Historic Background Research and a Ground Penetrating Radar Survey Associated with the Greer Stadium Redevelopment Project in Nashville, Davidson County, Tennessee

Tennessee Valley Archaeological Research

HISTORIC BACKGROUND RESEARCH AND A GROUND PENETRATING RADAR SURVEY ASSOCIATED WITH THE GREER STADIUM REDEVELOPMENT PROJECT IN NASHVILLE, DAVIDSON COUNTY, TENNESSEE

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ABSTRACT

Under contract with Metro Parks & Recreation, Nashville., Tennessee Valley Archaeological Research (TVAR) conducted historical background research and a ground penetrating radar (GPR) assessment of Greer Stadium in anticipation of potential development of the project area. Limited subsurface testing of the targeted areas was also conducted as a means to ground-truth the GPR data. The purpose of the investigation was to provide Metro Parks & Recreation with an assessment of the site in regard to previous disturbances and a recommendation about the potential preservation of archaeological remains in the project area.

Investigations resulted in the identification of stratified archaeological deposits and intact cultural features, which likely contain human remains associated with the "contraband camps" that were part of the building of Fort Negley, a Civil War-era fortification designated as archaeological site 40DV189.The GPR survey, coupled with subsurface testing, also revealed that significant portions of the project area have been subjected to extensive land alteration and leveling. The survey indicates that the southwestern portion of the project area includes intact deposits that potentially include human remains. Further, the survey indicates that, while there has been large-scale cutting of the hillside, segments of the pre-1937 hillside still exist underneath large amounts of fill.

TVAR is recommending that a portion of the project area be protected, with no land alterations taking place. It is suggested that this portion be reintegrated into Fort Negley Park. It is further recommended that during any land alterations of the project area that a qualified archaeological monitor be on-site due to the possibility that further sensitive archaeological deposits may be present.

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CHAPTER 1. INTRODUCTION

In the fall of 2017, Tennessee Valley Archaeological Research (TVAR), under a subcontract with Metro Parks & Recreation, Nashville., conducted historic background research and a ground penetrating radar (GPR) assessment of Herschel Greer Stadium—a former minor league baseball park for the Nashville Sounds—and adjacent parking lots to inventory and evaluate archaeological deposits. Limited subsurface testing of the targeted areas was also conducted as a means to ground-truth the GPR data. The purpose of the investigation was to provide Metro Parks & Recreation with an assessment of the site in regard to previous disturbances and a recommendation about the potential preservation of archaeological remains in the project area. Fieldwork was conducted under the supervision of Dr. Virgil R. Beasley, who also served as Principal Investigator, and was carried out with the assistance of Ted Karpynec, Meghan Weaver, J. Rocco de Gregory, Monica Warner, Michael Lee, Cristina I. Oliveira, and Chandler Burchfield.

The proposed Greer Stadium redevelopment project area falls within the boundaries of archaeological site 40DV189, which represents Fort Negley and associated features. The Tennessee state site form was updated in 2017, and the boundaries of the site expanded eastward to encompass the entirety of the project area. Sitting atop St. Cloud Hill, Fort Negley, an American Civil War fort, is the site's most prominent cultural feature. The project area includes much of the lower eastern slope of this hill (Figure 1.1).

Complimentary to the fieldwork, TVAR conducted extensive background research related to the history of St. Cloud Hill. Historic maps, documents, property records, institutional records, photographs, and eyewitness records were reviewed, providing insight about historic landscape activities and what types of archaeological features might be found. In addition to aerial photography, high resolution elevation models were reviewed and compared to the historical topography. The data under consideration were most informative in illustrating where archaeological deposits might be located.

The primary objective of the GPR survey was to identify undisturbed buried surfaces and evaluate the amount and extent of past construction disturbances. The presence of undisturbed ground surfaces was crucial for identifying locations that might contain human burials or other features related to historic activities in the project area. In order to determine the presence of intact deposits, TVAR implemented multiple investigative field techniques that, in addition to the GPR survey, included mechanical trenching and systematic shovel testing. The project area encompassed an 8.9 ha (21.9 acres) tract of land that includes Herschel Greer Stadium and several parking lots. A sampling strategy for the GPR survey of the parking lots was employed with a total of 25,000 square meters (6.3 acres) imaged. In addition, GPR transects were surveyed across the baseball field, along the road immediately east of the baseball field, in the northern gravel parking lot, and along the remnant hillside, totaling 677.57 meters (741 yards) of linear survey. To further investigate the presence of intact deposits, 11 trenches were mechanically excavated in the project area. Lastly, 16 shovel tests were conducted near GPR blocks suspected of containing undisturbed buried surfaces.

Chapter 2 provides an overview of the physical environment in the immediate area of 40DV189, while Chapter 3 contextualizes the historical development of the project area. Chapter 4 describes previous archaeological and archival studies undertaken in the project area. Chapter 5 discusses the

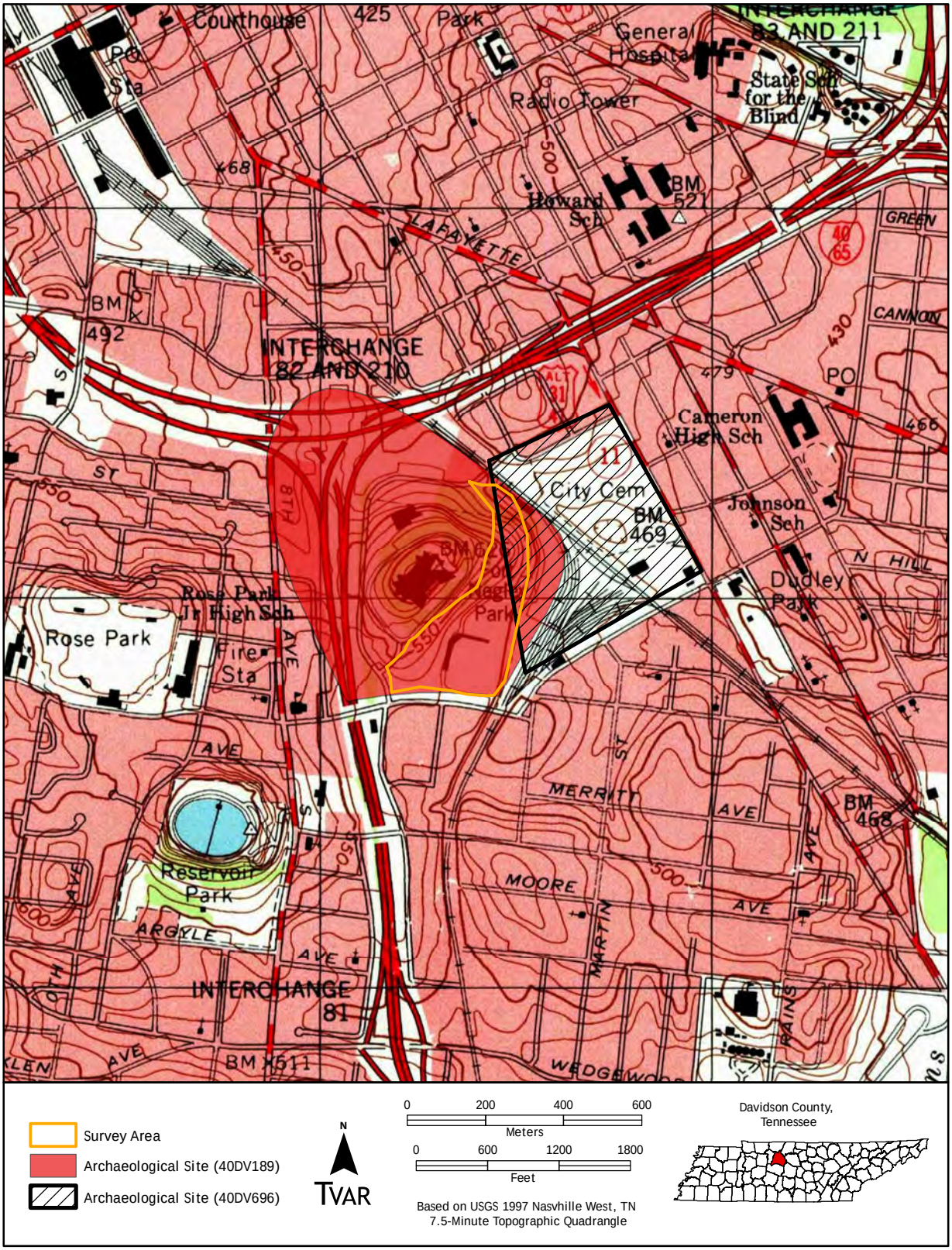

Figure 1.1. Project location map.

field methods employed during the investigation of 40DV189, as well as the results of the geophysical survey conducted across the project area. Chapter 6 discusses laboratory analysis and artifacts recovered during the investigations. Chapter 7 provides an interpretive framework for understanding the results of the fieldwork and artifact contexts. The concluding chapter also summarizes the project findings and provides management recommendations regarding the project area. Additional ancillary information is provided in the appendices that follow References Cited, including an inventory of materials recovered (Appendix A) and updated site form (Appendix B).

CHAPTER 2. ENVIRONMENT

The project area is located at the foot of St. Cloud Hill approximately three km south of downtown Nashville, Tennessee. Situated in northern middle Tennessee within the Lower Cumberland-Sycamore watershed, the project area is part of the Outer Nashville Basin Level IV ecoregion, which is encompassed by the larger Interior Plateau Level III ecoregion (Figure 2.1). The Interior Plateau extends from southern Indiana and Ohio to northern Alabama and is characterized by open hills, irregular plains, and tablelands. Vegetation consists of oak-hickory forests but also includes bluestem prairie and cedar glades (Griffith et al. 2001). The Outer Nashville Basin Level IV ecoregion is characterized by irregular plains and open hills. Moderate-gradient streams are found throughout. Native vegetation consists primarily of oak-hickory forests but also transitions to mixed mesophytic forests. Land within the Outer Nashville Basin is typically used for pasture and the cultivation of corn and hay (Griffith et al. 2001).

Two soils were mapped within the survey area: Maury-Urban land complex (McB), which comprises 64.4 percent of the survey area, and Mimosa-Urban land complex (MsD), which comprises the remaining 35.6 percent. Maury-Urban land complex soils are well drained, with slopes ranging from 2 to 7 percent. They are generally situated on hillslopes and formed from loess or alluvium derived from limestone. Mimosa-Urban complex soils are well drained, with slopes ranging from 2 to 15 percent. They are generally situated on hillslopes and formed from clayey residuum weathered from limestone (Soil Survey Geographic Database [SSURGO] 2017).

The geology underlying the project area consists primarily of limestone and shale formed during the middle Ordovician period more than 440 million years ago (Figure 2.2). Limestone bedrock in the vicinity of the project area is typically encountered at depths ranging from 100 to 150 cm below the surface (United States Geological Survey [USGS] 2014). A dark blue gray, crystalline bed of limestone covers an extensive area within downtown Nashville, outcrops of which were abundant upon and around the vicinity of St. Cloud Hill (Jones 1892). The prominent elevation of St. Cloud Hill, coupled with the available natural resources in its immediate vicinity, provided a number of tactical advantages to Union troops who occupied the area. In addition to providing a commanding view of the city, limestone blocks were quarried from the hill for the construction of Fort Negley.

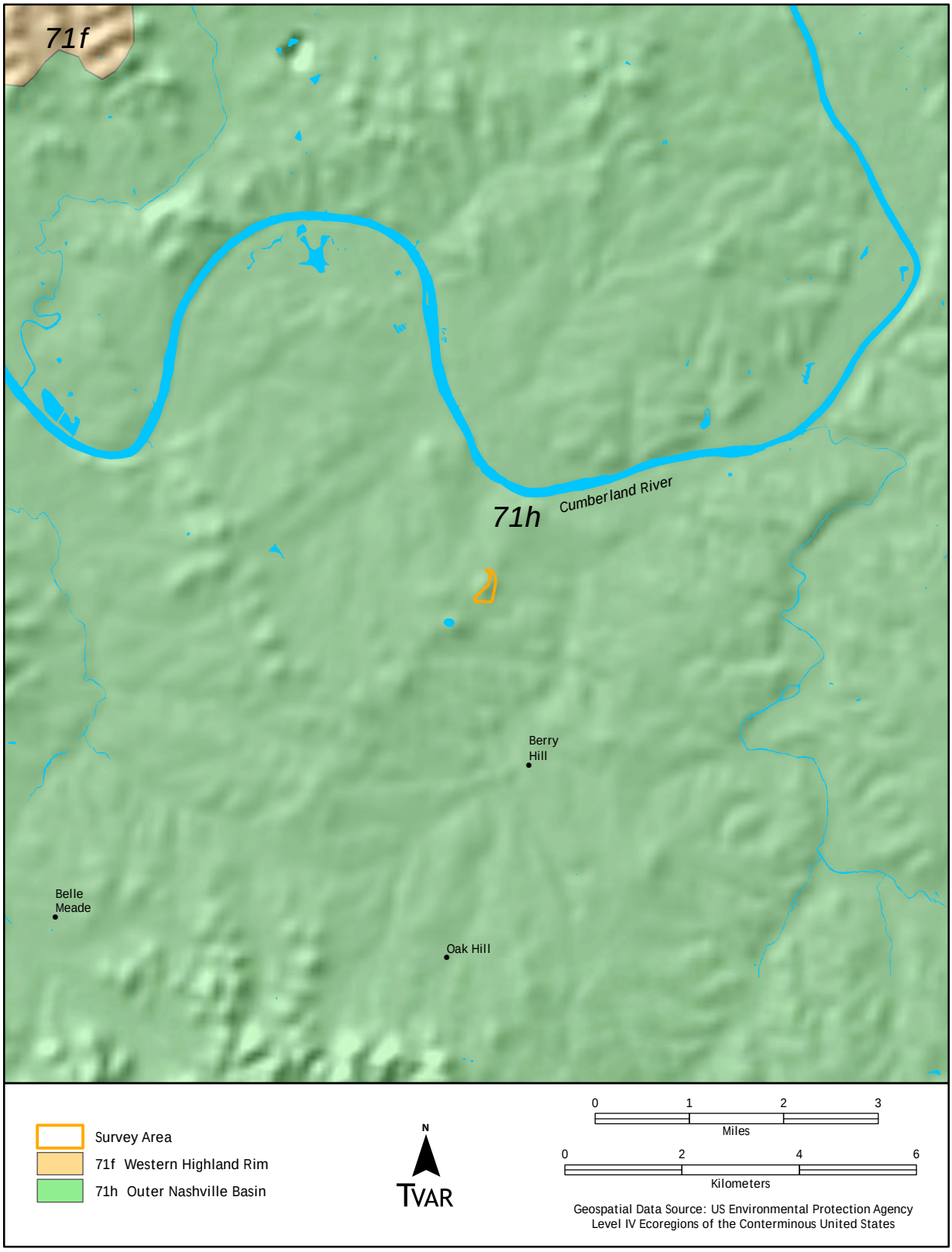

Figure 2.1. Location of the survey area within the Outer Nashville Basin Level IV ecoregion.

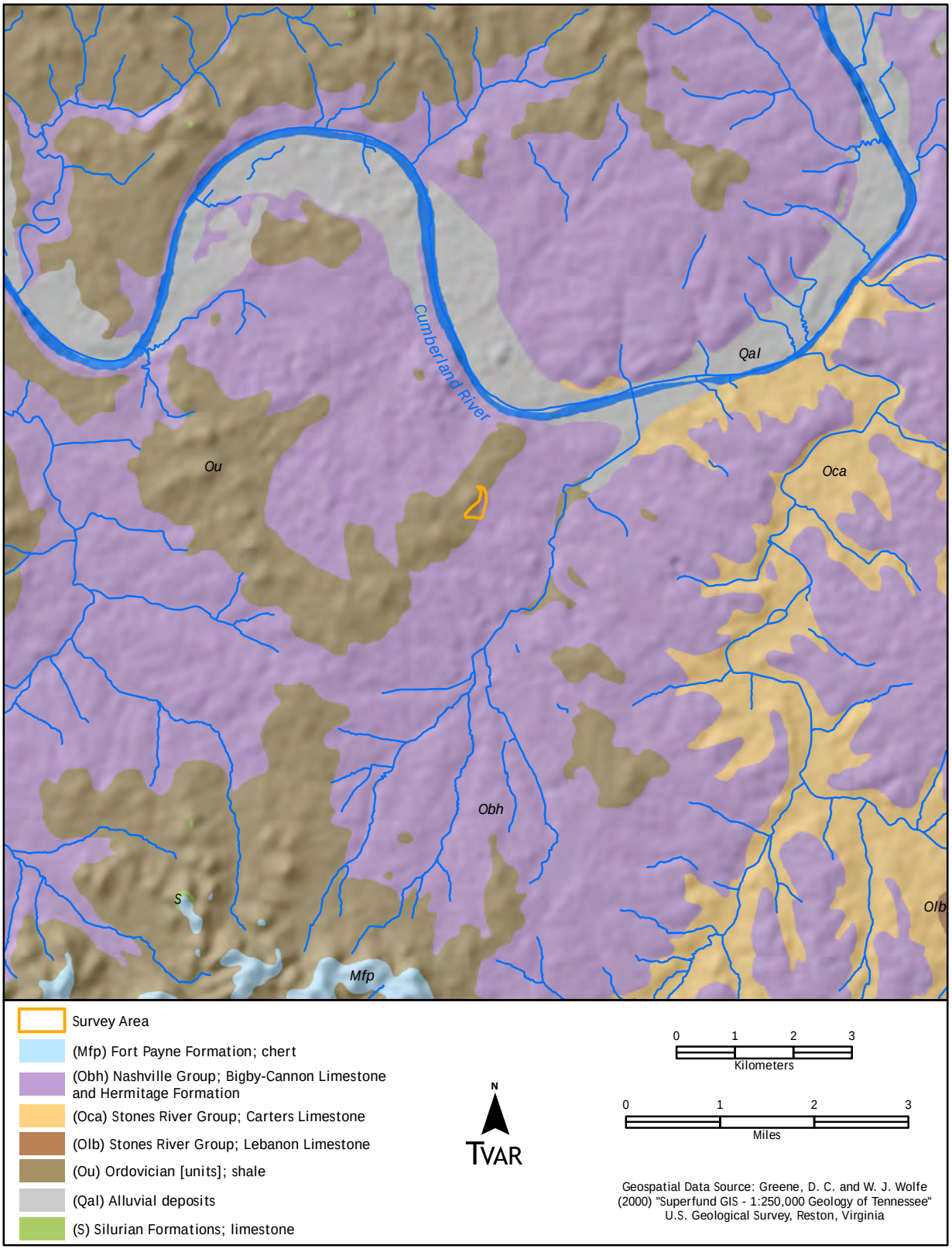

Figure 2.2. Map of the bedrock geology underlying the survey area.

CHAPTER 3. HISTORIC BACKGROUND RESEARCH

This section presents a brief overview of the historical development of the project area and the surrounding Nashville area. TVAR's research included a review of comprehensive histories of Nashville during the Civil War period housed at the Metro Nashville Archives and the Tennessee State Library and Archives (TSLA) located in Nashville. Notable historiographies of the city reviewed for this project included the *Building of Nashville: 1780-1975* by Wilbur Foster Creighton (1975); *History of Davidson County, Tennessee*, by W.W. Clayton (1880); *Nashville in the New South: 1880-1930* and *Nashville Since the 1920s* by Don H. Doyle (1985a, 1985b), and *From Winter to Winter: The Afro-American History of Nashville, Tennessee, 1870-1930* by Bobby L. Lovett (1981). Recent work consulted for this study regarding Nashville during the Civil War period included: *Reluctant Partners: Nashville and the Union, 1863-1865* by Walter T. Durham (2008); *Nashville 1864: From the Tennessee to the Cumberland*, by Mark Lardas (2017); and *Nashville: the Occupied City: 1862-1863* by Walter T. Durham (2008). TVAR's research also involved an examination of available primary and secondary source material filed at the TSLA and Fort Negley Museum, including Sanborn Fire Insurance Maps, *The War of the Rebellion: a Compilation of the Official Records of the Union and Confederate Armies*, Nashville City Directories, cemetery records, and nineteenth- and twentieth-century Nashville newspapers.

In addition, previous archaeological reports pertaining to Fort Negley reviewed for this study include the following: *Report of 1999 Investigations at Fort Negley: Tennessee Archaeological Site 40DV189, A Federal Army Civil War Period Military Site in Davidson County, Tennessee* by DuVall & Associates, Inc. (Allen 2000), *The Construction of Fort Negley: the Civil War Era* by Zada Law (2009), Panamerican Consultants, Inc.'s *Fort Negley 130 Years Later: An Archaeological Assessment* (Bergstrasser et al 1994), and John Milner Associates, Inc.'s *Historic Structure Report: Fort Negley Nashville, Tennessee* (2014).

Lastly, numerous historic maps were consulted during the course of this study (Table 3.1). Using ESRI's ArcGIS, TVAR aligns, or georeferences, historic maps to a map coordinate system in order to overlay and spatially compare multiple maps in a precise way. Often this is done by creating control points that connect the historic map to a previously georeferenced map, aerial, or other dataset. Locations for control points connecting two maps are chosen based on their commonality. Typical features used include road intersections and the Public Land Survey Sytem's township, range, and section lines. When such specific points are not available, georeferencing can be accomplished by rotating, shifting, and scaling a map until its features are of equal distance and orientation to the corresponding features in the reference map, aerial, or dataset. TVAR processes and analyzes elevation datasets obtained from Light Detection and Ranging technology [LiDAR] to aid its efforts in identifying cultural features, such as entrenchments and depressions, and to gain a better understanding of project area landforms and surrounding environs. LiDAR is a remote sensing technology that uses rapid laser pulses to measure varying distances, typically from an aircraft to Earth. The resulting data can be processed to create high-resolution 3D images of a landscape. TVAR uses LiDAR datasets that have been collected by various organizations, including the NRCS, USGS, US Army Corps of Engineers, and FEMA, and which are available online for public download.

Table 3.1. Georeferenced Historic Maps Used in the Current Study.

Author	Year	Title
Charles Royce	1899	Indian Cession map of Tennessee and Portions of Bordering States
Mathew Carey	1814	State of Tennessee
Anthony Finley	1831	Map of Tennessee
J. T. Lloyd	1863	Official Map of the State of Tennessee
J. D. Claybrooke	Ca. 1850	Map of Neighborhood Along Nashville and Chattanooga Railroad near Nashville Cemetery
Unknown	1889	Plat Map of Nashville
Unknown	1908	Plat Map (Plate 22A) from the Atlas of the City of Nashville

While TVAR conducted extensive historic research in conjunction with the current undertaking, an exhaustive search of all documentation pertaining to Fort Negley, the Catholic Cemetery, and the Nashville City Cemetery was beyond the scope of this project. As such, the primary focus of this background research was to identify references to potential burials within or adjacent to the project area and to identify those documents or maps that provide specific details regarding what archaeological features may be encountered within the project area.

Establishment and Expansion of Nashville

Davidson County's earliest Euro-American settlement, Nashborough (present-day Nashville), was founded in the winter of 1779-1780 by John Donelson and James Robertson of North Carolina's Watauga settlement (Paine and Connelly 2010; Van West 2010). Upon the creation of the Watauga Association, Robertson was elected as one of five magistrate officials and as commander of the Watauga Fort. Later in 1779, Robertson, along with eight other men of the Watauga settlement, served as a scouting party for the Transylvania Land Company, which had acquired a large tract of land consisting of most of present-day Kentucky and portions of Upper Middle Tennessee from the Cherokees. In the following year, Robertson led a group of roughly 250 persons, comprised mainly of men and boys, back to the area in order to establish a permanent settlement. Robertson's group arrived on Christmas Day 1779 to a site known as Cumberland Bluffs, where the Fort Nashborough historic site is now located. On April 24, 1780, Robertson was joined by Colonel John Donelson who arrived with the men's families and much needed provisions after traveling over 1,000 miles by boats down the Holston and Tennessee rivers and eventually up the Cumberland and Ohio rivers. A week following Donelson's arrival, the group signed the Cumberland Compact, which created the first civil government in Middle Tennessee. The group named their settlement "Nashborough" in honor of General Francis Nash of North Carolina (Paine 1998). In 1794, as a result of residual animosity toward Britain following the Revolutionary War, Nashborough officials dropped the "borough" from the town's name and replaced it with "ville" to officially change the name of the settlement to Nashville (Paine and Connelly 2010).

Early settlers soon entered into a contentious relationship with local Native Americans. Euro-American pioneers in the Tennessee territory arrived to great confusion in the region, as

control of the area west of the Appalachians remained uncertain. In 1783, North Carolina had ceded its western territories to the United States government, and then in the following year, revoked the cession. The Jefferson Ordinance, passed by Congress in 1784, encouraged the organization of new states along the western boundary of the former colonies. The Tennessee settlers, anxious to secure their independence and expand their boundaries through the annexation of Cherokee lands, sought to organize themselves as the first state for admission (Rothrock 1946). Despite the revoked cession of these lands to the federal government, General John Sevier, an aggressive land speculator, was elected governor of the erstwhile State of Franklin and pursued both territorial expansion and recognized statehood.

Davidson County was established by the North Carolina Legislature in 1783, and originally included approximately 11,000 square miles; presently, the county encompasses 526 square miles (Clayton 1880; Van West 2010). In 1785, the State of Franklin negotiated the Treaty of Dumplin Creek, which pushed the Cherokee boundary south of the Tennessee River. This enlarged the area of the State of Franklin to include present day Greene, Washington, and Sullivan counties (Semmer 1998). The United States government, however, refused to recognize the new state or the treaty. The Treaty of Hopewell, negotiated by the federal government in 1785, resulted in the Cherokee cession of much of present-day Davidson County (Figure 3.1) (Kappler 1904:8-11).

Conflicting land claims led to years of violence between the American settlers and the Cherokee. Intense European settlement of the area, then part of North Carolina, was spurred by the county's formal organization, and many early settlers claimed Revolutionary War land grants (Goodspeed 1884). The amount of land awarded was commensurate with rank. As such, a few hundred to several thousand acres were awarded to officers, while privates typically received 640 acres, or one square mile (Dovenbarger 1981). However, in many cases, North Carolina veterans in need of quick cash or who were unwilling to make the voyage west, sold their land grants to Tennessee speculators who, in turn, sold them to anyone interested in moving to the Middle Tennessee region (Dovenbarger 1981). By 1790, 3,459 persons resided in Davidson County, approximately 19 percent of whom were enslaved (U.S. Census Bureau 1872:61-63). Other early communities in Davidson County included Haysboro (near present-day Madison), Hillsboro, and Mansker's Station (Figures 3.2-3.3).

Between 1786 and 1856, Davidson County was gradually reduced to its present size through the creation of Cheatham, Montgomery, Robertson, Stewart, and Williamson counties (Clayton 1880:44). The county is named in honor of William L. Davidson, a Revolutionary War hero. Prior to European arrival, the area comprising present-day Davidson County was home to numerous groups of American Indians that hunted the area's abundant game, which were drawn to a large salt lick, known as French Lick, in present-day Nashville. Nashville has served as the county's seat since its establishment (Van West 2010).

The rich, fertile soil of the Central Basin and a moderate climate supported the cultivation of a variety of crops by county farmers, including corn, cotton, and tobacco. The county's thick stands of hickory, oak, poplar, and walnut trees created a thriving logging industry (Goodspeed 1886; Paine and Connelly 2010). The first water-powered mill in the county was constructed on Thomas' Creek by Headon Wells, and a series of grist and saw mills, as well as a distillery known as the Red Heifer, quickly followed (Phelan 1888:182). In 1810, 15,608 people (including 130 "free colored" and 6,305 slaves) resided in the county (U.S. Census Bureau 1872:61).

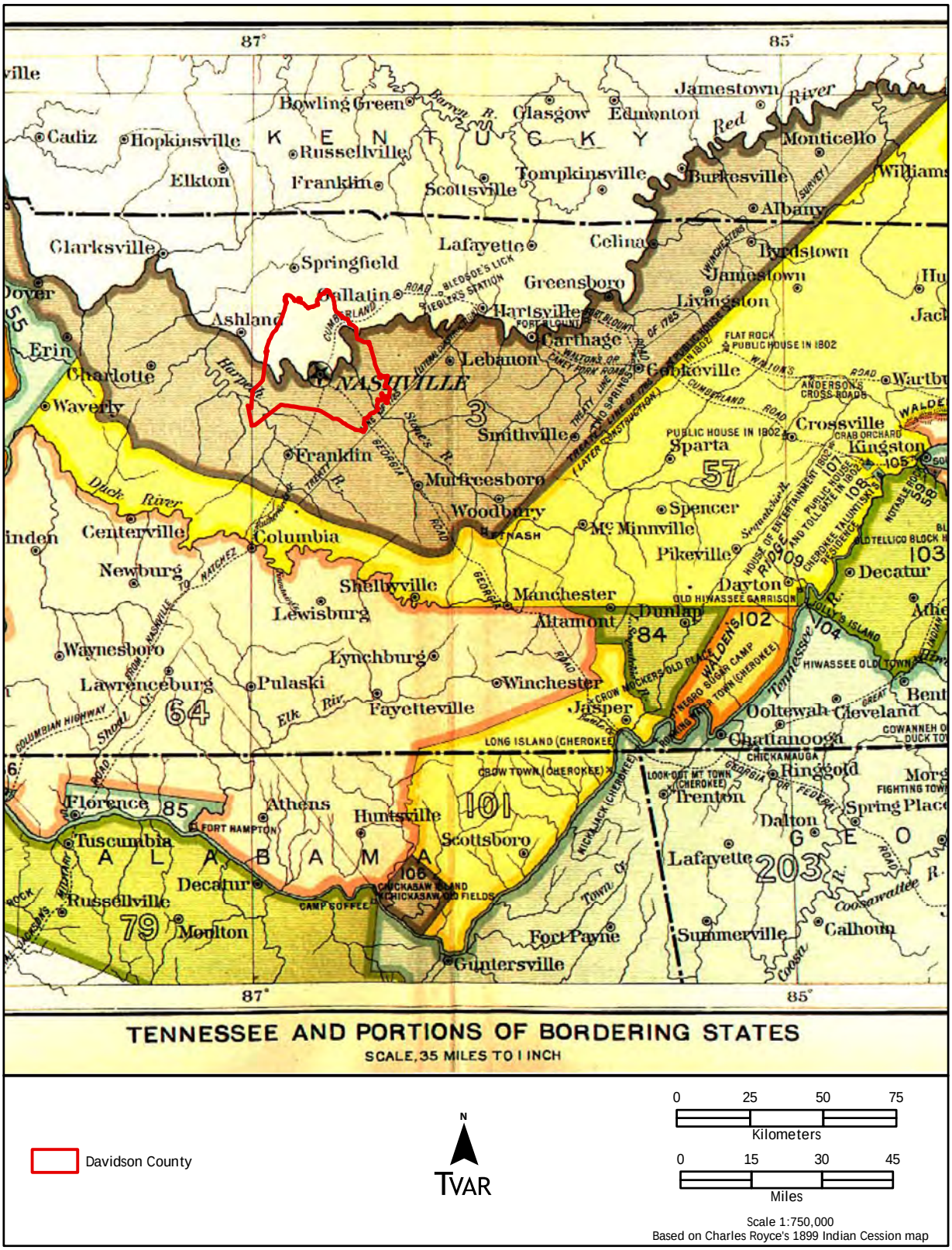

Figure 3.1. Charles Royce's 1899 map showing lands ceded by the Cherokee Indians as part of the Treaty of Hopewell (in dark brown) and the boundary of present-day Davidson County.

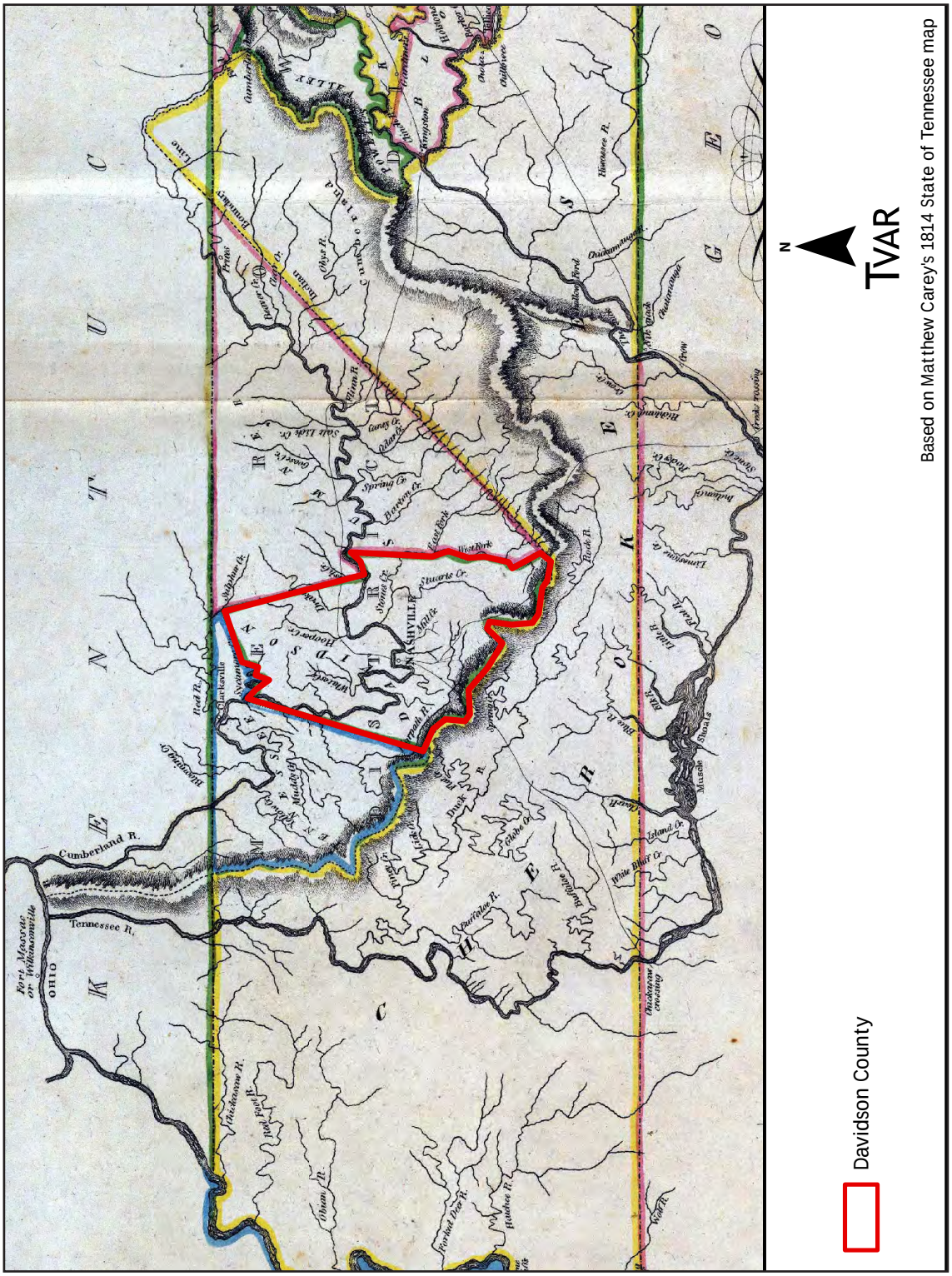

Figure 3.2. 1814 map showing the early boundary of Davidson County.

Figure 3.3. 1831 map showing the revised boundary of Davidson County and the early communities of Haysboro, Hillsboro, and Nashville.

The victory of Andrew Jackson at the 1815 Battle of New Orleans brought national prominence to Nashville, his home. Nashville's notoriety increased again with his election as the seventh President of the United States in 1828 (Paine and Connelly 2010). By 1830, 28,122 individuals (41.5 percent enslaved) called Davidson County home (U.S. Census Bureau 1872:61-63). Nashville, located on the southern bank of the Cumberland River, grew quickly to become the region's commercial and political center and attracted many settlers. The invention of the steamboat allowed for faster trade with cities farther afield, including New Orleans and Pittsburgh. As a result, Nashville became the primary distribution and shipping center for goods produced in the Mid-South (Paine and Connelly 2010). Early manufacturing operations included a cotton-spinning factory, coppersmiths, shoemakers, a nail factory, and silversmiths (Clayton 1880:197). In 1843, Nashville became the capital of Tennessee; a state capitol building was constructed in 1859 and is a National Historic Landmark today (Paine and Connelly 2010).

Davidson County's economic growth in the early to mid-nineteenth century was fueled by the construction of a network of roadways, beginning with the construction of the Nashville to Mansker's Station Road in 1783 (Phelan 1888; Goodspeed 1886). Completion of the Nashville, Chattanooga, and St. Louis Railway in 1851 and the Louisville and Nashville Railroad in 1859 created an overland trade link between Davidson County and "the manufacturing cities of the North and the rich fields and seaboard cities of the South" (Figure 3.4) (Goodspeed 1886).

By 1850, Davidson County contained approximately 117,000 acres of improved farmland, and its population included 38,882 persons—the highest in the state (DeBow 1853; U.S. Census Bureau 1872). County farmers raised horses, sheep, swine, and cattle, and cultivated corn, cotton, oats, and tobacco. Additional market products such as butter, wool, hay, and honey supplemented a farmer's income (DeBow 1853:584-589). In the following decade, Davidson County gained 15,000 improved acres of farmland, and farmers continued to grow staple crops such as corn, oats, wheat, cotton, and tobacco (Kennedy 1864:132-135).

Enslaved Africans and African Americans were present in Middle Tennessee from the earliest years of American exploration and settlement, and the institution of slavery had a strong influence on social and economic development in the region. The common figure cited for the proportion of white families owning slaves in the South is 1 in 4, and the average holding was 12.7 in the Deep South (Stampp 1956:30–31, based on the 1860 federal census). In Davidson County, enslaved African-Americans numbered 12,348 in 1840 (comprising 40.5 percent of the total population). By 1860, the ratio of slaves to free whites lessened to 31 percent of the total population of 47,055 (U.S. Census Bureau 1872:61-63). In the early to mid-nineteenth century, the population of "free colored persons" rose steadily from 17 individuals in 1800 to 1,209 in 1860 (U.S. Census Bureau 1872:61-63).

