and southern sections	
	of the Crawford Memorial Park project area shown on a modern aerial image	15
Figure 8.	Sports fields and the west end of the maintenance facility (visible to the right in	
	the photo) from the northern section. View is to the east	16
Figure 9.	Sidewalk, light poles, and electric lines running down the west boundary of the northern section. Maintenance facility is to the left in the photo. View is to the	
	south	16
Figure 10.	The newly constructed Crawford Aquatic Center at the very southern end of the	
	project area. View is to the southwest.	
_	Shovel test locations within the survey area.	18
J	Vegetation from the central wooded area subject to intensive pedestrian survey. View is to the west	19
Figure 13.	Example of the trash accumulation along Prairie Creek and within the park. View is to the southwest.	19
Figure 14.	Erosion to subsoil on the first terrace of the west bank of Prairie Creek. View is to the east.	
Figure 15		20

Figure 16.	Erosional gully carved into the bedrock immediately above Prairie Creek on the	
	east bank. View is to the north	. 21
Figure 17.	Southern Pedestrian Survey Area in the open remnant Blackland Prairie	. 22
Figure 18.	Intake structure and earthen dam at site 41DL549 shown on a historic aerial	
	photograph from 1968	. 23
Figure 19.	Site 41DL549 and the intake structure shown on recent aerial imagery	
Figure 20.	Earthen dam and intake structure.	. 30
Figure 21.	Intake structure	. 30
	LIST OF TABLES	
Table 1. C	ultural Chronology.	6
	hovel Test Descriptions.	

INTRODUCTION

The City of Dallas is proposing to improve the existing Crawford Memorial Park in centralsoutheastern Dallas County, Texas (Figure 2). The proposed Crawford Memorial Park Improvement project is multi-phased and includes the addition of roads and parking, the moving of the existing City of Dallas Park and Recreation Southeast Dallas Maintenance Facility, the addition of athletic fields and courts, a skate park, picnic areas, a recreation center and amphitheater, boat launches, and the construction of a dam across Prairie Creek to form what will become the approximately 45-acre Crawford Memorial Park Lake (Figure 2). The project area is approximately 265 acres in size and is located south of Elam Road, west of North Prairie Creek Road, north of the DART Rail right-of-way and State Highway 175, and east of a residential neighborhood. Prairie Creek flows north-south through the center of the park.

DIPS Environmental, Inc., contracted with AR Consultants, Inc. (ARC) to conduct an intensive archaeological survey of the Crawford Memorial Park Improvements project area. The purpose of this survey was to determine if cultural resources were present within the survey area and, if so, to make recommendations about their significance and how they might be impacted by construction. The survey involved walking transects and placing shovel tests across the survey area.

Fieldwork was conducted on March 5-6, 11, 14, and 19-20, 2019. This report was prepared to be reviewed by the Texas Historical Commission and the Fort Worth District of the U.S. Army Corps of Engineers (USACE). Relevant legislation includes the Antiquities Code of Texas (Texas Natural Resource Code, Title 9, Chapter 191). Federal legislation includes the National Historic Preservation Act of 1966, as amended (PL-96-515), the National Environmental Policy Act of 1969 (PL-90-190), the Clean Water Act, as amended (PL-92-500), the Rivers and Harbors Act of 1899, the Archeological and Historical Preservation Act of 1974, as amended (PL-93-291), Executive Order No. 11593 "Protection and Enhancement of the Cultural Environment," and Protection of Historic Properties (36 CFR 800).

This report is written in accordance with report guidelines used by the Archeology Division of the THC (Council of Texas Archeologists 2018). The following report presents a brief description of the natural setting of the project area, followed by a discussion of the culture history and previous investigations within the study area. A chapter on the research design and methodology employed in the investigation is then followed by the results of the field investigation. The report concludes with recommendations followed by the references cited and an appendix with the report from the architectural historians' findings from site 41DL549.

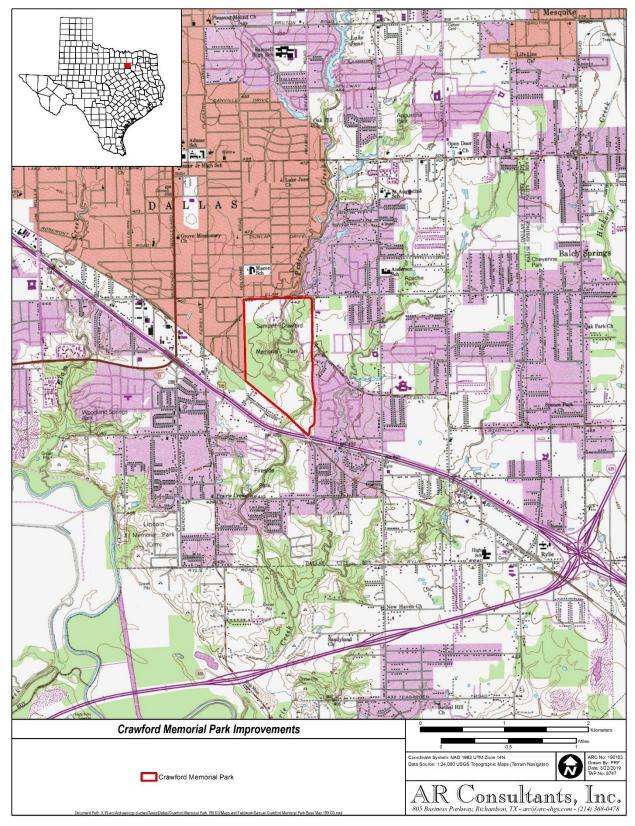


Figure 1. Crawford Memorial Park Improvements project area shown on the Hutchins 1:24,000 scale USGS topographic map.



Figure 2. Crawford Memorial Park Improvements design.

4 ARCHAEOLOGICAL SURVEY OF THE CRAWFORD MEMORIAL PARK IMPROVEMENTS

Administrative Information:

ARC Project Number: 190103

Sponsor: City of Dallas

Review Agency: Fort Worth District of the U.S. Army Corps of Engineers and the

Archeology Division of the Texas Historical Commission.

Principal Investigator: Philip Fisher, PhD

Field Dates: March 5-6, 11, 14, 19-20, 2019

Field Crew: Kathryn Cross, Emily Goetschius, and Philip Fisher

Field Person Days: 10.5

Acres Surveyed: approximately 265 acres

Sites Investigated: 1

Historic: 41DL549

Number of Historic

Resources Evaluated: 1

Curation: Center for Archaeological Studies at Texas State University in San

Marcos, TX

NATURAL ENVIRONMENT

The project area is located in the Northern Blackland Prairie subdivision of the Texas Blackland Prairies ecoregion (Griffith et al. 2007:61-65). Historically, this region has been comprised of large expanses of grassland, with wooded areas in stream bottoms. Küchler (1964) classified the prairie as being dominated by Andropogon-Sipa grasses, while stream bottoms were wooded with big trees such as oak, ash, cottonwood, and pecan. However, a transition from ranching to farming in the late 19th century saw an end to most of these tallgrass prairie communities as they were converted to croplands and non-native pastures. Due to expanding urban and suburban uses, the prairie environment continues to be one of low biotic diversity and covers less and less acreage. The Blackland Prairies that once supported bison, pronghorns, wolves, and greater prairie chickens, now have little habitat to support a lower diversity of wildlife (Griffith et al. 2007).

Crawford Memorial Park is located along Prairie Creek in southeast Dallas in the uplands upstream from the Holocene and Pleistocene aged Terrace deposits and Holocene aged Alluvial deposits along the Trinity River. The park boundary and project area rests on the Austin Chalk and Ozan Formations (Bureau of Economic Geology 1988). The Austin Chalk formation is composed of chalk, clay, and marl while the Ozan formation consist of calcareous clay, sand, and silt. The western half of the park rests on the Late Cretaceous aged Austin chalk while the eastern half rests on the Late Cretaceous-aged Ozan formation. This formation consists mostly of gravel, sand, silt, silty clay, and organic material.

