

COLUMBUS I CLEVELAND CINCINNATI-DAYTON MARIETTA

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Sally W. Bloomfield 614.227.2368 sbloomfield@bricker.com January 13, 2014

Via Electronic Filing

Ms. Barcy McNeal Administration/Docketing Public Utilities Commission of Ohio 180 East Broad Street, 11th Floor Columbus, OH 43215-3793

Re: Vectren Energy Delivery of Ohio, Inc. OPSB Case No. 13-1651-GA-BTX

Dear Mr. McNeal:

Please find attached the Phase I Cultural Resource Management Investigations Report along with a copy of the letter from the Ohio Historic Preservation Office ("OHPO") for the Vectren Energy Delivery of Ohio Z-167 pipeline relocation. A copy of the Report was sent to Staff on December 27, 2013.

The Phase I Cultural Report along with OHPO's response, which had not been received at the time the Amended Application was filed on November 15, 2013, was referenced in Section 4906-15-06(F) of the Amended Application.

Please do not hesitate to contact me if you have any questions.

Sincerely,

N Bloomques

Sally W. Bloomfield

Attachments

Cc: Ed Steele (w/Attachments)



December 26, 2013

Christopher Nelson, Project Reviews Manager Ohio Historical Society Ohio Historic Preservation Office 800 East 17th Avenue Columbus, Ohio 43211

Dear Dr. Nelson,

RE: 2013-MOT-25439

Dayton International Airport Relocation Project (UTI #13-135), Montgomery County, Ohio

This letter is in response to the August 27, 2013 correspondence requesting an archaeological survey to be conducted on the selected route for the relocation of a natural gas pipeline around the Dayton International Airport.

Our client, Vectren Energy Delivery of Ohio, is currently seeking a Certificate of Environmental Compatibility and Public Need from the Ohio Power Siting Board (OPSB) for this pipeline project. Part of this process involves developing and submitting two routes for consideration by the OPSB for approval. The routes have changed slightly since this original Section 106 Review submitted on July 29, 2013 due to requests by the City of Dayton and the City of Union. Weller and Associates, Inc. was contracted to complete the archaeological surveys on both routes to meet the requirements of the August 27 letter and the OPSB. The report generated from this survey has been enclosed for your review. Figures 7-11 show the Preferred and Alternate Routes for the project as well as the laydown and pipe-pull back areas.

Field work for the archaeological survey was completed December 2013 and resulted in the identification of one previously unrecorded archaeological site, 33MY901. This site is located in an area that is planned to be used as the laydown yard for the project. The report states that the artifacts recovered at this site lacked integrity and were not regarded as significant to be eligible for inclusion with the National Register of Historic Places and no further work was deemed necessary. No other historic artifacts or properties were discovered during the survey of the Preferred and Alternate Routes for the project.

UTI requests for the Ohio Historic Preservation Office to review the attached report by Weller and Associates, Inc. on the pipeline relocation project and to concur with their findings that the proposed underground pipeline project will not adversely affect any historic properties and no further cultural

resource management work is needed. Please contact me if you have any questions or need additional information.

Sincerely,

Melinda Stahl Environmental Coordinator

Enclosure (1): Weller and Associates, Inc. Phase I Cultural Resource Management Investigations for the Approximately 10.5 km (6.5 mi) Vectren/Dayton Airport Z-167 Pipeline Relocation Project in Butler Township, Montgomery County, Ohio

CC: Tom Jones, Vectren Mark Wannemueller, Vectren Ryan Weller, Weller and Associates, Inc.



Phase I Cultural Resource Management Investigations for the Approximately 10.5 km (6.5 mi) Vectren/Dayton Airport Z-167 Pipeline Relocation Project in Butler Township, Montgomery County, Ohio

Ryan J. Weller

December 23, 2013

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Phase I Cultural Resource Management Investigations for the Approximately 10.5 km (6.5 mi) Vectren/Dayton Airport Z-167 Pipeline Relocation Project in Butler Township, Montgomery County, Ohio

By

Ryan J. Weller

Submitted By:

Ryan Weller, P.I Weller & Associates, Inc. 1395 West Fifth Ave. Columbus, OH 43212 Phone: 614.485. 9435 Fax: 614.485. 9439 Website: www.wellercrm.com

Prepared For:

Utility Technologies International Corporation 4700 Homer Ohio Lane Groveport, OH 43125

Lead Agency:

Ohio Power Siting Board

Ryan Weller, P.I.