The onset of the Civil War brought great upheaval and loss to the region. A number of skirmishes and one major battle were fought in Davidson County. County residents were divided in their loyalties between the Confederacy and the Union and raised regiments of volunteers for both causes (FamilySearch.org 2017). Nashville's position as a hub of river and rail transport made the city an important supply distribution center; the city became occupied from the early days of the Civil War by federal troops, who constructed a substantial fortification known as Fort Negley (Paine and Connelly 2010; Van West 2010). Part of the Franklin-Nashville Campaign, the Battle of Nashville took place on December 15-16, 1864 when Union troops led by Major General George

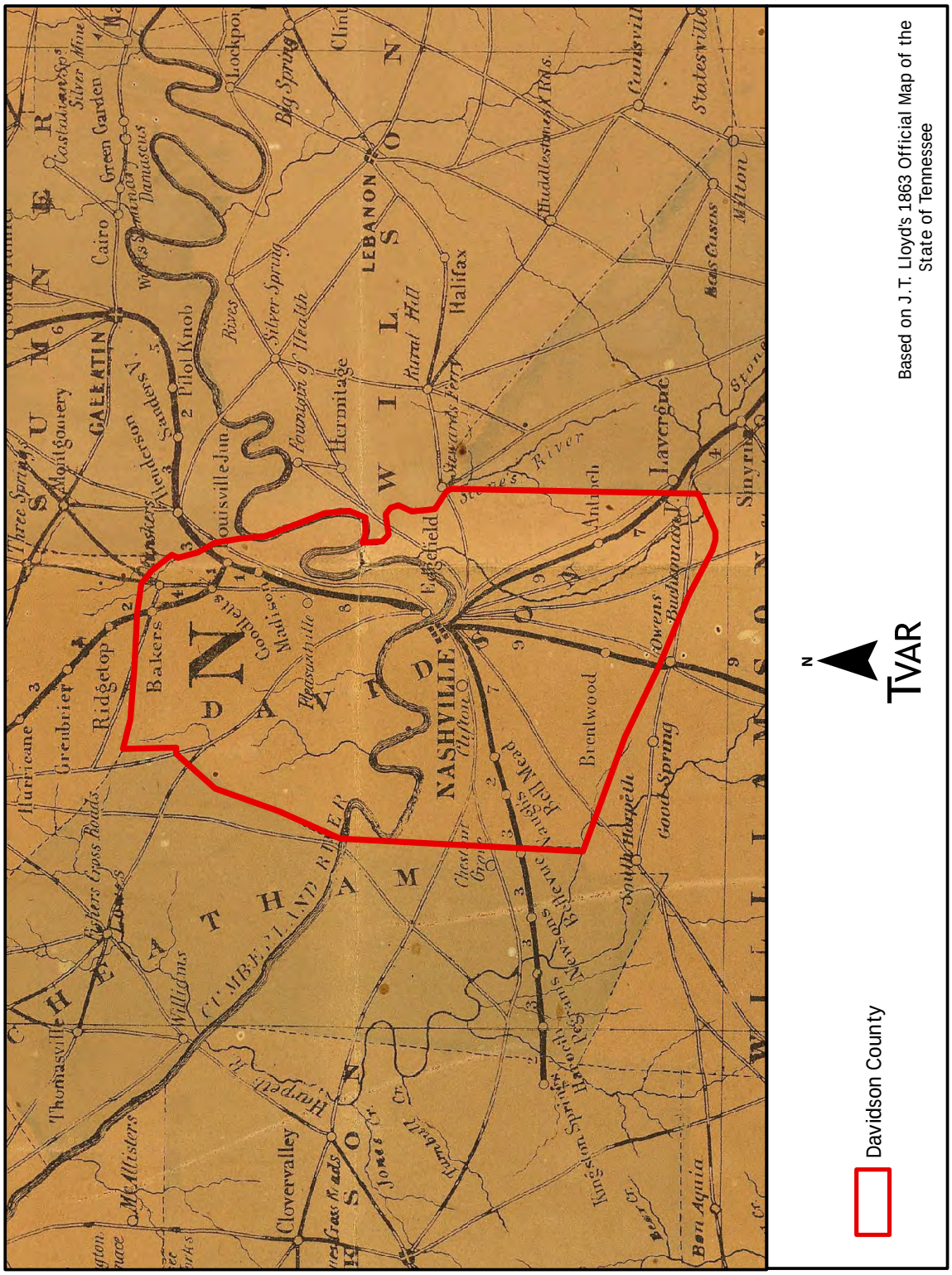

Figure 3.4. J.T. Lloyd's 1863 map of Tennessee showing Davidson County intersected by the newly constructed railroads.

H. Thomas attacked General John Bell Hood's Confederate forces positioned on the outskirts of Nashville. Ultimately, Hood's men were overtaken and forced to retreat south beyond the Tennessee River; a total of 6,602 soldiers (predominately Confederate) were killed during the battle (American Battlefield Protection Program 2017).

Unlike much of the rural South, Davidson County's economy rebounded quickly during the Reconstruction period due to Nashville's function as a trading center. A new focus on education resulted in the founding of Fisk University in 1866 (one of the first private universities for African-Americans), Vanderbilt University in 1875, and Meharry Medical College (established to educate black doctors) in 1876 (Paine and Connelly 2010). Outside of Nashville, a sharecropping economy arose in Davidson County, lasting from about 1870 to the 1930s.

In the late nineteenth century, Davidson County's economy expanded to include large-scale commercial and industrial enterprises, which were primarily centered around Nashville. Trunk rail lines, including the Tennessee and Pacific Railroad, increased the amount of goods brought to markets in Nashville for sale and shipment and brought imported goods to smaller communities in Davidson County (Clayton 1880:217). Nashville became connected to mercantiles in Charleston, New York, Boston, Pensacola, and Mobile, from which shipments were made to European markets, resulting in a rapid increase in foreign business. The area's largest industries at the end of the nineteenth century included the liquor, dry good, boot and shoe, hat, hardware, cotton, and tobacco trades (Clayton 1880:219).

As the county developed economically, additional public services were implemented. The inception of a street-car line allowed Nashville to develop beyond the immediate downtown area (Paine and Connelly 2010). In the early twentieth century, suburban expansion and economic pressures caused by the Great Depression led to the flight of many Nashville residents from downtown (Figure 3.7). New Deal programs spurred the construction of modern schools and the Davidson County Public Building and Courthouse (Van West 2010). In Davidson County, as in much of the South, racial tensions came to a boiling point in the 1950s and 1960s. Nashville became a center for training Civil Rights activists and was the location of a well-known sit-in at the Woolworth's lunch counter (Paine and Connelly 2010).

Nashville and Davidson County's governments merged in 1963, forming the United States' first consolidated city/county government (Paine and Connelly 2010). Davidson County's economy continued to diversify in the mid-twentieth century as the music/entertainment, publishing, and tourism industries grew increasingly popular. Health care services, beginning with the establishment of Hospital Corporation of America's headquarters in Nashville in 1968, have become the area's largest industry (Paine and Connelly 2010).

Civil War

Until the onset of the Union occupation of Nashville during the Civil War, the project area remained undeveloped following the creation of Davidson County and outside the official limits of Nashville despite the city's strong growth in the early half of the nineteenth century. After its founding, Nashville's economy grew rapidly following the arrival of the first steamboat in 1819, which transformed the city into one of the principal distribution points of goods in the South. The introduction of steamboat traffic allowed area merchants to sell their goods, consisting primarily of

cotton, corn, lumber, and tobacco to markets as far away as New Orleans and Pittsburgh (Paine 1998). Conversely, Nashville residents benefited from the wide assortment of imported products such as coffee, rice, and sugar. In 1843, Nashville was named the permanent capital of Tennessee, which elevated its status as the economic and political center of the state (Paine 1998).

The initial development of Nashville's built environment during the early to mid nineteenth century was characteristic of most cities in the United States. Much of the building stock was concentrated around its commercial core, which in the case of Nashville, consisted of the steamboat landings along the city wharf (present-day 1st Avenue). From here, streets were laid out in a uniform grid pattern and extended west from the Cumberland River. Major commercial areas included the public square and streets such as Cumberland, Market, and Broad (now respectively named: Commerce Street, 2nd Avenue, and Broadway). Key businesses at this time included banking, printing, and publishing, which continue to this day. Concurrent with the growth of the city's commercial districts, the bulk of Nashville's residential areas were constructed downtown in close proximity to business areas, whereas the expansive plantations, such as Belle Meade Plantation, Andrew Jackson's Hermitage, and Belmont Mansion, were located several miles outside the city core (Paine 1998).

The arrival of Tennessee's first railroad, the Nashville and Chattanooga (N&C), in 1854 hastened Nashville's growth in the mid-nineteenth century (Johnson 1998). Aside from Chattanooga, the introduction of the N&C provided Nashville residents with direct routes to major cities such as Atlanta and Louisville. Coupled with the existing riverfront wharf, the arrival of rail service helped Nashville emerge as one of the South's preeminent commercial and transportation centers.

In April 1861, the Civil War commenced with the Confederate bombardment of Union forces at Fort Sumter in Charleston Harbor, South Carolina. The attack represented the pinnacle of the growing secessionist movement that swept the South beginning in 1860 and ultimately led to the creation of the Confederates States of America (CSA) in February 1861. The CSA featured a provisional constitution and quickly included the states of South Carolina, Mississippi, Florida, Alabama, Georgia, Louisiana, and Texas, which had withdrawn from the Union. Following the bombardment of Fort Sumter, President Abraham Lincoln's subsequent call to arms of 75,000 troops brought indignation from the populace of the northernmost southern states and triggered a second wave of secession that included the states of Virginia, North Carolina, and Arkansas (Collins 1981:153-154). In June 1861, Tennessee joined the CSA with the first military regiment raised and organized in Williamson County on May 9, 1861 (Crutchfield and Holladay 1999).

As a response to the Confederate attack on Fort Sumter, the Federal government adopted the "Anaconda Plan" to quell the rebellion with the hopes of bringing a swift end to the war. The strategy was simplistic in its goal, which was to reunite the Union by militarily defeating the CSA army and suppressing the rebellious states. The national policy toward defeating the South rested on the ability to isolate it through a naval blockade of the Atlantic and Gulf coasts, including the Mississippi River, and invading the interior of the CSA with significant military forces in order to destroy its ability to wage war (Tomblin 2016:281). In an effort to achieve its goal, the initial federal strategy during the first year of the war rested on utilizing the United States Navy to control the Mississippi River and isolate the Trans-Mississippi West from the Confederacy; to engage General Robert E. Lee's Army of Northern Virginia and capture the Confederate capital of Richmond; to deny the Confederacy the use of its railroad network by implementing an offensive to enter the heart of the South through Georgia

and Tennessee; and initiating a blockade of commercial traffic to Southern ports along the Atlantic and Gulf through the use of the United States Navy (Tomblin 2016:281). As such, the critical theatre of the war would be in the West where the Mississippi, Tennessee, and Cumberland Rivers served as principal arteries into the heart of the Confederacy. Both federal and Confederate military strategist recognized the importance of these rivers and quickly took action to secure them (Lepa 2013:4).

For its part, the Union constructed forts along the Ohio River consisting of Camp Clay, located opposite of the town of Newport in Campbell County, and Camp Jo Holt in Indiana, which faced Louisville. For the South, Confederate General Albert Sidney Johnston was tasked with protecting Tennessee from invasion. Johnston's defensive plan, dubbed the "Line of the Cumberland" consisted of dispersing a thin line of troops from Columbus, Kentucky on the Mississippi River, through Bowling Green, Kentucky, and finally to the Cumberland Gap in East Tennessee (Garrett and Goodpasture 1903:207). In support of the Confederate line, Johnston ordered the construction of Forts Henry and Donelson, which were constructed near the Kentucky-Tennessee border and respectively positioned along the Tennessee and Cumberland rivers. In addition, Confederate troops were garrisoned in a fort located within fifty yards of the Kentucky border at Cumberland Gap (Garrett and Goodpasture 1903: 207). Recognizing Nashville's strategic importance, Johnston made an attempt to fortify the city through the construction of Fort Zollicoffer, but the fort was never completed due the lack of sufficient labor (Lossing 2010:234).

Roughly five months after declaring itself neutral, Kentucky's neutrality was compromised when Confederate forces entered the Commonwealth and captured the town of Columbus in September 1861. In response, the Union army, stationed in Cairo, Missouri, and under the command of General Ulysses S. Grant, seized Paducah in order to gain control of the northern terminus of the New Orleans & Ohio Railroad (Robertson 1993a). In February 1862, Union forces attacked the "Line of the Cumberland" by taking Forts Henry and Donelson (Garrett and Goodpasture 1903:207).

Nashville's geographic location within the Mid-South combined with its transportation infrastructure made it a strategic military objective for both Federal and Confederate forces following the onset of hostilities (Paine 1998). The city boasted five railroad lines and a series of macadamized turnpikes that connected the city to various points throughout the Confederacy. Additionally, the city featured several mills, foundries, and manufacturing plants, including a powder mill and an armament factory (DuVall & Associates 2007: 8). According to census records, the population of Davidson County at this time had reached roughly 47,055 persons, consisting of 31,056 whites; 1,209 free blacks; and 14,790 slaves (Kennedy 1864). According to Paine (1998), Nashville, consisting of the immediate town center, contained 14,000 residents in 1860. As a result of its transportation network, combined with its manufacturing and trading position, Nashville emerged as one of the leading social and political centers of the Western Theatre (DuVall & Associates 2007:8).

On February 25, 1862, Nashville became the first major city in the South to fall to the Federal Army following the withdrawal of Confederate forces prompted by the capture of Forts Donelson and Henry. Led by Major General Don Carlos Buell, the Union Army occupied Nashville and quickly initiated a program to subjugate the populace and fortify the city. In March 1862, President Lincoln appointed Andrew Johnson military governor of Tennessee, and Nashville became the center of command and supply for Union forces operating in the Western Theatre. Shortly after securing

Nashville, Buell's forces left the city for Shiloh, which left Johnson with an under strength defensive force of 6,000 men under the command of General James S. Negley to maintain control of Nashville. In response to a series of daring raids by Confederate cavalry commanders, Nathan Bedford Forrest and John Hunt Morgan throughout Middle Tennessee and central Kentucky, Johnson promptly initiated efforts to reinforce Nashville by pressuring Lincoln and Secretary of War, Edwin Stanton, to fortify the city (Lovett 1982:4). To Johnson, the actions of Morgan and Forrest, signaled a precursor to a larger Confederate plan to recapture Nashville. In response to Johnson's request, Buell ordered Captain James St. Clair Morton to help in the construction of fortifications around the city and to secure it as a major Federal supply depot within the Western Theatre (Lovett 1982:4).

Early Settlement of the Project Area

The project area is located on Davidson County Tax Map 105 02 and occupies Parcels 434 and 446, which are bounded to the north by Bass Street and the CSX railroad; the CSX rail yards to the east; Chestnut Street to the south; and to the west by Fort Negley Park and the Fort Negley Visitors Center (see Figure 1.1) (MNPD 2017a: MNPD 2017b). Initial Euro-American claims to the project area can be traced back to North Carolina land grants issued to Pleasant Henderson and James White in 1794 and 1796, respectively (Drake et al. 2009: Griffey 2000). According to pension records, Henderson served as a Major during the Revolutionary War (Ancestry.com 2007). Henderson acquired 640 acres, which included the majority of the current site of present day Fort Negley, while White's tract included a narrow strip of land containing 35 acres that encompasses the extreme eastern portion of the project area (Drake et al. 2009: Griffey 2000: Pruitt 2007) (Figures 3.5-3.6). As with most land grantees in Middle Tennessee, Henderson and White never occupied or made improvements to their lands. Rather, they divided and sold off piecemeal their respective parcels to the growing influx of settlers who sought to establish permanent residences in Davidson County (Figure 3.7).

By 1802, a 33 2/3-acre parcel containing St. Cloud Hill was subdivided from Henderson's larger tract and was owned by W. P. Anderson, likely William Preston Anderson (Davidson County Register of Deeds 1802 DB E:340). Anderson was a land speculator and surveyor who purchased and resold land across the state. He maintained a plantation of his own and a race track near Nashville (Rootsweb 2016). Anderson later served as a colonel in the War of 1812, during which he was court-martialed for fraud, drunkenness, and ungentlemanly conduct. In 1828, he became involved in a public feud with Andrew Jackson during his presidential campaign (Moser and Clift 2002:519). Anderson conveyed the 33 2/3-acre tract to Thomas Rutherford in 1802 (Davidson County Register of Deeds 1802 DB E:340). Two years later, Rutherford conveyed the property Anthony Foster (Davidson County Register of Deeds 1804 DB F:219). Foster was a surveyor and also co-owned the Anthony Foster and Company mercantile firm (Moser and Clift 2002:25).

Eventually by 1806, a little over 33 acres of Henderson's original land grant consisting of the current project area and the adjoining 620-foot summit locally known as "St. Cloud Hill" was acquired by John Overton, an influential Tennessee banker, judge, and political leader of the early nineteenth century (Topozone.com 2017; TSLA n.d). The land surrounding St. Cloud Hill came to be owned by a Joseph Horton by the 1820s. In 1828, Horton sold a 19 1/5-acre property to Overton,

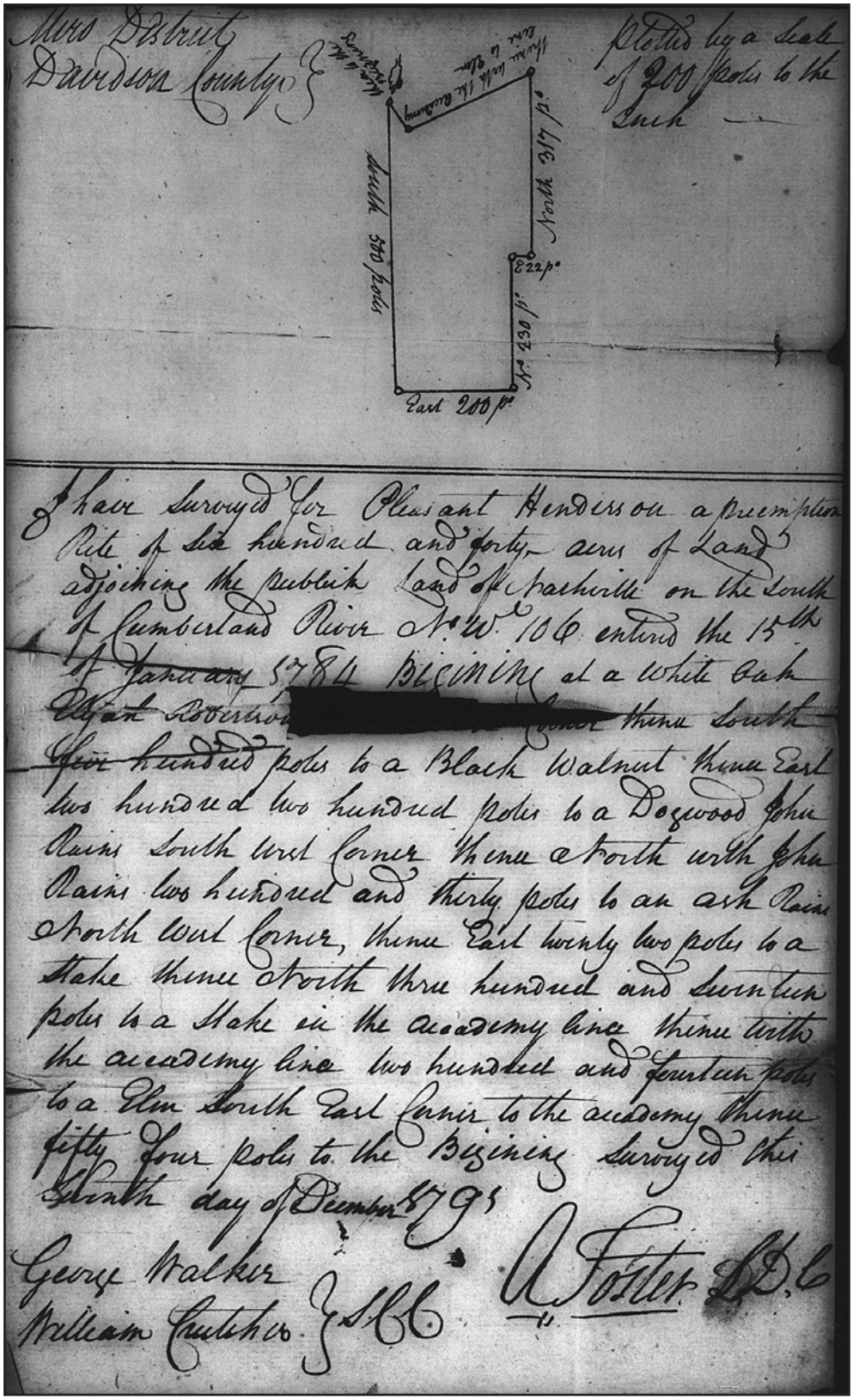

Figure 3.5. Original land grant to Pleasant Henderson. Image courtesy of the TSLA.

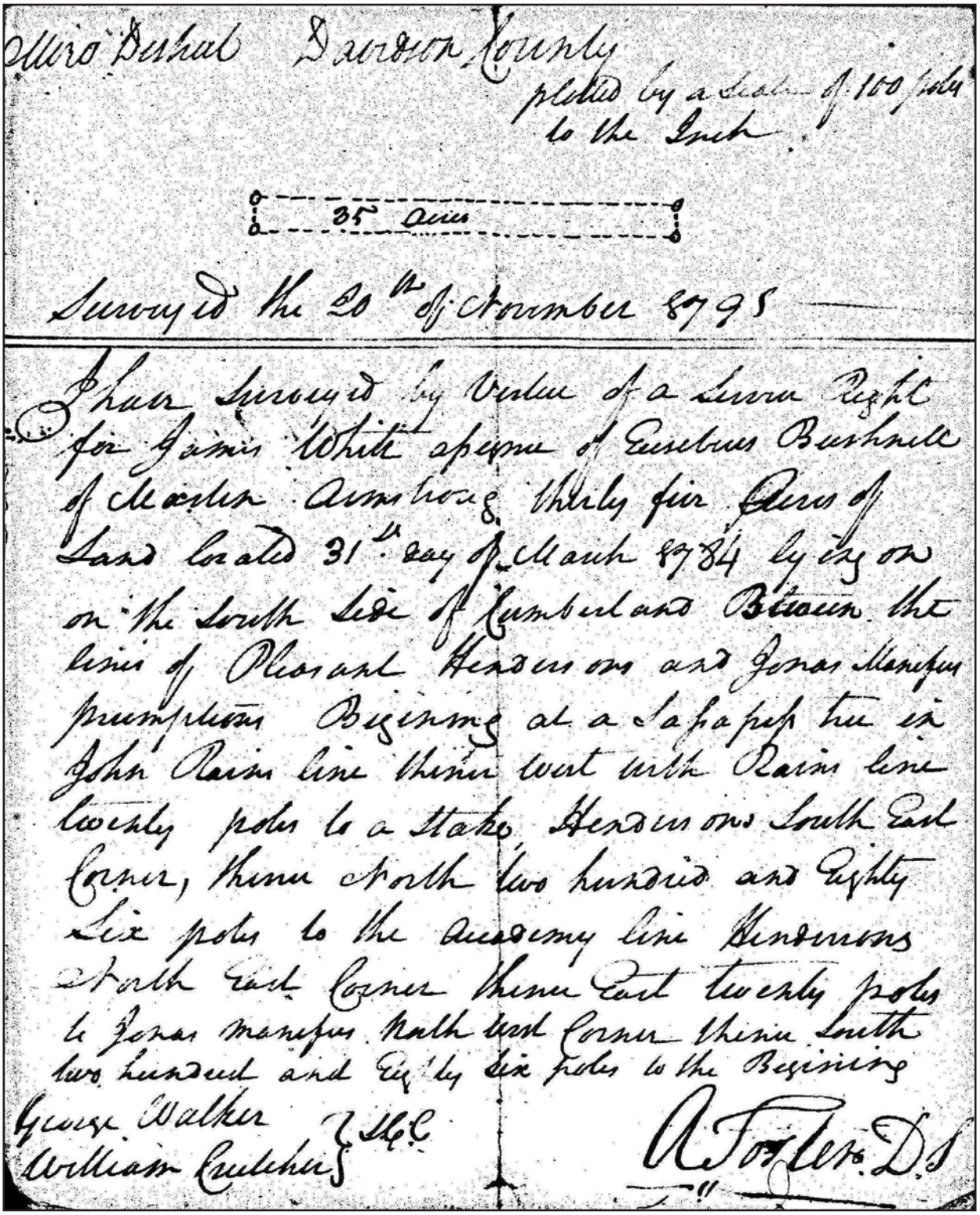

Figure 3.6. Original land grant to James White. Image courtesy of the TSLA.

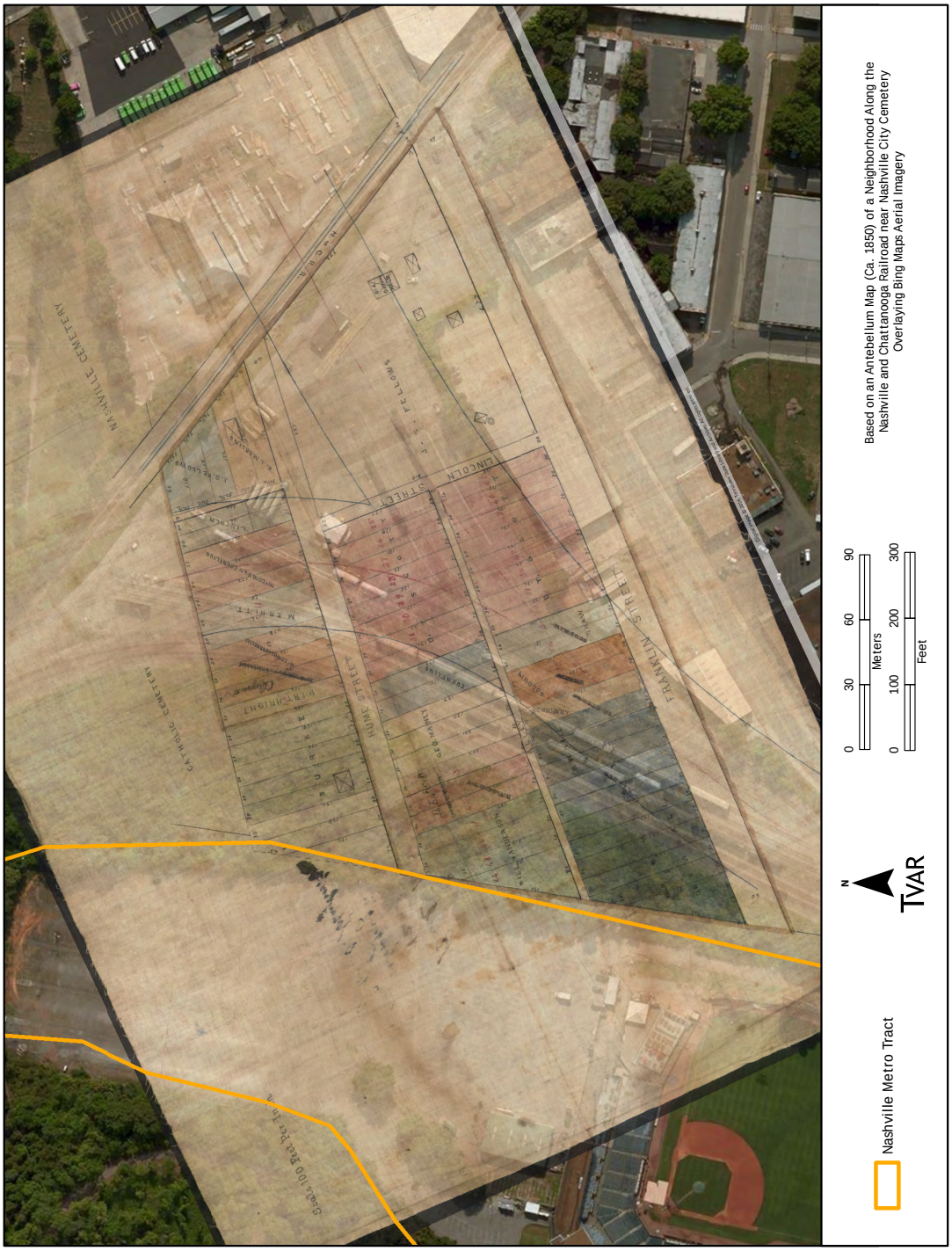

Figure 3.7. J.D. Claybrooke's antebellum map illustrating lots within Henderson and White's original land grants.

which immediately bordered St. Cloud Hill on the south (Davidson County Register of Deeds 1828; Law 2009:1).

Born in 1766 in Louisa County, Virginia, Overton migrated to Mercer County, in present-day Kentucky, in 1787 (Brown 2010). Here, Overton began his law career and boarded with the family of Lewis and Rachel Donelson Robards. Overton would later gain notoriety for handling Rachel Donelson's divorce from Lewis Robards and defending her subsequent marriage to President Andrew Jackson (Brown 2010). In 1789, Overton moved to Nashville to further his legal career and later established his famed plantation southeast of Nashville, Travellers Rest (NRHP 1969). Having been admitted to the state bar in 1790, Overton practiced law in the Davidson County court and roomed with Jackson who also had just launched his own legal career. Brought together by their profession, the two young attorneys soon developed a strong personal and professional friendship as their work often brought them together to represent similar clients. Soon, Jackson and Overton's relationship grew to include business ventures and in 1794, Overton joined Jackson in land speculation as his business partner (Brown 2010).

During the ensuing years, Overton's profile among the societal elite rose following his appointment as a Sumner County delegate to the 1789 North Carolina convention to ratify the U.S. Constitution. Later in 1795, President George Washington appointed Overton as supervisor of the revenue for the District of Tennessee, Territory South of the River Ohio. This was followed by an appointment to the post of district inspector of the revenue (Brown 2010). These last two appointments, coupled with his experience as Jackson's business partner, appeared to have honed Overton's business acumen and primed him for his role as land agent for the state of Tennessee between 1803 and 1806 (Brown 2010). During this period, Overton negotiated with the state of North Carolina on the disposition of the state's former lands within the newly created state of Tennessee. Under an agreement that became known as "Overton's compromise", Tennessee ceded the majority of its western third territory to the United States; agreed to honor North Carolina land warrants, both military and non-military; and succeeded in gaining Tennessee clear title to the remaining lands within its boundary (Brown 2010). Coinciding with this period was Overton's purchase of several tracts of land within Davidson County that included the current project area in 1806 and property further to the south where he would build Traveller's Rest (TSLA n.d.). Early Tennessee tax records indicate that by 1829, Overton owned 2,000 acres within Davidson County (Ancestry.com 2013).

While serving as land agent for the state, Overton was elected in 1804 to succeed Jackson as a member of the Superior Court of Tennessee, the precursor of the Tennessee Superior Court, in which he served until 1810. Between 1811 and 1816, Overton served on the Supreme Court of Errors and Appeals and after his resignation, collaborated with Judge Thomas Emerson to publish the first official series of the *Tennessee Reports*, which contained published decisions of the state's Supreme Court for the period covering 1813 through 1817 (Brown 2010).

Following his resignation from the Supreme Court, Overton married Mary McConnell White in 1820 and returned to private practice while also teaching law at his home. As a result of his business dealings with Jackson, stemming largely from land speculation and the slave trade, Overton was recognized as one of the wealthiest men in the state. His extensive land holdings in West Tennessee were shared by Jackson and General James Winchester and included sizable areas that included

future Shelby County. In 1819, Overton was one of the founders of Memphis and allocated a large part of the latter years of his life promoting the town's development (Brown 2010).

By 1819, Overton had turned his attention to handling his substantial business holdings and promoting Jackson's political ascendency. Overton leveraged his business experience to become the leader of what historian Theodore Brown Jr. dubbed "the Blount-Overton political/banking organization" (Brown 2010). According to Brown, as the president of the Nashville branch of Knoxville's Bank of the State of Tennessee, Overton and other state bankers constituting the Blount-Overton faction fought against the "resumption of specie payments and the adoption of small-debtor measures that followed the national depression triggered by the Panic of 1819" (Brown 2010). According to Brown, the Blount-Overton faction's opposition contributed to the election of anti-bank candidate for governor, William Carroll in 1821, and the closure of the Blount-Overton banks (Brown 2010).

Having gained Jackson's confidence stemming from the friendship formed during their early legal careers and business ventures, Overton became Jackson's attorney. In this capacity, Overton handled Jackson's business and legal affairs to effectively become Jackson's de facto right-hand-man, ensuring that his business and political interests were protected and equally promoted. By the early 1820s, Overton, seeking to promote Jackson's presidential ambitions, organized the Nashville Junto, which consisted of an informal group of Jackson's close personal friends to promote his candidacy. With the aid of powerful state legislator Felix Grundy, Overton formed the Blount-Overton faction within the Tennessee General Assembly to nominate Jackson for president in 1828 (Brown 2010). As one of Jackson's closest advisors, Overton successfully countered fierce personal attacks from Jackson's political rivals over his controversial marriage to Rachel Donelson during the presidential campaign. Following Jackson's election, Overton continued to serve as a close political advisor to Jackson during his first term and was appointed as chairman of the Baltimore convention for Jackson's re-election; however, Overton's failing health prevented him from accepting the position. Until his death in 1833, Overton remained close to Jackson and his last words were reputed to have been about Jackson (Brown 2010).

Development of Fort Negley

In February of 1862, Union General Don Buell arrived in Nashville with his troops and the city became the first Confederate state capital to be occupied by the federal army (Law 2009:4). According to archaeologist Zada Law (2009:4), "Federal troops transformed Nashville...into a strategic forward operating base for supplying the war zone between the Mississippi River and the Appalachian mountains." One month later, Senator Andrew Johnson was appointed the Military Governor of Tennessee and immediately began efforts to secure Nashville, recognizing the city's importance for future success in controlling other southern states (Law 2009:4). During the summer of that year, General Buell shifted his troops to Shiloh, leaving Nashville defenseless. He tasked Captain James St. Clair Morton with supervising the erection of a ring of fortifications surrounding Nashville, alongside Generals James S. Negley and Palmer. As part of this effort, in addition to Fort Negley, three others were also constructed: Forts Casino, Houston, and Morton (LeJeune 1975).

Architectural History

Located approximately 1.2 miles southeast of downtown Nashville, Fort Negley rests atop a 620-foot hill locally known as "St. Cloud Hill" (USGS 2018). In response to General Buell's order to fortify Nashville, Fort Negley was the largest in a series of fortifications that ringed Nashville to form the inner Federal line. Other forts located within the defensive line included Forts Casino, Donaldson, Houston, Morton, and Gillem, which were connected to each other by a string of entrenchments. In addition, fortifications were erected Hyde Ferry, Hill 210, and at Capitol Hill. The federal line meandered westward from the city's waterworks along the Cumberland River to Hyde's Ferry in present-day North Nashville. Forward of the inner line was a network of outer defenses and rifle pits. Fort Negley anchored the southern approaches to Nashville and its position on St. Cloud Hill, one of the highest points in the city, allowed for a commanding view of the surrounding landscape. As part of the Union defensive works, Fort Negley was incorporated into the Union defensive line through bisecting entrenchments that extended from its north and south elevations. Based on period maps, the project area appears to clip a portion of the Union defensive line that extends from the north elevation of the fort (Law 2014; OR, Series 1, Vol. 49, Part 2, pp. 775-781).

The fort is named after Union General James Scott Negely, who commanded some 6,000 troops in Nashville following the capture of the city in February 1862 (Law 2009: 1; Paine 2010). Constructed of dry-laid limestone quarried on site, Fort Negley was the largest inland masonry fortification built during the Civil War (Law 2009:1). Characterized by its five-point star design, the bulk of the fort's construction took place in less than three months beginning in mid-August and ending in October 1862 under the direction of Captain James St. Clair Morton, chief engineer of the Army of the Ohio and assistant Captain George Burroughs of the United States Army Corps of Engineers (Law 2009:1, 6-7, 9; DuVall & Associates Inc. 2000:10; OR, Series 1, Vol. 49, Part 2, pp. 775-781).

With construction on Fort Negley set to begin on August 13, 1862, Morton ordered the Nashville city commandant to supply a 1,000-slave work force immediately. On the morning of the thirteenth, however, only 150 slaves arrived at St. Cloud Hill, and they were bearing no tools or mule teams (OR, Series 1, Vol. 16, Part II, pp. 326-327.). The work was immediately behind schedule. Morton vigorously pushed construction along, using 6,000 soldiers and more than 2,000 impressed free blacks and runaway slaves from Nashville and the surrounding area (Figure 3.8) (Lovett 1982:8-9).

Morton's design of Fort Negley followed the model established by seventeenth-century French military strategist Sebastien LePrestre de Vauban who perfected the geometric star fort design, which was later adopted by top American military theorists such as Dennis Hart Mahan for its cover and cross-fire advantages (Law 2009:5; DuVall & Associates Inc. 2000: 12). Mahan, who had published five books prior to the Civil War on topics ranging from military and civil engineering, the study of warfare, and fort construction, taught Morton at West Point. Mahan's two best known works, *A Complete Treatise on Field Fortification* (1836) and *Summary of the Course of Permanent Fortification and the Attack and Defense of Permanent Works* (1850), served as required reading at West Point and greatly influenced the construction of both Union and Confederate fortifications (DuVall & Associates 2000:13).

Figure 3.8. U.S. War Department sketch of Fort Negley during its construction in 1862, showing laborers and mule teams atop St. Cloud Hill.

Architecturally, Fort Negley is oriented on a northeast/southwest axis with the primary entrance, known as the sally port, positioned on the northwest elevation (Law 2009: 6; OR, Series 1, Vol. 49, Part 2, pp. 775-781). Though the entrance to the work was located at this elevation, the southeast elevation is considered the primary façade of the fort (DuVall & Associates Inc. 2000:10). Fort Negley's signature feature, its "star design" comprised of redans and bastions, is symmetrically positioned on its northeast and southwest elevations (Figure 3.9). A central redoubt that once contained a square stockade constructed of 12-foot cedar posts divided the two sets of redans and bastions from each other. Based on available drawings of the fort made after its construction, the stockade itself measured 96-x-96 ft and was marked by rifle turrets located at each corner (see Figure 3.9) (OR, Series 1, Vol. 49, Part 2, pp. 775-781). Situated northeast of the stockade, the fort is marked by barbette platforms, which were occupied by field artillery. Additional barbette platforms were located just east of the stockade within the central redoubt. North of the primary barbette platforms, a ravelin ditch was dug that served as an open living area for soldiers garrisoned at the fort (Figure 3.10) (OR, Series 1, Vol. 49, Part 2, pp. 775-781).

The southwest elevation of the fort mirrors the northeast elevation with the presence of four v-shaped redans. In addition, the elevation also included a ravelin ditch between the inner and outer works followed by Casemate No. 1, which was a bomb-proof shelter topped by a 30 lb Parrott Gun. The fort contained two casemates which were constructed of railroad iron and cedar posts (OR, Series 1, Vol. 49, Part 2, pp. 775-781). Situated along the southeast elevation are two substantial bastions that complete the fort's star design. The bastions served to provide visibility to the fort's soldiers and allowed for rifle crossfire in order to defend the fort from attack. In order to provide protection to troops garrisoned in the fort, the two bastions featured tunnels cut out of hew stone within the works that allowed access to the inner parapets (Law 2009:8; OR, Series 1, Vol. 49, Part 2, pp. 775-781). Positioned between the two bastions was a bomb-proof magazine used to store gun powder and artillery shells (OR, Series 1, Vol. 49, Part 2, pp. 775-781). Located south of the magazine was Casement No. 2, which like Casement No. 1, was a bomb-proof shelter that featured a 30 lb Parrott Gun atop its roof. Finally, additional ammunition was stored in a magazine located west of the stockade. Overall, the fort was armed with 11 artillery pieces (including two 64-pound Confederate guns abandoned by Confederate forces after the fall of Nashville) manned by 75 artillerymen (Law 2009:7; OR, Series 1, Vol. 49, Part 2, pp. 775-781).

A summary of the fort's construction sequence is detailed in an account by a Union soldier who was stationed at the fort at the time of its construction:

> There was first an excavation for the intervallation of the crown of the whole hill by wall, the material taken out being quarried lime stone and earth. In this trench which may have been ten feet wide and as deep, were then laid the rocks to a height of perhaps ten feet above the surface, making a wall of rock 20 feet high. This was then covered with earth to the height of the fort walls when completed. Earth for this was taken from an outside ditch or most. Protected angles were prepared for the guns, and a bomb proof magazine within the works, for the ammunition. This bomb proof was excavated, and covered with timbers, railroad iron (T rails), rock and earth. Then erected the main work, to the right, facing south [Law 2009:5-6].