The project area is mapped on five soil series (Coffee et al. 1980). Soils along the western edge of the park are mapped as Rader-Urban with 0 to 2 percent slopes and Axtell-Urban with 1 to 5 percent slopes. Rader-Urban consists of brown fine sandy loam A horizon extending to approximately 15 cm below the surface underlain by 33 cm of light gray fine sandy loam, 16 cm of very pale brown fine sandy loam, and subsoil consisting of discrete masses of light yellowishbrown sandy clay loam. Axtell-Urban soils, in the west central portion of the park, consist of brown very fine sandy loam A horizon extending to 8 cm below the surface underlain by 12 cm of very pale brown very fine sandy loam and reddish yellow clay loam subsoil. Frio-Urban soils, with dark grayish brown silty clay to silty clay loam A horizon extending to 102 cm below surface, are mapped along Prairie Creek in the center of the park, with Rader-Urban soils along the eastern edge of the park. The northern and southern portions of the park are underlain by Wilson-Urban soils with 0 to 2 percent slopes characterized by very dark gray silt loam A horizon that extends 13 cm below the surface above very dark gray silty clay subsoil. On the east bank of Prairie Creek rests the Silawa-Urban land complex with 2 to 6 percent slopes. This soil series consists of a 15cm-thick pale brown fine sandy loam above an 18-cm-thick yellowish-brown fine sandy loam E horizon that rests on red sandy clay loam subsoil.

CULTURAL HISTORY

The history and prehistory of North Central Texas, in which Dallas County lies, is summarized in several reports prepared by the University of North Texas (Brown and Lebo 1991; Ferring and Yates 1998; Lebo and Brown 1990). More specifically, the archaeology of the East Fork of the Trinity River has been summarized by Crook and Hughston (2015). The most commonly used chronology for the region, which is presented below, was established by Prikryl (1990) who divides the Late Prehistoric: Late Prehistoric I (AD 700 to 1200) and Late Prehistoric II (AD 1200 to 1600).

Tuote 1. Cultural Chronology.				
Period	Dates			
Historic European	AD 1800 to Present			
Historic Native American	AD 1600 to AD 1850			
Late Prehistoric II	AD 1200 to AD 1600			
Late Prehistoric I	AD 700 to AD 1200			
Late Archaic	2000 BC to AD 700			
Middle Archaic	4000 to 2000 BC			
Early Archaic	6000 to 4000 BC			
Paleoindian	ca. 11,000 BC to 6000 BC			

Table 1. Cultural Chronology.

Prehistoric Native American settlement in North Central Texas began at least 10,000 years ago as attested to by the presence of distinctively shaped dart points (Crook and Harris 1957) at the Lewisville site and the Aubrey Clovis site (Ferring 2001) in neighboring Denton County to the northwest. Artifact collectors report the presence of Clovis, Folsom, Scottsbluff, and other Paleoindian points from the surface of sites in the region. As of 2007, six have been reported from Dallas County (Bever and Meltzer 2007:67-70). The presence of exotic, non-local lithic resources indicates that these early people traveled some distance to acquire higher quality lithic materials or were involved in a system of raw material exchange. These early people hunted now extinct large game and foraged off the land.

The subsequent period, the Archaic, lasted from 6000 BC to as late as AD 700. The Archaic peoples lived throughout the area, with particular focus along the major and minor stream valleys where they were able to hunt and gather available food resources. Large Archaic sites are generally located on terraces or ridges. Smaller lithic scatters have been recorded in upland areas throughout the county. These sites appear to be Archaic in age, but few have been thoroughly studied. Dart points, grinding stones, fire-cracked rock, and scrapers are common artifacts found in Archaic sites. The earliest Archaic peoples continued using exotic cherts for dart points, but, as time passed, there was a subtle shift toward the use of locally available stone for chipped stone tools (Prikryl 1990:47-65). These materials are described as Uvalde Gravels (Byrd 1971).

During Late Prehistoric I, a small amount of pottery appears at the Baggett Branch site, 41DL149 (Prikryl and Pertula 1995:189). From AD 1000 to 1300, pottery with similarities to Caddo pottery appears in North Central Texas. This similarity is not well understood and may be the result of trade with Caddo to the east, adoption of Caddo ceramic manufacture, Caddo settlement in North Central Texas, or some combination of these possibilities (Prikryl and Pertula 1995:189-190).

Arrowheads appear about this same time, signaling the bow and arrow's introduction to the hunting toolkit. In addition, houses were found at the Cobb-Pool site, 41DL148 (Peter and McGregor 1988:140). Fritz (1993) mentions the use of corn for food in North Central Texas during this time, and Todd (1999) suggests that the presence of mussel shell hoes in North Central Texas indicates some form of farming.

Stephenson (1952:305-312) tried to create a chronological sequence for the Upper Trinity River Basin when he defined the Late Prehistoric Wylie Focus, which dated from AD 1300 to 1600, based on shell and clay-grit tempered pottery that he believed was Caddo in origin. The Wylie Focus was characterized by large circular pits, no indigenous pottery, flexed burials (both single and multiple and in poorly defined burial pits), maize agriculture, and villages. The Wylie Focus concept was discarded when Bruseth and Martin (1987:280) dated pits at the Bird Point Island and the Adams Ranch sites to the Late Archaic period.

It has been suggested that the climate was drier during the Late Prehistoric II. During this period, bison may have been consumed more than in Late Prehistoric I times. The presence of bisonscapula hoes, especially in northern North Central Texas, suggests an increase in horticulture. This concept is supported by the presence of sites along sandy terraces instead of the floodplain area where Late Prehistoric I sites are found. Also, there is a marked Plains influence on lithic tool assemblages found in North Central Texas dating to this period (Prikryl 1990:80).

At the end of the Late Prehistoric periods, there appears to have been a general abandonment of the North Central Texas area (Skinner 1988). Along the Red River in Montague and Cooke Counties and across the Red River in Oklahoma, there is both archaeological and ethnographic evidence of historic Taovaya, Wichita, and Yscani Indians (Bell et al. 1967; John 1992:204). Since the Spanish could not subdue these tribes, they made them their allies with promises of help against the Osages.

There is evidence found on the Trinity River in Dallas County of a possible visit to North Central Texas by Spanish explorer Hernando de Soto (Bruseth 1992). Artifacts found consist of a chainmail gauntlet, a halberd, and a spur. Current research, however, seems to indicate that Anglo settlers were the first non-Indians to settle in North Central Texas.

Beginning in the 1830s and continuing into the 1840s, Native American inhabitants played a significant role in the history of the region. Garrett (1972:24) states "Indian hostilities almost depopulated North Texas [of Anglo dwellers] after 1839. It dwindled to less than half." Hostilities continued until the Treaty of 1843 was signed by the State of Texas and ten Native American tribes. This treaty provided the impetus for settlement of several North Central Texas counties.

The Anglo-American history of the Upper Trinity River Basin has been divided into the Frontier, Initial Cash Crop, Tenant Farming, and Agribusiness periods by Richner and Lee (1976:125-133). The Frontier period lasted from about 1820 to 1850 and was followed by the Initial Cash Crop period which lasted until 1870. Tenant Farming began at 1870 and continued to about 1940. Agribusiness began after the Great Depression and continues to this date. In addition to agribusiness, numerous wartime industries were established in North Central Texas during World War II (McElhaney and Hazel 2015). These industries additionally helped to bolster a diversified

and prosperous post-war economy, which had the added effect of increasing the regional population. Today North Central Texas continues to be a growing area.

Crawford Park History

The formation of Crawford Memorial Park is tied to two major Dallas figures from the late-19th and early-20th centuries. The two men were Dr. William Samuell and William Crawford. Dr. William Samuell was a prominent surgeon in Dallas until his death in 1937. In his will he left a large sum of money, approximately \$1.2 million, and land to the City of Dallas Park Board for park purposes and the creation of a foundation (Kovach 2009). After his death, his house in Dallas was sold and the money was used to acquire 202 acres of what became the Samuell-Elam Park (PKCE-WRT 2012). William Crawford moved to Dallas with his brother in the late 1880's and opened their law practice Crawford and Crawford and became invested in the city of Dallas. In 1955, his son William Crawford II, a city judge who actively pursued property and funds for the city's Park Department, donated 70 acres adjacent to the Samuell-Elam Park. The lands were combined, but under a deed restriction requested by William Crawford II, the name of the park was changed to the Crawford Memorial Park in honor of his parents, William and Katherine Crawford (PKCE-WRT 2012).

Previous Investigations

A search of TASA (2019) reveals no National Register of Historic Places (NRHP) properties, State Antiquities Landmarks (SALs), cemeteries, historical markers, recorded archaeological sites, or previous cultural resources surveys within the proposed project area. Within a mile of the project area, however, there are a cemetery, five recorded archaeological sites, and five previous cultural resources surveys.