December 23, 2013

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i. Abstract

In late November of 2013, Weller & Associates, Inc. completed Phase I Cultural Resource Management Investigations for the Approximately 10.5 km (6.5 mi) Vectren/Dayton Airport Z-167 Pipeline Relocation Project in Butler Township, Montgomery County, Ohio. The work was conducted under contract with Utilities Technologies, International Corporation. The project area is located in the north central part of Montgomery County and is just north of Vandalia. The area surrounding the airport consists of a mixture of agriculture, single-family housing, and business/commercial interests. The fieldwork resulted in the identification of one previously unrecorded archaeological site (33MY901). There were no buildings or structures older than 50 years identified as part of this project.

A literature review conducted prior to the field investigations determined that there were no previously recorded archaeological sites within the project corridor. One survey, Keel (1976), was conducted for a thoroughfare roadway to the Dayton International Airport. This survey did not identify any cultural materials in the vicinity of the project area and it accounts for only a small aspect of the current investigations. Review of the atlas information generally did not indicate that there were many buildings within or near the project. However, there was a residence located within a proposed preparation/staging area that is north of Dogleg Road. The residence and buildings continued to be depicted into the modern era. It is this location that is considered to be 33MY901.

The project area is located in very gently undulating to nearly level upland Till Plain conditions. This area is within the Mill Creek (Stillwater River) and Great Miami River watershed. The soils in the area are typical of this region and are not topographically dynamic in that they all have a slope percentage that is less than six percent. The project area is a pipeline and alternate that is located to the south, west, and north of the Dayton International Airport. The pipeline is mostly traversing agricultural conditions and within a comparably rural, undeveloped setting.

The field investigations resulted in the identification of site 33MY901, a historic period scatter. This site is not considered to be eligible for the National Register of Historic Places (NRHP) as it does not meet the minimum criteria. A finding of no historic properties affected as outlined by 36 CFR § 800.4 and 36 CFR § 800.5 is considered appropriate. No further work is deemed necessary for this project.

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Introduction

In late November of 2013, Weller & Associates, Inc. completed Phase I Cultural Resource Management Investigations for the approximately 10.5 km (6.5 mi) Vectren/Dayton Airport Z-167 Pipeline Relocation Project in Butler Township, Montgomery County, Ohio (Figures 1-4). The work was conducted under contract with Utilities Technologies International Corporation (UTIC) for submittal to the Ohio Power Siting Board (OPSB). These investigations were necessary to identify any sites or properties and to evaluate them for the National Register of Historic Places (NRHP) pursuant to Section 106 of the National Historic Preservation Act of 1966, as amended (16 U.S.C. 470 [36 CFR 800]). This report summarizes the results of the fieldwork and literature review. The report format and design is similar to that established in *Archaeology Guidelines* (Ohio Historic Preservation Office [OHPO] 1994). The work includes archaeological and visual inspection of the Area of Potential Effects.

The project area is located in upland, glaciated terrain that is nearly level to gently undulating. The majority of the investigations traversed through farm fields that had either been harvested or standing, mature cornfields. The pipeline corridor and its alternate skirt any buildings or structures and will utilize directional drilling techniques to go under roadways. The survey was also conducted within these pull-backs and set up areas associated with the directional drilling; most are positioned to the south of the airport. A staging, storage, and preparation area was investigated that is north of Dogleg Road and northwest of the airport. This was a former farmstead location. The southeastern terminus of the project is located within an urban setting and hooks up to an existing pipeline in Vandalia. From this point, it extends westward through largely undeveloped country before turning northward in eastern part of Section 13. The pipeline turns northward, crosses under the National Road and follows along the northern right-ofway for about .8 km (.5 mi) and turns north again. The corridor then extends in a northeasterly direction and along the north side of the proposed and existing Dogleg Road right-of-way. In the central part of Section 7, the Preferred and Alternate routes split. Both routes extend northward and then eastward. The Alternate terminates just south of County Line Road and the Preferred is just north of Old Springfield Road (Figure 2).

The survey for this project was conducted in late November of 2013. Chad Porter completed the literature review. Chad Porter, Ryan Weller, and Jose Ledezma completed the field investigations. Ryan served as the Principal Investigator and project manager.

Environmental Setting

Climate

Montgomery County, not unlike all of Ohio, has a continental climate, with hot and humid summers and cold winters. Temperatures in the winter have about 4 days where the temperatures drop below zero. In the summer there are about 25 days where the temperatures are greater than 90 degrees. January, February and October are the driest months, while the period from April to September accounts for about 60 percent of the yearly precipitation (United States Department of Agriculture, Soil Conservation Service [USDA, SCS] 1976).