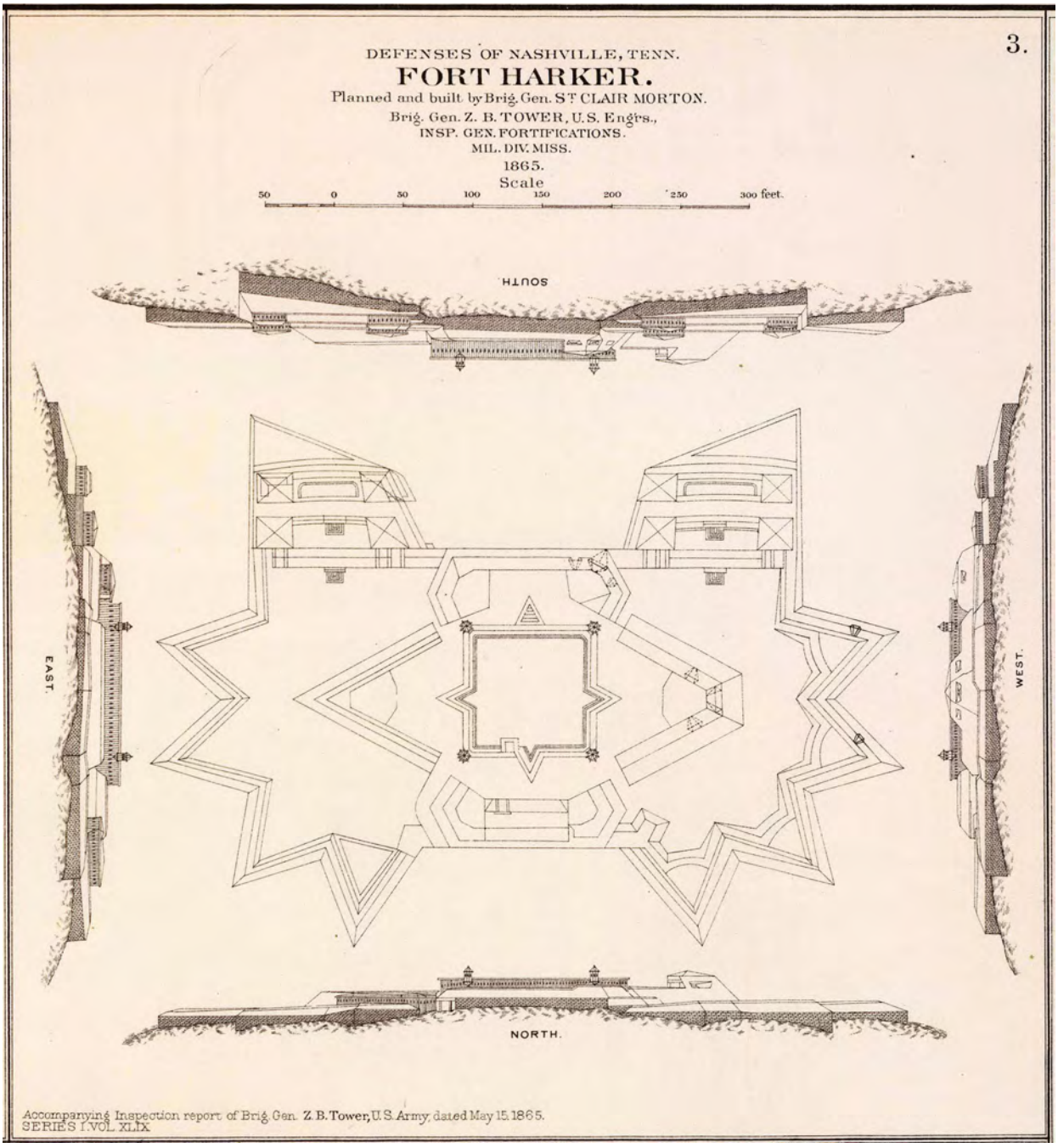

Figure 3.9. U.S. War Department plan and elevation drawings of Fort Negley (later briefly called Fort Harker).

Figure 3.10. View northeast featuring Fort Negley's eastern bastion, ravelin, and ditch. Image courtesy of the TSLA.

Though functional by October 1862, additional improvements continued to be made to the complex in the ensuing months and throughout the duration of the war (Law 2009:10). These included the installation of an iron gate at the sally port; a 60-foot flag pole, stockade, and cisterns within the stockade; and "an interior double-cased block-house" topped with a parapet, just to name a few (Law 2009: 8-9). Additionally, sketches of the Fort Negley made during the Civil War reveals the hillside dotted with tree stumps; however, two large trees located at the top of Saint Cloud Hill were left to serve as a lookout and to support telegraph wires (Figures 3.11-3.12) (Fergusson 1862a; Law 2009:8).

According to a diary entry by John Fergusson, a soldier with the Tenth Illinois Volunteer Infantry garrisoned at Fort Negley, in November of 1862, Union troops razed a series of houses that blocked the view of the Cumberland River from Fort Negley. At the same time, an attack by the Confederates, caused the residents to shelter inside their homes, and some began to fire on the Union soldiers during the confusion. In retaliation, the federal troops set fire to the homes and shot the residents as they fled the smoke and flames (Fergusson 1862b).

Following the completion of Fort Negley, work on Nashville's remaining three forts and encircling earthworks slowed as many black laborers enlisted in the Union army, drastically reducing the impressed labor pool (Law 2009:9). According to historian Bobby Lovett, Fort Negley was typically garrisoned by the Twelfth Indiana Battery and Battery C of the First Tennessee Light Artillery Volunteers. Other infantry regiments, which at various times included white and colored regiments from Illinois, Indiana, Ohio, Tennessee, and Wisconsin, camped on the lower part of the hill (1982:14-15). Fergusson, recounts how on October 17, 1862 his company received orders to clean the side of the hill behind the fort (on the western slope), so that the troops could set up their tents

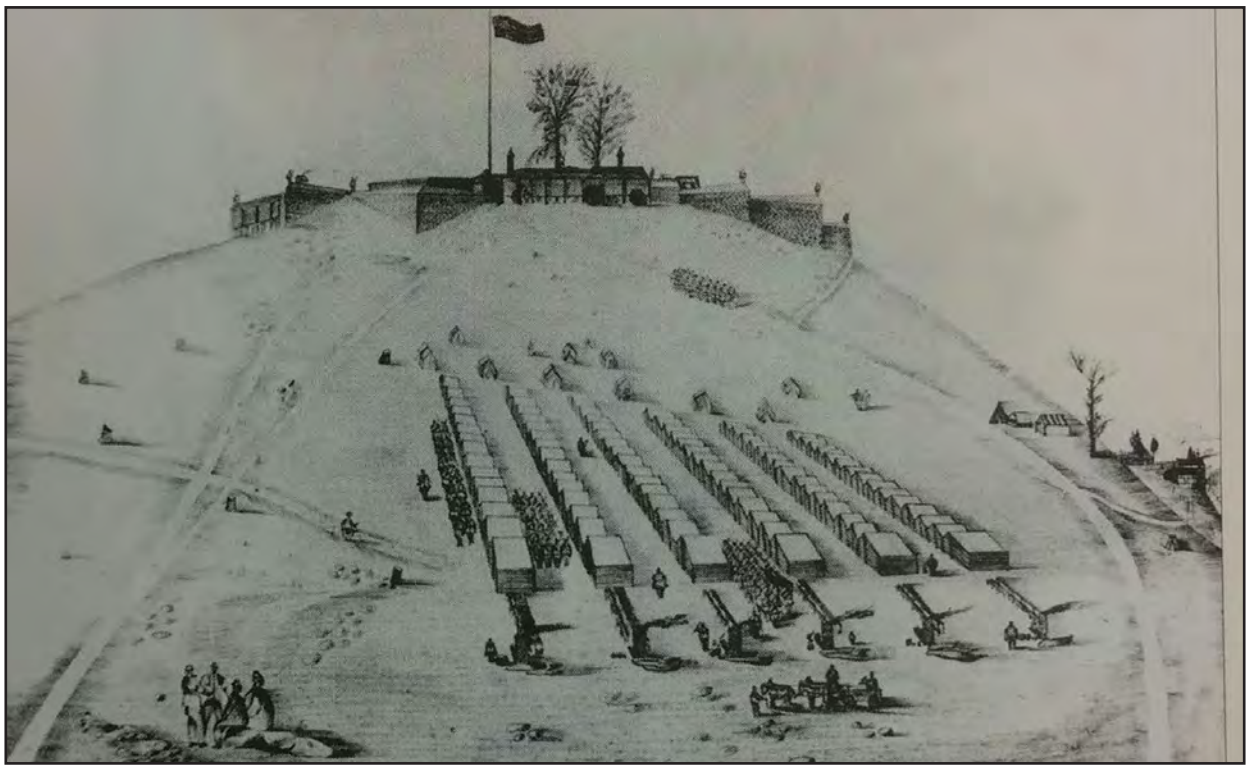

Figure 3.11. Ca. 1864 sketch of Fort Negley showing a regimental camp on the western slope below the fort (Durham 2008:121).

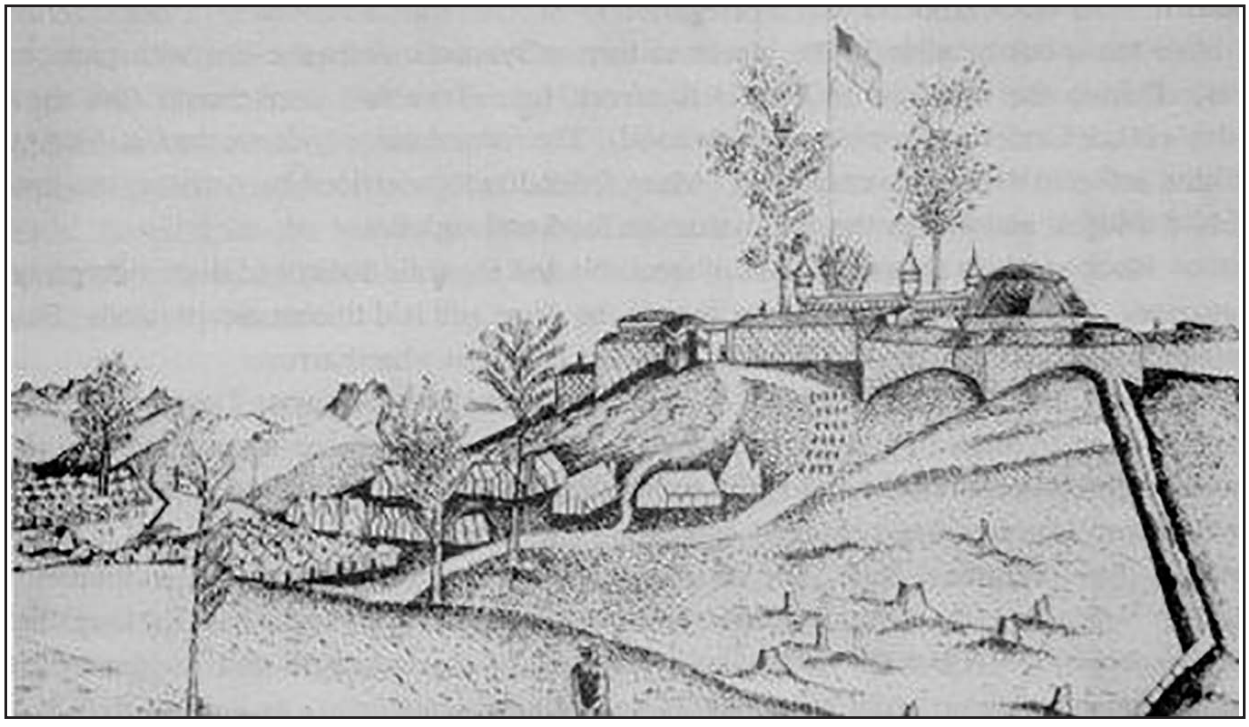

Figure 3.12. Undated sketch showing the fort, regimental camp, and a segment of the Union fortification line (on right) identified in LiDAR data analysis by Zada Law (2014). View southeast.

there (Fergusson 1862a). Fergusson did not survive the war, and he died in September of 1864 in Nashville of exhaustion suffered from a fracture to his ilium, as well as diarrhea (Ancestry.com 2012).

Based on historic photographs and sketches of Fort Negley made during the Civil War, the slopes of Saint Cloud Hill featured an assortment of both temporary and permanent structures. Figure 3.11, which is an unknown soldier's sketch of the fort, depicts troop barracks on the downward western slope of the hill below the sally port. The illustration features six orderly rows of 15 gable-roofed structures. At the end of each row are what appear to be outdoor kitchens. Positioned upslope from the barracks is a scattered collection of gable-roofed houses that may have served as officer quarters. Other buildings located on the Saint Cloud Hill during the Civil War include a side-gabled, wood-framed house with a stone pier foundation. This building is depicted in Figure 3.13 and may have been potentially located within the project area. TVAR's research has not yielded any documentary evidence to suggest what function the house may have served, or if it held any connection to the fortification. Positioned several yards to the right of the house is a collection of informal shanties. As with the aforementioned side-gabled house, it is unclear what function the structures served, or what their association to Fort Negley may have been. The orientation of the photograph appears to be southwest, taken from the Nashville and Chattanooga Railroad. Located within the foreground of the photograph is the cut stone foundation of what appears to have been a railroad shed. Connected to the foundation are two iron arches that likely served as the entrance bays for the building. Scattered near the building ruins are railroad car wheels, which attest to the buildings' association with the railroad.

As one of the leading commercial centers in the South, railroads expanded their presence within the city to keep up with the growing economy. The first railroad constructed in Nashville, the Nashville and Chattanooga Railroad, runs northwest to southeast along the northern edge of the project area and was chartered on December 11, 1845 in Tennessee. Originally, the rail line stretched from Paducah, Kentucky to Atlanta, Georgia with a major branch line that also ran from Bruceton, Tennessee to Memphis (NC&StL Preservation Society 2003). The railroad served as a link to the Western and Atlantic Railroad, which would connect Nashville to markets in Charleston, South Carolina and Georgia. Construction on the railroad began in 1849, and when it was finished in 1854, the N&C was the first complete rail line to operate in Tennessee (Gamble 2010).

In 1867, the Tennessee and Alabama Railroad merged with the Central Southern and Tennessee and Alabama Central Railroads to form the Nashville and Decatur Railroad. By the 1880s, the L&N had taken over the Nashville and Decatur Railroad. The Nashville and Chattanooga Railroad expanded to St. Louis in 1873, at which time its name was changed to the NC&StL. Several years later, the L&N purchased a controlling interest in the NC&StL and allowed the railroad to operate as an independent division, until they formally merged in March of 1957 (Gamble 2010; NC&StL Preservation Society 2003). As seen in Figure 3.14, the L&N in 1889 maintained a platform, elevator, rail yard, roundhouse, and auxiliary buildings.

The Tennessee and Alabama Railroad, later the Louisville and Nashville Railroad Company (L&N), runs southwest to northeast along the eastern edge of the project area, intersecting with the Nashville, Chattanooga, and St. Louis line at a triangular junction. The Tennessee and Alabama Railroad was chartered in 1853. Completed in 1860, the rail line stretched from Nashville to Decatur,

Figure 3.13. Ca. 1864 image; view southwest of Fort Negley, with tents and wood-framed structures visible on hillside. Railroad in foreground.

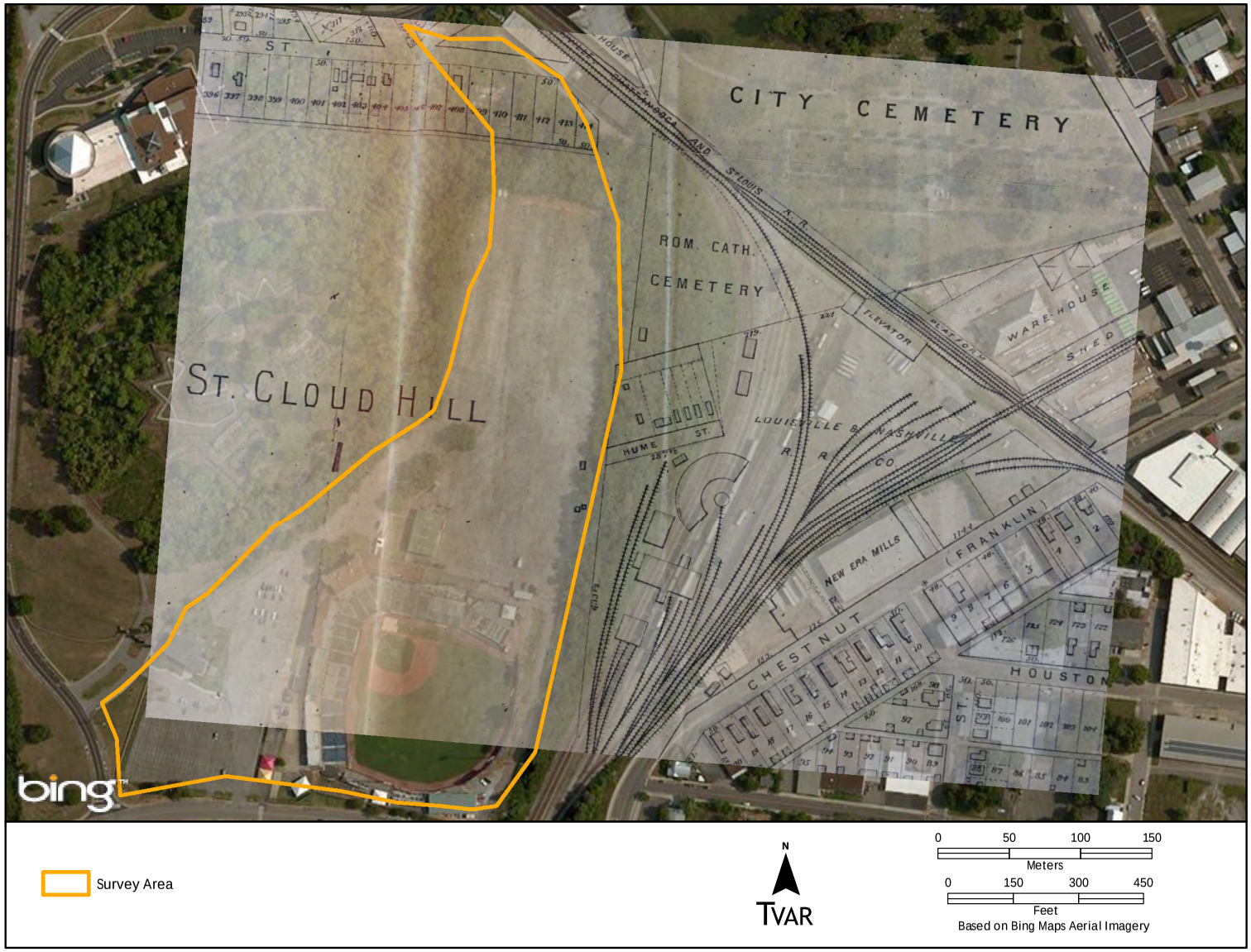

Figure 3.14. 1889 plat map of Nashville overlaying current aerial imagery and depicting buildings associated with the railroad and the location of the Catholic Cemetery.

Alabama (Confederate Railroads 2017). During the Union occupation of Nashville, the United States Army controlled the NC&StL railroad, which served as a vital supply line for the troops. In an attempt to protect the rail line, the Union constructed a series of blockhouses and stockades along the railroad (Gamble 2010).

During the early 1850s, the triangular junction located between the L&N Railroad and St. Cloud Hill was parceled off into a series of lots measuring 30 feet wide as seen in an antebellum plat map of the area (Claybrooke 1850). Due to the triangular shape of the parcel, the lengths of the individual lots varied in depth from 166 to 200 feet (see Figure 3.7). The lots were connected to Hume Street (later changed to Eureka Street), which ran in a slightly northeast-southwest direction and dead-ended at the railroad. As the triangular parcel was "land locked" by the Catholic Cemetery to the north, the N & C Railroad to the east, and the Snowden tract to the west, access to the lots along Hume Street was through Lincoln Street, which ran in northwest-southeast and connected to Franklin Street, the precursor to present-day Chestnut Street. Additionally, a service alley, ran between the lots located south of Hume Street and connected to Lincoln Street. TVAR's georeferencing of the antebellum map in Figure 3.7 suggests that the project area slightly clips the western edge of the triangular parcel. Though the Claybrooke map illustrates individual lots and the names of the owners, the parcel was not fully developed until after the Civil War. Based on the map, the only residence (labelled "Old Gordon House") that appears to have been constructed within the parcel during this period was the J.G. Fellows property, located outside the project area within the eastern corner of the tract near the N&C Railroad. The map also indicates a building north and northwest of the Fellows tract, but these were possibly outlying agricultural buildings associated with the Fellows property.

Impressed Labor and Working Conditions

Over 2,770 names are contained within the *Employment Rolls and Nonpayment Rolls of Negroes Employed in the Defense of Nashville, Tennessee, 1862-1869*, housed at the Tennessee State Library and Archives (TSLA). Of these, the majority were runaway slaves known as contrabands and free blacks who were forcibly drawn into the labor pool (Figure 3.15) (TN Department of State 2009). All able-bodied male blacks in the city were impressed into labor (Fitch 1864:651). According to an anecdote in the *Annals of the Army of the Cumberland*, "the colored population of that city [Nashville] have probably not yet forgotten the suddenness with which his men gathered them in from barber-shops, kitchens, and even churches, and set them at work upon St. Cloud Hill" (Fitch 1864:182).

In one particularly traumatic instance, Union soldiers set upon a Sunday evening church service, entering the building with muskets and announcing that services would be concluded at the Fort Negley site. The lights were put out, and chaos ensued as congregants attempted to escape through the windows of the church (Figure 3.16). Soldiers waiting outside caught those who tried to flee. According to the *Annals*,

> Shrieks, howls, and imprecations went forth to the ears of darkness, rendering night truly hideous. Fancy bonnets were mashed, ribbons were rumpled, and the destruction of negro finery was enormous...And the next morning it was still more comical-the same crowd being at work at the fort, dressed in their mussed and bedirtied finery of the previous evening, in which they had slept upon the earthworks,-they, meanwhile, being the jeer and sport of their surrounding darky acquaintances [Fitch 1864:652].

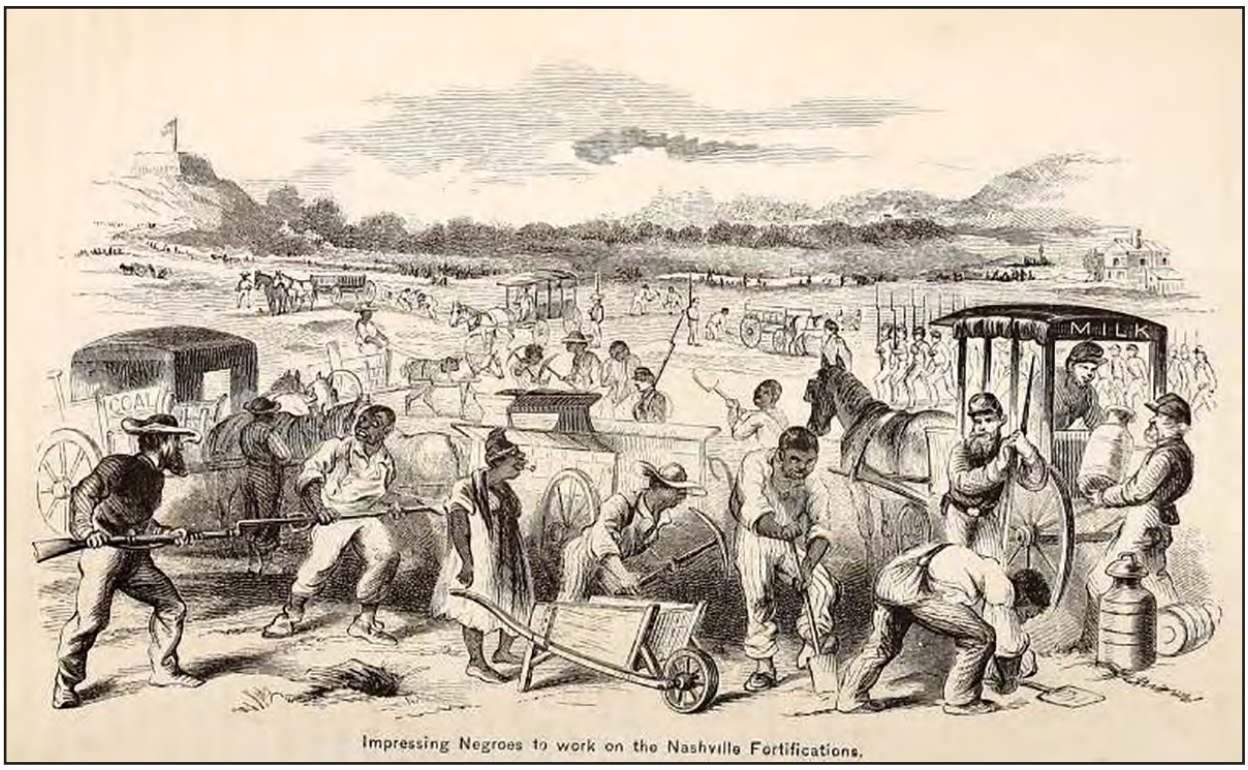

Figure 3.15. Sketch depiction of Union soldiers impressing black laborers into work (Fitch 1864:633).

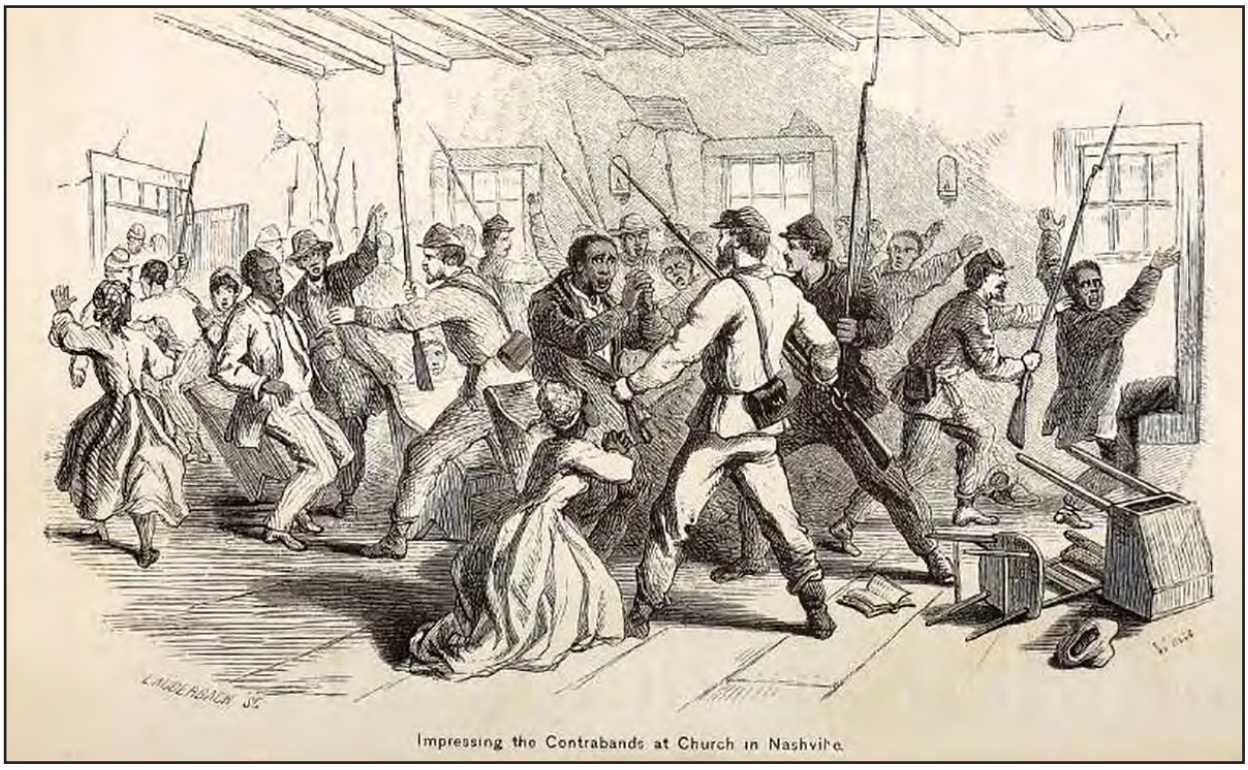

Figure 3.16. Sketch depiction of Union soldiers seizing black churchgoers during a service (Fitch 1864:619).

A *Nashville Globe* newspaper article from 1913 describes the particular experience of James Harding, who was born into slavery in 1842 and worked on the construction of Fort Negley. Having endured a lifetime of cruelty at the hands of his father (who was the son of James' owner, Tom Harding), Harding fled to a Union camp at the onset of the war. From the camp near the State Capitol building, along with approximately 200 others, Harding marched to St. Cloud Hill where the group set about building the fortification (*The Nashville Globe* 1913).

During construction, impressed laborers camped on top of the fortifications and on the surrounding hillside, occasionally in tents, but mostly in the open (Lovett 1982:9). According to Captain Morton, supervising the fort's construction, "[laborers] lay out upon the works at night under armed guard, without blankets and eating only army rations" (Lovett 1982:12). Although black laborers were to be paid, the Union Army only paid out $13,648 of the $85,858.50 that was owed to the workers. On February 4, 1864, Union Army officials ordered 1st Kentucky Volunteers Captain Ralph Hunt to establish an official contraband camp near the Chattanooga-Nashville Railroad Depot (Lovett 1982:11). Ultimately, three contraband camps were established in Nashville: near the railroad depot between Church and Demonbreun Streets, on the east side of the river near the Louisville-Nashville Railroad tracks, and between Front and Cherry streets south of Broad Street (Lovett 1982:11).

Conditions at the contraband camps were filthy and unhealthy; removal of the dead from living quarters often took days. A December 1864 letter from R.H. Clinton, commander in charge of one of the camps, wrote to Andrew Johnson (then the Military Governor of Tennessee):

> I [Clinton] found six dead bodies, covered with vermin. Some having been dead two days and no effort made to bury them, unless they are doing so this morning. I would not trouble Your Excellency with such reports but I think that humanity demands that some order should be issued that would force the officers...to bury their dead out of the way of the living [Berlin et al. 1993:458-459].

Clinton's assessment was controversial at the time and other Union officers argued that under the present circumstances, they were doing everything they could to bury the dead. Another officer writes that:

> ...their condition was wretched in the extreme. The stench arising from the excrement and urine in and around their quarters was intolerable even in the coldest weather, and in my oppinion was the cause of many deaths among them...I have seen them dying in the alleys and houses and on the steps of their quarters" [Berlin et al. 1993:459-460].

Yet another officer, a commander of a Tennessee black regiment, writes "...the suffering from hungar and cold is so great that those wretched people are dying by scores—that sometimes thirty per day die and are carried out by wagon loads, without coffins, and thrown promiscuously, like brutes, into a trench" (Berlin et al. 1993:461). Working conditions were so harsh historians estimate that between 600 and 800 black laborers died working on the ring of fortifications surrounding Nashville during the Union occupation (Lovett 1982:12).

William R. Cornelius, a local Nashville undertaker, was commissioned by the federal government to serve as the Union's undertaker for the region. In total, Cornelius buried 13,561

federal soldiers and government employees during the Union occupation of Nashville. In addition, he interred 8,000 Confederate soldiers and 10,000 contrabands and refugees (*The New York Times* 1865). Cornelius was assisted with his embalming work by Prince Greer, a former slave owned by a Confederate cavalry officer killed in Tennessee. Greer was the first black embalmer in the United States (Groeling 2015:64).

Cornelius contracted with the Nashville City Cemetery in 1862 for the burial of the dead in a five-acre plot at the southern end of the cemetery. When this space was filled, the dead were interred within a triangular parcel between the Nashville and Chattanooga and Tennessee and Alabama Railroads, which contained approximately three acres and may have been the former location of the Catholic Cemetery (see Figure 3.14; Figure 3.17) (Coke 2015:2). By 1864, more space was needed and an 11-acre area was chosen south of the railroad that came to be known as Due West of City Cemetery and U.S. Burial Ground-South West of City Cemetery. It is possible that these intersect the project area. According to a clerk at the Cumberland hospital, federal soldiers' graves were marked by a cedar board incised with name, rank, company, regiment, and date of death (Coke 2015:2).

An 1866 Union and American newspaper article describes graves dug within the soldiers' cemetery as shallow, only two-and-a-half feet deep. Typical coffins were 16 inches in height, leaving little more than a foot of soil to top the grave shaft. According to the article, "the stench arising from these shallow graves is a great annoyance to the surrounding neighborhood, and is calculated to spread disease to an alarming extent in that section of the city" (*Union and American* 1866). In 1911, a deposition was taken of William Perry, who worked as a gravedigger during the war, burying the Union dead. Perry recounted a flooding event that resulted in the opening of a sinkhole within the soldiers' cemetery that measured approximately ten feet square. All remains within the vicinity of the sinkhole were washed into the hole. Perry dropped a 50-foot bricklayer's line into the hole and could not reach the bottom. The hole was eventually filled in and covered by a building belonging to the Nashville Warehouse and Elevator Company (*The Tennessean* 1911).

Between October 1867 and January 1868, the remains of 8,592 individuals in the Due West and South West cemeteries were exhumed and reinterred in the Nashville National Cemetery (Coke 2015:3). It appears that a number of graves were left behind, and an 1867 newspaper article describes a dozen "lonely, sunken graves, probably of as many Confederate soldiers" (*Nashville Union and Dispatch* 1867). According to the article, no fence surrounded the graves, and the land was used for cattle, which grazed amongst strewn and broken grave markers.

Fort Negley Postbellum

After the war, Union forces continued to occupy Fort Negley until 1867. Following their departure, the Ku Klux Klan began using the property as their first headquarters (Law 2009:1). In the meantime, ownership of the immediate property containing Fort Negley and Greer Stadium reverted to the heirs of John Overton (Law 2009:1). Following the Civil War, Nashville underwent significant growth as it recovered from the collapse of the Southern economy to regain its position as one of the leading commercial centers of the South. This resulted in the construction of new residential neighborhoods such as Edgefield in present-day East Nashville and North Nashville's Buena Vista neighborhood, which expanded the city's footprint outside its pre-Civil War boundaries. Near Fort Negley, the Edgehill neighborhood developed and later emerged as one of the leading African-

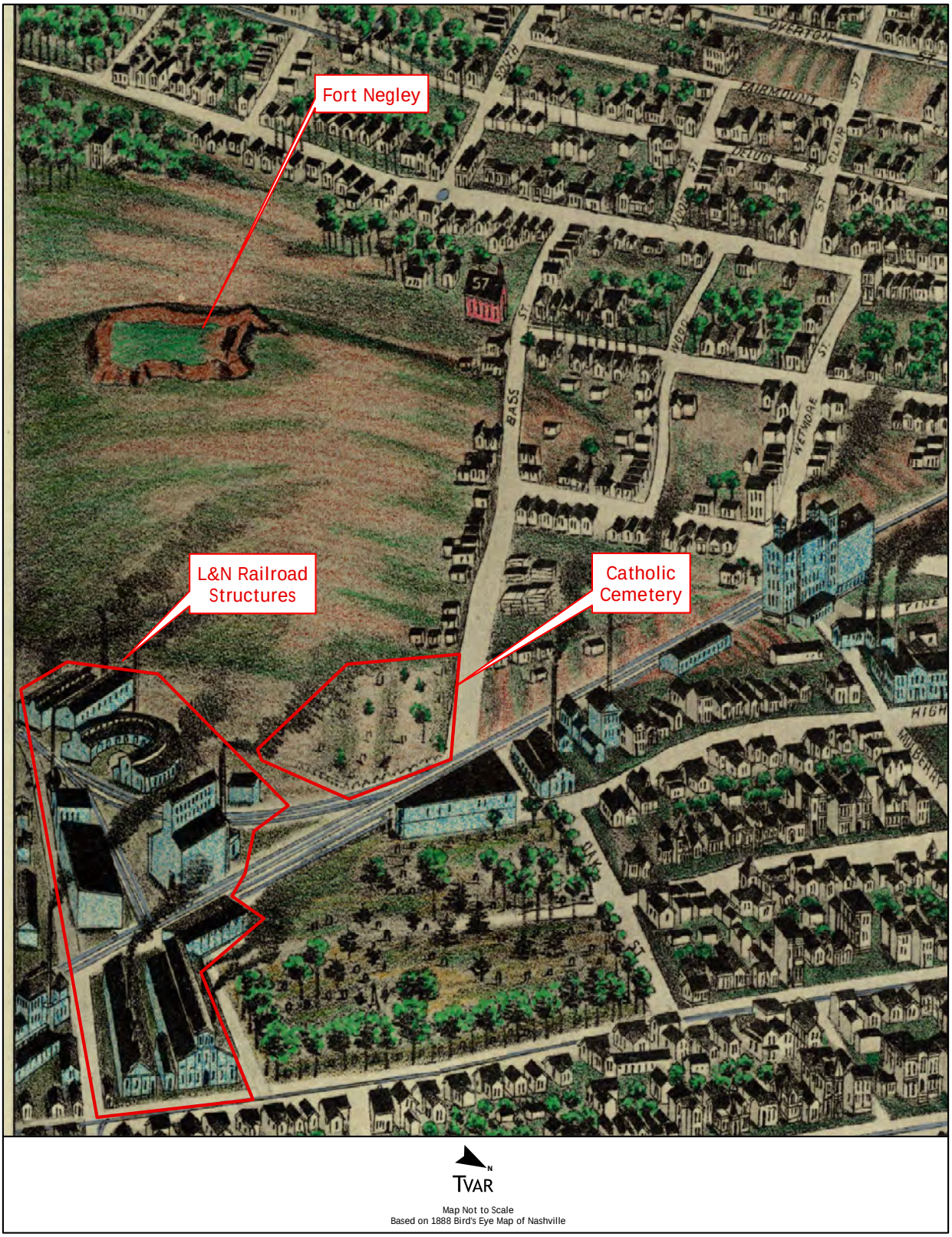

Figure 3.17. Ca. 1888 bird's eye view map of Nashville depicting the location of the Catholic Cemetery.

American communities in Nashville. Concurrent with the boom in residential construction, the burgeoning neighborhoods were interconnected by a network of new roads that led to the traditional turnpikes leading in and out of the city such as Lebanon Road, Granny White Pike, and Franklin Road.

In 1868, 100 lots were laid out surrounding St. Cloud Hill and were sold at auction beginning in April (*The Tennessean* 1868a). At the same time, city leaders also entertained the prospect of converting the fort into a park and were in talks with the property owners to purchase what was then a 75-acre parcel (*The Tennessean* 1868b). Ultimately, the city decided against buying the land due to "the present financial embarrassments of the city" (*The Tennessean* 1868c).

On July 24, 1868, *The Tennessean* (1868d) reported that a group of approximately 50 black men were found to be conducting military drills on the flat land at the bottom of St. Cloud Hill, near the Franklin Turnpike. The next day, the same group of men, who reportedly conducted a daily fatigue march at the hill, purchased a keg of gunpowder (*The Tennessean* 1868e). The drilling was reportedly led by Leander Wood, "whom the respectable colored men of the city denounce as the vilest and most corrupt scoundrel in Nashville" (*The Tennessean* 1868f). Wood had reportedly convinced the group to join his informal militia by claiming he held a commission from Governor William Brownlow. He assured the men that a legislative act was soon to be passed that would legitimize the militia. The makeshift group camped on St. Cloud Hill, and as Wood provided them with no food, they ransacked neighbors' gardens and livestock (*The Tennessean* 1868f). Their drilling typically took place during the night and laborers at the adjacent Nashville and Decatur depot and shops complained of incessant drumbeats.

By 1869, squatters had taken up residence in the former government buildings on St. Cloud Hill, and according to a newspaper article, "the most unseemly carousals are indulged in, and numerous shots are fired off day and night" (*The Tennessean* 1869). The hill was reputed as a hideout for thieves and outlaws, who allegedly escaped police through the old tunnel that connected Fort Negley with the McNairy vault in the City Cemetery (*The Tennessean* 1929). During the early Reconstruction period, the site of Fort Negley also served as the original headquarter of the Ku Klux Klan (KKK), where they held "ghostly enclaves" by night. Reportedly, thousands of white-robed men gathered for the rallies, bearing pine torches (*The Tennessean* 1929).

In 1875, the property containing St. Cloud Hill was announced for public auction due to unpaid back taxes from the years 1865 to 1869 (*The Tennessean* 1875). At that time, Overton's property was owned by his son-in-law R.C. Brinkley and was divided into three lots. Lot 1 contained approximately 33 1/3 acres, including St. Cloud Hill. The second and third lots contained unknown acreage and one acre, respectively (*The Tennessean* 1875). Brinkley's life interest was to be sold first, and if the proceeds did not cover the back tax payments, the property was to be auctioned. It appears that the back taxes were repaid, and a 1908 plat map indicates Annie B. Snowden, a granddaughter of John Overton, owned the 56-acre tract containing St. Cloud Hill and the project area (Figure 3.18). Photographs taken by Otto Giers in 1884 depict a series of wood-framed residences he describes as a "negro settlement" on St. Cloud Hill below Fort Negley (Figures 3.18 and 3.19). Four buildings are visible in the images and appear to have gabled metal roofs and exteriors clad with vertical plank siding. Simple wood picket fences surround two of the buildings. It is possible that some of these

Figure 3.18. 1908 plat map overlaying current aerial imagery and showing Annie B. Snowden as the owner of St. Cloud Hill.