The cemetery, Lincoln Memorial Park (DL-C186) is located 0.86 miles southwest of Crawford Memorial Park. The cemetery consists of two block areas totaling approximately 134 acres. No other information is available (TASA 2019).

The five sites within a mile of Crawford Memorial Park include 41DL86, 41DL108, 41DL113, 41DL306, and 41DL307. In 1941, 41DL86 was recorded on the west bank of Prairie Creek, approximately 300 meters downstream from the park. Surveyors noted rough blades and flakes scattered over a 50-by-100-yard area. Based on these findings, the site was deemed a surface camp. No other information is available on the site (TASA 2019). 41DL108 is located along a tributary upstream from Prairie Creek, approximately one mile southeast of the park. This site, also considered a surface camp, was discovered in 1940 after the area had been stripped in association with a highway project. Surveyors observed arrowheads and blades on the surface and noted that children had previously collected projectile points from the area (TASA 2019). 41DL113 was recorded approximately one mile upstream from the park along a tributary of Prairie Creek. Flake and broken rock were observed at the time of survey, though the site card states that projectile points had been collected by locals in the past (TASA 2019). Sites 41DL306 and 41DL307 were recorded just south of 41DL86 along Prairie Creek. The site card notes that the three sites may represent a single site. Several test units were excavated at the locations of 41DL306 and 41DL307, both located in the Fireside Baseball Park, which yielded points, a biface, and a groundstone tool.

Additional items may have been collected by local residents, but these are not listed on the site card (TASA 2019).

Five previous cultural resources surveys occurred approximately one mile southwest of Crawford Memorial Park. Two of these represent transects that are mapped in the TASA database but have no other information available on their site cards. Two large block survey areas overlap with these line surveys. It appears that these are associated with a United States Army Corps of Engineers project that occurred in 1981. The line surveys may also be associated with this project. No other information is available (TASA 2019). Four small block areas were surveyed approximately 0.80 miles south of the park in 2001. The project was sponsored by the Federal Energy Regulatory Commission. No other information is available on this survey (TASA 2019).

Historic Map & Aerial Review

Several maps and aerial images were reviewed to determine if any historic structures were present within the proposed project area. The earliest available USGS topographic maps are 1:250,000scale maps from 1890 and 1893. These show no structures within the project area, though the railroad, labelled as the Texas Trunk Railroad, is mapped at its south end. The 1900 Dallas County Sam Street map, 1928 Dallas County Road map, and 1936 Dallas and Rockwall County General Highway map also show no mapped structures within the proposed project area. The 1920 Dallas County Soils map shows two structures mapped within the proposed project area. One is located along a road extending south from Elam Road into the project area. The other is located along the eastern edge of the project area along a road that extends from the current location of South Prairie Creek Road and South Old Seagoville Road. Aerial imagery from 1953 shows a dirt road and possible structure at this same location, though the resolution is poor (Figure 3). This appears to be at the same location as the modern entrance road and parking lot on the east side of the park. The soils map also reveals that the railroad name had changed to the Texas and New Orleans sometime prior to 1920.

More recent maps, beginning with the 1958 1:24,000-scale USGS topographic map, no long show the two mapped structures that appeared on the 1920 soils map. Rather, they show the development of Samuel Crawford Memorial Park. An examination of later topographic maps reveals that by 1958 the park's main road, extending south through the center of the park from Elam Road, and the associated maintenance facility were constructed. By 1968, the eastern entrance and parking lot were built. Aerial imagery from that same year shows that the maintenance facility was expanded (Figure 3). The 1973 topographic map illustrates the addition of one structure near the maintenance facility and another along the eastern entrance road. The 1995 topographic map depicts four structures along the northern entrance road and a lake at the center of the park. It, however, does not map the eastern road or parking lot, though this can be seen on current aerial imagery. Recent aerial imagery also shows parts of the paved trail system and sports fields that are present in the park today.



Figure 3. Crawford Memorial Park project area shown on historic aerial photographs from 1953 and 1968.

RESEARCH DESIGN AND METHODOLOGY

Research Design

Two predictions were developed prior to survey regarding the potential for finding prehistoric and historic sites in the Crawford Memorial Park Improvements project area. The first hypothesis concerns the prehistoric occupation. It was predicted that there was low potential for encountering evidence of prehistoric occupation in this location. This is based primarily on the fact that the survey area lies in the uplands and is located over 4 km upstream from the confluence with the Trinity River. Most recorded prehistoric sites are located further downstream on the terraces above the Trinity River.

The second prediction addresses historic site potential which is also considered to be low across most of the project area based on a review of historic maps and aerial photographs of the surrounding area which show no structures within the project area. However, historic and modern aerial imagery show that the old channel of Prairie Creek was dammed sometime between 1953 and 1968, shifting the creek channel to the west to its current location. Based on the date of the earliest historic photograph depicting this architectural feature, it was predicted that the potential for finding cultural resources at this location were high.

<u>Methodology</u>

Survey was conducted in accordance with the standards set forth by the THC (2014). Field personnel walked the survey area and placed shovel tests at a rate of at least 1 every 3 acres where the slope was less than 20 percent and the ground visibility less than 30 percent. Shovel tests averaged 30 cm in diameter. A clay auger was used to supplement shovel test if the clay subsoil was deeper than shovels could reach. All sandy and loamy soils were screened through 1/4" wire mesh screens. Clay fill was inspected visually and broken into smaller chunks in order to determine if cultural materials were present. Shovel test soil matrices were described on the basis of composition, texture, and color. The Munsell Soil Color Chart (2009) was used to identify soil colors. The exception to this was in the northern section of Crawford park that has been subject to modern landscape disturbances that include the maintenance facility as well as the numerous sports fields. These areas were subject to a reconnaissance survey that included transects spaced no more than 30 m apart without shovel testing. The field crew made notes about the ground exposure, drainages, soil types, and disturbed areas where subsoil was exposed. Photographs were taken during the survey using digital, GPS-equipped cameras. Shovel test and project boundary locations were marked with a handheld, GPS receiver using the NAD83 datum.

RESULTS

This chapter consists of three sections. The first describes the project area's natural setting along with results of the pedestrian survey. The second section describes a newly recorded historic site 41DL549. Finally, conclusions derived from the survey close the chapter. Shovel tests (STs) are described generally in the text but are detailed in Table 2 at the end of the Survey Results section. Conclusions round out the chapter.

Survey Results

The Crawford Memorial Park Improvements project area is located in the uplands and is bisected by the north-south running Prairie Creek. Survey was broken into two areas that will be discussed in turn; the Modern Disturbance Sections and the Intensive Pedestrian Survey Area. The northern portion of modern disturbance is currently maintained as sports fields and walking trails that consist of short, mowed grasses along with widely spaced oak trees while the Crawford Aquatic Center has been constructed on the very southern portion of the park. The area subject to intensive pedestrian survey located in the central wooded area of the park is extremely dense consisting of elm, oak, cottonwood, greenbrier, Virginia creeper, and poison ivy. The southern portion of the park is open and consists mostly of tall grasses with pockets of deciduous trees closer to the creek.

The central and southern portions of the project area is located in an environment that is subject to heavy erosional activity that has carved deep gullies that flow into Prairie Creek (Figure 4 and Figure 5). Erosional activity is present on both sides of Prairie Creek and is also evident where shallow soils are present on top of exposed bedrock (Figure 6). In total, 57 STs were excavated in the non-disturbed approximately 160 acres of the park.



Figure 4. Erosional gully from the central wooded area. View is to the north.



Figure 5. Erosional gully from the central wooded area on the west bank immediately above Prairie Creek. View is to the east.



Figure 6. Erosion of shallow subsoils to bedrock along the east bank of Prairie Creek. View is to the north.

Modern Disturbance Sections

Two sections within the Crawford Memorial Park Improvements project area have been subject to modern landscape disturbances. These are the northern and very southern sections of the park (Figure 7), both of which were subject to a reconnaissance survey without shovel testing.