Physiography, Relief and Drainage

The central part of Montgomery County is located within the Southern Ohio Loamy Till Plain physiographic region. These are typically rolling to gently rolling or flat Till Plains that have dissected and entrenched stream valleys (Brockman 1998). The boulder belt is located immediately to the south of the airport area (Pavey et al. 1999). However, the soils survey for the county indicates that the project area is within the boulder belt. The project area is located in an upland till plain area that is about midway between of the Great Miami River and the Stillwater River. The western part of the airport area is within the Stillwater River watershed and is drained by Mill Creek and its tributaries.

Geology

The central and northern parts of Montgomery County are comprised of late Wisconsinan glacial till that overlies Ordovician and/or Silurian bedrock deposits (Brockman 1998). The Great Miami River valley to the east is comprised of outwash gravels.

Soils

The project area is located in the Brookston-Crosby association. These are comprised of soils that are formed in glacial till and are consistently identified in uplands such as the project area. The soils in the project area are not complex and include large patches of their respective series (USDA, SCS 1976). There are eight soil types evident in the project area (Table 1). These are common and representative of the homogenous, glaciated till plain terrain.

| Table 1. Soils in the Project Area. | | | | |
|-------------------------------------|-------------------------------|-------------|------------------------------|--|
| Soil Symbol | Soil Name | % Slope | Location | |
| Bs | Brookston silty clay loam | 0 | Upland valleys and low areas | |
| CsA | Crosby silt loam | 0-2 | Upland slight elevations | |
| MIB,MIB2 | Miamian silt loam | 2-6, eroded | Upland elevations | |
| Br | Brookston silt loam, overwash | 0 | Upland valleys and low areas | |
| CoB | Corwin silt loam | 2-6 | Slight rises | |
| MlA | Miamian silt loam | 0-2 | Uplands, slight rises | |
| CeB | Celina silt loam | 2-6 | Uplands, slight rises | |

Flora

There is or at least was great floral diversity in Ohio. This diversity is relative to the soils and the terrain that generally includes the till plain, lake plain, terminal glacial margins, and unglaciated plateau (Forsyth 1970). Three major glacial advances, including the Kansan, Illinoisan, and Wisconsinan, have affected the landscape of Ohio.

The effects of the Wisconsin glaciation are most pronounced and have affected more than half of the state (Pavey et al. 1999).

The least diverse part of Ohio extends in a belt from the northeast below the lakeaffected areas through most of western Ohio (Gordon 1966). These areas are part of the late Wisconsin ground moraine and lateral end moraines. It is positioned between the lake plains region and the terminal glacial moraines. This area included broad forested areas of beech maple forests interspersed with mixed oak forests in elevated terrain or where relief is greater (Forsyth 1970; Gordon 1966). Prairie environments such as those in Wyandot and Marion County areas would contain islands of forests, but were mostly expansive open terrain dominated by grasses.

Generally, beech forests are the most common variety through Ohio and could be found in all regions. Oak and hickory forests dominated the southeastern Ohio terrain and were found with patchy frequency across most of northern Ohio. Areas that were formerly open prairies and grasslands are in glacial areas, but are still patchy. These are in the west central part of the state. Oak and sugar maple forests occur predominantly along the glacial terminal moraine. Elm-ash swamp forests are prevalent in glaciated areas including the northern and western parts of Ohio (Gordon 1966; Pavey et al. 1999).

North central Montgomery County, including the project area, is generally within what is considered to be a beech and oak-sugar maple forestation (Gordon 1966).

Fauna

The upland forest zone offered a diversity of mammals to the prehistoric diet. This food source consisted of white-tailed deer, black bear, Eastern cottontail rabbit, opossum, a variety of squirrels, as well as other less economically important mammals. Several avian species were a part of the upland prehistoric diet as well (i.e. wild turkey, quail, ruffed grouse, passenger pigeon, etc.). The lowland zone offered significant species as well. Raccoon, beaver, and muskrat were a few of the mammals, while wood duck and wild goose were the economically important birds. Fishes and shellfish were also an integral part of the prehistoric diet. Ohio muskellunge, yellow perch, white crappie, long nose gar, channel catfish, pike, and sturgeon were several of the fish, whereas, the Ohio naiad mollusc, butterfly's shell, long solid, common bullhead, knob rockshell, and cod shell were the major varieties of shellfish. Reptiles and amphibians, such as several varieties of snakes, frogs, and turtles, were also part of the prehistoric diet (Trautman 1981; Lafferty 1979; Mahr 1949).

Cultural Setting

The first inhabitants of Ohio were probably unable to enter this land until the ice sheets of the Wisconsin glacier melted around 14,000 B.C. Paleoindian sites are considered rare due to the age of the sites and the effects of land altering activities such as erosion. Such sites were mostly used temporarily and thus lack the accumulation of human occupational deposits that would have been created by frequent visitation.