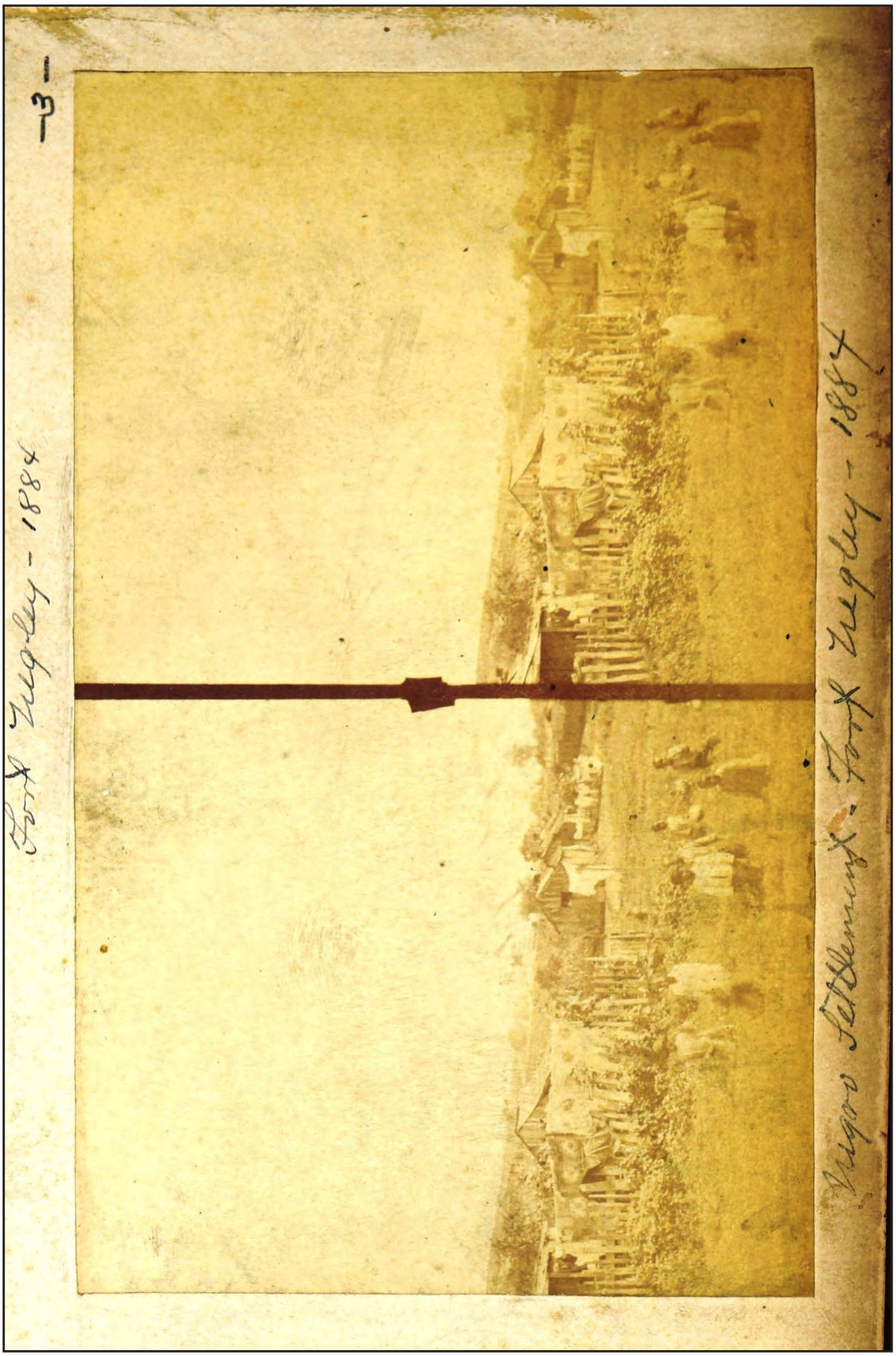

Figure 3.19. Photographer Otto Giers' 1884 image of St. Cloud Hill showing a "negro settlement" (Case Antiques Auctions and Appraisals 2017).

Figure 3.20. Detail of Figure 3.13, showing buildings that may have been associated with the 1880s "negro settlement." View southwest towards Fort Negley.

buildings are the same as those depicted in Figure 3.13 and seen in detail in Figure 3.20.

Following the Civil War, the L&N expanded its presence in Nashville by acquiring additional property within the triangular junction located east of Fort Negley and transforming the area into into an extensive rail yard. Though Fort Negley is not depicted, the 1889 map depicted in Figure 3.14 reveals a cluster of five wood-framed buildings located within the northwestern corner of the parcel on the east side of Cumberland Boulevard (present-day Fort Negley Boulevard). Within the project area, the western edge of the Snowden tract is bordered by an unnamed road running north-south, which connected to Eureka Street (formerly Hume). By this period, the built environment of the triangular parcel was largely consumed by the L&N Railroad, which had established its South Nashville Yard at this location. The map illustrates that the Fellows residence and all its associated outbuildings had been demolished and replaced by a vast network of railroad siding tracks and a series of brick and wood-frame warehouses that bordered Chestnut Street.

The earlier Claybrooke map depicted in Figure 3.7 suggests that the triangular parcel was planned for residential use prior to the Civil War. However, with the expansion of the railroad after the war, the area became primary industrial, although some residential development did occur along the only surviving street from the Claybrooke map, Eureka. The evolution of the triangular parcel as illustrated in the G.M. Hopkins 1889 atlas map (see Figure 3.14) and the 1908 plat map (see Figure 3.18) reveals wood-framed residential buildings located along Eureka Street. The street first appears in the 1893 edition of the *Nashville City Directory* and is described as extending "from L. & N. R.R. west to St. Cloud Hill, ward 16" (Davis 1893:12). Eureka continues to be listed in the city directories until 1939, after which time the street and any standing structures were presumed to have been demolished as part of the Works Progress Administration (WPA) improvement project involving Fort Negley Park. A review of the 1912 city directory provides an insight into the demographics and occupations of those who resided along Eureka Street at this time. The directory indicates that there were a total of twelve residences at the time that were all occupied by African-Americans (Marshall-Bruce-Polk

1912:1154). The residents are listed as having various low-wage occupations; of the twelve persons identified in the 1912 city directory, seven were "laborers." Other occupations included a brickmason, a teamster, and a laundress. The occupations of the two remaining residents were not mentioned in the city directory (Marshall-Bruce-Polk 1912).

At the same time that Eureka Street was developed and occupied, Bass Street, which bisected the northern portion of the project area, was also a predominately African-American neighborhood. Like the residents who lived on Eureka Street, the majority of the houses along Bass Street are identified in the 1912 city directory as occupied by African-Americans with low-paying occupations (Marshall-Bruce-Polk 1912:1117). Based on the current scope of the undertaking, roughly eight former house lots located along the south side of Bass Street fall within the footprint of the project area; these include lot numbers 407 through 414 (see Figure 3.18) (Hopkins 1889). In addition, two former house lots on Oak Street, now occupied by a modern warehouse, also fall within the project footprint. As with Eureka Street, city directories indicate that Bass Street featured a combination of home owners and boarders. Of the five houses within the eight designated lots that fall within the project area, three were occupied by laborers, with the remaining two featuring a lampman and a laundress (Marshall-Bruce-Polk 1912).

In the early twentieth century, much of the Fort Negley's stone was disassembled and re-used for the construction of the City Reservoir, on the former site of Fort Casino (LeJeune 1975). Eventually Fort Negley fell into a state of disrepair. Nashville's Board of Park Commissioners approved the purchase of the land containing Fort Negley from Overton's heirs in 1926 for $20,000 (Law 2009:1). The Snowden family had moved to Memphis by this time and the Fort Negley site was occupied by black squatters, who were forcibly removed from the property (*The Tennessean* 1946). Under the supervision of engineer J.C. Tyner, the WPA began work on reconstructing the fort in 1934. Portions of the Civil War-era walls remained extant and were unearthed by the WPA during the project. Law speculates that WPA workers left the war-era remnants in situ, using them as a base for the reconstruction (2009:11).

At its peak, approximately 2,500 laborers worked on the reconstruction. Roughly 2,500 perch (or 62,500 cubic feet) of stone was quarried from the site for the project, as well as 18,000 cubic yards of soil (Figure 3.21) (*The Tennessean* 1946). During the reconstruction, Tyner and a group of laborers investigated the existence of a tunnel that allegedly once connected Fort Negley with a vault in the City Cemetery. While they did not definitively locate the tunnel, they identified a trap door within the fort and a cemetery vault with a hollow-sounding wall that may be the locations of the tunnel's entrances (*The Tennessean* 1946).

As part of the reconstruction, a road was constructed that circled St. Cloud Hill, as well as a parking lot. In the area of Greer Stadium, recreational facilities were built that included a football field and baseball diamonds (Law 2009; LeJeune 1975). According to a report on a meeting of the Board of Park Commissioners, grading for the baseball diamonds required the excavation of a four-foot cut from the side of St. Cloud Hill (Board of Park Commissioners 1938a). The grading included a "4-1/2 foot fill...on the Fort Negley Field, which would give the diamonds, when finished, a 4% grade" (Board of Park Commissioners 1938b). Additional improvements included a 3,000 ft water line, bumping boards, and a 400 ft stone wall (Board of Park Commissioners 1938c). Two years later, the Board

Figure 3.21. Aerial imagery dated 1937 during the reconstruction of Fort Negley. Quarrying area is circled in red.

of Park Commissioners approved the installation of flood lights around the baseball diamonds in addition to the construction of bleachers by the WPA. Plans for the bleachers were drawn by the WPA and seated a capacity of 5,068. The bleachers were composed of 1,140 locust wood posts and cement coated nails (Board of Park Commissioners 1940). In 1940, Fort Negley reopened as a municipal park, but closed again only five years later for repairs (Figure 3.22). Fort Negley remained closed to the public until the early 1990s, following the removal of overgrowth from the fort's walls, which ultimately led to their destabilization (Law 2009:2).

Plans for a municipal minor league baseball stadium began to take shape in the late 1970s, largely pushed by Larry Schmittou (Figure 3.23) (*The Tennessean* 1977). Named in honor of Herschel Greer, the stadium was completed in 1978, served as the home stadium for the Nashville Sounds, and sat a 10,300-capacity crowd. The playing field covers approximately 2.3 acres, while the stadium area as a whole encompasses 26.1 acres. In 1985, the stadium's bleachers were replaced (Figure 3.24). Greer Stadium became known for its guitar-shaped scoreboard, which is set on a foundation comprised of 205 cubic yards of concrete (Nashville Sounds 2014). In 2015, the Nashville Sounds moved to the newly constructed First Tennessee Park in downtown Nashville, and Greer Stadium has remained abandoned since.

Figure 3.22. Aerial imagery from 1940 showing the completed reconstruction of Fort Negley and adjacent baseball field.

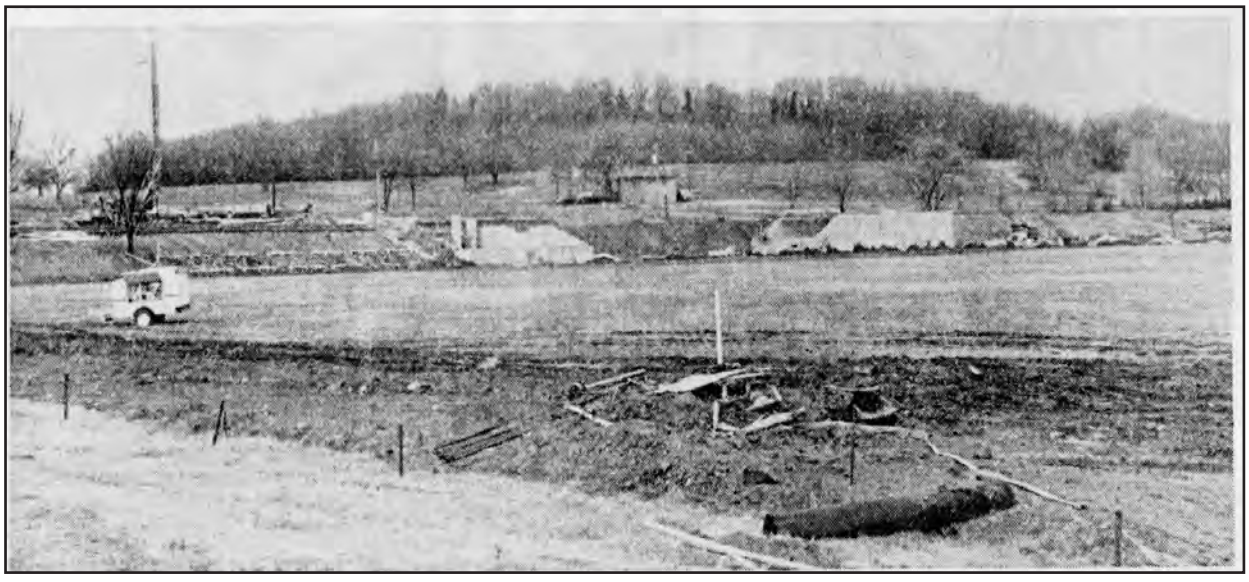

Figure 3.23. Greer Stadium during its construction (*The Tennessean* 1977).

Figure 3.24. Ca. 1985 image of Greer Stadium during the replacement of its bleachers.

Catholic Cemetery

Opened in 1832 and adjacent to the project area was the former site of Nashville's first cemetery designated specifically for the burial of the city's Catholic residents (*The Nashville American* 1902b). Primary source documents regarding the cemetery are scarce as no official rolls of those who were buried at the cemetery are known to exist (Klasek 2017). In addition, there are no official records of those persons whose remains were later reinterred to Calvary Cemetery following the closure of the Catholic Cemetery in 1902 (Klasek 2017; *Nashville Banner* 1902).

Consequently, it is unknown how many people were buried in the cemetery during the course of its 69-year history. According to local newspaper accounts, the cemetery contained at least 700 persons who were later reinterred to the "new" Catholic burial ground known as Calvary Cemetery, which opened in 1868 (*Nashville Banner* 1902; The Nashville City Cemetery Association 2010). An unpublished document filed at the Metropolitan Nashville Archives provides a compilation of persons buried at Calvary Cemetery whose deaths predated the opening of Calvary Cemetery (MNA n.d.)

At its peak usage, the cemetery is reported to have encompassed between five and six acres (Nashville City Cemetery Association 2017; Clayton 1880:346). The earliest map depicting the location of the Catholic Cemetery can be found in the Claybrooke 1850 antebellum map (see Figure 3.7). Though the map was drafted to illustrate the division of lots along Hume Street (later Eureka Street), the map does identify the lower base of the cemetery boundary which consisted of a triangular-shape parcel (Claybrooke 1850). A complete, scaled diagram of the cemetery can be seen in an 1889 map of the environs surrounding St. Cloud Hill (see Figure 3.14) (Hopkins 1889). This map illustrates the full dimensions of the cemetery and the encroachment of the L&N railroad yards just outside the cemetery boundary.

An early photograph of the Catholic Cemetery was taken during the Civil War from atop Fort Negley (see Figure 3.10; Figure 3.25). The cemetery can been seen adjacent to the railroad tracks within a cluster of trees and surrounded by a stone fence. Individual headstones can be seen as well; however, the funerary style of the headstones cannot be determined. A newspaper account during the exhumations described the condition of the cemetery: "...marble slabs and tombstones which mark the burial spots have crumbled away and some have fallen down" (*The Nashville American* 1902a). TVAR's historical research identified additional photographs of the Catholic Cemetery taken by Otto Giers in 1884 (Figures 3.26-3.27). These images depict what appears to be the cemetery overgrown and surrounded by a coarsely laid, dry stack stone wall. Another view of the cemetery reveals a gabled-roof building surrounding by a similar stone wall. It is unclear what function this building served and if it had any connection with the cemetery (see Figure 3.27).

When the Catholic Cemetery was originally established, it effectively anchored the southwestern corner of Nashville City Cemetery tract, which was established in 1822 (NCCA 210:1). However, in 1851, the two cemeteries were physically separated from each other with the arrival of the Nashville and Decatur Railroad, which acquired right-of-way through the cemeteries. The arrival of the railroad and the subsequent development of the associated railroad yards south of the Catholic Cemetery, effectively discouraged any future expansion of the Catholic Cemetery, which by 1880 had been largely filled to capacity (Dennis 1943:32; Clayton 1880:346). According to local accounts, the last burial is reported to have occurred in 1873 (*Nashville Banner* 1902, 8).

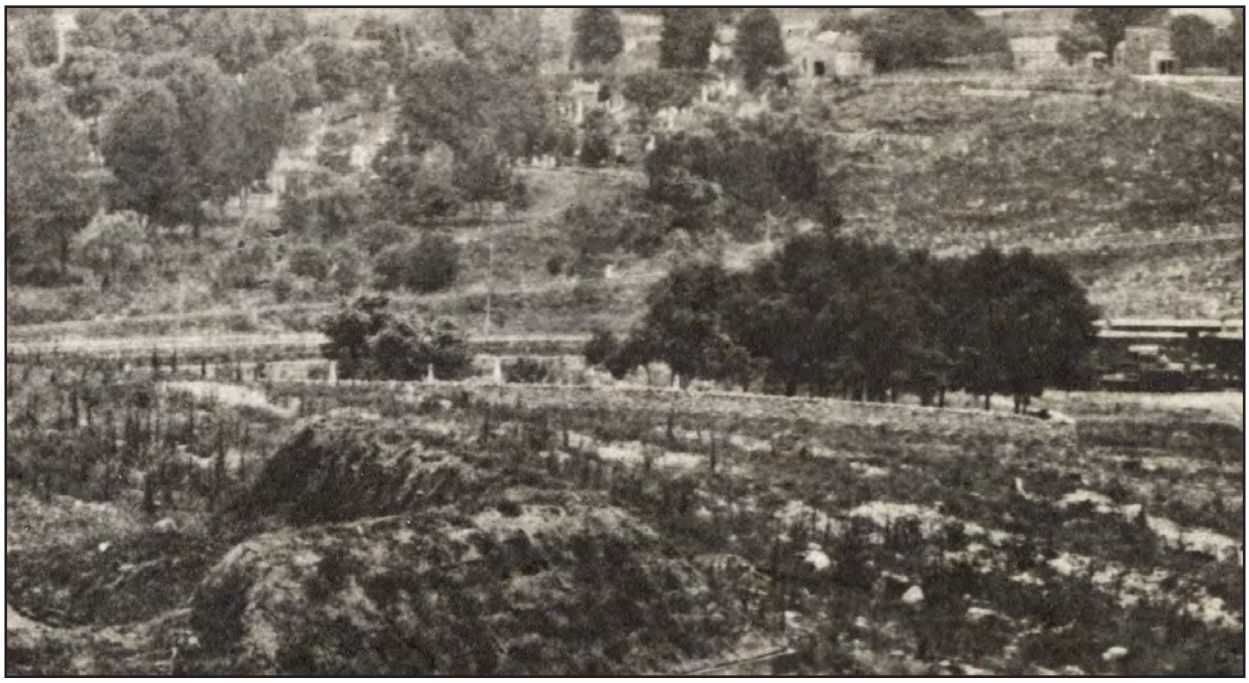

Figure 3.25. Detail view of Figure 3.14, view is northeast from Fort Negley showing the Catholic Cemetery; earthworks associated with Fort Negley in foreground.

In 1902, Nashville Bishop Thomas S. Byrne ordered the removal of all burials in the cemetery to Calvary Cemetery (*Nashville Banner* 1902, 8). Byrne's order indicated that relatives of the dead would be responsible for the disinterment and subsequent reburial of the their own dead in exchange for a plot at Calvary Cemetery. The church took responsibility for handling the graves of the unknown who were also reburied at Calvary Cemetery (*Nashville Banner* 1902, 8). The removal of the Catholic dead, which occurred in March and April, drew crowds of onlookers as well as relatives who took a morbid interest in the exhumation work. According to newspaper accounts, the disinterment of the dead was conducted by laborers hired by the families who directed the work (The Tennessean 1902a, 4). According to one local newspaper account, the cemetery contained "several hundred" burials and that ultimately the church is reported to have exhumed 700 bodies with relatives having exhumed "as many more" (The Tennesseean 1902a, 4; The Tennessean 1902c, 12). The preservation of the remains largely consisted of only a few bones. However, workers unearthed "many" metallic caskets that contained well-preserved remains, some of which were over 40 years old (The Tennessean 1902a, 4; The Tennessean 1902b, 5; *Nashville Banner* 1902, 8; The Tennessean 1902c, 12) These included Timothy Ryan who died in 1866 and 9-year old Mamie Calnan who died ca. 1862 (The Tennessean 1902a, 4). In same year that Bishop Byrne ordered the closure of the Catholic Cemetery, the remaining 2.5-acres of the cemetery property not already acquired by the railroad, were purchased by E.C. Andrews, an executive with Liberty Mills. Liberty Mills was a large grain mill located just north of the Catholic Cemetery (see Figure 3.18). Though several hundred burials were reinterred to Calvary Cemetery, not all the graves were exhumed. Six years after all the burials were supposedly exhumed, workers with John Broderick & Son discovered an iron casket on the former cemetery grounds adjacent to the railroad, which suggests that not all the burials at the Catholic Cemetery were accounted for and that other burials may still remain undisturbed (The Tennessean 1908, 3).

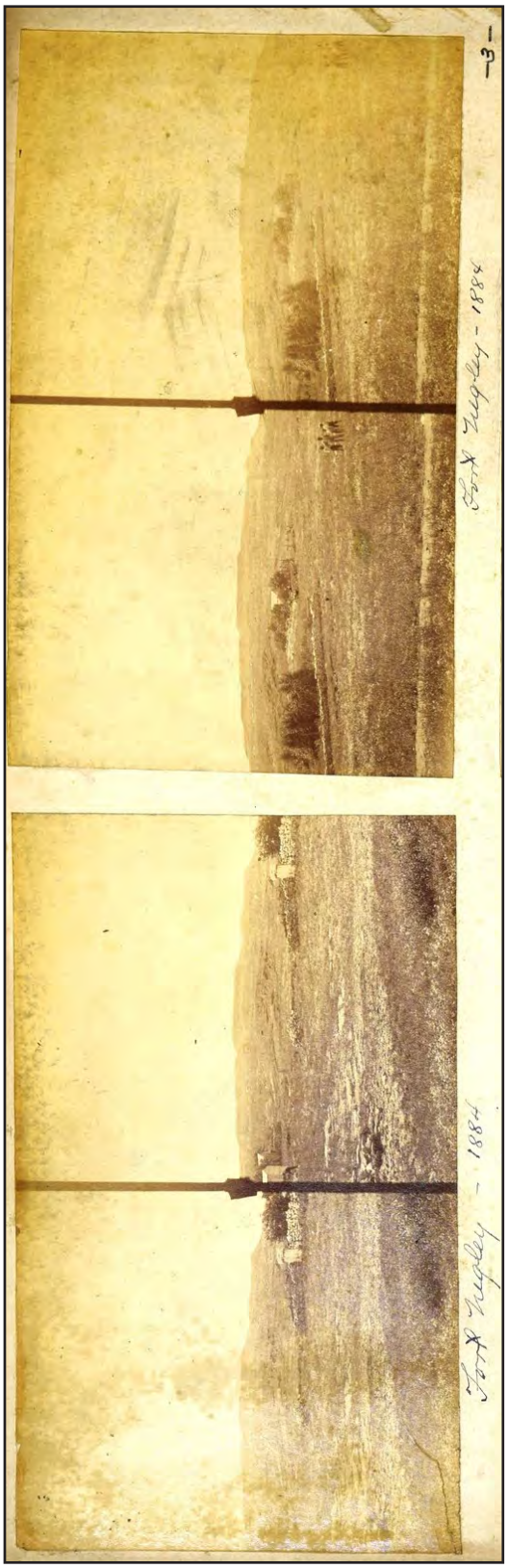

Figure 3.26. Photographer Otto Giers' 1884 image of St. Cloud Hill, showing the Catholic Cemetery, bordered by a stone wall (Case Antiques Auctions and Appraisals 2017).

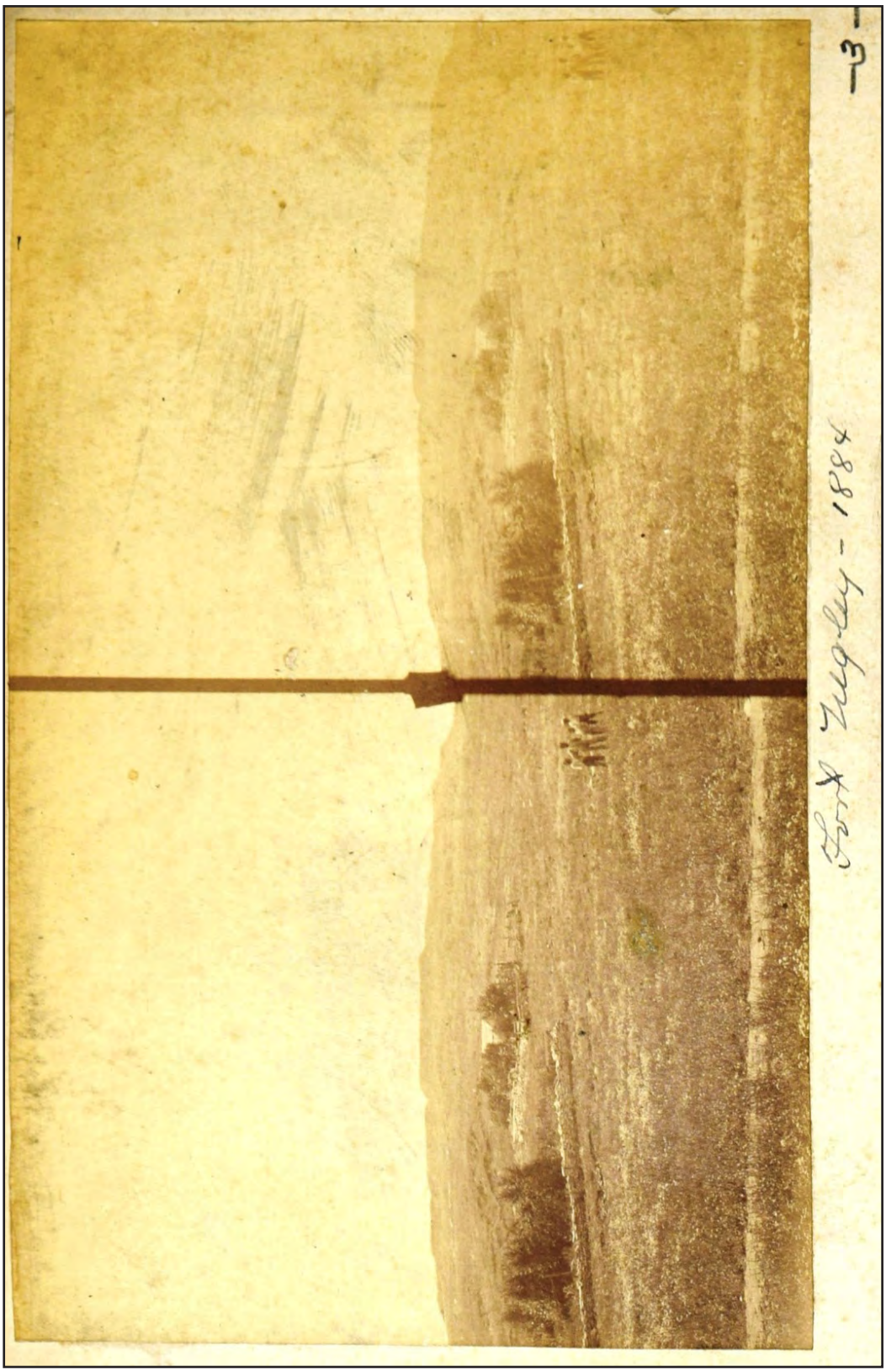

Figure 3.27. Photographer Otto Giers' 1884 image of St. Cloud Hill showing the Catholic Cemetery, bordered by a stone wall (Case Antiques Auctions and Appraisals 2017).

CHAPTER 4. ARCHAEOLOGICAL BACKGROUND

A number of archaeological and archival investigations (summarized below) have been undertaken in proximity to and within the current boundaries of the project area (Alexander 2006; Allen 2000; Bergstresser et al. 1994; Law 2009, 2017; Robinson 2014). The project area is located adjacent to Fort Negley, which was constructed in 1862 under the direction of Union forces during the Civil War. In 1975, Fort Negley was listed on the National Register of Historic Places (NRHP) and later received Local Historic Landmark District status in 2005. Fort Negley is documented at the Tennessee Division of Archaeology (TDOA) as archaeological site 40DV189. According to the Fort Negley archaeological site survey record on file at the TDOA, the site boundary of the fort was expanded in 2017. The site now extends eastward to the railroad tracks and south to Chestnut Street in order to capture the probable locations of Union troop encampments as well as Civil War-related burials. Overall, the Fort Negley site includes the fort, intact sections of Union earthworks, and contraband and troop encampment areas. The fort's site boundaries now encompass the entirety of the project area. Previous investigations of Fort Negley have focused primarily on the fortification's interior and exterior walls, as well as the foundation construction of the existing walls. Investigations have also concentrated on determining which sections of WPA walls were constructed over remnants of the Civil War-era walls.

Overlapping the boundary of the Fort Negley archaeological site is the western site boundary of the Nashville City Cemetery, which was established around 1822. Recorded at the TDOA as site 40DV696, the archaeological site survey record indicates that original portions of the Nashville City Cemetery are located within the project area, underneath and adjacent to the railroad interchange, and underneath the former parking lot of the Nashville Sounds Stadium. According to the Nashville City Cemetery site survey record, the proposed project area may contain burials of Federal and Confederate troops, as well as emancipated African Americans who lived in the associated contraband camp and/or were impressed upon to work on the fort's construction. In addition, the record indicates that portions of the former Catholic Cemetery are located within the site area.

Previous Investigation at 40DV189

Panamerican Consultants, Inc. conducted an archaeological study of Fort Negley in 1993 to determine if the existing structure could be temporally affiliated with the original Civil War construction and to what extent portions date to the WPA reconstruction (Bergstresser et al. 1994). Results of the investigation indicate that the WPA reconstruction of Fort Negley closely follows the original ground plan and that portions of the existing structure likely date to the WPA reconstruction. The study indicated that sections of the WPA walls may have been constructed on top of remnants of the Civil War structure. The investigation also revealed that while artifacts from the Union occupation of the fort were redeposited in twentieth-century fill layers associated with the WPA reconstruction, Civil War-era archaeological deposits may be preserved below the twentieth-century deposits.

DuVall & Associates, Inc. conducted archaeological investigations at Fort Negley in 1999 (Allen 2000). This survey was associated with efforts to stabilize and repair portions of the WPA ma-

sonry walls and was designed to "test and assess the nature of archaeological deposits within a series of impact areas scheduled to be restored or stabilized" (Allen 2000). Results of the investigations indicated that Civil War-era deposits found at shallow depths along the fort's interior walls were likely disturbed by the WPA restoration efforts. However, Civil War deposits may be present at these locations below 50 centimeters. Civil War-era deposits may also be preserved on the exterior of the fort outside of the main gate (Allen 2000).

Alexander Archaeological Consultants, Inc. conducted Phase II archaeological testing at Fort Negley in 2007 that was designed to evaluate archaeological resources at the location of a proposed flagpole installation in the stockade area of the fort (Alexander et al. 2007). Investigations uncovered the north bastion of the stockade in its entirety and portions of the main palisade line to the east and west of the bastion. Limited testing at the base of the stockade trench indicated that it had been excavated into bedrock to a depth of approximately 30 centimeters. Large palisade posts were placed in circular holes that were cut into bedrock where the west bastion wall and main palisade intersected. It was determined that the feature was associated with the construction of both the Civil War-era stockade and the reconstructed WPA stockade.

New South Associates, Inc. conducted archaeological investigations at Fort Negley in 2013. The investigations were designed to expose and examine the foundation of existing wall structures and to determine the chronology of significant periods of construction (Robinson 2014). Two trenches were excavated along the outer walls of the fort. One trench exposed the foundation of the east bastion wall, which was constructed in a stepped fashion to accommodate the southward slope of the hillside on which it was located (Robinson 2014). Though precise chronology of the walls could not be determined, fill layers indicated that material associated with the construction of a berm along the south wall of the fort was likely deposited in the twentieth century.

CHAPTER 5. FIELD INVESTIGATIONS

Under contract with Metro Parks & Recreation, Nashville, Tennessee Valley Archaeological Research conducted a GPR survey of an 8.9 ha (21.9-acre) tract of land in order to inventory and evaluate cultural resources. The primary objective of TVAR's investigations was to identify intact archaeological deposits and evaluate the amount and extent of past construction disturbances in the project area. The presence of intact archaeological deposits was crucial for identifying locations that might contain human burials or other features related to historic activities in the project area. In order to determine the presence of intact deposits, TVAR implemented multiple, complimentary investigative techniques. A ground penetrating radar (GPR) survey was conducted, during which a total of 11 GPR blocks were investigated. Additionally, eight GPR transects were surveyed across the baseball field, along the road immediately east of the baseball field, in the northern gravel parking lot, and along the remnant hillside north of the batting facility. To ground-truth GPR results and to further investigate the presence of intact deposits, 11 trenches were mechanically excavated in the project area. Lastly, 16 shovel tests were conducted near GPR blocks suspected of containing undisturbed buried surfaces (Figure 5.1).

Geophysical Survey

The project area is located in Davidson County, Nashville, Tennessee. It is adjacent to Fort Negley (40DV189), which overlaps the western site boundary of the Nashville City Cemetery (40DV696). According to the Nashville City Cemetery site survey record and historical records reviewed in Chapter 3, the project area may contain burials of Federal and Confederate troops as well as emancipated African Americans. In addition, the record indicates that portions of the former Catholic Cemetery are located within the site area. Because a substantial portion of the project area was used for human interments during the nineteenth century (*The Nashville Union and Dispatch* 1867; *The Tennessean* 1911, 1946), the purpose of the investigation was to determine the presence of intact archaeological deposits associated with human remains.

To address these objectives, TVAR employed a Geophysical Survey Systems, Inc. (GSSI) SIR-4000 control module equipped with a 350HS hyperstacking digital antenna and a 200 MHz analog antenna to investigate subsurface variations within the project area. The GSSI 350HS is the first antenna to incorporate digital output, resulting in higher resolution scans. The antenna also incorporates hyperstacking technology. Hyperstacking is the process of taking multiple scans at slightly different bandwiths and then "stacking" the scans together into a composite signal. Block and transect locations were mapped using a Topcon OS-103 total station and georeferenced using prominent landscape features, including buildings, utility poles, and elements of the stadium. TVAR's data are spatially referenced and directly incorporated into a GIS.

The purpose of a geophysical survey is to detect and document subsurface variations over a known area. Geophysical survey methods, derived from geological and geomorphological techniques, have been employed in North America since the 1930s (Aitken 1961). These methods were adapted

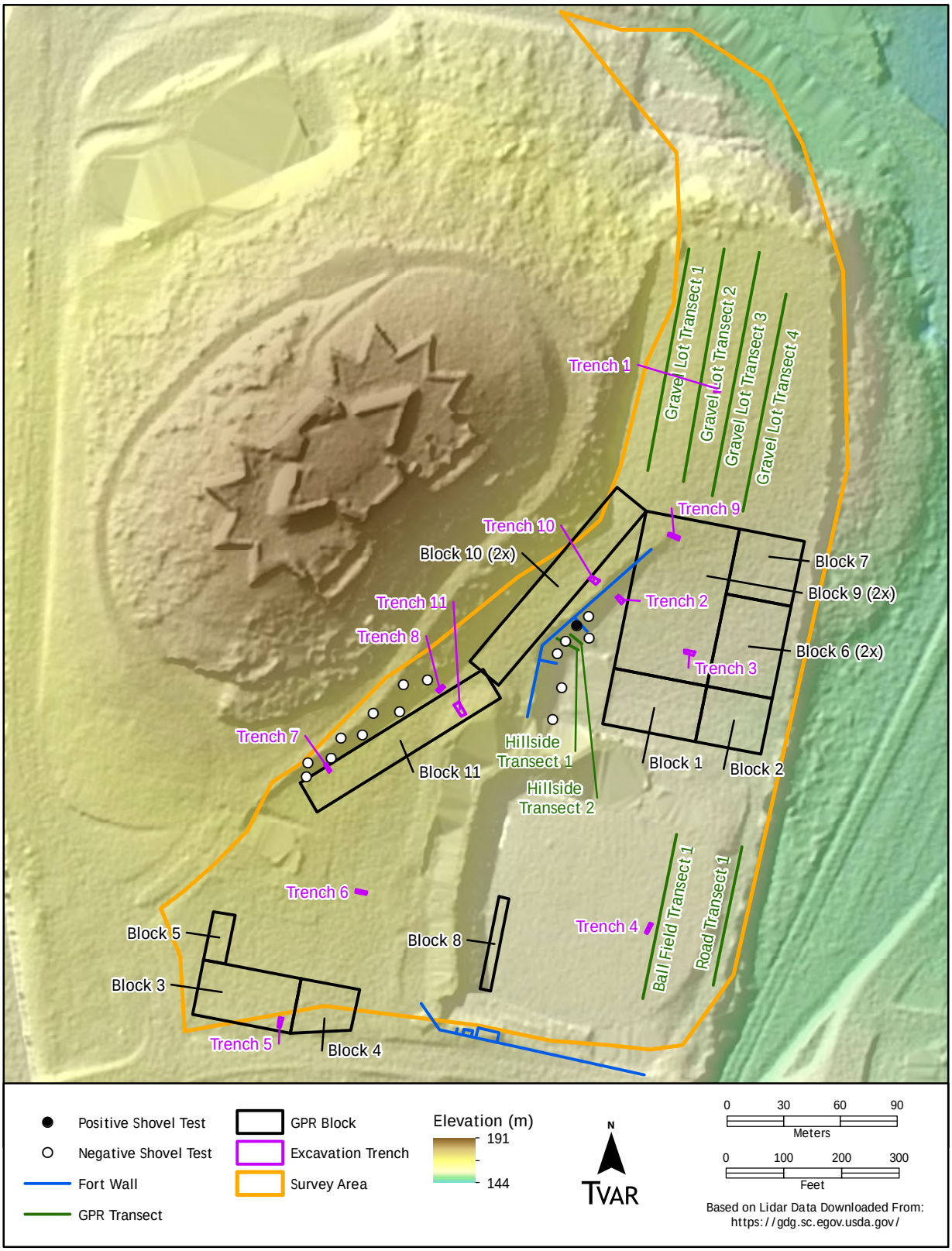

Figure 5.1. Map showing all levels of investigation in the project area.

for archaeological research in Europe during the second half of the twentieth century, but archaeology-specific geophysical methods were not widely used in North America until the advent of cultural resource management in the 1970s (Bevan and Kenyon 1975; Clark 1996; Johnson 2006; Thompson et al. 2011). The increased accessibility of commercially available hardware and software led to the widespread use of geophysical methods in archaeology throughout the following decades. Today, geophysical surveys are routine in archaeological investigations, and advances in technology and microchip processing allow for mass quantities of data to be collected in a short period of time (Clark 1996; Gaffney and Gater 2003; Johnson 2006; Smekalova et al. 2005; Thompson et al. 2011; Thompson and Pluckhahn 2010).