Northern Section

The northern section totals approximately 97 acres and was subject to a reconnaissance survey with crew members walking transects spaced at no more than 30 m. No STs were dug in this area. Ground visibility in this section was good and ranged from 30 to 100% as it is manicured, and grasses are kept short. Trees are widely spaced when present. This section is confined to the areas that have been subject to modern landscape disturbances that include parking lots, cement walking trails, bathroom facilities, a playground, a covered picnic area, numerous sports fields, and the City of Dallas Park and Recreation Department Southeast Dallas Regional Maintenance Facility (Figure 8 and Figure 9). Park improvements to this area include reformatting and construction of sports fields, additional roads and parking, as well as the construction of a recreation center, playground, and skate park (Figure 2). A large amount of modern trash was visible on the surface that included broken glass, bottle caps, plastic, and rubber. No cultural resources were identified during the survey of this section.

Southern Section

The very southern end of the project area is another area that has been subject to modern landscape disturbances. This portion of the park totals approximately 8 acres and was used in the past as a motocross trail system until 2004 when the local community voiced concern and this activity ceased (PKCE-WRT 2012). In addition, the Crawford Aquatic Center was constructed sometime after September of 2017 based on Google Earth imagery. The aquatic center itself rests on approximately 5.5 acres of this area. Modern trash was again encountered on the ground surface and no cultural resources were identified during the survey of this section. No STs were dug.



Figure 7. Areas with modern landscape disturbances in the northern and southern sections of the Crawford Memorial Park project area shown on a modern aerial image.



Figure 8. Sports fields and the west end of the maintenance facility (visible to the right in the photo) from the northern section. View is to the east.



Figure 9. Sidewalk, light poles, and electric lines running down the west boundary of the northern section. The maintenance facility is located at the left edge of the photo. View is to the south.



Figure 10. The newly constructed Crawford Aquatic Center at the very southern end of the project area. View is to the southwest.

Pedestrian Survey Area

Survey of the remaining approximately 160 acres was subject to an intensive pedestrian survey with 57 STs (Figure 11). A total of 46 STs (01-46) were placed in the central wooded area on both sides of Prairie Creek that will form the Crawford Memorial Lake. This wooded area was extremely dense and consisted of elm, oak, cottonwood, greenbrier, Virginia creeper, and poison ivy (Figure 12). An additional 11 STs (47-57) were dug in the southern portion of the Pedestrian Survey Area that is more open and is defined by the PKCE-WRT (2012) as a remnant Blackland Prairie. According to the improvements design (Figure 2), the remnant Blackland Prairie will be preserved with little impact from the proposed Crawford Memorial Park Improvements. Throughout the survey a large amount of modern trash was visible on the ground surface of the park, especially in and around Prairie Creek (Figure 13). In STs around the creek modern trash was recovered in the STs down to approximately 20 cmbs.



Figure 11. Shovel test locations within the survey area.



Figure 12. Vegetation from the central wooded area subject to intensive pedestrian survey. View is to the west.



Figure 13. Example of the trash accumulation along Prairie Creek and within the park. View is to the southwest.

As mentioned earlier, the environment in which Crawford Memorial Park is located is extremely erosional. The areas on or above the first terrace of Prairie Creek, within the Pedestrian Survey Area, are mapped as having shallow A horizons of sandy loam above a clay loam to sandy clay loam subsoil between 13 and 64 cmbs. Soils mapped in this setting are the Rader-Urban, Axtell-Urban, Silawa-Urban, and Wilson-Urban complexes that have a color and texture change between the A or E horizons and the B horizon. This was evident in the visible erosional activities that occur across the project area (Figure 14), as well as the shallow deposits resting on top of bedrock along Prairie Creek (Figure 15). In some areas all soil was eroded, and gullies or channels were carved into the bedrock itself (Figure 16). Shovel tests 1-4, 8-13, 15-16, 23-37, and 40-57 (Table 2) were excavated in this topographic setting and were, in general, consistent with the A, E, and B horizons of these mapped soils. On the west side of Prairie Creek, STs encountered subsoils, degrading bedrock fragments, and bedrock between 12-70 cmbs. The southernmost section defined as Blackland Prairie remnant consists mostly of open grassland with sparse tree cover (Figure 17). This area has shallow subsoils resting on degrading bedrock fragments and bedrock that extends to the edge of the creek channel. Profiles from STs 44-57 in this area ranged in depth from 29-65 cmbs before subsoil or bedrock was encountered. ST 49 was the deepest ST in this area and went to approximately 80 cmbs before subsoil was encountered. An auger supplemented the ST at approximately 60 cmbs and encountered bedrock at 120 cmbs. No cultural resources were identified on the surface or in any of the STs.



Figure 14. Erosion to subsoil on the first terrace of the west bank of Prairie Creek. View is to the east.

AD CONCULTANTE INC



Figure 15. West bank of Prairie Creek just east of ST 57. View is to the west.



Figure 16. Erosional gully carved into the bedrock immediately above Prairie Creek on the east bank. View is to the north.



Figure 17. Southern Pedestrian Survey Area in the open remnant Blackland Prairie.

Throughout most of the Pedestrian Survey Area Prairie Creek runs between narrowly confined and deep drainage banks (Figure 15). However, there are two low floodplain areas in the center of the project area where Prairie Creek turns and runs east-west. It is evident that Prairie Creek is subject to heavy flooding based on the amount of modern trash on the surface (Figure 13). These low floodplain areas are mapped as Frio-Urban complex soils that have 102 cm of A horizon above a B horizon. Four STs (5, 6, 7, and 14) where placed on the north side of Prairie Creek (west bank) in this low floodplain area. However, STs on this topographic feature encountered degrading bedrock fragments and subsoil between 60 and 82 cmbs.

On the southside of Prairie Creek at this location (east bank) six STs (17-22) were placed in the low floodplain. Shovel tests in this area consisted of dark grayish brown clay ranging in depth from 80 to up to 140 cmbs before subsoil was encountered. In addition to the large amounts of modern trash on the surface, modern trash was recovered in these STs at depths up to approximately 20 cmbs. However, this low area, visible on (Figure 18) with deeper ST profiles, has been subject to increased flooding and sedimentation in the last 58 years due to the construction of a dam across Prairie Creek. The old channel of Prairie Creek was dammed by an earthen berm (the modern Crawford Memorial Park Loop Trail runs on top of this feature) and an approximately 4.25 m diameter intake structure was constructed to take flood water underneath the dam and trail in 1961 (Appendix A: Architectural and Historic Resources Survey). The new channel of Prairie Creek now flows to the west of this area before turning southeast again where the confluence of the two channels is located. This historic dam is visible as the open area in the center of (Figure 11 and Figure 18) and was recorded as site 41DL549 which will be discussed in the next section. Evident in Figure 18 is the fact that when even the smallest amount of flooding occurs, the whole

area extending back into the STs identified above floods as a result of this modern dam, much more so than it would have prior to damming. No cultural resources were found on the surface or in STs in this area apart from site 41DL549.

This image has been intentionally omitted by the authors.

Figure 18. Intake structure and earthen dam at site 41DL549 shown on a historic aerial photograph from 1968.

Table 2. Shovel Test Descriptions.

ST#	Depth	Description	Comments/
01	(cm) 0-110	Brown (10YR4/3) sandy silty loam	Artifacts Auger at 60 cmbs.
01	0-110	Brown (10 1 K4/3) sailey stity toain	Terminated at
			bedrock. None.
02	0-24	Very dark gray (7.5YR3/1) silty clay loam	None.
02	24-66	Very dark gray (7.5 YR3/1) sitty clay foam Very dark gray (7.5 YR3/1) and very dark grayish brown (10 YR3/2) silty clay	TVOIIC.
	66-79	Dark gray (2.5Y4/1) silty clay with small gravels	
	73-79	Dark gray (2.5 Y4/1) silty clay with large bedrock gravels	
03	0-16	Dark brown (10YR3/3) sandy clay	None.
03	16-30	Strong brown (7.5YR4/6) clay	rvone.
04	0-11	Very dark grayish brown (10YR3/2) silty loamy clay	Auger at 70 cmbs.
04	11-24	Dark yellowish brown (10YR4/4) sandy clay	None.
	24-65	Dark grayish brown (10YR4/2) and dark gray (10YR4/1) sandy clay	None.
	65-74	Dark grayish brown (2.5Y4/2) sandy clay	
	74-85	Yellowish brown (10YR5/4) sandy silty clay with white (10YR8/1) and very	
	74-03	pale brown (10YR7/3) degrading bedrock	
05	0-30	Very dark grayish brown (10YR3/2) silty loamy clay with 2 cm gravels (5%)	Auger at 75 cmbs.
03	30-65	Grayish brown (10YR5/2) silty clay	None.
	65-82	Brown (10YR5/3) sandy clay with bedrock fragments and gravels	None.
	82-85	Brown (10YR4/3), yellowish brown (10YR5/6), and very pale brown	
	82-83		
06	0.10	(10YR7/4) degrading bedrock	M. 1 1
06	0-19	Dark grayish brown (10YR4/2) silty clay	Modern trash to
	19-35	Dark grayish brown (10YR4/2) and dark gray (10YR4/1) fine silty clay,	~20 cmbs. None.
	25 47	angular	
	35-47	Brown (10YR4/3) and dark grayish brown (10YR4/2) clay	
	47-67	Dark grayish brown (10YR4/2) clay and brown (10YR5/3) sandy clay	
	67-72	Pale brown (10YR6/3), brown (10YR5/3), and yellow (10YR7/6) degrading bedrock	
07	0-17	Very dark grayish brown (10YR3/2) clay loam	Terminated at
07	17-20	Very dark grayish brown (10 YR3/2) clay loam with degrading bedrock	bedrock. None.
	17-20	(25%)	bedrock. Ivolic.
	20-30	Very dark grayish brown (10YR3/2) clay loam	
	30-60	Yellowish brown (10YR5/4) sandy loam	
08	0-17	Dark brown (10YR3/3) sandy clay	None.
00	17-40	Strong brown (7.5YR4/6) clay	TVOIIC.
09	0-41	Very dark grayish brown (10YR3/2) silty clay	None.
09	41-62	Very dark gray (10YR3/1) silty clay	None.
10	0-27	Very pale brown (10YR7/3) fine sandy loam	None.
10	27-52	Very dark gray (10YR3/1) silty clay	None.
11	0-12	Very dark grayish brown (10YR3/2) sandy loam	None.
11			None.
	12-42	Very pale brown (10YR7/3) fine sandy loam Light brownish gray (10YR6/2) (90%) and yellowish red (5YR5/8) (10%)	
	42-51		
12	0.50	clay	Nama
12	0-50	Very dark grayish brown (10YR3/2) silty clay	None.
12	50-59	Very dark gray (10YR3/1) silty clay	NT
13	0-6	Very dark grayish brown (10YR3/2) silty loam	None.
	6-50	Grayish brown (10YR5/2) silty clay	

ST#	Depth (cm)	Description	Comments/ Artifacts
14	0-17	Very dark grayish brown (10YR3/2) silty clay	Auger at 80 cmbs.
	17-84	Dark grayish brown (10YR4/2) sandy silty clay	Modern trash to
	84-95	Grayish brown (2.5Y5/2) sandy silty clay	~20 cmbs. None.
15	0-21	Very dark grayish brown (10YR3/2) sandy loam	None
	21-36	Yellowish red (5YR4/6) clay loam	
16	0-12	Dark grayish brown (10YR4/2) sandy loam	None.
	12-65	Yellowish brown (10YR5/6) sandy loam	
	65-78	Brownish yellow (10YR6/6) and light gray (10YR7/2) sandy loam	
	78-80	Light gray (10YR7/2) degrading bedrock and sand	
17	0-21	Very dark grayish brown (10YR3/2) sandy clay loam	Auger at 86 cmbs.
	21-56	Dark grayish brown (10YR4/2) sandy clay loam	Modern trash to
	56-70	Brown (10YR4/3) sandy clay	20 cmbs. None.
	70-98	Pale brown (10YR6/3) sandy loam	
	98-125	Brown (10YR4/3), yellowish brown (10YR5/4), gray (10YR5/1), and light	
		gray (10YR7/1) clay loam	
18	0-36	Very dark gray (7.5YR3/1) sandy clay loam	Auger at 77 cmbs.
	36-50	Dark grayish brown (10YR4/2) sandy clay loam	None.
	50-86	Dark grayish brown (10YR4/2) and yellowish brown (10YR5/4) sandy loam	
	86-165	Brown (10YR4/3) and dark yellowish brown (10YR4/4) clay with <0.5 mm	
		river gravels and 2 cm bedrock fragments at the bottom	
19	0-125	Very dark grayish brown (10YR3/2) sandy clay loam	Auger at 60 cmbs.
	125-140 140-150	Dark grayish brown (10YR4/2) sandy clay loam	None.
		Grayish brown (10YR5/2) sandy clay	
20	0-90	Very dark grayish brown (10YR3/2) clay	Auger at 65 cmbs.
	90-110	Brown (10YR5/3) silty sand	None.
21	0-90	Dark grayish brown (10YR4/2) silty clay loam	Auger at 65 cmbs.
	90-100	Grayish brown (10YR5/2) sandy clay loam	None.
22	0-32	Very dark grayish brown (10YR3/2) clay	Auger at 60 cmbs.
	32-70	Grayish brown (10YR5/2) (85%) and dark yellowish brown (10YR4/6)	None.
	70.05	(15%) clay	
	70-95	Grayish brown (10YR5/2) (85%) and dark yellowish brown (10YR4/6)	
	05 115	(15%) sandy clay	
	95-115	Very dark brown (10YR2/2) (90%) and dark yellowish brown (10YR4/6)	
	115-125	(10%) clay Dark grayish brown (10YR4/2) (85%) and dark yellowish brown (10YR4/6)	
	113-123	(15%) clay	
	125-130	Grayish brown (10YR5/2) and yellowish brown (10YR5/6) sandy clay	
23	0-20	Dark brown (10 YR3/3) clay loam	None.
23	20-59	Yellowish red (5YR5/8) sandy clay	TAORC.
24	0-4	Very dark grayish brown (10YR3/2) fine sandy loam	None
_	4-23	Very dark grayish brown (10 FK5/2) line sandy loam Very pale brown (10YR7/4) fine sandy loam	TAOHE
	23-38	Yellowish red (5YR5/8) clay loam	
25	0-7	Very dark grayish brown (10YR3/2) fine sandy loam	None.
23	7-34	Very pale brown (10YR7/4) fine sandy loam	Tione.
	34-46	Yellowish red (5YR5/8) clay loam	
26	0-9	Dark brown (10YR3/3) sandy loam	None.
20	9-34	Pale brown (10 YR6/3) sandy loam	Tione.
	34-45	Brown (10YR5/3) clay	
	J 1 TJ	Bioni (10 lito/5) city	

ST#	Depth (cm)	Description	Comments/ Artifacts
27	0-5	Very dark grayish brown (10YR3/2) fine sandy loam	None.
	5-17	Very pale brown (10YR7/4) fine sandy loam	
	17-33	Yellowish red (5YR5/8) clay loam	
28	0-4	Very dark grayish brown (10YR3/2) fine sandy loam	None.
	4-24	Very pale brown (10YR7/4) fine sandy loam	
	24-45	Yellowish red (5YR5/6) clay loam	
29	0-5	Brown (10YR4/3) and very dark grayish brown (10YR3/2) sandy loam	None.
	5-23	Pale brown (10YR6/3) sandy loam	
	23-28	Yellowish red (5YR5/6) sandy clay	
30	0-30	Dark grayish brown (10YR4/2) silty clay	Auger at 80 cmbs.
	30-78	Grayish brown (10YR5/2) sandy clay	Modern trash to
	78-117	Brown (10YR4/3), gray (10YR5/1), gray (10YR6/1), and yellowish brown	~25 cmbs. None.
		(10YR5/4) sandy clay loam	
31	0-50	Black (10YR2/1) clay	Terminated due to
			roots. None.
32	0-45	Dark brown (10YR3/3) sandy clay loam	Auger at 65 cmbs.
	45-68	Yellowish brown (10YR5/4) sandy clay loam	Terminated at a
	68-85	Light yellowish brown (2.5Y6/4) sandy clay with small calcium carbonate	root. None.
		fragments (15%)	
	85-96	Light yellowish brown (2.5Y6/4) sandy clay loam with larger calcium	
		carbonate fragments (25%)	
33	0-22	Dark brown (10YR3/3) sandy clay loam	None
	22-57	Dark yellowish brown (10YR4/4) clay loam with calcium carbonate	
		fragments (5%)	
34	0-3	Brown (10YR4/3) sandy loam	None.
	3-7	Pale brown (10YR6/3) sandy clay loam	
	7-20	Dark grayish brown (10YR4/2), very dark grayish brown (10YR3/2), and	
		light yellowish brown (10YR6/4) clay with some sandy loam, angular,	
		blocky	
35	0-8	Brown (10YR4/3) sandy loam	Modern plastic
	8-24	Pale brown (10YR6/3) sandy clay loam	and glass from
	24-41	Very dark grayish brown (10YR3/2) and brown (10YR4/3) clay with some	surface to ~3
		sandy loam, angular, blocky	cmbs.
36	0-9	Brown (10YR4/3) sandy loam	None.
	9-12	Light yellowish brown (10YR6/4) sandy loam	
	12-16	Reddish yellow (5YR6/6) sandy clay	
37	0-12	Brown (10YR4/3) sandy loam	Terminated at
	12-50	Brownish yellow (10YR6/6) sandy loam	bedrock. None.
	50-100	Brownish yellow (10YR6/8) sand	
	100-105	Yellowish brown (10YR5/6) and brownish yellow (10YR6/6) sand	
38	0-22	Light yellowish brown (10YR6/4) sand	Auger at 78 cmbs.
	22-46	Very dark grayish brown (10YR3/2) silty clay	Modern trash to
	46-66	Yellowish brown (10YR5/4) sandy clay	~20 cmbs. None.
	66-107	Very dark grayish brown (10YR3/2) silty clay with bottom 20 cm clay	
	107-117	Dark grayish brown (10YR4/2) silty clay to clay	
39	0-50	Dark grayish brown (10YR4/2) silty clay	Auger at 50 cmbs.
	50-60	Very dark grayish brown (10YR3/2) sandy clay	None.
	60-95	Yellowish brown (10YR5/6) sand	