Geophysical Survey Methods

A GSSI SIR-4000 control module equipped with a 350HS hyperstacking digital antenna and a 200 MHz analog antenna was used to collect the GPR data within the geophysical survey area. The depths to which radar energy can penetrate, and the amount of resolution that can be expected in the subsurface, are dependent on the frequency of the radar energy transmitted (Conyers 2004; GSSI 2015). Since GPR antennae operate on a variety of frequencies between 10 and 2600 MHz, there is a trade-off between depth of penetration and the degree of feature resolution: the higher the antenna frequency, the greater the resolution of features. However, greater resolution is achieved at the expense of penetration depth (and vice-versa). Antenna frequencies in the range of 250 to 400 MHz are most commonly utilized in the investigation of historic cemeteries, while frequencies below 250 MHz are appropriate for the detection of larger anomalies. Using the two antennae allowed TVAR to recover a more representative geophysical dataset.

GPR devices transmit radar waves into the ground in order to measure the differential reflections of subsurface anomalies (e.g., rocks, graves, and pits). Reflection is defined as the length of time between when the pulse leaves the transmitter, hits an anomaly, and is reflected back to the control module. The amount of reflection can then be translated to obtain depth measurements. The effectiveness of GPR can be limited in the presence of clayey and/or poorly drained soils. Also, the electromagnetic property of soil can alter the depth and attenuation rate of radar waves. This effect is expressed as the relative dielectric permittivity (RDP), which describes how well a material allows an electromagnetic field to pass through it. The formula used to express RDP is $K=(C/V)^2$, where C is the velocity of light and V is the velocity of the radar wave traveling through a soil (Conyers 2004). RDP values are symbolized by K and can range between 1K (air) and 81K (water). Although RDP can inhibit data collection, useful data can still be obtained when the dielectric of the area to be tested is considered.

During TVAR's geophysical survey, the GPR data were collected over a 10-day period, with predominantly clear and warm conditions and no measurable precipitation. The GPR Suitability Map (USDA-NRCS 2009) shows that the geophysical survey area falls within the moderate index. The instrument was calibrated each morning before collection. This calibration effectively zeroed in the instrument to the local conditions and was a necessary step before collecting data and setting an RDP

value. Effective depth penetration was approximately 2.5 meters for the 350HS, and 3-3.5 meters for the 200 MHz antenna. Signal attenuation (degradation) was not a major factor during the data collection process.

Geophysical survey data were collected in a controlled manner across the project area through the implementation of eight transects and 11 survey blocks, three of which were surveyed with both antennas. GPR data were collected at 50 scans per meter for the 350 MHz antenna and 64 scans per meter for the 200 MHz antenna. Data were collected along transects spaced 100 cm apart for the 350 MHz antenna and 150 cm apart for the 200 MHz antenna. Placement and orientation of transects and survey blocks were determined in the field to best accommodate constraints imposed by the project area, particularly man-made obstructions, and to ensure adequate spatial coverage of the area under investigation. A total of 25,600 square meters, or 6.3 acres, was surveyed in blocks. Additionally, transects were surveyed across the baseball field, along the road immediately east of the baseball field, in the northern gravel parking lot, and along the remnant hillside near a metal building batting facility, totaling 677.57 meters, or 741 yards of linear survey. The GPR survey was conducted across the project area, with an emphasis on representative samples from the various subareas of the property. Blocks were created using surveyors rope and stakes driven into the asphalt at the block corners. All block corners and transect endpoints were mapped using a Topcon OS-103 total station. The GPR data were downloaded and processed using the GPR-Slice 7 software package. The data were exported into ESRI ArcGIS 10.3 in order to be georeferenced and the location of anomalies determined in geographic space.

One of the primary goals of TVAR's field investigations was to identify the presence of intact deposits (soils) that are likely to contain burials within the project area. For the purposes of this report, deposits are categorized in the following manner. Intact archaeological deposits denote remains that are exclusively the result of human activities, including the modification of the natural land surface or subsurface through the deliberate creation of artificial sediments. Secondary or disturbed archaeological deposits refer to artifactual materials associated with human activities, particularly construction and landscape modification activities. Often described as cut and fill, these deposits refer to the removal or redeposition of material in association with human-induced alterations of the natural landscape, including the large-scale removal of surface soils and rock and the use of fill material, either derived locally or from demolition debris brought to the site. Natural deposits are those characterized by unaltered soils, particularly layers of soil in the stratigraphic record that show no evidence of being disturbed by human activities.

Geophysical Survey Results

The ground penetrating radar data were downloaded from the instrument and processed using GPR-Slice 7 software. This software allows for extensive post-processing of data and includes the ability to interpolate horizontal "slices" of subsurface anomalies from the vertical radargrams. These slices provide a three-dimensional view of the subsurface, including potentially significant radar anomalies (Figures 5.2-5.3).

There are three stages of data review. First, review of the real-time radargram present on the unit screen. Anomalies were noted in the field, including intact archaeological deposits, secondary or

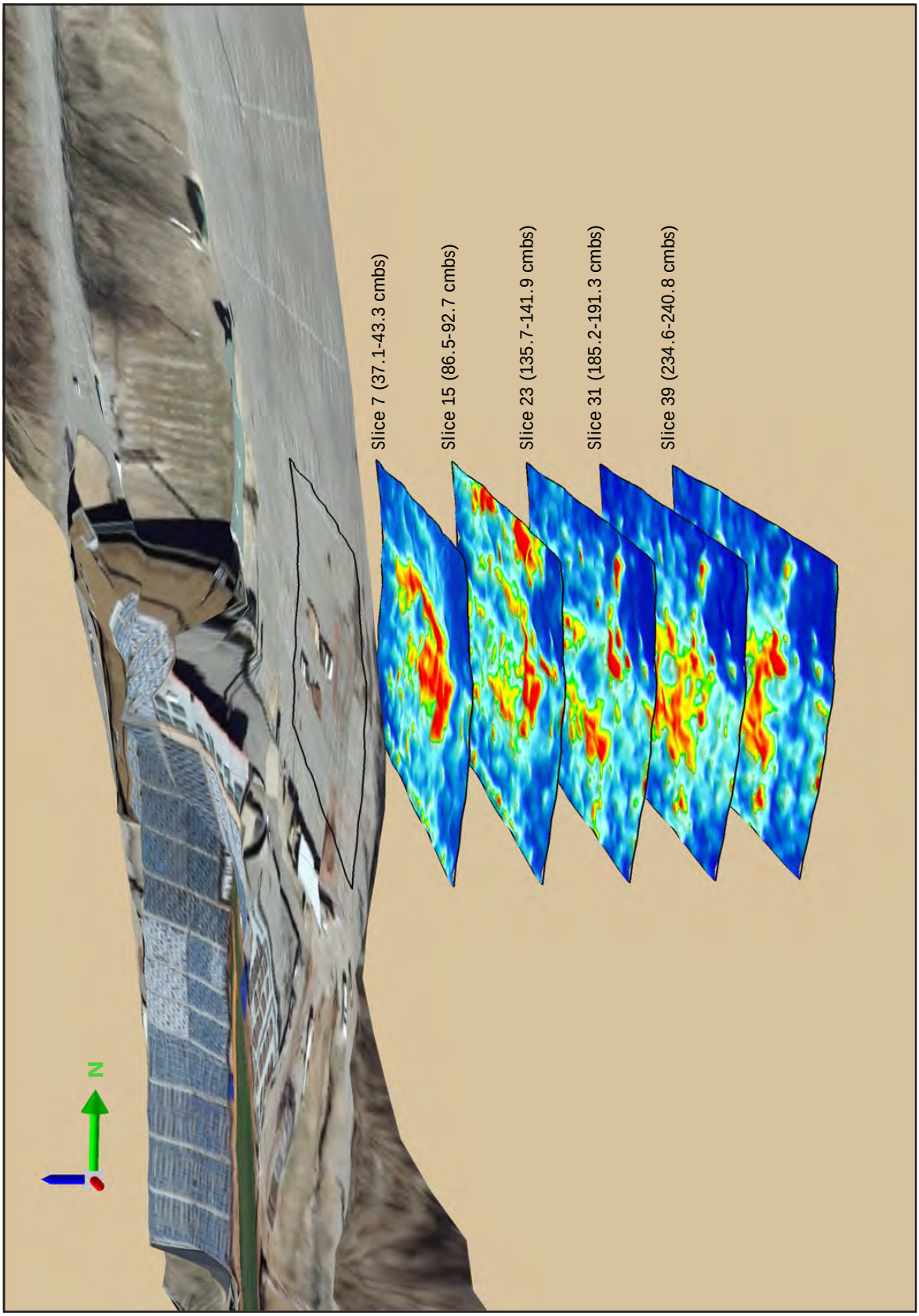

Figure 5.2. GPR Block 2 slice display.

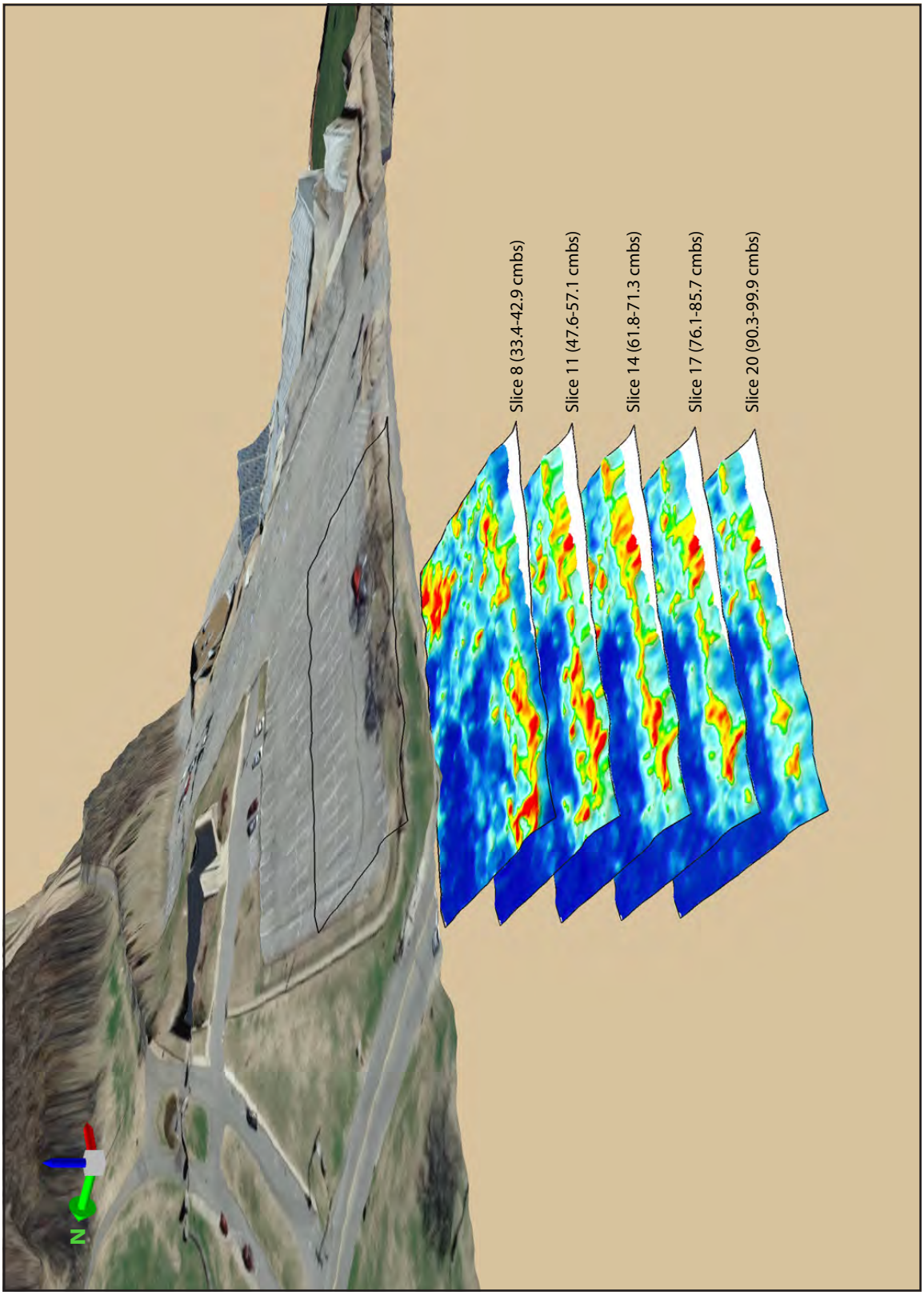

Figure 5.3. GPR Block 3 slice display.

disturbed deposits (cut and fill deposits), and buried utilities (Table 5.1). Second, review of preprocessed radargrams in the lab. Radargrams are reviewed for anomalies after import into GPR-Slice 7. Third, data-processing and creation of horizontal slices in a three-dimensional model of the data is reviewed for indications of intact subsurface deposits. Each stage allows for refinement of the data, permitting more specific determinations, while review of the raw data elucidates features that may be obscured during processing. Processing included timezeroing, background filter, and migration.

Data slices were reviewed, and relevant anomalies were displayed on horizontal time slices. The data were exported into ESRI ArcGIS 10.3 in order to be georeferenced, and suspect features digitized. Anomalies encountered during investigations are discussed in detail below, including intact archaeological deposits, secondary or disturbed deposits (cut and fill deposits), and natural deposits.

GPR Blocks

Eleven GPR blocks were surveyed in the project area (Table 5.2). Locations of GPR blocks were determined in order to assess the presence of intact archaeological deposits in the survey area (Figure 5.1).

GPR Block 1-2

GPR Block 1

GPR Block 1 was a 50-x-30 m block located 10 m north of the Greer Stadium outer fence line. The block was oriented in a north-south direction. Fifty-one profiles were obtained from GPR Block 1 for a total survey length of 1,502 meters (Figure 5.4). A 70-x-10 m wide utility pipe extended along the southern edge of the block, while the northern edge consisted of what appears to be fill deposited over bedrock. GPR Block 1 also contained a large filled in natural drainage (Figure 5.5).

GPR Block 2

GPR Block 2 was a 35-x-30 m block located 10 m north of the Greer Stadium outer fence line. The block was oriented in a north-south direction. Thirty-nine profiles were obtained from GPR Block 2 for a total survey length of 1,171 meters (Figure 5.6). The utility pipe identified in GPR Block 1 also extended along the southern edge of GPR Block 2. The northern edge of this block likely consists of fill material deposited over bedrock and an area of potential intact archaeological deposits (Figure 5.7).

GPR Block 1-2 Summary

No clear intact archaeological deposits related to pre-WPA activities were identified during investigation and evaluation of GPR Blocks 1 and 2. However, there exists the possibility of potential intact archaeological deposits in the northern portion of GPR Block 2 (Figure 5.8).

GPR Block 3-5

GPR Block 3

GPR Block 3 was a 52-x-33 m block located on the east side of the south parking lot area just north of Chestnut St. In the extreme southwestern portion of the project area, the block was oriented

Table 5.1. Anomalies Encountered During GPR Survey.

Location	Anomaly Type	Depth (cm)
GPR Block 1	utilities	70-170 below asphalt
GPR Block 2	utilities	70-170 below asphalt
GPR Block 3	intact archaeological deposits	0-100 below asphalt
GPR Block 4	intact archaeological deposits, scattered intact archaeological deposits	0-100 below asphalt
GPR Block 5	scattered intact archaeological deposits	0-100 below asphalt
GPR Block 6	scattered intact archaeological deposits, cut and fill deposits	0->200 below asphalt
GPR Block 7	scattered intact archaeological deposits, cut and fill deposits	0->200 below asphalt
GPR Block 9	intact archaeological deposits, scattered intact archaeological deposits, cut and fill deposits	0-100 below asphalt
GPR Block 10	extensive intact archaeological deposits, scattered intact archaeological deposits, cut and fill deposits	0->200 below asphalt
GPR Block 11	scattered intact archaeological deposits	0->200 below asphalt
Gravel Lot Transects	cut and fill deposits	0->200 below asphalt
Hillside Transects	intact archaeological deposits	0-60 below surface
Baseball Field Transect	midden, utilities	0->250 below surface
Southeast Road Transect	scattered intact archaeological deposits, fill deposits, utilities	0->250 below asphalt

Table 5.2. GPR Blocks Surveyed in the Project Area.

GPR Block	Size (m)	Spacing (m)	Direction
1	50-x-30	5	north-south
2	35-x-30	2	north-south
3	52-x-33	2	north-south
4	36-x-29	5	north-south
5	12-x-26	5	north-south
6	38-x-50	5	north-south
7	37.5-x-35	2	north-south
8	5-x-50	10	north-south
9	50-x-85	5	north-south
10	20-x-120	10	north-south
11	18-x-113	10	north-south

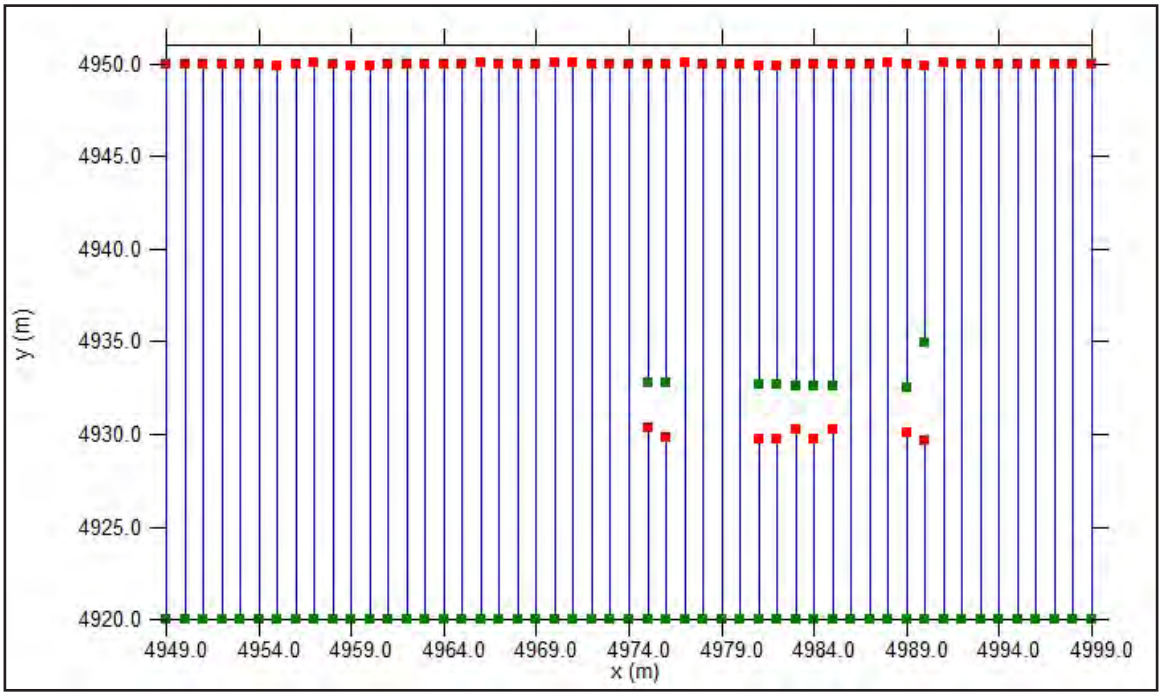

Figure 5.4. GPR Block 1 transect plot.

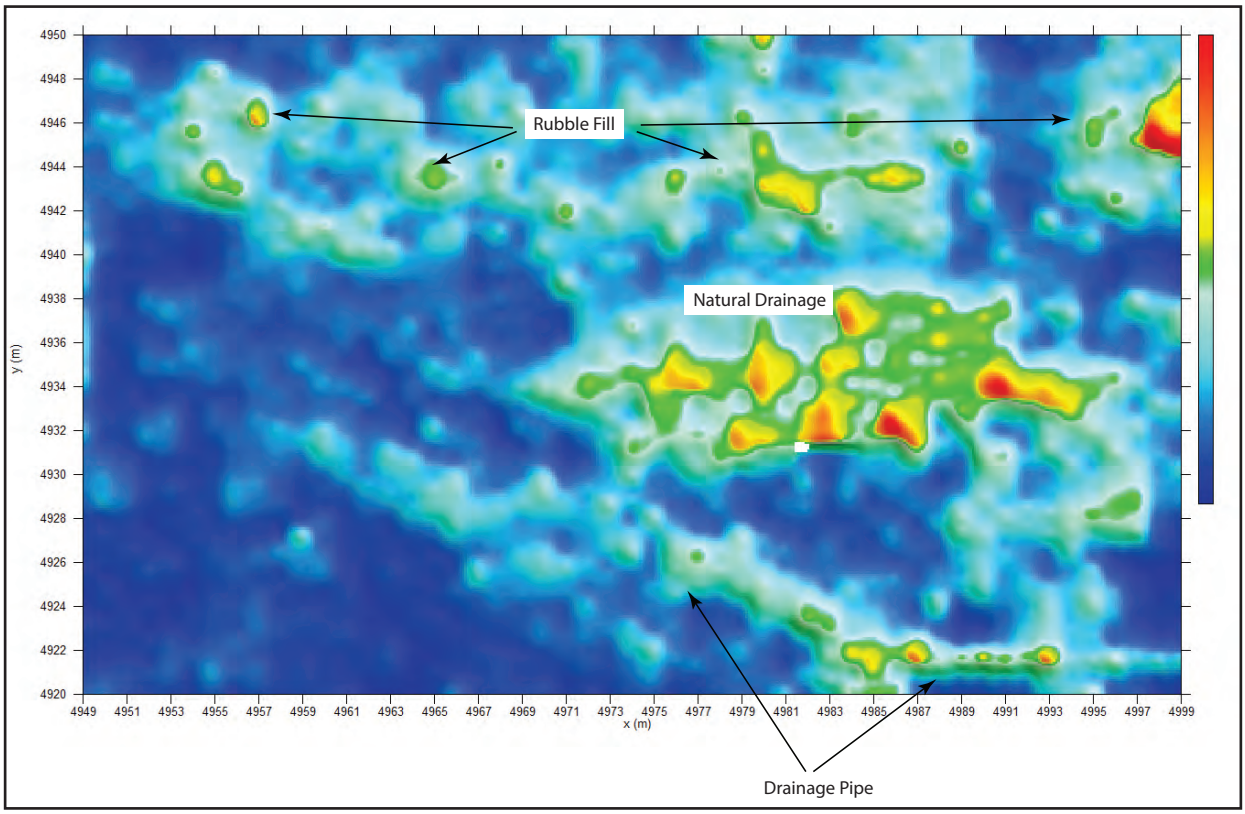

Figure 5.5. GPR Block 1, slice 9.

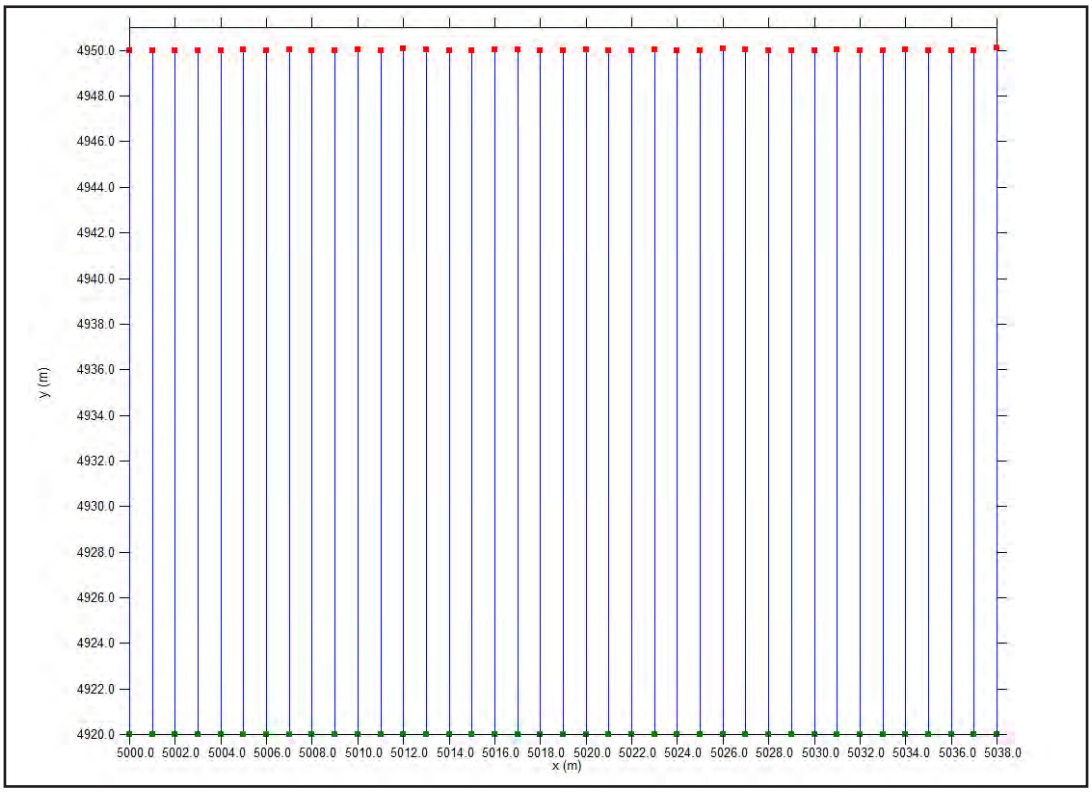

Figure 5.6. GPR Block 2 transect plot.

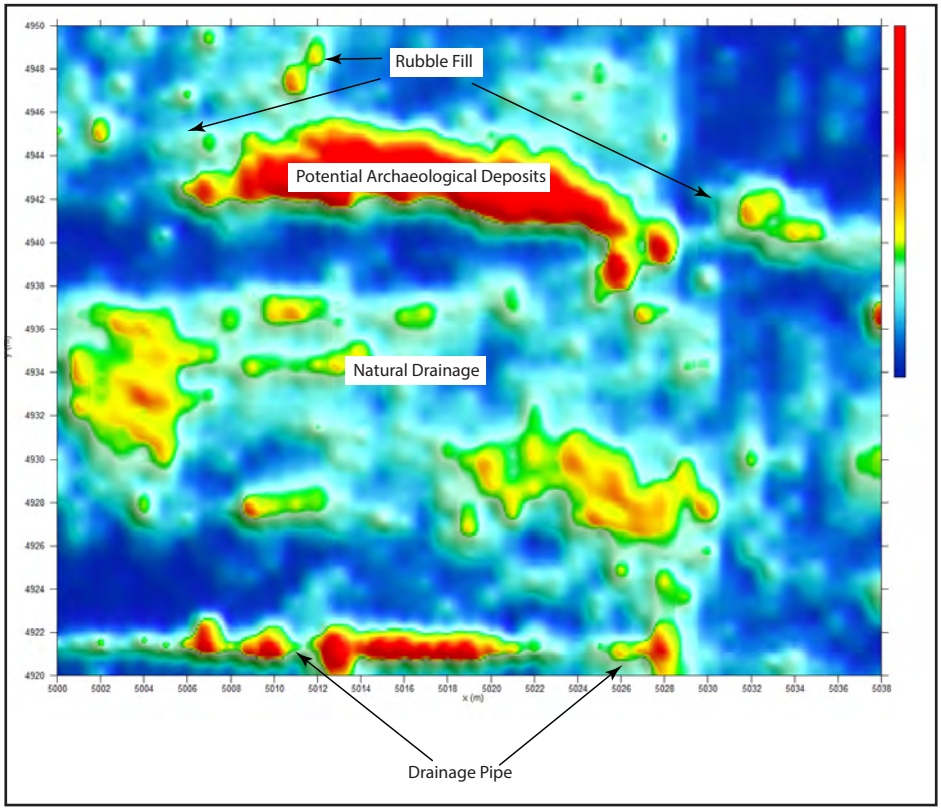

Figure 5.7. GPR Block 2, slice 9.

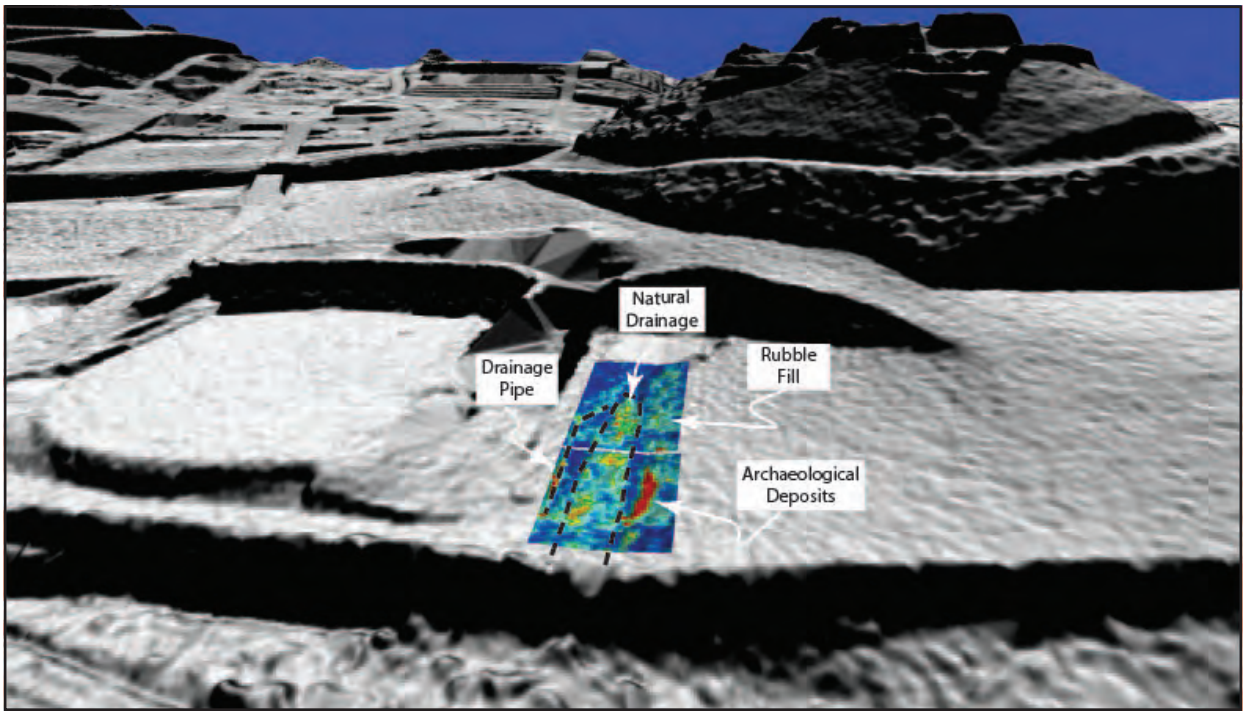

Figure 5.8. GPR Blocks 1-2 detail.

in a north-south direction. Fifty-three profiles were obtained from GPR Block 3 for a total survey length of 1,729 meters (Figure 5.9). Much of the northern edge of GPR Block 3 is stripped to bedrock and overlain with asphalt. The WPA-reconstructed wall extends eastward, and potentially scattered intact archaeological deposits may be present along the western edge of the block (Figure 5.10). The southern edge of GPR Block 3 is likely to contain intact archaeological deposits.

GPR Block 4

GPR Block 4 was a 36-x-29 m block located in the south parking lot area just north of Chestnut St. In the extreme southwestern portion of the project area, the block was oriented in a north-south direction. Thirty-seven profiles were obtained from GPR Block 4 for a total survey length of 983 meters (Figure 5.11). As with GPR Block 3, much of the northern edge of GPR Block 4 is stripped to bedrock. Sections of GPR Block 4 likely contain scattered intact archaeological deposits and, as with GPR Block 3, the southern edge of the block, adjacent to Chestnut Street, is likely to include intact archaeological deposits (Figure 5.12).

GPR Block 5

GPR Block 5 was a 12-x-26 m block located on the west side of the south parking lot area. The block was oriented in a north-south direction. Thirteen profiles were obtained from GPR Block 5 for a total survey length of 292 meters (Figure 5.13). Along the extreme southwestern perimeter of the project area, the northern edge of GPR Block 5 consists of bedrock overlain with asphalt. Intact archaeological deposits may persist in the northern portion of GPR Block 5 and, as with GPR Block 4, there exists the possibility of scattered intact archaeological deposits along the western edge. (Figure 5.14).

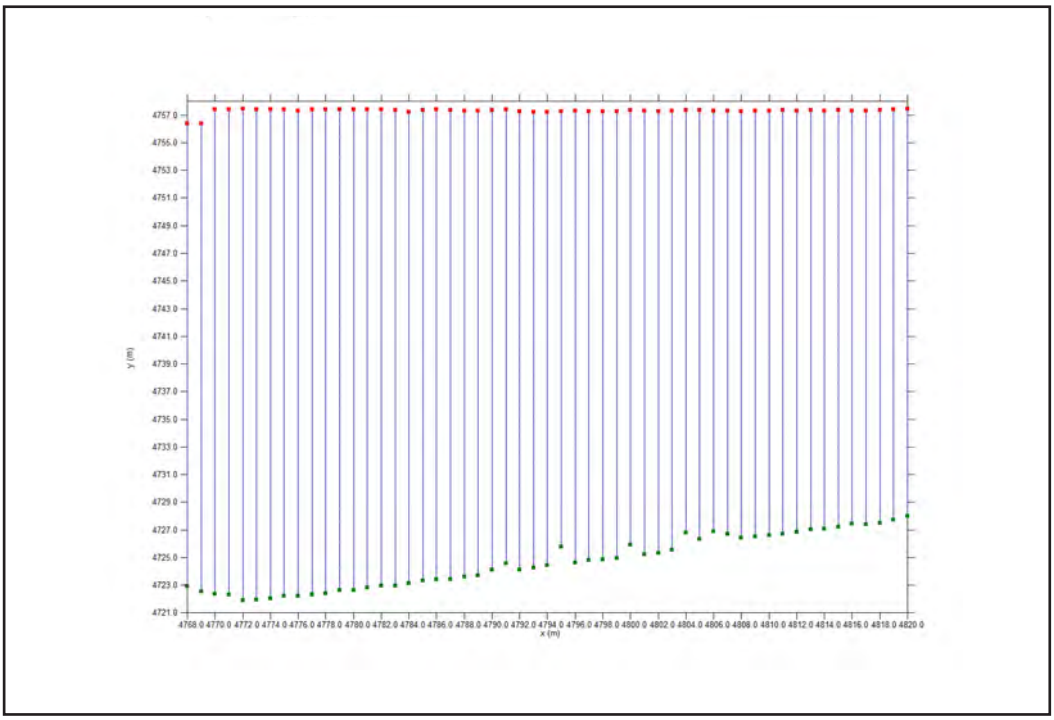

Figure 5.9. GPR Block 3 transect plot.

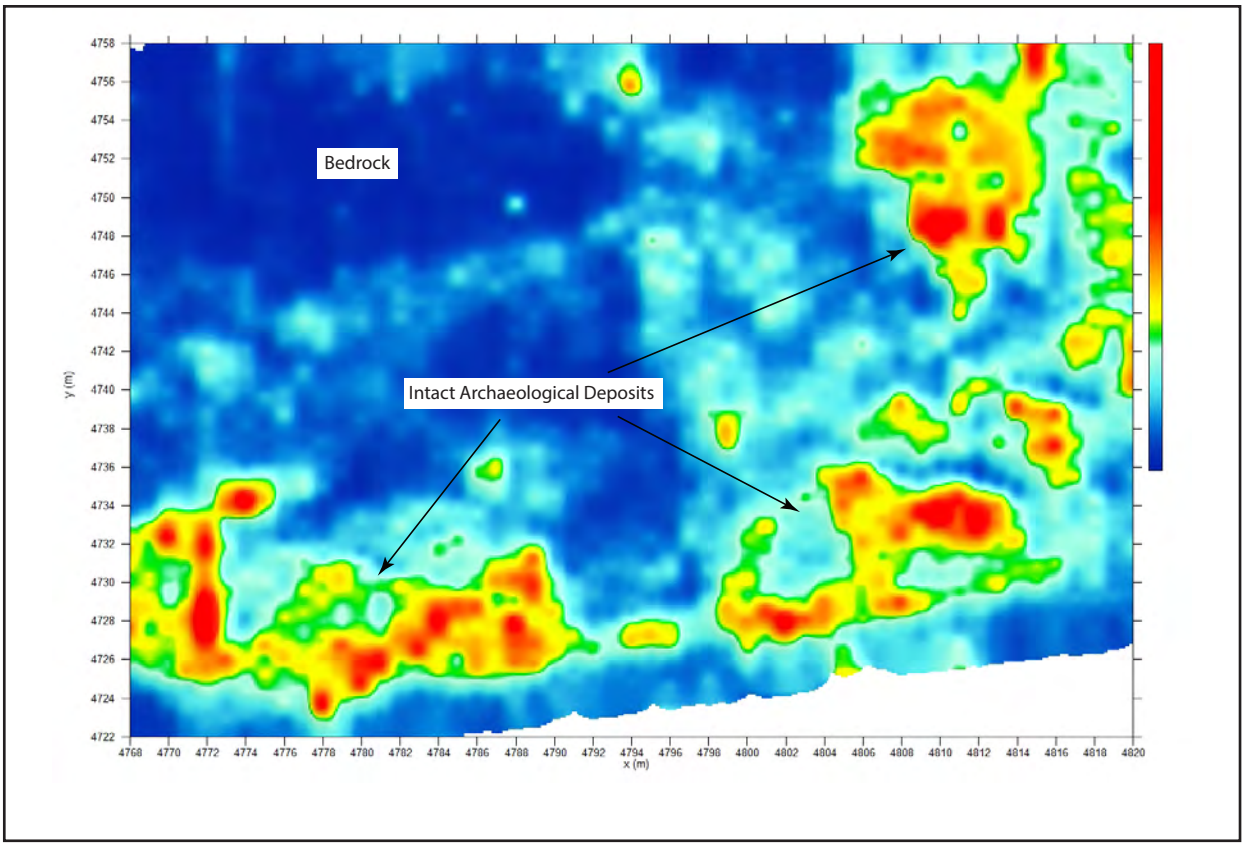

Figure 5.10. GPR Block 3, slice 9.

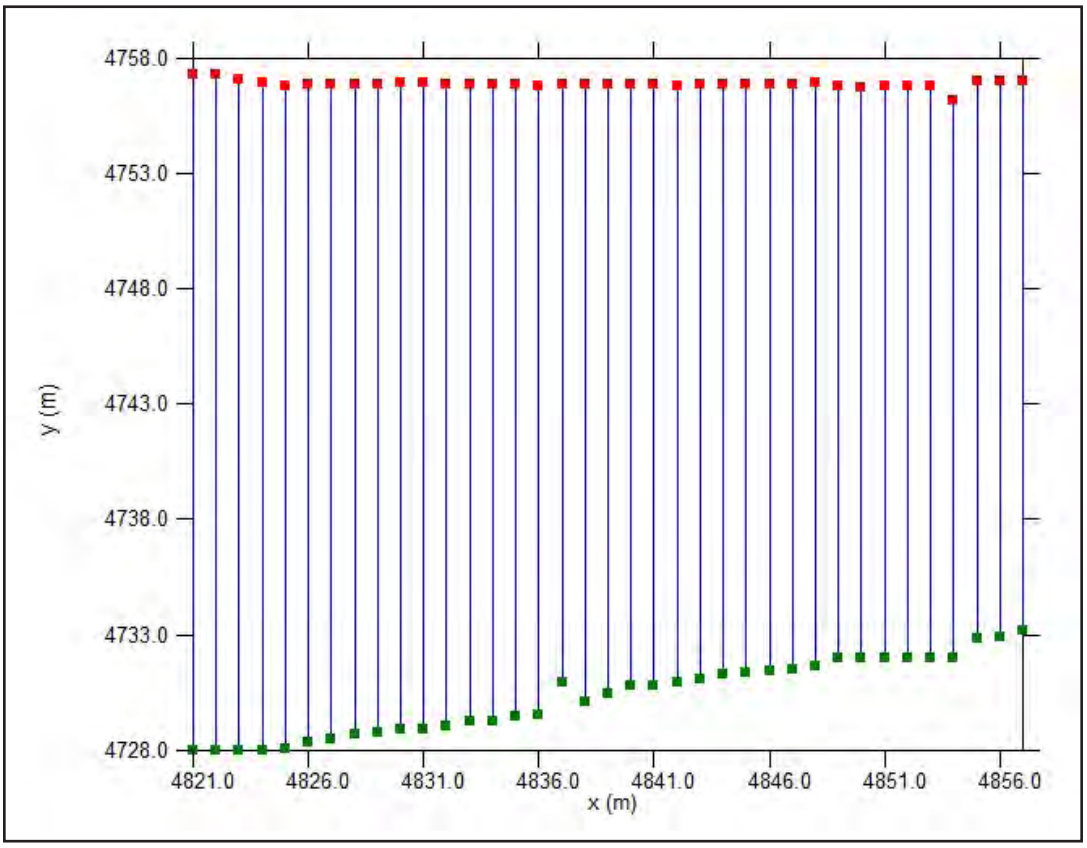

Figure 5.11. GPR Block 4 transect plot.

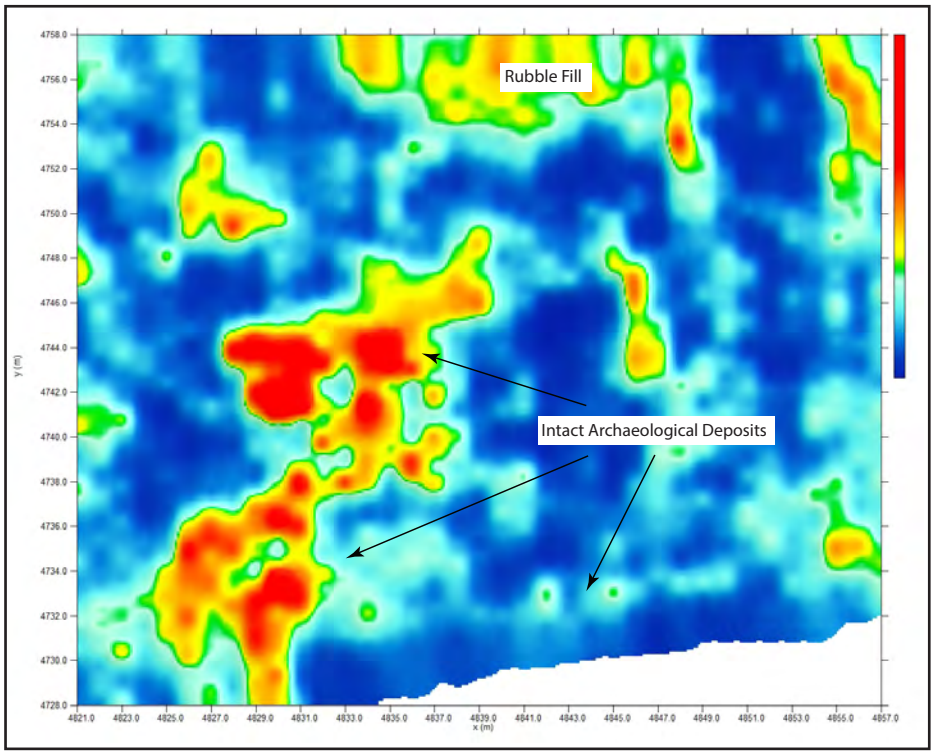

Figure 5.12. GPR Block 4, slice 9.

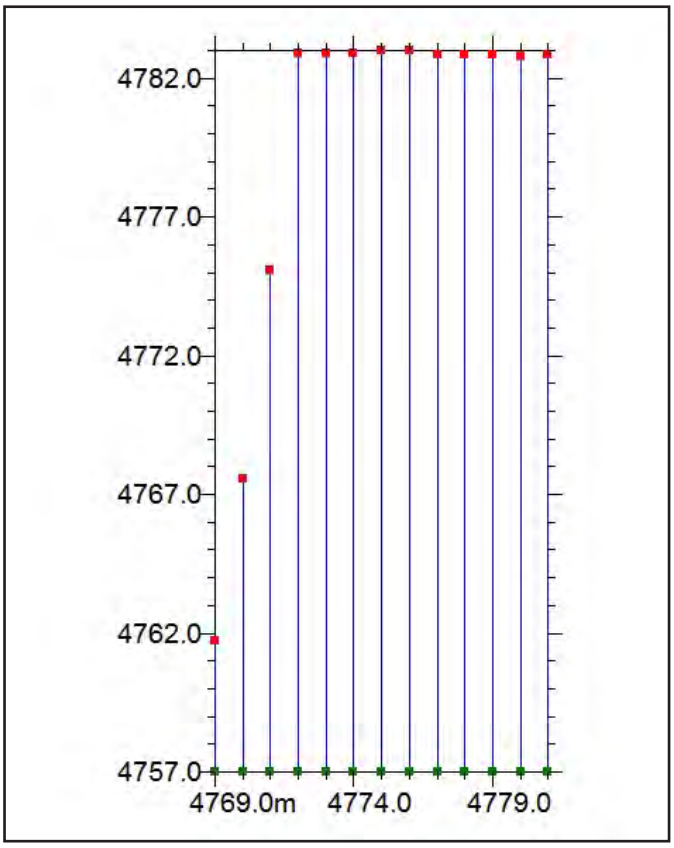

Figure 5.13. GPR Block 5 transect plot.

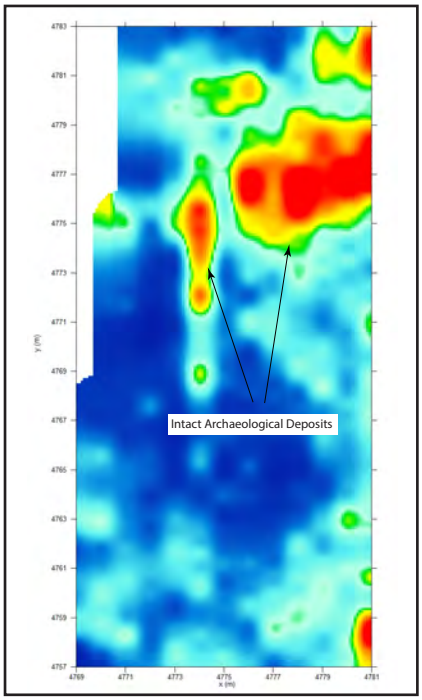

Figure 5.14. GPR Block 5, slice 9.

GPR Block 3-5 Summary

In addition to scattered intact archaeological deposits, the presence of intact archaeological deposits appears likely throughout portions of GPR Blocks 3-5 (Figure 5.15).

GPR Block 6-9

GPR Block 6

GPR Block 6 was a 38-x-50 m block located 40 m north of the Greer Stadium outer fence line (Figure 5.16). The block was oriented in a north-south direction. Thirty-nine profiles were obtained from GPR Block 6 for a total survey length of 1,955 meters (Figure 5.17). What appear to be cut and fill deposits dominate the southwestern corner and northern edge of GPR Block 6. Approximately three meters of cut and fill material were identified during the investigation of GPR Block 6, beneath which there exists the possibility of intact archaeological deposits (Figure 5.18).

GPR Block 7

GPR Block 7 was a 37.5-x-35 m block located 90 m north of the Greer Stadium outer fence line. The block was oriented in a north-south direction. Twenty-six profiles were obtained from GPR Block 7 for a total survey length of 903 meters (Figure 5.19). Cut and fill deposits appear likely along the block's eastern edge. Approximately three meters of secondary deposits, consisting of concrete demolition fill with large limestone boulders were identified during the investigation of GPR Block 7. Scattered intact archaeological deposits may persist beneath the demolition fill (Figure 5.20).

GPR Block 8

GPR Block 8 was a 5-x-50 m block located on the southwest portion of the baseball field. The block was oriented in a north-south direction. Six profiles were obtained from GPR Block 8 for a total survey length of 301 meters (Figure 5.21). GPR Block 8 consisted of wet clay, the composition of which was not conducive to the acquisition of usable GPR data. Consequently, no definitive evaluation can be made about the archaeological significance of this block (Figure 5.22).

GPR Block 9

GPR Block 9 was a 50-x-85 m block located 40 m north of the Greer Stadium outer fence line. The block was oriented in a north-south direction. Fifty-one profiles were obtained from GPR Block 9 for a total survey length of 3,886 meters (Figure 5.23).The northeastern and southern portions of GPR Block 9 were comprised of cut and fill deposits and may contain scattered intact archaeological deposits. The western portion of the block appears also to be primarily fill deposited over archaeological remains. GPR Block 9 is located along the edge of a slope, and there is a strong possibility of intact archaeological deposits in this area of the block (Figure 5.24).

GPR Block 6-9 Summary

GPR Blocks 6, 7, and 9 contain probable secondary or disturbed deposits that are the result of intensive landscape modification in the project area. However, intact archaeological deposits also seem likely throughout the northern portion of GPR Block 9 (Figure 5.25).

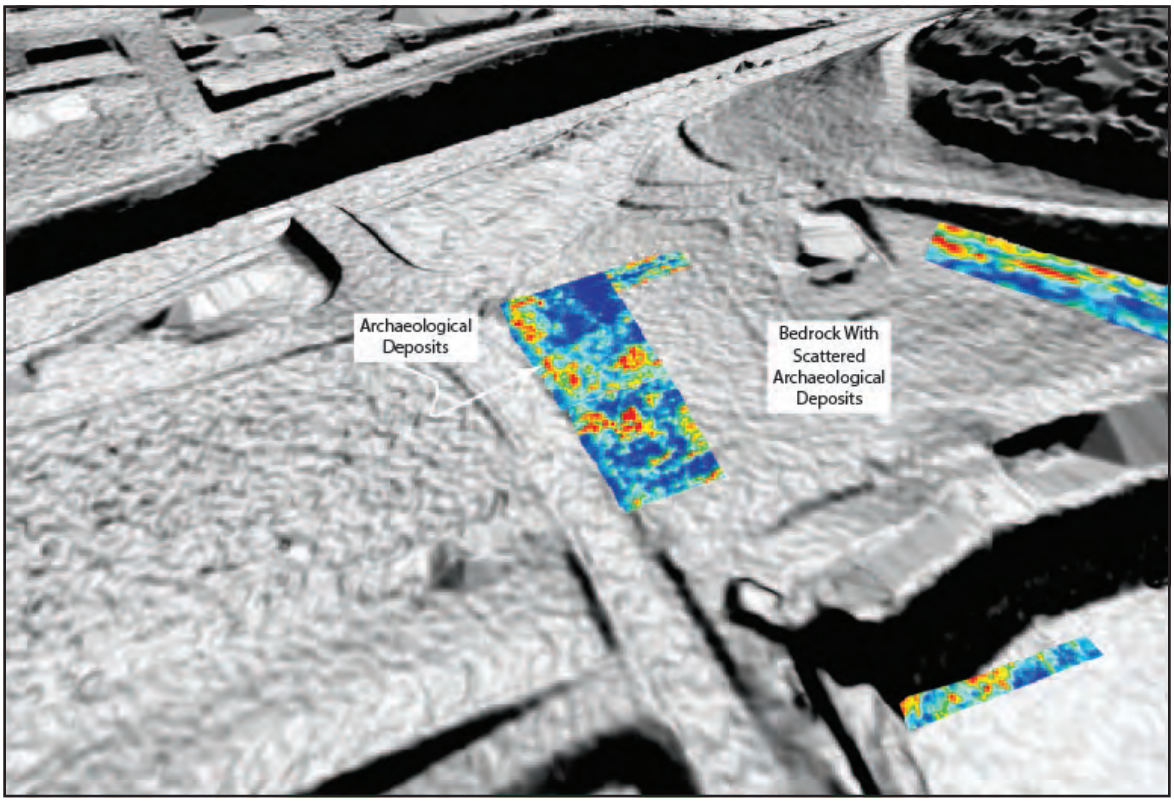

Figure 5.15. GPR Blocks 3-5 detail.

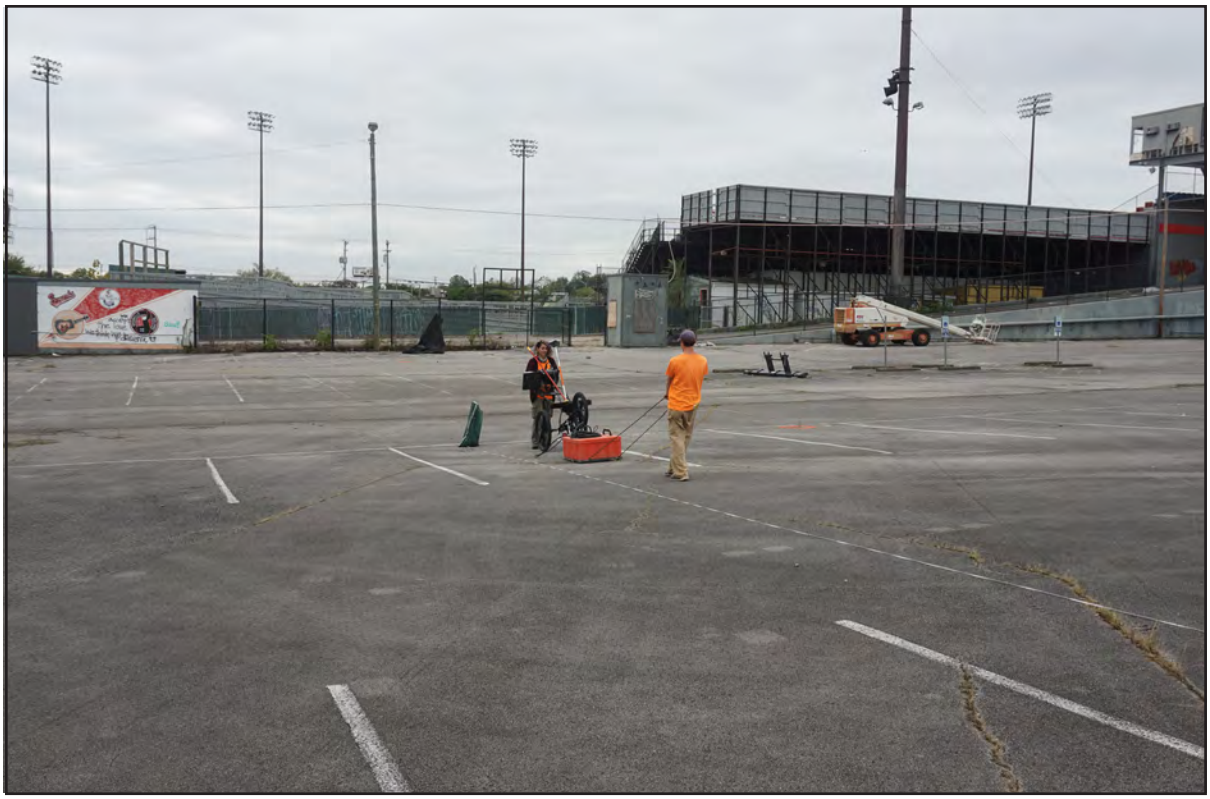

Figure 5.16. TVAR personnel surveying GPR Block 6.

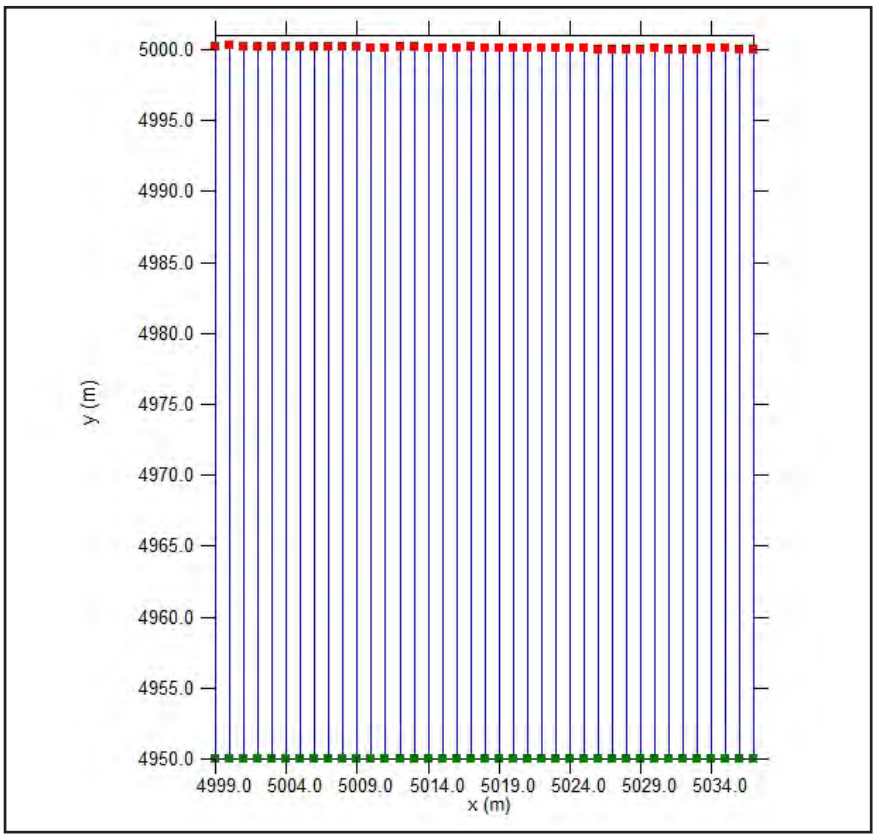

Figure 5.17. GPR Block 6 transect plot.

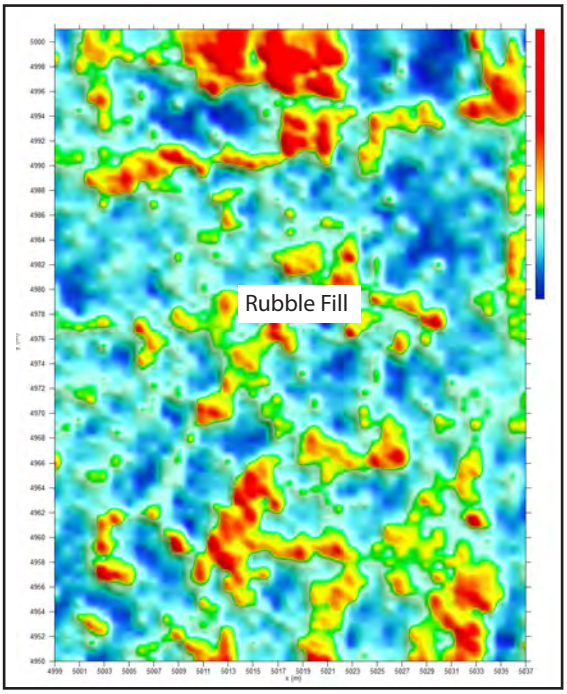

Figure 5.18. GPR Block 6, slice 9.

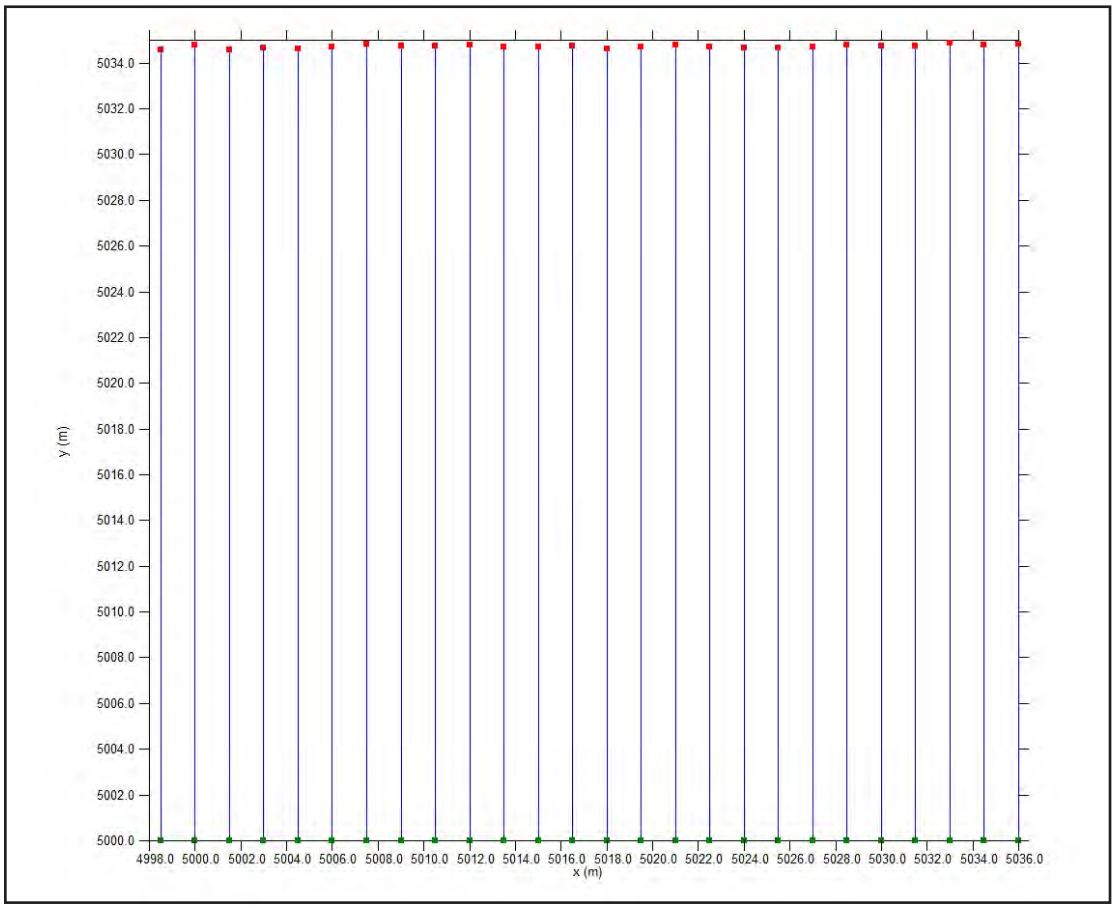

Figure 5.19. GPR Block 7 transect plot.

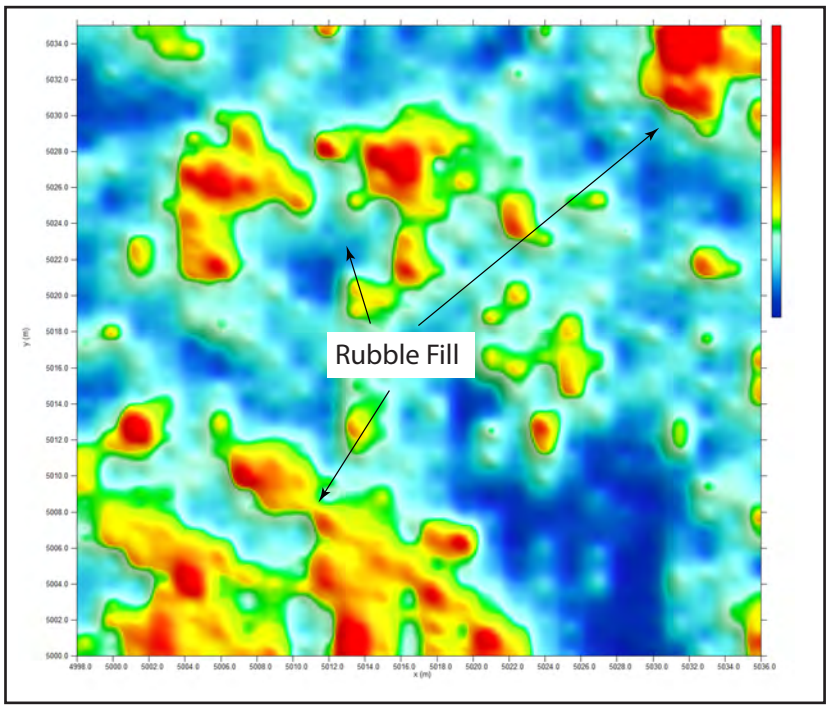

Figure 5.20. GPR Block 7, slice 9.

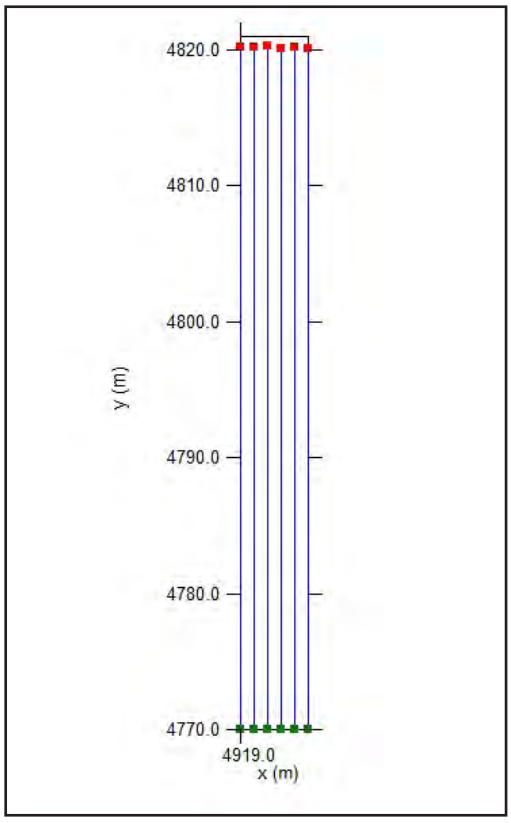

Figure 5.21. GPR Block 8 transect plot.

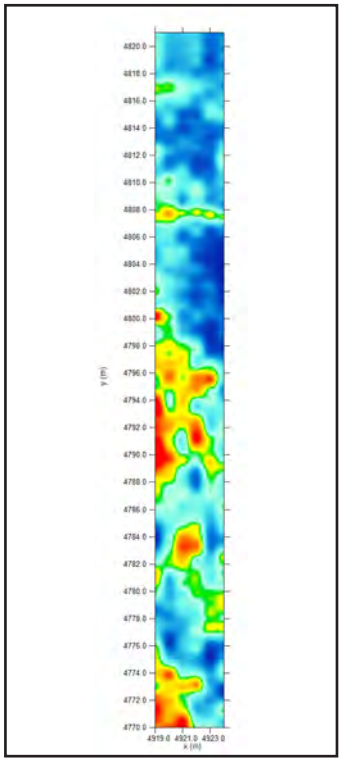

Figure 5.22. GPR Block 8, slice 9.

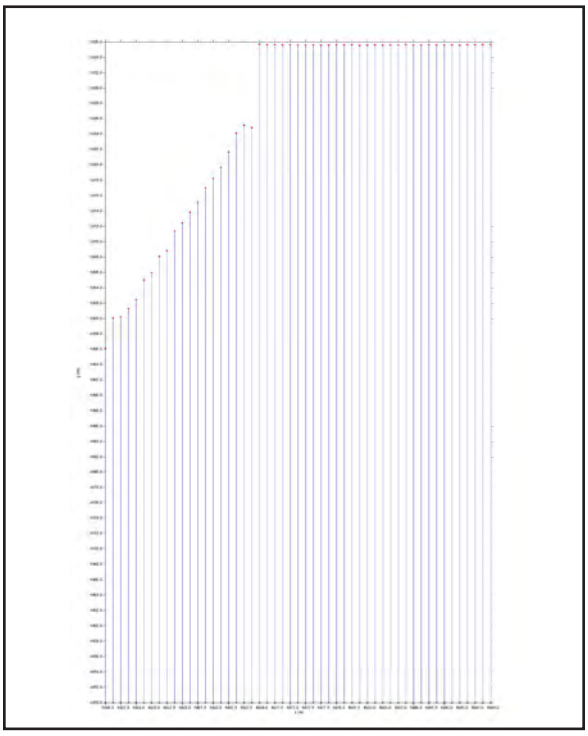

Figure 5.23. GPR Block 9 transect plot.

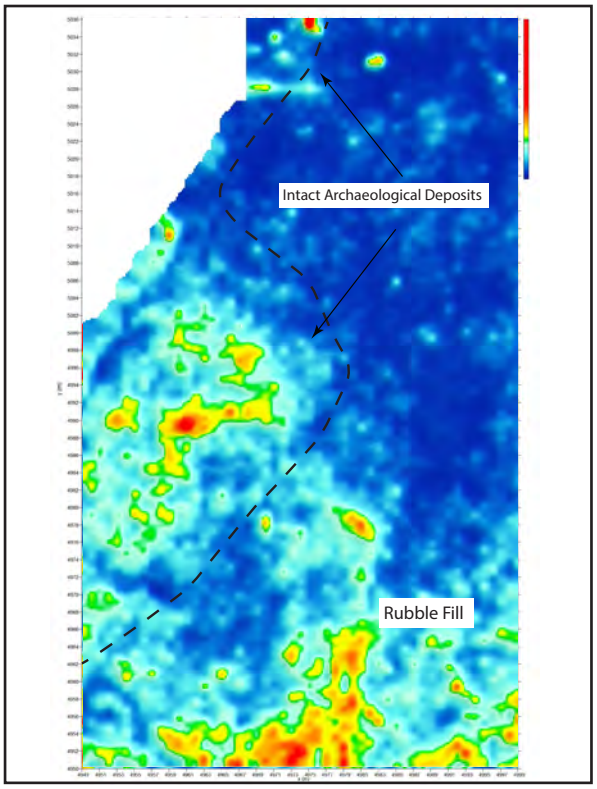

Figure 5.24. GPR Block 9, slice 9.

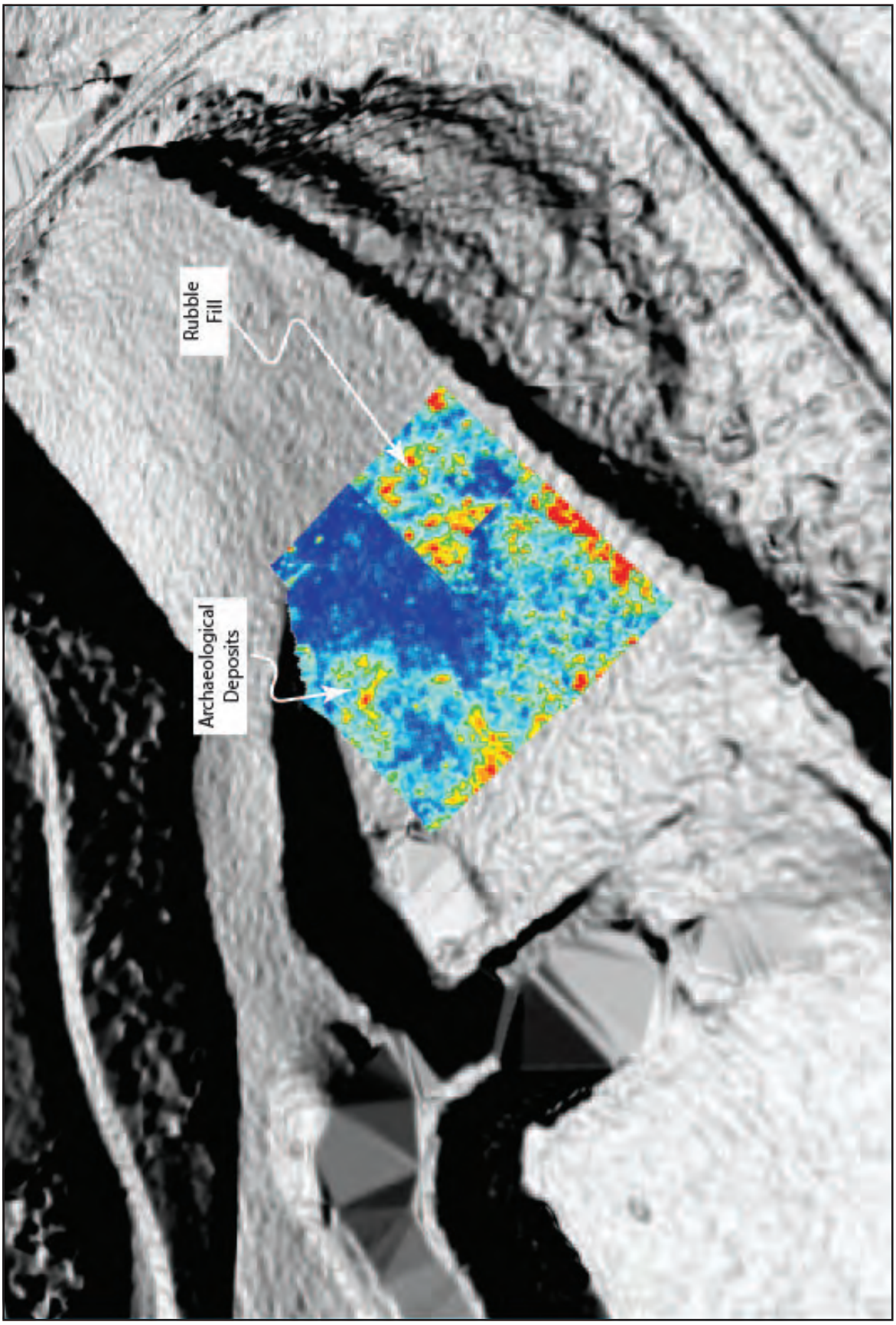

Figure 5.25. GPR Blocks 6, 7, and 9 detail.

GPR Block 10-11

GPR Block 10

GPR Block 10 was a 20-x-120 m block located just north of the Greer Stadium entrance, along the western slope extending downward from Fort Negley. The block was oriented in a north-south direction. Thirty-nine profiles were obtained from GPR Block 10 for a total survey length of 2811 meters (Figure 5.26). The eastern portion of GPR Block 10 contains an extensive amount of cut and fill material that almost certainly indicates abundant archaeological deposits. In contrast, the western portion of the block likely contains only scattered intact archaeological deposits (Figure 5.27). More detailed information about the composition and contents of this portion of the project area is discussed below in the section on trench excavation.

GPR Block 11

GPR Block 11 was an 18-x-113 m block northwest of the Greer Stadium entrance extending into the south parking lot area. The block was oriented in a north-south direction and, as with GPR Block 10, extends downward from Fort Negley. Twenty-one profiles were obtained from GPR Block 11 for a total survey length of 1,244 meters (Figure 5.28). Much of GPR Block 11 exhibited asphalt directly above the underlying bedrock. The potential for scattered intact archaeological deposits in this block appears likely (Figure 5.29). More precise information about the composition and contents of this portion of the project area is discussed below in the section on trench excavation.

GPR Block 10-11 Summary

Portions of GPR Block 10 likely contain extensive intact archaeological deposits, while scattered intact archaeological deposits in GPR Block 10 and GPR Block 11 appear probable (Figure 5.30).

GPR Transects

Eight transects were surveyed in the project area (see Figure 5.1). Four transects were surveyed in the north parking lot area, two along an ascending slope just north of Greer Stadium, one in the left field portion of the baseball field, and one on Southeast Road adjacent to the rear of the stadium (Table 5.3).

Gravel Lot Transects

Four transects were surveyed in the north parking lot area (Figure 5.1). Composed primarily of gravel underlain by bedrock, all four transects indicated extensive evidence of cutting, with some fill on both the southern and northern portions of Gravel Lot Transect 4 (Figure 5.31).

Hillside Transects

Two transects were surveyed on the slope descending southeast from Fort Negley (Figure 5.1). Extensive archaeological deposits, approximately 65-70 cm in thickness, likely overlay the bedrock foundation. Upon the bedrock itself , the presence of Civil War era deposits are probable and, on top of these, WPA-era deposits are likely (Figure 5.32).

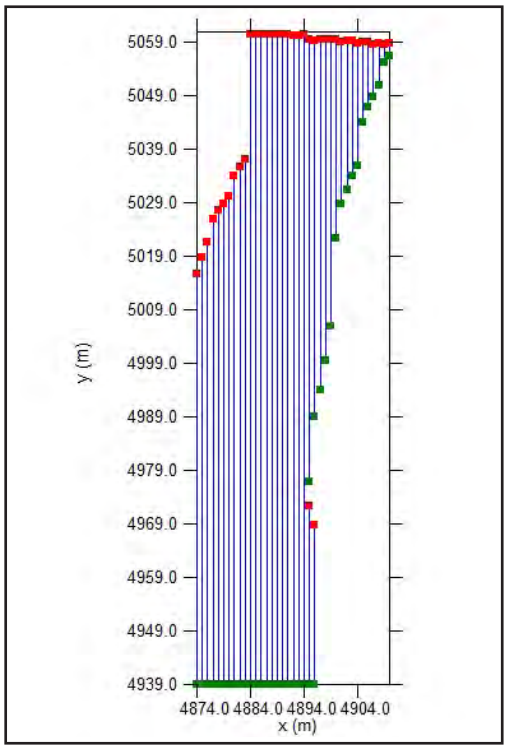

Figure 5.26. GPR Block 10 transect plot.

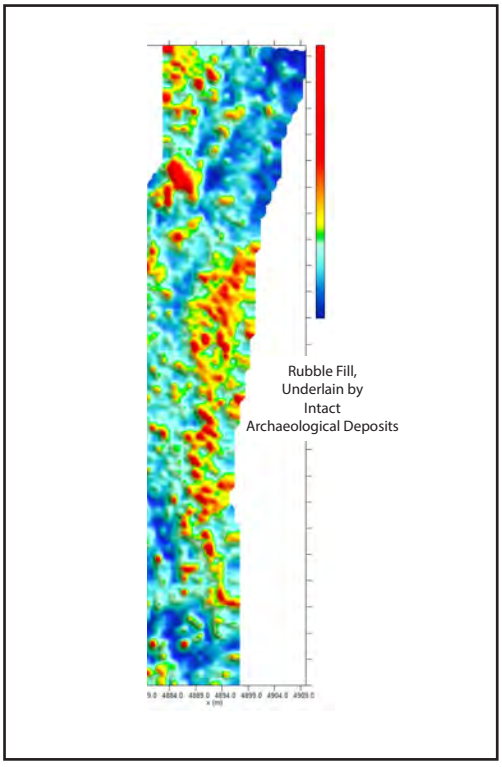

Figure 5.27. GPR Block 10, slice 7.

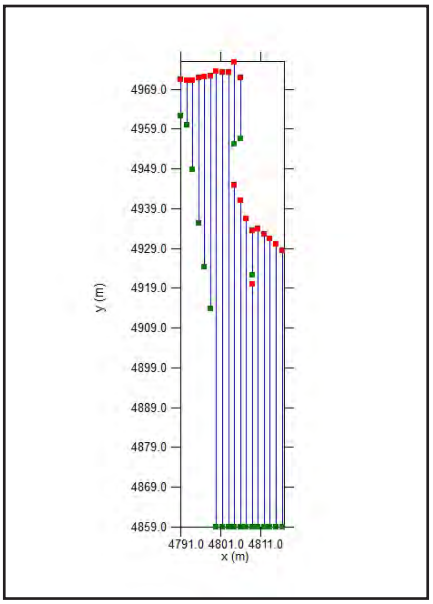

Figure 5.28. GPR Block 11 transect plot.

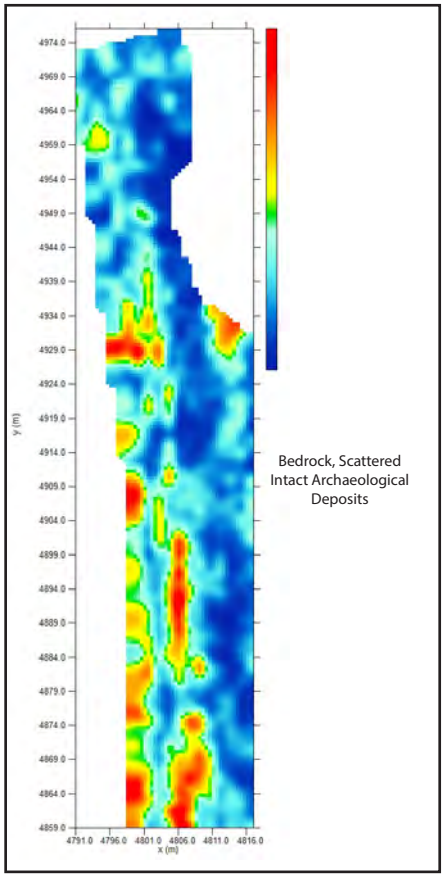

Figure 5.29. GPR Block 11, slice 9.