ST#	Depth (cm)	Description	Comments/ Artifacts
40	0-25	Very dark brown (10YR2/2) clay	Auger at 70 cmbs.
	25-60	Dark yellowish brown (10YR4/4) silty sandy clay	Terminated at
	60-100	Dark yellowish brown (10YR4/6) silty sand with shell fragments of decomposing bedrock	bedrock.
41	0-42	Very dark grayish brown (10YR3/2) sandy clay	Auger at 85 cmbs.
	42-90	Dark grayish brown (10YR4/2) clay	Terminated at
	90-110	Dark grayish brown (10YR4/2) (95%), yellowish brown (10YR5/8) (5%)	bedrock. None.
		sandy clay with 50% small pebbles	
	110-127	Dark grayish brown (10YR4/2) (33%), yellowish brown (10YR5/8) (33%),	
		and very pale brown (10YR8/2) (33%) clay	
42	0-13	Dark brown (7.5YR3/2) sandy loam	None.
	13-30	Strong brown (7.5YR5/6) sandy loam	
	30-48	Yellowish brown (10YR5/6) clay	
43	0-23	Very dark grayish brown (10YR3/2) clay with a lot of roots	Terminated at
	23-30	Light gray (10YR7/2) decaying bedrock	impenetrable root.
			Racoon mandible
			at 20 cmbs. None.
44	0-19	Dark brown (10YR3/3) sandy clay loam	None.
	19-30	Strong brown (7.5YR5/6) clay loam	
45	0-11	Brown (10YR4/3) sandy loam	None.
	11-32	Light yellowish brown (10YR6/4) sandy loam	
	32-36	Reddish yellow (5YR6/6) sandy clay	
46	0-5	Brown (10YR4/3) sandy loam	None.
	5-29	Light yellowish brown (10YR6/4) sandy loam	
47	29-35	Reddish yellow (5YR6/6) sandy clay	.
47	0-68	Dark grayish brown (10YR4/2) (60%) and dark yellowish brown (10YR4/6)	None.
40	0.7	(40%) silty clay	NT
48	0-7 7-32	Very dark gray (10YR3/1) sandy clay loam	None
	32-34	Brown (10YR4/3) sandy loam Light yellowish brown (10YR6/4) and brownish yellow (10YR6/6) sandy	
	32-34	loam	
	34-38	Red (2.5YR4/8) sandy clay	
49	0-85	Very dark grayish brown (10YR3/2) very fine sandy silty loam	Auger at 60 cmbs.
77	85-120	Brown (10YR4/3) silty loam	Terminated at
	03 120	Biowii (10 IK 1/3) siity louiii	impenetrable
			bedrock.
50	0-42	Dark brown (10YR3/3) clay loam	None.
	42-78	Yellowish brown (10YR5/4) clay with calcium carbonate (25%) increasing	
		with depth	
51	0-16	Brown (10YR4/3) sandy loam	None.
	16-58	Reddish yellow (7.5YR6/6) (70%) and brown (10YR4/3) (30%) sandy clay	
		loam	
52	0-8	Very dark grayish brown (10YR3/2) sandy silty loam	None.
	8-35	Very dark gray (10YR3/1) silty clay	
	35-45	Black (10YR2/1) silty clay	
53	0-62	Black (10YR2/1) sandy loam	Terminated at the
			water table. None.
54	0-16	Dark yellowish brown (10YR4/4) sandy loam	None.
	16-38	Yellowish red (5YR4/6) sandy clay	

ST#	Depth	Description	Comments/
	(cm)		Artifacts
55	0-12	Very dark grayish brown (10YR3/2) sandy loam	None.
	12-31	Brown (10YR4/3) fine sandy loam	
	31-48	Strong brown (7.5YR5/6) and brown (10YR5/3) sandy clay loam	
	48-54	Brownish yellow (10YR6/6) and grayish brown (10YR5/2) sandy clay	
56	0-11	Dark grayish brown (10YR4/2) sandy loam	Terminated at
	11-34	Dark grayish brown (10YR4/2) sandy clay loam	bedrock. None.
	34-54	Brown (10YR4/3) and yellowish brown (10YR5/4) sandy clay	
	54-65	Olive brown (2.5Y4/3) sandy clay	
57	0-24	Brown (10YR4/3) sandy loam	None.
	24-56	Yellowish brown (10YR5/4) and yellowish brown (10YR5/6) sandy clay	
	56-65	Light olive brown (2.5Y5/3) sandy clay	
	65-80	Light brownish gray (10YR6/2) and grayish brown (10YR5/2) sandy clay	
		with decomposing bedrock	

Site Description

Site 41DL549

Site 41DL549 (Figure 1Figure 19) is an earthen dam and intake structure that was constructed in 1961 and is visible on historic aerial photographs and recent aerial imagery starting in 1968. The dam was originally conceived in 1955 and the plan was to construct a much larger lake at the location within Crawford Memorial Park. However, a reduced version of the dam was constructed in 1961 and by 1968 had structurally failed (Appendix A: Architectural and Historic Resources Survey). The site was evaluated by an Architectural Historian from Cox|McLain Environmental Consulting, Inc, and the full report can be seen in Appendix A: Architectural and Historic Resources Survey. The earthen dam is approximately 7-8 ft above the channel bottom and a portion of the Crawford Memorial Park Loop Trail runs along the top of it (Figure 20). The visible berm of the earthen dam begins on the east side of the site as it grades from the edge of the first terrace. The dam continues to the west, encompassing the intake structure to the north, and then heads in a northwesterly direction. The exact edge of the earthen dam is unknown as the visible berm gradually levels out with the surrounding ground surface where the manicured grass ends and is lost in the trees and vegetation. The intake structure, located on the upstream side of the dam, is approximately 4.25 m diameter and takes flood water underneath the dam and walking trail where an outtake feature is likely located under an existing pool of standing water (southeastern portion of the site). The cement and rebar intake structure is approximately 1.7 m-tall, the cement portion being about 1.1 m above the ground surface and the rebar lattice being approximately 0.6 m-high on top of the cement (Figure 21).

Based on the findings of the architectural historian (Appendix A: Architectural and Historic Resources Survey) site 41DL549 is not individually eligible for NRHP listing under Criterion A, B, or C or as a potential contributor to any historic district associated with Crawford Memorial Park, which has limited potential for NRHP listing itself. The site could not be tied to significant persons, events, or styles, nor does it hold potential to produce further information about past lifeways or environments (36 CFR 60.4a-d). Therefore, site 41DL549 is recommended as ineligible for listing in the NRHP nor to be designated as a SAL.

Figure 19. Site 41DL549 and the intake structure shown on recent aerial imagery.

Figure 20. Earthen dam and intake structure.

Figure 21. Intake structure.