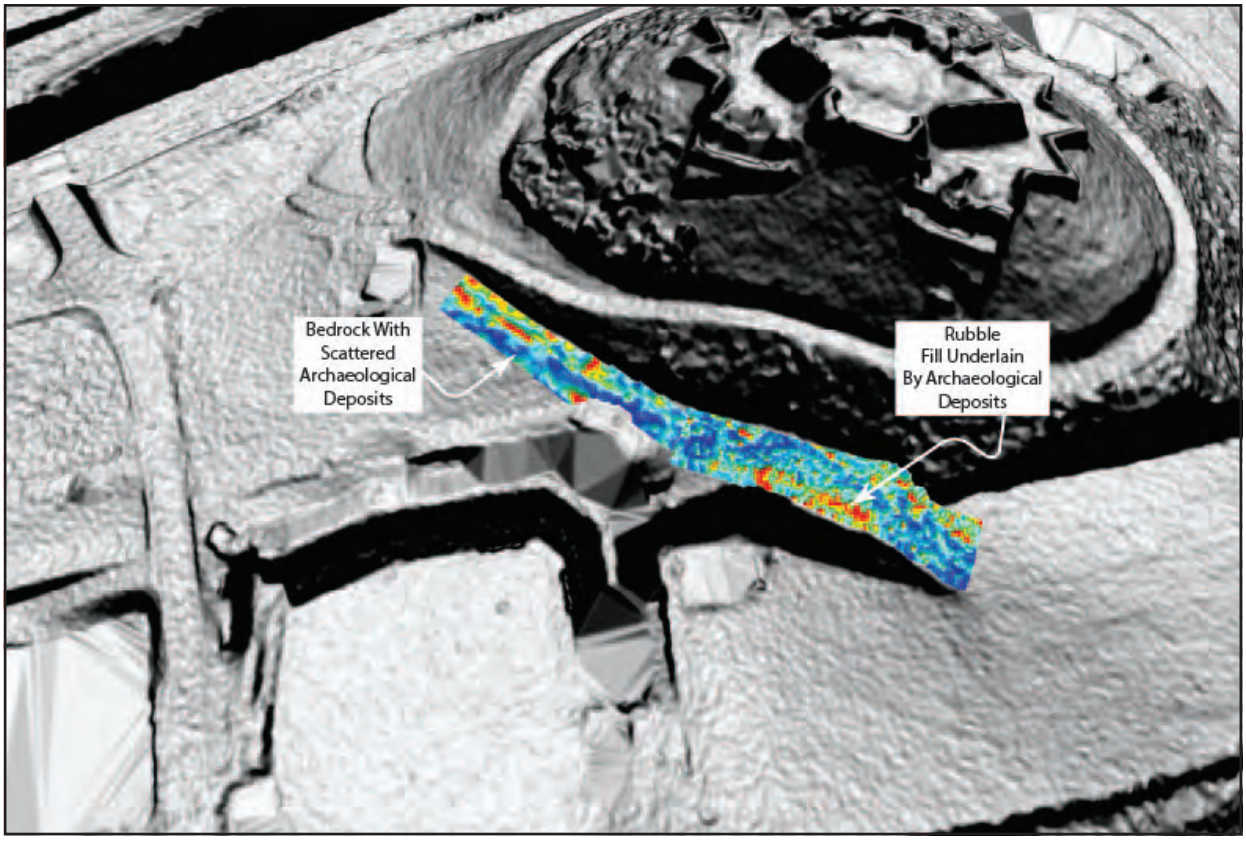

Figure 5.30. GPR Blocks 10-11 detail.

Table 5.3. GPR Transects Surveyed in the Project Area.

Transect	Size	Direction
North Gravel Lot 1	126.96 m	south-north
North Gravel Lot 2	126.01 m	south-north
North Gravel Lot 3	132.46 m	south-north
North Gravel Lot 4	118.25 m	south-north
Baseball Field	95.80 m	south-north
Southeast Road	125.88 m	south-north
Hillside 1	13.68 m	east-west
Hillside 2	8.40 m	east-west

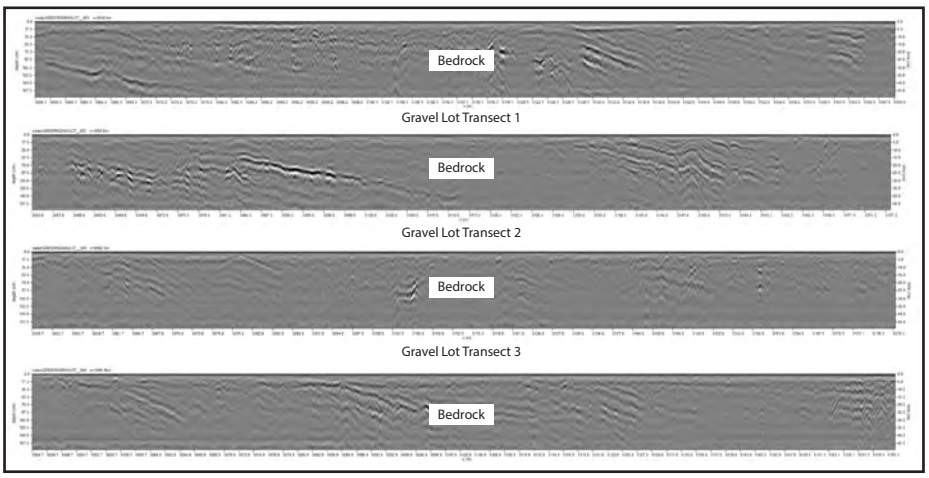

Figure 5.31. Radar slice of Gravel Lot transects.

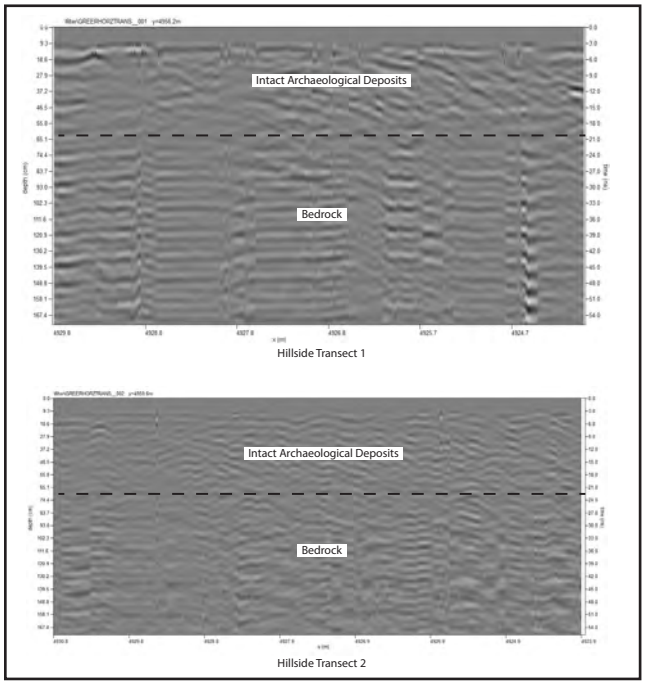

Figure 5.32. Radar slice of Hillside Transects.

Baseball Field Transect

One transect was surveyed on the baseball field in the left and centerfield portions of the stadium (Figures 5.1 and 5.33). The upper soil layer was an approximately 30 cm sand and clay mixture. Below this was a 60 cm layer of clay from the original construction of the ball field. Underlying this was approximately 80 cm of pre-WPA fill—likely a midden—that extended throughout the transect. A drainage pipe was also identified near the southern terminus of the transect (Figure 5.34).

Southeast Road Transect

Located adjacent to the rear of the stadium, the Southeast Road Transect progresses west from Chestnut Road (Figure 5.1). A slight slope or ramp appears to be fill associated with road construction. Fill also appears to be present along the last 50 meters of the northern end of the transect. The central portion of the transect likely contains archaeological deposits. The presence of scattered utilities throughout the transect also seems likely (Figure 5.35).

Trench Excavation

Eleven trenches were mechanically excavated in the project area. Nine trenches were excavated in the western portion of the project area, and two were dug in the eastern portion (Figure 5.36). Specimens of materials recovered during trench excavation are illustrated in Figures 5.37-5.38.

Figure 5.33. Outfield portion of baseball field.

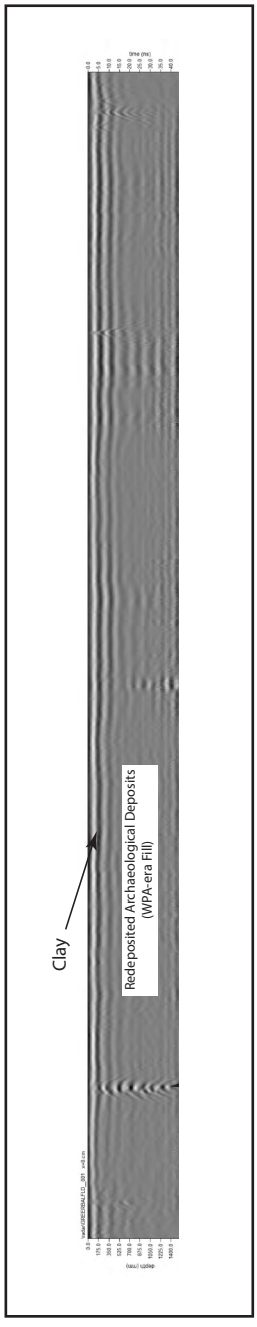

Figure 5.34. Radar slice of Baseball Field Transect.

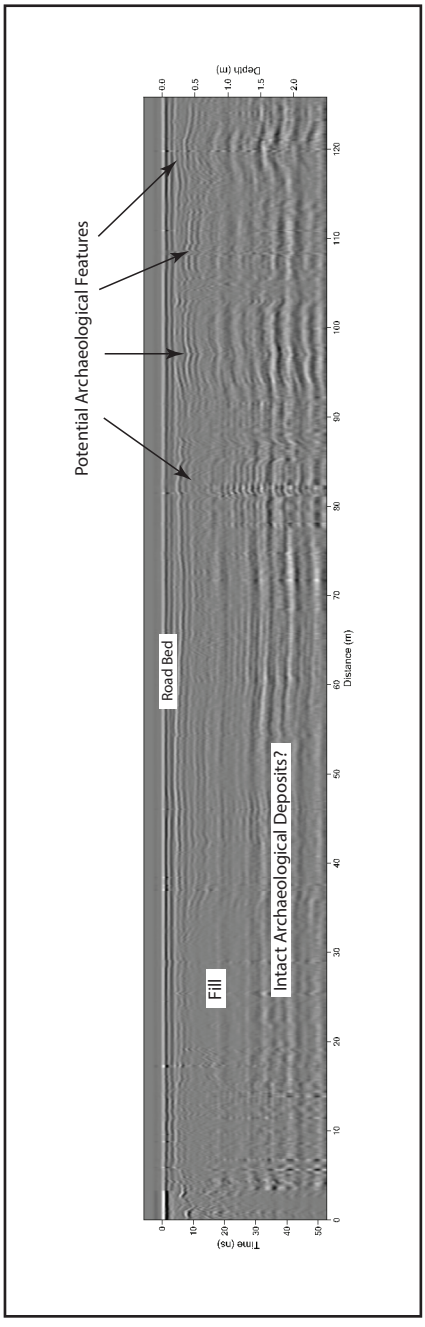

Figure 5.35. Radar slice of Southeast Road Transect.

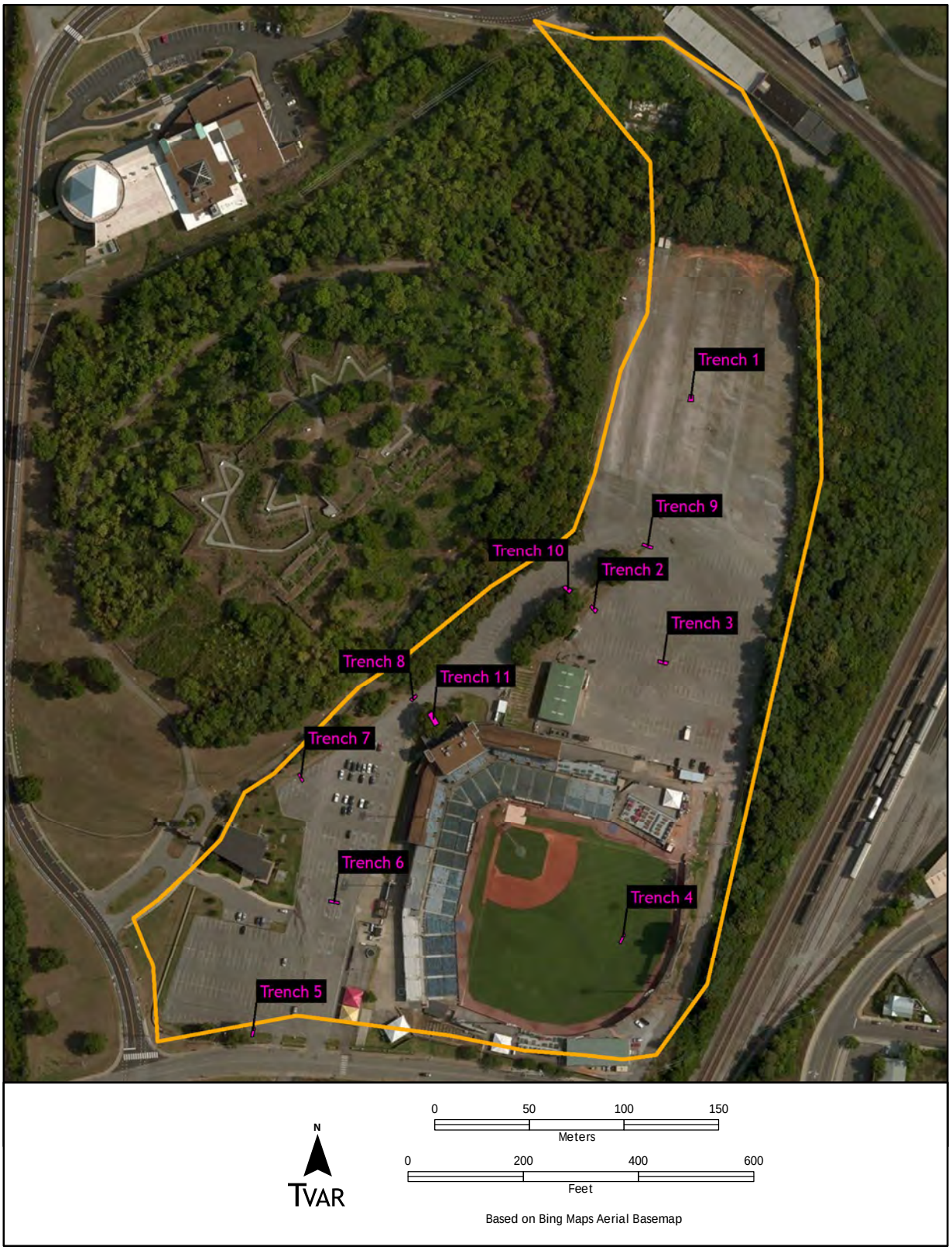

Figure 5.36. Map showing trench locations in survey area.

Figure 5.37. Artifacts recovered during trench excavation.

Figure 5.38. Glass artifacts recovered during trench excavation.

Trench 1

Trench 1 was a 4-x-2 m mechanically excavated unit that was oriented north to south. It was located in the northernmost parking lot of Greer Stadium between Gravel Lot Transects 2 and 3. The trench was excavated to a depth of 250 cmbs to determine whether intact deposits were present (Figure 5.39). Thick bedrock made up of decomposing limestone and identical to the exposed bluff located approximately 50 m west of Trench 1 persisted from below the surface gravel layer to the base of the trench. Due to the extreme depth of Trench 1, safety protocols limited TVAR personnel to surface observation of the trench. Identification of discrete strata and Munsell soil characteristics were not recorded. No significant archaeological deposits were observed during monitoring of Trench 1.

Trench 2

Trench 2 was a 5-x-2 m mechanically excavated unit that was oriented east to west. This trench was located in the lower parking lot of Greer Stadium just west of GPR Block 9 and northeast of the cut hillside where the remains of the WPA fort wall still stand. Trench 2 was excavated to a depth of 100 cmbs.

Six strata were exposed in Trench 2 (Figure 5.40). Stratum I consisted of asphalt. Stratum II was composed of coarse sand and gravel that was used to further level out the area for asphalt placement. Stratum III was primarily a cobble and medium-size gravel layer. Stratum IV was a dark brown clay fill. Stratum V was composed of a dark yellowish brown (10 YR 4/4) clay. Evidence of a buried ground surface was noted in this stratum. Stratum VI consisted of limestone bedrock. No visible archaeological deposits or features were observed in Trench 2.

Trench 3

Trench 3 was a 5.7-x-2 m mechanically excavated unit that was oriented east to west. Trench 3 was located in the southeastern portion of GPR Block 9 and is about 50 m east of the cut hillside where the remains of the WPA fort wall still stand. The trench was excavated to a depth of approximately 200 cmbs until limestone bedrock was encountered.

Five strata were exposed in Trench 3 (Figure 5.41). Stratum I consisted of asphalt. Stratum II was composed of coarse sand and gravel that was used to further level out the area for asphalt placement. Stratum III was a large fill layer that contained limestone blocks, reinforced concrete slabs, and a sandy clay soil. Stratum IV was a 1.6-2 m layer of black (10YR 2/1) clay with fine gravel. Due to the dark color of the soil, this layer may have been a natural ground surface, potentially a pre-WPA natural drainage. Stratum V was at the base of Trench 3 and was composed of limestone bedrock. No significant archaeological deposits were identified during monitoring of Trench 3.

Trench 4

Trench 4, a 6.3-x-1.2 m mechanically excavated unit, was oriented northeast to southwest. Located just west of the ball field transect, this trench is 40 m west of the easternmost wooden fence surrounding the ball field. Trench 4 was excavated to a depth of 220 cmbs to examine deeply buried deposits.

Four strata were exposed in Trench 4 (Figure 5.42). Stratum I consisted of a 0-30 cm fill layer of sand. Stratum II was a 31-70 cm layer of clay fill. Stratum III consisted of a 100 cm demolition fill

Figure 5.39. West profile of Trench 1.

Figure 5.40. West profile of Trench 2.

Figure 5.41. West profile of Trench 3.

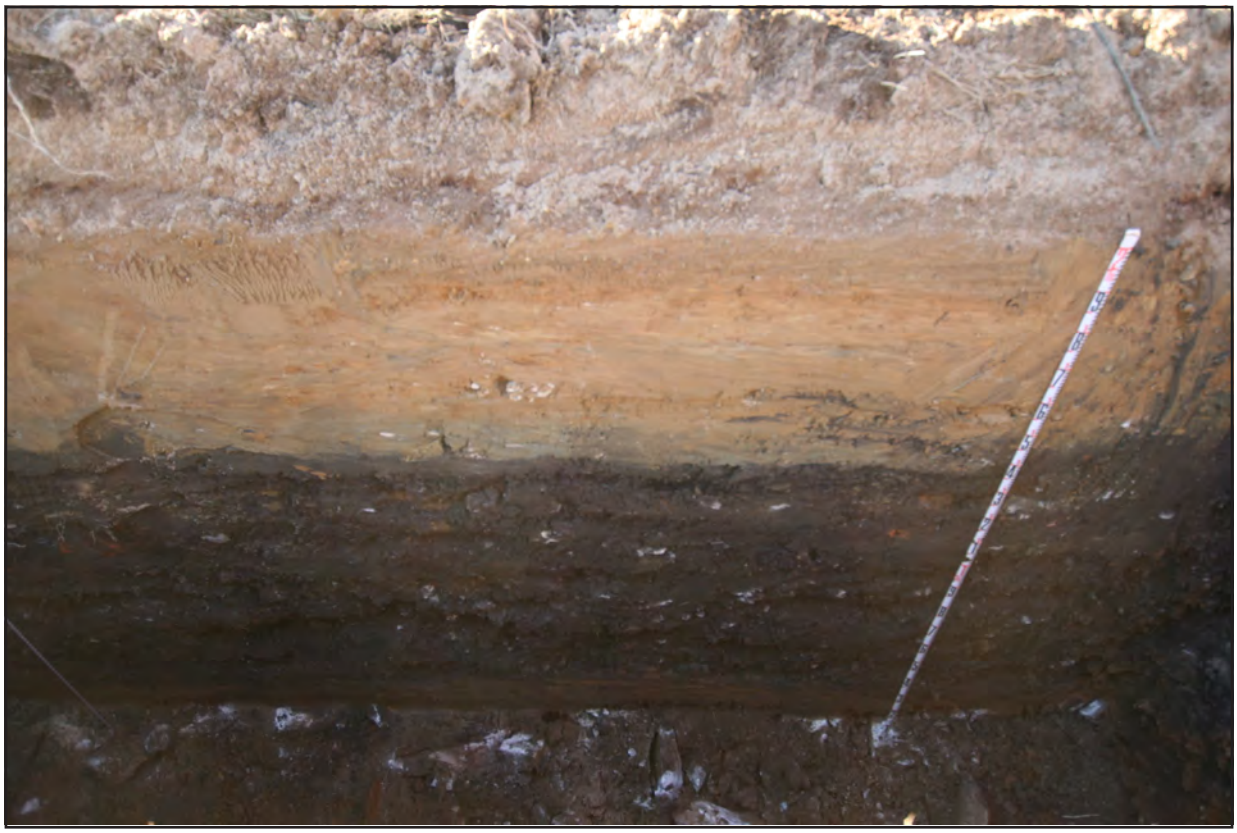

Figure 5.42. North profile of Trench 4.

layer of black (10YR 2/1) sandy clay with inclusions of fine gravel. Stratum III contained a large deposit of historic artifacts, including cosmetic jars, brick, milk glass, the torso of a female figurine, nail polish bottle, transfer print ceramic sherds, and a variety of colored and clear glass fragments. The chronology of the artifacts indicate that they may be associated with the 1930's WPA construction of this area. Stratum IV consisted of a 200-220 cm layer of dark yellowish brown (10YR 4/4) clay.

Trench 5

Trench 5 was a 5-x-1 m mechanically excavated unit oriented north to south. This trench is located in the southeastern corner of GPR Block 3, about 10 m from the southernmost fence of Greer Stadium. Trench 5 was excavated to a depth of 98 cmbs, at which point limestone bedrock was encountered. Investigation of Trench 5 provided ground-truth for results obtained from GPR Block 3.

Nine strata were exposed in Trench 5 (Figure 5.43). Stratum I consisted of a 0-6 cm layer of asphalt. Stratum II was composed of a light brownish gray (10YR6/2) coarse sand mixed with gravel. Stratum III was an 18-58 cm layer of very dark brown (10YR 2/2) sand. This stratum is a primary demolition fill layer layer that contained fragments of brick, glass, whiteware, and small to medium sized mammal bones. Stratum IV consisted of a 59-64 cm layer of black (10YR 2/1) sandy loam. Several flat limestone slabs were discovered at the top of this stratum. Stratum V was composed of a 65-70 cm layer of very dark brown (10 YR 2/2) sand interspersed with gravel. Stratum VI consisted of a 70-72 cm layer of black (10YR 2/1) sand. Stratum VII was a 73-90 cm fill layer of dark grayish brown

Figure 5.43. West profile of Trench 5.

(10YR 4/2) sand. Stratum VIII was composed of a 91-98 cm layer of dark yellowish brown (10YR 4/4) clay subsoil. Stratum IX, at the base of Trench 5, was limestone bedrock.

Trench 6

Trench 6 was a 6-x-1 m mechanically excavated unit oriented east to west. This trench was located in the parking lot east of the Fort Negley Park Visitors Center and west of the Greer Stadium box office building. Trench 6 was positioned approximately 50 m north of GPR Block 4 and 45 m south of GPR Block 11. Trench 6 was excavated to a depth of 56 cmbs in order to further investigate the presence of intact deposits in the vicinity of GPR Blocks 4 and 11.

Excavations of Trench 6 revealed four strata (Figure 5.44). Stratum I consisted of a 0-6 cm layer of asphalt. Stratum II was composed of a light brownish gray (10YR 6/2) coarse sand with gravel inclusions. Stratum III consisted of a 7-15 cm layer of dark yellowish brown (10YR 4/4) sandy clay subsoil. Stratum IV was composed of limestone bedrock, at which point further excavation of Trench 6 was terminated. No significant archaeological deposits or features were identified during monitoring of Trench 6.

Trench 7

Trench 7 is a 4.7-x-1 m mechanically excavated unit oriented north to south. This trench is located in GPR Block 11 and is approximately 10 m from the northwestern fence separating Fort Negley from Greer Stadium. Trench 7 was excavated to a depth of 30 cmbs.

Three strata were exposed in Trench 7 (Figure 5.45). Stratum I consisted of a 0-13 cm layer of asphalt. Stratum II was composed of a 14-30 cm layer of light brownish gray (10YR 4/4) coarse sand with gravel fill. Stratum III was limestone bedrock that prevented any further excavation. No archaeological deposits or features were observed in Trench 7.

Trench 8

Trench 8 was a 4.3-x-1.2 m mechanically excavated unit located adjacent to GPR Block 11, between the Greer Stadium office and the northwest Fort Negley fence. The trench is oriented north to south. Trench 8 was excavated to a depth of 28 cmbs.

Four strata were exposed in Trench 8 (Figure 5.46). Stratum I consisted of asphalt. Stratum II was composed of a light brownish gray (10YR 6/2) coarse sandy gravel. Stratum III was a light brownish gray (10YR 4/4) coarse sand mixed with gravel. Stratum IV was comprised of limestone bedrock. No significant archaeological deposits or features were observed in Trench 8.

Trench 9

Trench 9 was a 5-x-1.2 m mechanically excavated unit oriented east to west. Located in the extreme northern portion of GPR Block 9, Trench 9 was situated on the crest of a gradual slope in the lower parking lot. Trench 9 was excavated to a depth of 150 cmbs. Investigation of Trench 9 provided ground-truth for results obtained from GPR Block 9.

Seven strata were exposed in Trench 9 (Figure 5.47). Excavations revealed part of the WPA fort wall that was buried during construction of Greer Stadium. Stratum I consisted of a 0-6 cm layer

Figure 5.44. West profile of Trench 6.

Figure 5.45. West profile of Trench 7.

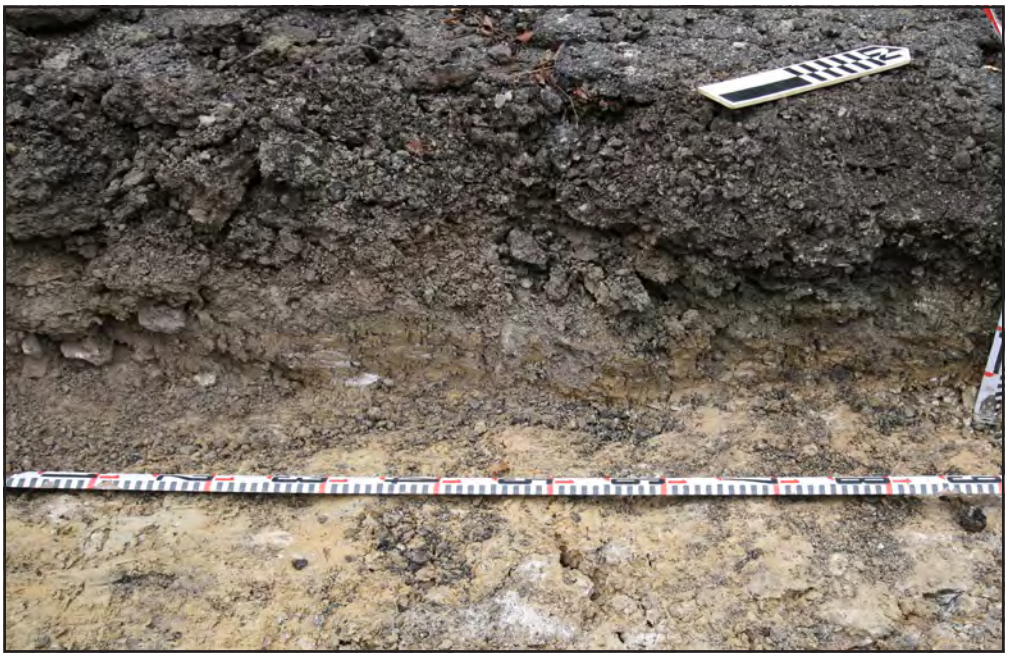

Figure 5.46. West profile of Trench 8.

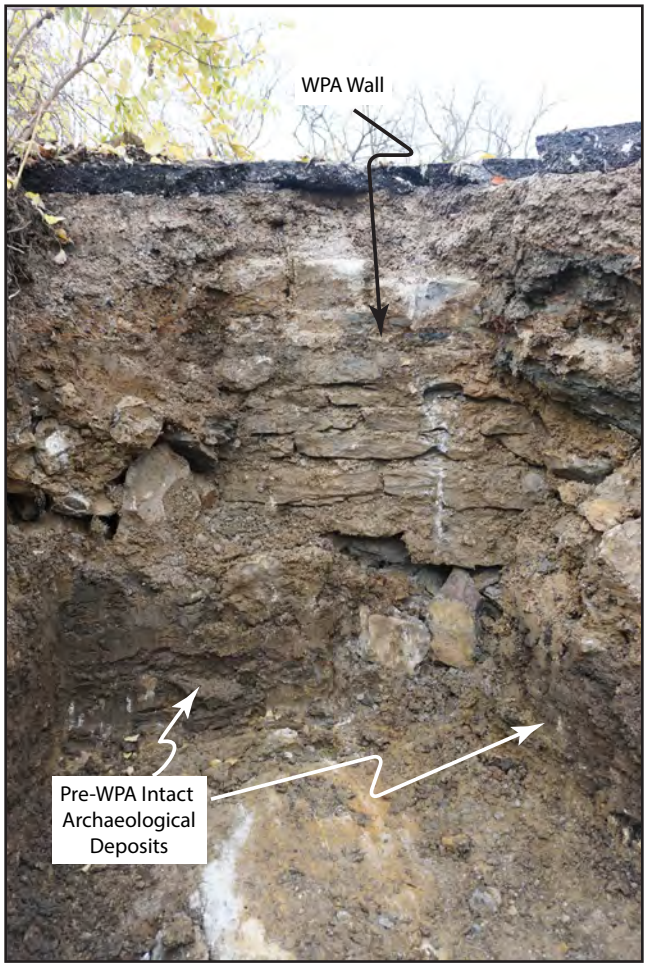

Figure 5.47. West profile of Trench 9.

of asphalt. Stratum II was composed of a light brownish gray (10YR 6/2) coarse sand with gravel fill, which was used to further level out the area for asphalt placement. Stratum III consisted of a 24-57 cm layer of black (5Y 2.5/1) clay fill. Stratum IV was a 58-102 cm dark yellowish brown (10YR 4/4) clay and medium-size limestone rock fill layer. Stratum V consisted of a 103-133 cm layer of very dark brown (10YR 2/2) clay loam. Stratum VI was composed of a 134-150 cm layer of olive brown (2.5Y 4/4) clay subsoil. Stratum VII was comprised of limestone bedrock that prevented any further excavation. Several historic artifacts were found within the intact archaeological layers of Trench 9, including fragments of clear glass, amber glass, brick, and whiteware. Upon further investigation of the western trench wall, the remains of the WPA fort wall were discovered. The wall is situated 29 cm below the surface and ends at 113 cmbs on top of and slightly into Stratum V. This wall clearly intrudes into the lower deposits, therefore; those deposits must predate the WPA park construction.

Trench 10

Trench 10 was a 5.7-x-1.6 m mechanically excavated unit oriented north to south. The trench is located along the eastern edge of GPR Block 10 where the remains of the WPA wall are exposed. Trench 10 was excavated to a depth of 235 cmbs to further investigate intact deposits in this area and to ground-truth results obtained from GPR Block 10.

Five strata were exposed in Trench 10 (Figure 5.48). Stratum I consisted of a 0-5 cm layer of asphalt. Stratum II is a 6-14 cm layer of light brownish gray (10YR 6/2) coarse sand with gravel

Figure 5.48. South profile of Trench 10.

inclusions. Stratum III is a large fill layer extending from 15-174 cmbs; it contains massive limestone blocks, cobbles, and is composed of dark grayish brown (10YR 4/2) clay loam. Stratum IV consisted of a 175-210 cm fill layer of dark yellowish brown (10YR 4/6) clay interspersed with cobbles. Stratum V was a 211-235 cm layer of dark yellowish brown (10YR 3/6) clay. Stratum V contains what appears to be an intact ground surface. A burn layer was also observed on the surface of Stratum V. Historic artifacts recovered from Stratum V included specimens of clear glass, orange slag glass, milk glass, brick, and ferrous metal. This trench clearly demonstrates the presence of intact archaeological deposits below the extensive fill.

Trench 11

Trench 11, oriented north to south, was a 7.4-x-3 m mechanically excavated unit located along the northeastern edge of GPR Block 11 directly in front of the Greer Stadium office. Investigation of Trench 11 provided ground-truth for results obtained in GPR Block 11. Trench 11 extended to a depth of 70 cmbs, at which point a limestone foundation prevented further excavation (Figure 5.49). The originally associated structure can be seen from an aerial photograph that dates to at least the 1940s (Figure 5.50).

Excavations of Trench 11 revealed four strata, all of which are different fill layers (Figure 5.51). Stratum I consisted of a 0-31 cm layer of very dark brown (10YR 2/2) silty clay loam. Stratum II was

Figure 5.49. Limestone foundation in Trench 11.

Figure 5.50. Aerial photograph of building associated with limestone foundation in Trench 11.

Figure 5.51. East profile of Trench 11.

a 32-50 cm layer of dark brown (10YR 3/3) clay with gravel inclusions. Stratum III was composed of a 51-61 cm layer of dark yellowish brown (10YR 4/6) clay. Stratum IV consisted of a 62-70 cm layer of dark gray (10YR 4/1) clay interspersed with gravel and small cobbles. Historic artifacts found within Stratum IV included tile and ceramic fragments, as well as fragments of ferrous metal pipe.

Shovel Testing

The Phase I survey consisted of systematic shovel testing and surface inspection as the basis for the identification and delineation of archaeological resources. Shovel test locations were conducted at 20 m intervals within the archaeological APE (Figure 5.1). Shovel tests were 30-x-30 cm square units and excavated until impenetrable substrate was encountered. Test soils were passed through 1/4-inch hardware mesh screen to recover cultural materials. Artifacts recovered in the screen were bagged and labeled by provenience, including a shovel test number and a temporary site number.

All shovel test locations investigated during the survey were recorded using a field computer (Topcon GRS-1) equipped with a global positioning system (GPS) receiver with sub-meter precision and specialized data-capturing software. The combination of hardware and software provided for realtime data acquisition and visualization while furnishing important information to the field crews, including environmental features and survey boundaries. Using software developed by TVAR, detailed information, such as soil descriptions, landscape features, and photographic information, was recorded at the time of observation and linked via geographic coordinates.

Results of the Survey

A total of 16 shovel tests were excavated during TVAR's survey of the APE, one of which tested positive for cultural materials. Nine shovel tests were executed east of GPR Block 11 directly adjacent to the Fort Negely Park fence line.Tests in this area were terminated due to impenetrable bedrock from 6 to 31 cmbs. Shovel Test 5 produced a dark grayish brown (10YR 4/2) silty clay loam. Modern trash was observed on the surface throughout the area, but there were no positive tests. Seven shovel tests were excavated southeast of Block 10. Shovel Test 10 yielded a cobalt glass specimen and two small brick fragments. The soil in this area was also a dark grayish brown (10YR 4/2) silty clay loam. The other six shovel tests near Block 10 produced no cultural materials and were terminated from 5 to 15 cmbs due to impenetrable bedrock.

Conclusions

The primary objective of TVAR's investigations was to identify undisturbed buried surfaces and evaluate the amount and extent of past construction disturbances in the project area. The presence of undisturbed ground surfaces was crucial for identifying locations that might contain human burials or other features related to historic activities in the project area. In order to determine the presence of intact archaeological deposits, TVAR implemented multiple investigative field techniques, including a GPR survey, trench excavation, and shovel testing.

TVAR's investigations included 11 GPR blocks, eight individual GPR transects, 11 backhoe trenches, 16 shovel tests, and limited mapping of surface features. In combination, these techniques

allowed for a comprehensive overview of the project area. The survey determined that the project area is a palimpsest of land alterations, including large-scale cutting and filling, demolition, construction, and burial of intact archaeological deposits. Details of these operations can be found in preceding chapters.

This survey revealed that despite multiple major land alteration projects over the centuries (Fort Negley, WPA park, Herschel Greer Stadium), there remain areas where intact archaeological (human-created) deposits still exist—particularly deposits that predate the WPA park construction efforts. Some of these intact deposits are buried under substantial overburden of asphalt and rubble/boulder fill. In a few areas, the deposits are immediately below the surface. A natural drainage was detected in the north parking lot, and indications of buried utilities were observed in portions of the project area.

The majority of the buried intact archaeological deposits are located in the southwestern quarter of the project area. There is additionally a narrow strip of intact deposits found along the southern perimeter of the project area, paralleling Chestnut Street. Finally, there are likely to be intact deposits along the eastern edge of the project area, under the eastern road and buried under substantial fill along the entire eastern edge. In addition, there are substantial significant intact archaeological deposits encircling the project area on the east, north, and west sides.

The northern portion of the project area (the gravel parking lot) has been quarried for limestone, and with the exception of the eastern edge, where deep fill covers intact archaeological deposits, does not contain any deposits of archaeological significance. The parking lot immediately north of the baseball stadium is unlikely to include deposits of archaeological concern. The ballfield itself represents substantial fill over intact deposits. Unless the fill is removed from these areas, there is low risk of the disturbance of intact archaeological deposits.

CHAPTER 6. MATERIALS RECOVERED

Field notes, maps, artifacts, photos, and pertinent records generated during the recovery and evaluation program were transported to TVAR's laboratory in Huntsville, Alabama. At the laboratory facilities, artifacts and other associated materials recovered during the investigations were thoroughly washed and allowed to air dry. Provenience information was verified for accuracy at this stage, and all materials were accounted for by a physical inventory. All items were assigned unique catalog numbers and placed in 4 mil polypropylene resealable bags. Prior to entering the material data into a relational database, a final check of provenience was performed. The data were then entered into the database, and both query-driven and physical data checks were used to verify the accuracy of the entries. All material collected, as well as digital and handwritten records generated during the project, will be curated at repository facilities maintained by the Tennessee Division of Archaeology (TDOA). Materials collected during the investigations at 40DV189 are summarized below.

Whiteware

Whiteware is a refined earthenware that is white to off-white in color with a compact, hard paste and clear glaze (Brown 1982). Whiteware began evolving from pearlware around 1820 and continues to be manufactured today (Noël Hume 1969). Site 40DV189 yielded three small undecorated whiteware vessel fragments.

Ironstone

Ironstone, also known as white granite, is a semivitreous white-bodied refined earthenware with a hard paste and thick glass-like glaze (Brown 1982; Florida Museum of Natural History 2017; Miller 1991). This type of ceramic was manufactured in England as early as 1813 and was being imported into the United States by the 1840s (Miller 1991). Ironstone commonly occurs as an undecorated utilitarian ware from 1840 until 1930 and became the dominant type used in the United States from the 1850s until the end of the nineteenth century (Florida Museum of Natural History 2017; Majewski and O'Brien 1987; Miller 1991; Noël Hume 1969). Three ironstone specimens were recovered from 40DV189, one of which is an undecorated fragment too small to discern a vessel type. The remaining ironstone fragments display relief-molded designs. One of the molded specimens is a plate fragment with a scalloped rim, and the other is too small to determine the vessel type.

Fiesta Ware

In this report, "fiesta ware" refers to refined white-bodied earthenware glazed with bright, solid colors. Fiesta ware takes its name from wares produced by the Homer Laughlin China Company. The Fiesta line produced 14 colors of Fiesta ware between its inception in 1936 and 1972 (Moran 2004). No Fiesta ware was produced from 1973 to 1985, due to falling sales (Fiesta 2016). However, the Fiesta line was reintroduced in 1986 and is still being produced today. This report uses the term

Figure 6.1. Fiesta ware.