Conclusions

The location of the project area is in an environment subject to heavy erosion. Subsoils, degrading bedrock fragments, and bedrock were encountered at shallow depths and are visible in the profiles of Prairie Creek and on the surface of the ground itself. In total, 57 STs were excavated in targeted areas not subject to modern landscape disturbances, all of which were negative. As a result of the Crawford Memorial Park Improvements survey a single historic site, 41DL549, was recorded. Site 41DL549 is an earthen dam and intake structure that failed within a decade of construction based on the findings of an architectural historian. Apart from site 41DL549, no additional cultural resources were encountered during survey on the surface or in STs. These results are consistent with the hypotheses put forth in the research design.

RECOMMENDATIONS

The purpose of this investigation was to determine if significant cultural resources are present within the proposed Crawford Memorial Park Improvements project area in Dallas County, Texas. Within the approximately 265 acres surveyed, one historic site was newly recorded. Site 41DL549 is an earthen dam and intake structure that was constructed in 1961 but failed within a decade. Site 41DL549 is not individually eligible for NRHP listing under Criterion A, B, or C or as a potential contributor to any historic district associated with Crawford Memorial Park as it could not be tied to significant persons, events, or styles, nor does it hold potential to produce further information about past lifeways or environments (36 CFR 60.4a-d). Site 41DL549 is recommended as ineligible for listing in the NRHP nor to be designated as a SAL.

AR Consultants, Inc. recommends that the Crawford Memorial Park Improvements project be allowed to proceed. Based on the results of the survey, ARC concludes that further cultural resource investigations for this project are unwarranted and recommends that the USACE and the THC concur with this assessment. However, if buried cultural materials are discovered during construction, the Archeology Division of the Texas Historical Commission and the Fort Worth District of the USACE should be notified.

AD CONCLUTANTE INC

REFERENCES CITED

Council of Texas Archeologists

Guidelines for the Content of Cultural Resource Management Reports. http://www.thc.texas.gov/public/upload/CTAguidelines.pdf, accessed February 15, 2018.

Abbot, James T. and Scott Pletka

2014 Data Release: The Dallas District HPALM Model. Environmental Affairs Division, Texas Department of Transportation, Austin.

Bell, R. E., Edward B. Jelks and W. W. Newcomb, Jr.

1967 A Pilot Study of Wichita Indian Archaeology and Ethnohistory. Final Report for Grant GS-964. National Science Foundation, Washington, D. C.

Bever, Michael R. and David J. Meltzer

2007 Paleoindians of Texas: A Third Revised Edition of the Texas Clovis Fluted Point Survey. *Bulletin of the Texas Archeological Society* 78:65-99.

Brown, Kenneth L. and Susan A. Lebo

1991 Archaeological Testing of the Lewisville Lake Shoreline, Denton County, Texas. University of North Texas, Institute of Applied Sciences, report submitted to the Fort Worth District, US Army Corps of Engineers, Denton.

Bruseth, James E.

1992 Artifacts of the de Soto Expedition: The Evidence from Texas. *Bulletin of the Texas Archeological Society* 63:67–98.

Bruseth, James E. and William A. Martin

The Wylie Focus: Cultural Reality or Archaeological Myth? In *The Bird Point Island and Adam Ranch Sites: Methodological and Theoretical Contributions to North Central Texas Archaeology*. William A. Martin and James E. Bruseth, Eds., Institute for the Study of Earth and Man, Archaeology Research Program, Richland Technical Series, Volume II, pp. 267-284, Southern Methodist University, Dallas.

Bureau of Economic Geology

1988 Geologic Atlas of Texas: Dallas Sheet. Bureau of Economic Geology, the University of Texas at Austin.

Byrd, Clifford Leon

1971 *Origin and History of the Uvalde Gravel of Central Texas*. Bulletin No. 20. Baylor Geological Studies, Waco. Coffee, Daniel R., Ralph Hill, and Dennis D. Ressel

1980 *Soil Survey of Dallas County, Texas.* United States Department of Agriculture, Soil Conservation Service in cooperation with Texas Agricultural Experiment Station.

Crook, Wilson W., Jr. and R. King Harris

Hearths and Artifacts of Early Man near Lewisville, Texas and Associated Faunal Material. *Bulletin of the Texas Archeological Society* 28:7-79.

Crook, Wilson W. and Mark D. Hughston

2015 The Late Prehistoric of the East Fork: A Redefinition of Cultural Concepts along the East Fork of the Trinity River, North Central Texas. CreateSpace, Charleston, South Carolina.

Ferring, C. Reid

2001 The Archaeology and Paleoecology of the Aubrey Clovis Site (41DN479), Denton County, Texas.
University of North Texas, Department of Geography, Center for Environmental Archaeology, Denton.

Ferring, C. Reid and Bonnie C. Yates

1998 Archaeological Investigations at Five Prehistoric Sites at Lewisville Lake, Denton County, Texas. Institute of Applied Sciences, University of North Texas, Denton.

Fritz, G. J.

1993 Archaeobotanical Evidence from Cobb-Poole Site: A Late Prehistoric Farmstead in Dallas County, Texas. Bulletin of the Texas Archeological Society 64:227-246.

Garrett, Julia Kathryn

1972 Fort Worth: A Frontier Triumph. The Encino Press. Austin.

John, Elizabeth A. H.

1992 A Case Study in the Interdependence of Archeology and History: The Spanish Fort Sites on the Red River. Bulletin of the Texas Archeological Society 63:197 – 210.

Kovach, Gretel C.

2009 The Very Complicated Legacy of Dr. William Samuell. D Magazine, August 2009.

AD CONCILITANTS INC

Lebo, Susan A. and Kenneth Lynn Brown

1990 Archaeological Survey of the Lewisville Lake Shoreline, Denton County, Texas. University of North Texas, Institute of Applied Sciences, Denton.

McElhaney, Jackie and Michael V. Hazel

2015 Dallas, Texas. Electronic document, http://www.tshaonline.org/handbook/online/articles/hdd01, accessed May 2, 2018.

Pacheco Koch Consulting Engineers and Wallace Roberts and Todd (PKCE-WRT)

2012 Crawford Memorial Park Master Plan Report. Prepared for the City of Dallas, Park and Precreation Department, in February 2012. Available online:

https://www.dallasparks.org/DocumentCenter/View/6877/H-Crawford-Park-Master-Plan-Report-FINAL.

Peter, Duane E. and Daniel E. McGregor, editors

1988 Late Holocene Prehistory of the Mountain Creek Drainage. Joe Pool Lake Archaeological Project, Volume I. Institute for the Study of Earth and Man, Southern Methodist University, Dallas.

Prikryl, Daniel J.

1990 Lower Elm Fork Prehistory: A Redefinition of Cultural Concepts and Chronologies along the Trinity River, North-Central Texas. Office of the State Archeologist, Report 37. Texas Historical Commission, Austin.

Prikryl, Daniel J. and Timothy K. Perttula

North Central Texas. In Prehistoric and Historic Aboriginal Ceramics in Texas, edited by Timothy K. Perttula, Myles R. Miller, Robert A. Ricklis, Daniel J. Prikryl and Christopher Lintz. *Bulletin of the Texas Archeological Society* 66:175-235.

Richner, Jeffrey J. and T. Reed Lee

1976 *Cultural Resources of Tennessee Colony Lake*, Research Report 85. Archaeology Research Program, Southern Methodist University, Dallas.

Skinner, S. Alan

1988 Where Did All the Indians Go? *The Record*, Fiftieth Anniversary Edition, 42(3):101-104.

Texas Archeological Sites Atlas

Search for cultural resources near the current project area. Texas Historical Commission Internet site, http://nueces.thc.state.tx.us, accessed March 25, 2019.

Texas Historical Commission (THC)

Archeological Survey Standards for Texas.

http://www.thc.texas.gov/public/upload/publications/THC_SurveyStandards_2014.pdf, accessed February 15, 2018.

Todd, Jesse

1999 Shell Hoes: Toward a Definition. Paper presented at the 70th Annual Texas Archeological Society Meeting, Fort Worth.

ARCHAEOLOGICAL SURVEY OF THE CRAWFORD MEMORIAL PARK IMPROVEMENTS	35
APPENDIX A: ARCHITECTURAL AND HISTORIC RESOURCES SURVEY	



April 25, 2019

Phil Fisher Project Archeologist AR Consultants, Inc. 805 Business Parkway Richardson, TX 75081

Re: Earthen Dam at Crawford Memorial Park, Dallas, Dallas County, Texas

Dear Mr. Fisher:

Per your request, Cox | McLain Environmental Consulting, Inc. (CMEC) conducted a survey and completed research on an earthen dam in Crawford Memorial Park in the city of Dallas, Dallas County, Texas. In anticipation of potential project permitting by the U.S. Army Corps of Engineers, this investigation includes an evaluation of the dam for its potential eligibility for inclusion in the National Register of Historic Places (NRHP) and thus, designation as a State Antiquities Landmark (SAL) under the provisions of the Texas Antiquities Code. As this is a non-archeological study, NRHP evaluation under Criterion D was not undertaken as part of this report.

History of Crawford Memorial Park and the Earthen Dam

As part of a master plan for Crawford Memorial Park, the team of Pacheco Koch Consulting Engineers (PKCE) and Wallace Roberts and Todd (WRT) compiled a history of the park for the City of Dallas Park and Recreation Department in 2012. CMEC research confirmed details of the origin and development of the park presented in the master plan, and a summary is provided here.

Crawford Memorial Park comprises 272 acres in the Pleasant Grove neighborhood of Dallas, southeast of downtown and just east of Loop 12. The park originated with two land donations. The City of Dallas received a 202-acre parcel as part of a land transaction with the Dr. William W. Samuell Foundation, resulting in the creation of Samuell–Elam Park in 1954. Judge William Lyne Crawford II acquired and donated to the city a 70-acre parcel adjacent to Samuell–Elam Park in 1955. Crawford's donation included a caveat that the entire 272-acre park was to be named Crawford Memorial Park, in honor of his parents.

The original master plan for Crawford Memorial Park was completed c. 1955 by Kansas City-based architecture and landscape design firm Hare and Hare, who had extensive experience in the Dallas—Fort Worth area, having designed Dealey Plaza in 1940, and master plans for both Dallas and Fort Worth parks and schools in the 1930s and 1940s, among many other projects. At the time it was acquired, the park was the third-largest in the city, behind White Rock and Bachman Parks (*Dallas Morning News* 1954). Plans for the park included a bird sanctuary, walking trails, athletic fields, and a large service center with greenhouses. Hare and Hare's master plan called for a lake as the centerpiece for the park, created by damming Prairie Creek, which runs generally north-south through the park.

A lake, albeit reduced in scale from the original plans, was built in 1961 by construction of an earthen dam and spillway near the center of the park. According to the PKCE-WRT master plan, "the lake was a popular feature with local residents for a few years, but in time, several geotechnical issues arose along with inadequate water conveyance systems, which resulted in the failure of the lake structure" (PKCE-WRT 2012:12). Aerial photography from 1968 illustrates the earthen dam constraints, but no lake

present by that time (Figure 1). The current survey confirmed the presence of the dam and intake structure as of March 2019.

Survey

Prior to conducting the survey, CMEC staff examined the Texas Historical Commission's Texas Historic Sites Atlas to determine the presence or absence of previously identified historic properties in the vicinity of the dam. No historic properties were identified in the Atlas.

CMEC staff documented the earthen dam in Crawford Memorial Park on March 28, 2019. The dam is not distinguishable from the surrounding grounds except by its change in grade and the presence of the original intake structure. There was no standing water present within the confines of the dam and spillway. There are vegetative grasses, shrubs, and trees on what would have been the floor of the lake. The presence of man-made detritus and refuse within the confines of the footprint of the lake indicates that Prairie Creek continues to flow through the area, but the dam is not functioning to retain any of the creek's overflow. See attached Photos 1–4.

NRHP Evaluation

The 1955 Hare and Hare master plan for Crawford Memorial Park called for a large man-made lake as the park's main attraction. The earthen dam built in 1961 was erected to create a scaled-down version of the designers' original vision, and though enjoyed by park attendees for several years, had structurally failed by 1968. Components of the construction project are still in place, with both the dam and the intake structure visible in March 2019.

The dam does not have any known associations with events that have made a significant contribution to broad patterns of history (Criterion A). Its design/construction is not known to be associated with any significant persons (Criterion B). The dam, as executed on a smaller scale, was not part of the Hare and Hare master plan, nor does it embody distinctive characteristics of a type, period, or method of construction, or possess high artistic values (Criterion C). Therefore, the dam, as a failed component of the reduced-scale lake constructed in 1961 is recommended not individually eligible for NRHP listing under Criterion A, B, or C.

The City of Dallas Park and Recreation Department commissioned a comprehensive inventory, assessment, and management plan for all of its parks, which was approved in January 2016. In the resultant document, also prepared by WRT, Crawford Memorial Park is classified as one of 12 metropolitan parks, larger than a neighborhood park, but smaller than a regional park like White Rock. The report identified 59 historic and 13 culturally significant parks, categorizing their associations with the City Beautiful Movement, school partnerships, Depression-era works projects, civic investment, cemeteries, or any other historic association. As a park developed after 1943 and lacking association with the previously mentioned themes, Crawford Memorial Park was not included on the report's list of historic or culturally significant parks in Dallas (WRT 2016).

The dam is associated with a park that is not one of the 13 deemed culturally significant in the City of Dallas Park and Recreation Department Comprehensive Plan, nor one of the 59 historic parks identified in the report, most of which are associated with a pre-1950 theme. Crawford Memorial Park, while associated with prominent Dallas citizens Dr. William W. Samuell and Judge William Lyne Crawford II, is not the primary link between the men and Dallas, and neither man is associated with the design and construction of the earthen dam. Therefore, the dam is also recommended not eligible as a potential contributor to any historic district associated with Crawford Memorial Park, which, as discussed, has

limited potential for NRHP listing itself. The dam is not part of the original park design and functioned for less than 10 years.

Please feel free to contact me at (469) 647-4866 or annk@coxmclain.com if you have any questions.

Sincerely,

Ann M. Keen

Senior Architectural Historian

References

Dallas Morning News

1954 "City Employs Firm to Plan Large Park." 19 November 1954:12.

Pacheco Koch Consulting Engineers and Wallace Roberts and Todd (PKCE-WRT)

2012 Crawford Memorial Park Master Plan Report. Prepared for the City of Dallas, Park and Precreation Department, in February 2012. Available online:

https://www.dallasparks.org/DocumentCenter/View/6877/H-Crawford-Park-Master-Plan-Report-FINAL.

Wallace Roberts and Todd (WRT)

2016 Dallas Park and Recreation Department Comprehensive Plan. Prepared with PROS Consulting, Dunaway Associates, Quimby McCoy, National Service Research, Verdunity, and K Strategies. Available online: https://www.dallasparks.org/DocumentCenter/View/5267/Park-and-Recreation-Comprehensive-Plan-Final-20160318.

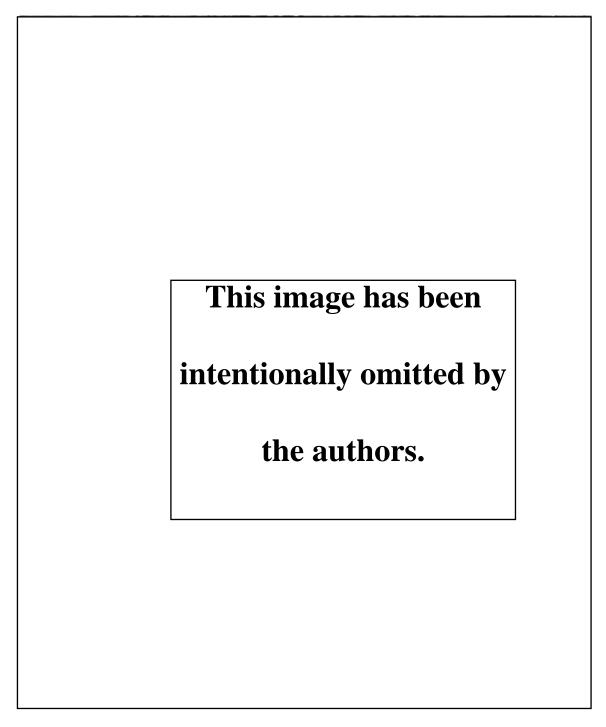


Figure 1. Crawford Memorial Park, 1968, with earthen dam indicated. (Source: U.S. Geological Survey)

Photo 1. Earthen dam location, view looking west. (March 28, 2019)

Photo 2. Earthen dam location, view looking northwest. (March 28, 2019)

Photo 3. Earthen dam location, view looking northeast. (March 28, 2019)

Photo 4. Intake structure, view looking northwest. (March 28, 2019)