"fiesta ware" for wares similar to the Fiesta line, since it cannot be definitely ascertained whether a sherd was made specifically by Homer Laughlin. One red Fiesta ware fragment was recovered from site 40DV189 (Figure 6.1).

Porcelain

Porcelain is generally considered a fine ware and is a very hard, compact, and vitreous ceramic that is white to bluish-white in color (Brown 1982; Florida Museum of Natural History 2017). Chinese porcelains came to America through trade with India in the second half of the eighteenth century, although some porcelain specimens have been found in pre-1650 contexts (Noël Hume 1969). Successful production of American porcelains began around 1825 and production continues today, both in the United States and abroad (Brown 1982). Site 40DV189 yielded 11 porcelain specimens. Five of these examples are vessel fragments. Two of the porcelain vessel fragments are undecorated, one of which is an undifferentiated specimen too small to discern a vessel type. The remaining undecorated porcelain vessel specimen is a bowl fragment with "JAPAN" imprinted into the base and a partial maker mark that reads, "MADE...JA...". This specimen was likely produced sometime between 1921 and 1944, or after 1952. Prior to 1921, the Japanese name "Nippon" was used to mark ceramics produced in Japan. The words "Made in Occupied Japan" were used from 1945 to 1952 when Allied nations occupied the country after World War II. After 1952, Japanese ceramics were once again marked with the word "Japan" (Kovel and Kovel 1986).

Figure 6.2. Decorated porcelain: (a-b) transfer print; (b) decal print.

Two of the porcelain specimens are transfer printed. Transfer printing is a decoration method wherein a paper impression was taken off an inked copperplate engraving and transferred to the surface of the ceramic. This process began in England in the 1750s on tin-glazed earthenware and porcelain and later was produced on refined earthenwares (Noël Hume 1969:128). The transfer printing method did not arrive in America until after the War of 1812 (Samford 1997). Before the 1830s, blue was the predominant color used in transfer prints. As glazes and production techniques began to improve, other transfer print colors began to emerge-first black, then others such as purple, pink, red, green, or brown. Notably, green, red, and purple transfer prints were introduced in 1829 (Florida Museum of Natural History 2017). One of the recovered transfer-printed porcelain fragments displays a blue floral design (Figure 6.2a). The other transfer-printed specimen is a plate fragment exhibiting polychrome transfer-printed interior and molded exterior surfaces (Figure 6.2b).

One of the porcelain vessel fragments has a polychrome decal print decoration in a floral design (Figure 6.2b). Decal designs consist of a series of raised dots transferred to a ceramic vessel body from a film or paper backing. This transfer can be done either before or after glazing and firing but is typically done before. Decal decorations are commonly polychrome and can be differentiated from transfer prints by their use of shading and bright, natural colors. There is also a slight relief to decal prints that can be felt or seen in the light. This method of ceramic decoration was first used in Europe in the 1830s but was not common until the late 1870s and primarily appeared on European ceramics before 1900. Decal decorations superseded underglaze printing (like transfer-printed ceramics) in popularity by ca. 1910, and the decal printing technique is still used today (Samford and Miller 2012).

The remaining six porcelain fragments are plumbing fixture specimens. One of these is a faucet handle fragment with the word “COLD” hand-painted in black on it. The five remaining porcelain specimens are plumbing fixture fragments.

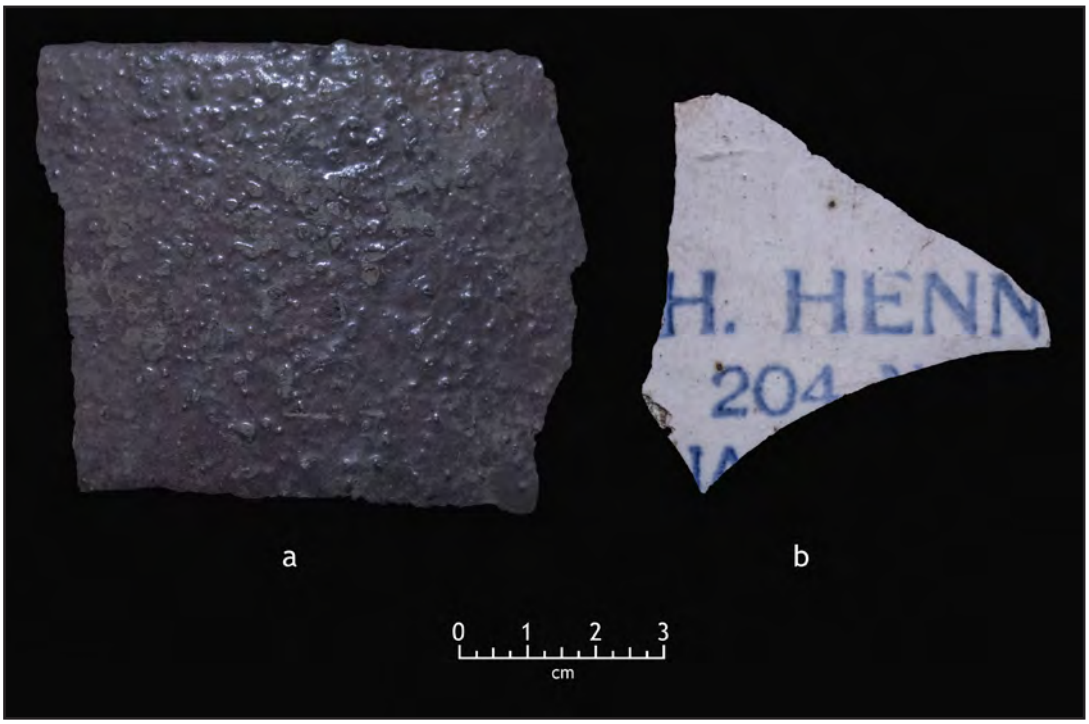

Figure 6.3. Stoneware: (a) salt-glazed drainage pipe fragment; (b) Bristol/Albany-glazed with stenciled text.

Stoneware

Stoneware is a hard, non-porous ware fired at high temperatures between 1,200 and 1,300 degrees Celsius. Glaze is often applied to coat stoneware for a smooth, easy to clean surface (Greer 2005). Site 40DV189 yielded three stoneware specimens. Two are stoneware container fragments, and one is a drainage pipe fragment.

One of the stoneware container specimens displays a salt glaze. Salt glaze is a stoneware glaze formed from common salt. The glazing process involves salt being thrown or poured into the kiln at the height of the firing process, which causes an "orange peel" texture (Brackner 2006). The firing temperature must be high enough for silica in the clay to combine with the sodium to form the glaze (Greer 2005; Maryland Archaeological Conservation Library 2008). Salt glaze was developed as early as the fifteenth century and was introduced into the Deep South directly from Europe or through migrations of potters from the North or Upland South as early as ca. 1750 (Brackner 2006).

The stoneware drainage pipe fragment displays a salt glaze on both the interior and exterior surfaces (Figure 6.3a). Glazed stoneware was commonly used for household drainage pipes both in England and in America during the inception of public water works starting in the third quarter of the nineteenth century, replacing older pipes of brick or wood (Stone 1979). These stoneware pipes were often, but not always, salt-glazed (Coleman 1896; Cooper 2000; Ward-Harvey 2009).

The remaining stoneware fragment displays a Bristol-glazed exterior, cobalt blue stenciled text, and an Albany-glazed interior (Figure 6.3b). Bristol glaze is a smooth white to slightly off-white glaze made using chemicals that were readily available on the open market. Bristol glaze, developed

in Bristol, England, during the last quarter of the nineteenth century, incorporates feldspar and zinc, two ingredients typically found in potters' shops (Brackner 2006; Greer 2005; Noël Hume 1969; Stelle 2001). By 1915, Bristol glaze was commonly found across North America. Prior to 1920, potters would commonly use this glaze in combination with Albany slip to create a two-tone effect (Brackner 2006).

Albany slip is a dark brown slip that forms a glaze at stoneware temperatures. It was first used as a glaze in the first quarter of the nineteenth century. Many glazes of the time did not vitrify completely, and liquids would seep into vessel walls. For this reason, Albany slip was often used as a glaze on the interior of vessels which were glazed on the exterior with another type of glaze (Greer 2005). The Albany slip became so widely used in the United States that the term "Albany type" was used to describe most dark brown or black slip-clay glazes. It was introduced as a glazing technique around ca. 1820 and was commonly used until 1940 (Brackner 2006; Greer 2005; Stelle 2001).

Stencils were often used to denote container capacity, maker marks, merchant names, and decorations on salt- and Bristol-glazed stoneware beginning in the mid-nineteenth century (Greer 2005:174). The stenciled text on this stoneware specimen is likely a partial maker mark that reads, "H. HENN..." and "204."

Container Glass

Site 40DV189 yielded 25 container glass fragments. Laboratory analysis of these artifacts focused on the identification of manufacturing attributes such as finish/closure types, base types, color, and mold seams. When possible, attributes such as manufacturer marks and embossing were also used in the identification of bottle or jar glass. The bottle/jar term was used when fragments could not be identified with certainty as either a bottle or a jar. Curved glass specimens that lack manufacturing attributes, which may determine the specific type of container from which it originates, are categorized as container glass. Twelve of the 25 container glass fragments were further identified as bottle (n=2), liquor bottle (n=1), milk bottle (n=1), nail polish bottle (n=1), soda bottle (n=1), medicine bottle (n=1), jar (n=1), and bottle/jar (n=4).

Clear or colorless glass refers to transparent decolorized glass. Glass produced in this manner was from the purest sand possible and decolorized with manganese, selenium, or arsenic (Lockhart 2006; Trowbridge 1870). This method of producing colorless glass commonly dates from the 1870s to today (Lindsey 2010a). A total of 15 container glass fragments were recovered from site 40DV189. Five of the 14 display no manufacturing marks. One fragment has an embossed "...IN. CONTENTS..." The remaining eight fragments were further identified as bottle (n=1), milk bottle (n=1), nail polish bottle (n=1), soda bottle (n=1), and bottle/jar (n=4).

One of the four bottle/jar fragments is an undifferentiated base specimen. The base or the bottom of a bottle is usually the thickest part and provides a flat surface on which the bottle stands (Lindsey 2010b). Undifferentiated bases cannot be identified as a specific base type. Another bottle/jar fragment is an undifferentiated base fragment with machine mold seams.

Body characteristics and mold seams are indicative of the manufacturing method used in the production of a bottle or jar. Features on the body, shoulder, and neck can be useful for dating a par-

ticular specimen (Lindsey 2010c, 2010d). The first semi-automatic bottle-making machine was patented in 1882, but it still required the glass to be fed into the machine by hand. These semi-automated machines were used up until about 1905 (Lindsey 2010e). Michael J. Owens patented the first fully automatic bottle-making machine in 1904, which greatly increased the number of bottles that could be made in a day (Baugher-Perlin 1982; Miller and Sullivan 1984:86). Mold seams on machine-made bottles tend to be thinner than those encountered on mold blown bottles and usually run vertically up to the highest point of the finish. Although there are earlier examples, machine-made bottles commonly date from 1910 to the present.

The remaining two bottle/jar fragments recovered from 40DV189 are cup-bottom base specimens with machine mold seams. Cup-bottom bases are produced from a cupped base plate of a polypart mold that extends to the upper edge of a bottle's heal, creating the entire base. A mold seam is usually, but not always, visible where the base plate meets the two molds creating the body. All types of bottles were produced using this method. Bottles manufactured with this process span a period from the mid-nineteenth century to present and represent the preferred base mold of the machine-made bottle era (Lindsey 2010f; Toulouse 1969). One of the cup-bottom base bottle/jar specimens displays stippling and is embossed with "HALF" and an Owens-Illinois maker mark. The Owens-Illinois Glass Company was formed by a merger of the Owens Bottle Company and the Illinois Glass Group in 1929 (Toulouse 1971). It has plants throughout the country and is still manufacturing bottles today both locally and worldwide. When the two companies merged, the maker mark it chose was an "I" within a diamond superimposed over the letter "O." This mark was used from 1929 to ca. 1960. In 1954, the diamond was eliminated from the mark, leaving a "I" within an "O." This mark is still in use today (Lindsey 2010f). The "I" within a diamond superimposed over the "O" maker mark is present on this bottle/jar cup-bottom base specimen.

Stippling is a textured effect of fairly light embossed dots, bumps, or indentations on bottle glass. It is commonly found on the bottom of the bottle, as stippling was used to decrease the drag on conveyor belts or to hide suction scars. The effect was also sometimes used for decoration. Stippling first appeared in 1940 on bottles produced by Owens-Illinois Glass Company and continues to the present (Lindsey 2010e). The presence of stippling on the Owens-Illinois bottle/jar fragment suggests a manufacture date between 1940 and ca. 1960.

The clear bottle fragment is an oil finish specimen with a rubber cork closure and a machine mold seam (Figure 6.4a). Bottle and jar finishes are defined as the portion to which the closure is attached located above the upper terminus of the neck. Determining the method of finishing can help establish a date range for the bottle's production (Lindsey 2010e). The oil finish is a one-part finish that is generally as tall as it is wide, with a gradually wider taper to the base. This finish was used on a variety of bottle types, such as bulk ink, tonic, and sauce bottles. It generally dates from the 1830s to the 1920s (Lindsey 2010g).

The clear milk bottle fragment is a capseat finish specimen with machine mold seams. This specimen is embossed with "JERSE...FARMS"/"TASTE"/"PASTEU..."/"JF" (Figure 6.4b). The capseat finish is essentially a bead finish on a wider mouth, around the inside of which there is a ridge where a disposable paper cap sits. This finish, also called the common sense finish or the milk bottle finish, was most commonly used on milk bottles. The capseat finish was patented in 1889 and was

used until around the 1960s (Lindsey 2010d). The embossing on the milk bottle fragment indicates it is a Jersey Farms Milk Service Incorporated bottle, which delivered milk to customers in the Nashville area (Davidson County, Tennessee Dairy Trademark Register 1935-1940).

The clear nail polish bottle has machine mold seams, a cup-bottom base with an embossed "V" and "11," and a small external threaded finish (Figure 6.4c). The small external thread finish is characterized by the presence of a raised ridge or ridges spiraling around the outside surface of the finish onto which a cap was "threaded" or screwed, thereby tightening the seal. These ridges can either be one continuous piece, several interrupted pieces, or lugs, which are interrupted pieces, only shorter, higher, and thicker. External-threaded finishes are categorized as large or small, based on the bore diameter alone. Small external thread finishes date as early as the mid-1870s on liquor bottles but became more popular on mouth-blown liquor flasks in the 1890s. Externally threaded finishes became the dominant finish type by the 1930s and are still popular today (Lindsey 2010f).

The clear nail polish bottle still contains dried polish and an applicator brush inside it. Based on the bottle shape and advertising, the clear nail polish bottle appears to be from the Cutex nail polish line (Bennett 2017a; Cutex Brands 2017). This particular bottle shape was utilized by Cutex between 1941 and the 1960s (Bennett 2017a; Cutex Brands 2017). Cutex was started by Northam Warren in 1911 with the company's signature liquid cuticle remover. Cutex first produced liquid nail polish in 1916, but the product's popularity did not increase until the 1920s. Cutex became the dominant nail polish brand by 1930 but would soon compete with Revlon and other prestige brands. Cutex was purchased by Chesebrough-Pond's in 1960 from Northam Warren, Jr. In 1986, Chesebrough-Pond's was purchased by Unilever, and the Cutex brand and products would be marketed by multiple companies. Most recently, Revlon purchased Cutex Brands in 2015 and Cutex International in 2016. Revlon still produces Cutex products today (Bennett 2017a; Cutex Brands 2017).

The clear soda bottle is a Big Kraze soda specimen with machine mold seams, a cup-bottom base, and embossed text which reads, "BIG"/"KRAZE"/"MIN. CONT. 9 FLU. OZS."/"NASHVILLE"/"TENN." and a "K" maker mark. The "K" maker mark has not been linked to any known companies (Lockhart et al 2017). A Kraze Bottling Company is known to have operated in Memphis, but no further information about Kraze or Big Kraze soda is available at this time (Historic-Memphis 2017).

Cobalt blue-colored glass was produced by adding cobalt oxide to the glass. All types of bottles were manufactured using this process ranging from food and beverage containers to ink wells. Bottles of this color commonly date from the 1840s to the 1930s (Lindsey 2010a). One cobalt blue bottle fragment embossed with "...PHI..." was recovered from 40DV189. This specimen is a portion of a Phillips Milk of Magnesia bottle. The Chas. H. Phillips Chemical Company began operation in 1819 and manufactured the popular Phillips Milk of Magnesia. Although the company was acquired by Bayer HealthCare in 1995, products with the Phillips name are still made today (Land 2009).

In the early 1600s, English glassmakers switched from using wood-fired furnaces to coal-fired furnaces. This led to the development of new types of glass, such as olive green glass (Jones 1986). Olive green-colored container glass is a result of natural iron oxide in the sand used to produce glass of this color. The greenish olive tones can range from light to dark. Although production of olive green-colored glass for spirits bottles continues today, it is common in all types of bottles prior to 1890 and uncommon after ca. 1900 (Lindsey 2010a; McKearin and Wilson 1978; Wilson 1972). One olive green container glass fragment was recovered from site 40DV189.

Milk glass is an opaque white glass created by adding either natural additives such as calcium and bone, or chemical additives, such as fluorides, phosphates, tin, or zinc (Jones and Sullivan 1989; Lindsey 2010a). Milk glass was used in the production of several different types of bottles but can be chronologically diagnostic in some cases. Cosmetic and toiletry bottles were commonly made of milk glass from the 1870s to about 1920, and ointment and cream jars were made of this glass from around the 1890s to the mid-twentieth century. Milk glass would not be commonly found on sites with occupations entirely prior to the 1870s (Lindsey 2010a). Five milk glass container specimens were recovered from site 40DV189. Two of these were further identified as bottle (n=1) and jar (n=1).

The milk container glass bottle fragment is a bead finish specimen. The bead finish consists of a single rounded ring of glass. It was relatively common and used on medicinal, liquor, sauce, and other types of bottles. It is not particularly useful for dating, as it was used on free-blown bottles in the early nineteenth century as well as machine-made bottles in the twentieth century (Lindsey 2010f).

The milk container glass jar specimen has machine mold seams, a cup-bottom base, and a large external thread finish (Figure 6.4d). This finish is commonly found on canning and food storage jars at least as early as the patent of the Mason fruit jar in 1858 and is still used today (Lindsey 2010g, 2010h). This milk container glass jar displays an embossed "9" and "1," and is likely a Pond's cold cream jar. Pond's was formed as Pond's Extract Company in 1846 by Theron T. Pond to sell patent medicines. Pond's began selling cold cream and vanishing cream in 1904, and the products tripled in sales by 1920. The creams were packaged in small milk glass jars. In 1955, Pond's combined with Chesebrough Manufacturing Company, Consolidated to form Chesebrough-Pond's (Bennett 2017b).

Amber-colored glass is produced by adding sulfur, nickel, and particularly carbon to the glass in the form of charcoal, woodchips, and coal. Natural impurities, such as iron and manganese, also contributed to coloring the glass. Amber-colored glass is produced in many shades, ranging from light yellow to dark brown. Although amber-colored glass was produced for many centuries, colors such as olive amber, light yellow amber, and black amber become uncommon when machines became the dominant manufacturing method after 1910. The more common brown or medium amber colors are still produced today, primarily for beer bottles (Lindsey 2010a). One amber colored glass bottle fragment was recovered from site 40DV189. This bottle fragment has machine mold seams, a cup bottom base, and an embossed Owens-Illinois diamond maker mark. Embossed text on the side and base reads, "...ALF PINT 4"/"58" "50"/"...RAM WALKER & SONS"/"LIMITED" "4"/"...KERVILLE CANADA"/"...LE MADE IN U.S.A." The Owens-Illinois diamond maker mark indicates a production range between 1929 and ca. 1960 (Figure 6.5). The embossed text indicates the Hiram Walker & Sons distillery in Walkerville, Canada.

Hiram Walker began purchasing land in Canada in 1856, where he planned to move his whiskey operation from Detroit. By 1870, Walker's distillery was the largest in the Confederation of Canada, and the village of Walkerville was established around it. The village would be incorporated into a town in 1890. During Prohibition in the United States, smuggling from Walkerville to Detroit became a lucrative business and eventually was connected to Al Capone's Chicago syndicate. The company was sold to Harry C. Hatch in 1926, and Walkerville was forcibly combined with Windsor in 1935. Hiram Walker remains the largest beverage distillery in North America today (Corby Spirit and Wine 2016; Visit Walkerville 2017).

Figure 6.4. Bottle and jar examples: (a) oil finish with rubber cork closure; (b) milk bottle; (c) nail polish bottle; (d) cold cream jar.

Figure 6.5. Owens-Illinois maker mark.

Pressed Glass

Pressed glass is categorized as molded glass designed to look like cut crystal. It is not part of the molded container glass category. The pressing machine was invented in the 1820s, but pressed glass existed before this in the form of small pieces, such as bottle stoppers made with a hand-operated mold. The pressing machine allowed for the creation of larger items, such as dishes and bottles. The process of pressing glass involved dropping viscid glass into a mold and pressing it into the mold with a plunger operated by a lever (McKearin and McKearin 1970). Site 40DV189 yielded a total of three pressed glass specimens. One is clear, one is bright green, and one is opaque orange.

The bright green pressed glass specimen is uranium glass, also known as Vaseline glass, which is produced when uranium oxide is added as a coloring agent. This produces a translucent bright yellow to yellow-green glass that glows under ultraviolet light. Uranium oxide was first used as a coloring

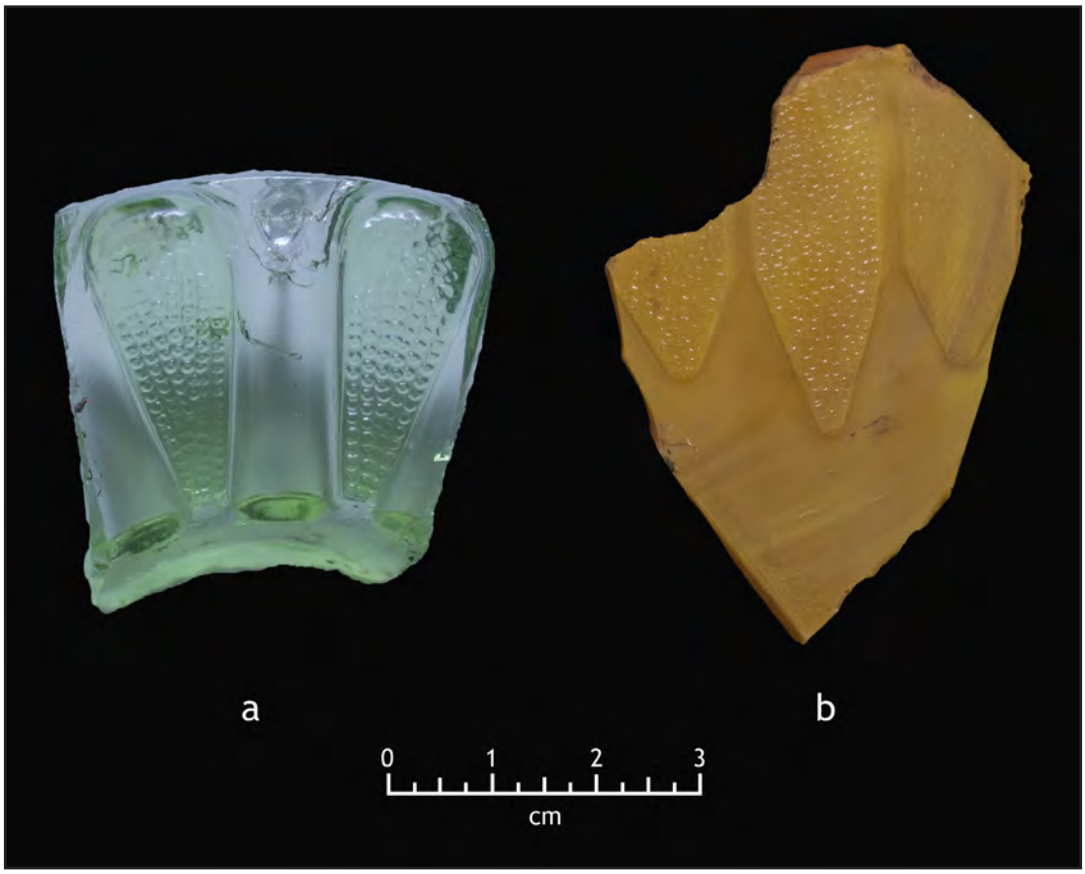

Figure 6.6. Pressed glass: (a) uranium; (b) slag.

agent in the 1830s, and uranium glass was produced until the 1940s. Non-military use of uranium in the United States was banned in 1943 (Strahan 2001).

The opaque orange pressed glass fragment is a slag glass specimen. Slag glass is opaque glass with colored streaks that are typically white or cream (Glass Encyclopedia 2017). Slag glass was popular during the late nineteenth and early twentieth centuries, and new versions are still produced today (Glass Encyclopedia 2017; Kovels 2017).

Cased Glass

Site 40DV189 yielded one piece of dark green/milk cased glass. Cased, or overlay, glass is produced by layering glass over a contrasting color (Corning Museum of Glass 2002). The successive layers could be gathered over each other, one inflated inside a premade form in another color, or formed around an object such as a mold (Corning Museum of Glass 2002; PatternGlass.com 2017).

Jadiete Glass

Commonly referred to as Jadeite, this green-colored milk glass was often used to produce tableware vessels. It was first developed by the McKee Glass Company in 1930 and was made in large quantities during the Depression era until roughly 1975, but reproductions are still produced today (Walker 2008). One Jadeite container glass fragment was recovered from 40DV189.

Cast-Iron Drainage Pipe

Cast-iron drainage pipes were first available ca. 1750 for municipal water services. The first cast-iron pipe produced in the U.S. was manufactured by a foundry in New Jersey in the early 1800s. By 1898, 71 foundries in the U.S made cast-iron pipes. Cast-iron would eventually be phased out in favor of fiber conduit pipes (Sewerhistory.org 2004).

Brick

Bricks are produced from tempered clay which is formed in a mold or cut into a rectangular block and fired in a kiln. The manufacturing of brick in the United States began soon after European colonists arrived. Machine-made bricks began replacing hand-made bricks throughout the nineteenth century and became the primary method of brick production in the late nineteenth century (Holley 2009). Site 40DV189 yielded one solid glazed brick, with "DIIIRII" on one side, and four brick fragments.

Miscellaneous Artifacts

Additional artifacts recovered from site 40DV189 include glass caster cup (n=1), ceramic tile fragment (n=6), ferrous metal can fragment (n=1), tar (n=2), and concrete with blue paint (n=1).

CHAPTER 7. INTERPRETATIONS AND CONCLUSIONS

During the fall of 2017, TVAR conducted a geophysical/archaeological survey of the Herschel Greer Stadium property adjacent to Fort Negley, Nashville, Tennessee, to investigate and evaluate areas that are potentially archaeologically significant. In particular, the possibility of human remains being interred at the site was assessed. Utilizing historic document research, ground penetrating radar and limited test excavations, the property was surveyed, and evaluations were made for specific areas within the project boundaries.

TVAR's investigations included 11 GPR blocks, eight individual GPR transects, 11 backhoe trenches, 16 shovel tests, and limited mapping of surface features. In combination, these techniques allowed for a comprehensive overview of the project area. The survey determined that the project area is a palimpsest of land alterations, including large-scale cutting and filling, demolition, construction, and burial of intact archaeological deposits. Details of these operations can be found in preceding chapters.

This survey revealed that despite multiple major land alteration projects over the centuries (Fort Negley, WPA park, Herschel Greer Stadium), there remain areas where intact archaeological (human-created) deposits still exist—particularly deposits that predate the WPA park construction efforts. Some of these intact deposits are buried under substantial overburden of asphalt and rubble/boulder fill. In a few areas, the deposits are immediately below the surface. The pre-WPA archaeological deposits date to the time period when people were being interred on Cloud Hill, and therefore, due to there being no documentary evidence of the removal of the human remains associated with the construction of Fort Negley, their presence indicates a strong possibility of burials still being present.

The majority of the buried intact archaeological deposits are located in the southwestern quarter of the project area (Figure 7.1). There is additionally a narrow strip of intact deposits found along the southern perimeter of the project area, paralleling Chestnut Street. Finally, there are likely to be intact deposits along the eastern edge of the project area, under the eastern road and buried under substantial fill along the entire eastern edge. In addition, there are substantial significant intact archaeological deposits encircling the project area on the east, north, and west sides.

The northern portion of the project area (the gravel parking lot) has been quarried for limestone, and excepting the eastern edge, where deep fill covers intact archaeological deposits, does not contain any deposits of archaeological significance. The parking lot immediately north of the baseball stadium is unlikely to include deposits of archaeological concern. The ballfield itself represents substantial fill over intact deposits. Unless the fill is removed from these areas, there is low risk of the disturbance of intact archaeological deposits.

TVAR recommends that a portion of the project area be protected (see Figure 7.1), with no land alterations taking place. It is suggested that this portion be reintegrated into Fort Negley Park. It is further recommended that a qualified archaeological monitor be on site during any future land-altering activities due to the possibility that significant archaeological deposits may be present.

Figure 7.1. Map showing recommended monitoring and protected areas.

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APPENDIX A:
MATERIALS RECOVERED

Site Number 40DV189

Shovel Test 10 (0-10 cmbs)			
	1	1.59 g	clear container glass
	1	2.02 g	cobalt blue container glass, bottle w/"...PHI..." embossing
	2	0.44 g	brick fragment
Trench 4 (100-200 cmbd)			
	1	7.42 g	porcelain faucet handle, with "COLD"
	1	62.66 g	polychrome transfer print, molded porcelain plate
	1	2.49 g	polychrome decal print porcelain vessel fragment, floral design
	1	2.8 g	persimmon fiesta ware
	1	13.23 g	Jadeite container glass
	1	65.02 g	amber molded container glass/machine mold seam/cup bottom base, liquor bottle w/"...ALF PINT 4"/ "58" Owens-Illinois maker mark "50"/"...RAM WALKER & SONS"/"LIMITED" "4"/"...KERVILLE CANADA"/"...LE MADE IN U.S.A" embossing
	1	98.42 g	milk container glass/machine mold seam/cup bottom base/ external thread (large) finish, jar w/"9"/"1" embossing
	1	3.53 g	dark green/milk container glass
	1	75.53 g	clear pressed glass
	1	24.06 g	clear molded container glass/machine mold seam/cup bottom base/external thread (small) finish, nail polish bottle w/"V"/"11" embossing with pink nail polish and brush inside bottle
	1	127.19 g	clear container glass/machine mold seam/capseat finish, milk bottle w/"JERSE...FARMS"/"TASTE"/"PASTEU..."/ "JF" embossing
	1	115.81 g	clear caster cup glass
	1	26.64 g	bright green pressed uranium glass
	1	1200 g	glazed brick solid with "DIIIRII"
Trench 5 (18-90 cmbd)			
	3	9.18 g	plain whiteware
	1	16.43 g	molded ironstone plate
	1	20.68 g	cobalt blue stenciled Bristol/Albany glazed stoneware
	1	0.83 g	molded ironstone
	1	142.24 g	salt glazed stoneware, drainage pipe fragment

1	13.21 g	plain ironstone
1	29.47 g	ceramic tile fragment
1	29.67 g	plain porcelain bowl
1	2.73 g	milk container glass/bead finish, bottle
1	4.17 g	milk container glass
1	9.08 g	olive green container glass
1	17.84 g	clear container glass w/"...IN. CONTENTS..." embossing
1	327.71 g	clear molded container glass/machine mold seam/cup bottom base, soda bottle w/"BIG"/"KRAZE"/"MIN. CONT. 9 FLU. OZS."/"NASHVILLE"/"TENN."/"K" embossing
1	6.47 g	clear molded container glass
1	5.75 g	clear container glass/undifferentiated base, bottle/jar w/"...D" embossing
1	107.75 g	clear container glass/machine mold seam/undifferentiated base, bottle/jar
1	42.1 g	clear container glass/machine mold seam/oil finish/rubber cork, bottle
1	55.12 g	clear container glass/machine mold seam/cup bottom base, bottle/jar
4	35.88 g	clear container glass
1	12.75 g	brick fragment
1	5.69 g	mammal bone/rib
1	33.6 g	mammal bone/femur
4	2.65 g	mammal bone fragment
1	3.29 g	mammal bone fragment with butcher marks
Trench 10 (210-235 cmbd)		
1	34.38 g	plain porcelain with "MADE...JA..." maker mark, with "JAPAN" molded into base
1	17.03 g	clear container glass/machine mold seam/cup bottom base, bottle/jar w/"HALF"/Owens-Illinois maker mark embossing with stippling
2	10.21 g	milk container glass
1	27.38 g	opaque orange pressed glass, slag glass
1	12.75 g	ferrous metal can, fragment
1	900 g	brick fragment

Trench 11 (0-70 cmbd)

1	0.99 g	salt glazed stoneware
5	266.38 g	porcelain plumbing fixture fragment
5	64.31 g	ceramic tile fragment
1	9.45 g	blue transfer print porcelain vessel fragment
2	650 g	ferrous metal cast iron drainage pipe, fragment
1	7.84 g	concrete with blue paint
2	36.9 g	tar

APPENDIX B:
SITE FORM

ARCHAEOLOGICAL SITE SURVEY RECORD

Tennessee Department of Environment and Conservation
Division of Archaeology
Cole Building #3
1216 Foster Avenue
Nashville, Tennessee 37243
Phone (615) 741-1588 Fax (615) 741-7329

State Site No.: 40DV189
Date Assigned: Update

Submittal of a Division of Archaeology (TDOA) site survey record constitutes a request for state number assignment to a new site, or revises information on a previously recorded site. Send as email attachment(s) to the TDOA site file curator with no more than 25MB attached per message. State site number will be assigned if warranted, and a copy of the final site survey record will be returned to the reporter.

Our office does not define a site by an arbitrary number of artifacts or other specific criteria. Request a preliminary review if site status is uncertain or if additional guidance is needed. If files to be submitted exceed 25MB, contact the TDOA site file curator for instructions at paige.silcox@tn.gov

Site name or field number: 40DV189

[**Underline/Bold AND highlight** from options on the next two pages, either all that apply or one choice, as noted]

Cultural Affiliation:(choose all that apply, but not both undetermined prehistoric and any other prehistoric option)

Undetermined Prehistoric	Early Gulf Formational	Early Mississippian
Paleoindian	Middle Gulf Formational	Middle Mississippian
Transitional Paleo	Late Gulf Formational	Late Mississippian
Archaic	Woodland	Protohistoric
Early Archaic	Early Woodland	Contact Period Native American
Middle Archaic	Middle Woodland	Historic Native American
Late Archaic	Late Woodland	**Historic**
Gulf Formational	Mississippian	Pleistocene Fauna

The block below is for Division of Archaeology use only

Site Type:
County
Physiographic Div.:
Elevation:
USGS 7.5' quad:

[40DV189]
[Update]

Date range for protohistoric through historic period sites (all that apply)**:**		
Pre-1770	**1861-1865**	**1933-present**
1770-1819	**1866-1900**	
1820-1860	**1901-1932**	
Human Remains (one choice)**:**		
Unknown	Isolated Intact Burial(s)	Absent (historic sites only)
Scattered Surface Remains	**Cemetery**	Unknown, but likely
Ownership (one choice)**:**		
Private Individual/Corporation	State of Tennessee	
Local Government	Federal-TVA, COE, etc.	
Site Size (Long and short axis, in meters):	**880m x 770m**	
Basis for Size Estimate (one choice)**:**		
Taped	Guessed	**Estimated from map**
Paced	Transit/alidade/digital	
Boundary (one choice)**:**	**Partial (explain in site description)**	Inclusive
Land Use/Ground Cover (one choice)**:**		
Grassland/Pasture/Yard	Improved Forest/Orchard	Roadway
Cultivation	Intermittent Flooding	Open and Eroded
Secondary Growth	Inundated/Shoreline	**Other (explain in site narrative)**
Unimproved Forest	Urban	
Condition/Percent Disturbed (one choice)**:**		
Undisturbed [excellent]	51-75% [fair]	**Percent Unknown**
<25% [very good]	76-99% [poor]	
26-50% [good]	Destroyed	
Level of Investigation (one choice)**:**		
No collection	Surf. collection and/or shovel tests	Excavation program
No collection, with shovel tests	**Surf. collection and/or test units**	Total excavation
Surface collection, 'grab bag'	Extensive testing program	
Reporter Type (one choice)**:**		
Private Consulting Firm	Amateur Society Member	Student (volunteered rpt.)
Agency or Non-educ. Inst.	Landowner	Professional (volunt'd rpt.)
Educational Institution	Private Individual	
Last Day of Investigation: update based on historic research, GPR survey, and limited trench excavation with machinery		

Also include:

- USGS 7.5' topographic map with site boundary and scale (place multiple sites on a single map when possible)
- Descriptive page(s) with the following:
  - field number and/or site name on each page
  - landowner, tenant, or easement holder
  - verbal directions to the site
  - landform, setting, distance and direction to water
  - surface conditions, level of survey, and explanation for limitations in determining site boundary
  - nature and extent of past and anticipated disturbance
  - cultural affiliation, site type, features, table or summary of observed/collected artifacts, and site map
    -- **prehistoric cultural affiliation must be supported by temporally sensitive artifact(s) with photos**
    --**for historic sites a pre-1933 occupation date must be established** from features, maps, deeds, informants (artifact scatters that **might have been** manufactured before 1933 are generally insufficient for recording a site)
  - relationship, if any, to nearby sites
  - associated history, persons, buildings
  - photo media and quantity; temporary and permanent repositories for artifacts and documentation
  - location of any additional information such as reports, maps, local informants, etc.
  - title, author, and date of the report in which the site is or will be reported
  - reporter name, affiliation, address, phone, fax, email, and date of submittal

Electronic submittals will be edited to reduce space. A sample format for the site narrative follows.

[40DV189]
[Update]

Landowner: Metro Nashville

Setting, landform, and distance/direction to water: Fort is located just outside of downtown Nashville, atop St. Cloud Hill with additional site elements extending down slope and outward from the base of the hill.

Survey purpose, methods, and limitations in determining site boundary: TVAR's site update is based on ground penetrating radar survey and limited subsurface testing of the site's recently expanded boundary. TVAR's project area was limited to Greer Stadium and associated parking lots. The purpose of the survey was to evaluate to amount of previous disturbance resulting from past development of the area. TVAR did not evaluate any areas beyond the current site boundaries.

Past and anticipated disturbance: Past: construction of interstates, movement of railroad lines, WPA-era reconstruction of Fort Negley, construction of Adventure Science Center, Greer Stadium/parking lot, Fort Negley Park Visitor Center/trails/parking lot, park landscaping. Future: Potential redevelopment of Greer Stadium and associated parking lots.

Cultural affiliation, site type, occupation date range (for historic sites), features, artifact summary: Historic: 19th and 20th century. Artifacts recovered by TVAR include porcelain, fiesta ware, milk container glass, molded container glass, ironstone, stoneware, whiteware, brick fragments, ceramic tile fragments, and ferrous metal cast iron drainage pipe.

Relationship, if any, to nearby sites: Site boundary overlaps with 40DV696 (Nashville City Cemetery). Also may overlap with former Catholic Cemetery (included within 40DV696). Based on georeferenced historic maps, TVAR's project area does not contain any portion of the Catholic Cemetery.

Location of additional information: See 40DV696 site form.

NRHP recommendation (optional): Listed.

Photo and artifact repositories: Tennessee Division of Archaeology

Report: Beasley, et al. 2018 Historic Background Research and a Ground Penetrating Radar Survey Associated with the Greer Stadium Redevelopment Project in Nashville, Davidson County, Tennessee.

Site reporter: Updated by Tennessee Valley Archaeological Research.

[40DV189]
[Update]