Paleoindian artifact assemblages are characteristic of transient hunter-gatherer foraging activity and subsistence patterns. In Ohio, major Paleoindian sites have been documented along large river systems and near flint outcrops in the Unglaciated Plateau (Cunningham 1973). Otherwise, Paleoindian sites in the glaciated portions of Ohio are encountered infrequently and are usually represented by isolated finds or open air scatters.

The Paleoindian period is characterized by tool kits and gear utilized in hunting Late Pleistocene megafauna and other herding animals including but not limited to shortfaced bear, barren ground caribou, flat-headed peccary, bison, mastodon, and giant beaver (Bamforth 1988; Brose 1994; McDonald 1994). Groups have been depicted as being mobile and nomadic (Tankersley 1989); Paleoindian artifacts include projectile points, multi-purpose unifacial tools, burins, gravers, and spokeshaves (Tankersley 1994). The most diagnostic artifacts associated with this period are fluted points that exhibit a groove or channel positioned at the base to facilitate hafting. The projectiles dating from the late Paleoindian period generally lack this trait; however, the lance form of the blade is retained and is often distinctive from the following Early Archaic period (Justice 1987).

The Archaic period has been broken down into three sub-categories including the Early, Middle, and Late Archaic. During the Early Archaic period (ca. 10,000-8000 B.P.), the environment was becoming increasingly arid as exhibited by the canopy (Shane 1987). This period of dryness allowed for the exploitation of areas that were previously inaccessible or undesirable. The Early Archaic period does not diverge greatly from the Paleoindian regarding the type of settlement. Societies still appear to be largely mobile with reliance on herding animals (Fitting 1963). For these reasons, Early Archaic artifacts can be encountered in nearly all settings throughout Ohio. Tool diversity increased at this time to include hafted knives that were often re-sharpened by the process of beveling the utilized blade edge and intense basal grinding (Justice 1987). There is a basic transition from lance-shaped points to those with triangular blades. Notching becomes a common hafting technique. Other characteristic traits occurring almost exclusively in the Early and Middle Archaic periods are basal bifurcation and large blade serrations. Tool forms begin to vary more and may be a reflection of differential resource exploitation. Finished tools from this period can include bifacial knives, points, drills/perforators, utilized flakes, and scrapers.

The Middle Archaic period (8000-6000 B.P.) is poorly understood in Ohio. Some (e.g., Justice 1987) regard small bifurcate points as being indicative of this period. Ground stone artifacts become more prevalent at this time. Other hafted bifaces exhibit large side notches with squared bases, but this same trait can extend back to the Paleoindian period. The climate at this time is considered to be modern. The Middle Archaic period subsistence tended to be associated with small patch foraging involving a consistent need for mobility with a shift towards stream valleys (Stafford 1994). Sites encountered from this time period through most of Ohio tend to be lithic scatters or isolated finds. The initial appearance of regional traits seems to occur at this time.

The Late Archaic period in Ohio (ca 6000-3000 B.P.) diverges from the previous periods in many ways. Preferred locations appear to have been repeatedly occupied. The more intensive and repeated occupations often resulted in the creation of greater social and artifact complexity. The environment at this time is warmer and drier. Most elevated landforms in northeastern Ohio have yielded Archaic artifacts (Prufer and Long 1986: 7), and the same can be stated for the remainder of Ohio.

Various artifacts are diagnostic of the Late Archaic period. Often, burial goods provide evidence that there was some long-distance movement of materials, while lithic materials used in utilitarian assemblages are often from a local chert outcrop. There is increased variation in projectile point styles that may reflect regionalism. Slate was often used in the production of ornamental artifacts. Ground and polished stone artifacts reached a high level of development. This is evident in such artifacts as grooved axes, celts, bannerstones, and other slate artifacts.

It is during the Terminal Archaic period (ca 3500-2500 B.P.) that extensive and deep burials are encountered. Regional Terminal Archaic expressions within Ohio include Crab Orchard in the southwest, Glacial Kame in the north, and Meadowood in central to northeastern Ohio. Along the Ohio River, the intensive Riverton culture occupations have been documented. Pottery makes its first appearance during the Terminal Late Archaic.

The Early Woodland period (ca 3000-2100 B.P.) in Ohio is often associated with the Adena culture and the early mound builders (Dragoo 1976). Early and comparably simple geometric earthworks first appear with mounds more spread across the landscape. Pottery at this time is often thick and tempered with grit, grog, or limestone; however, it becomes noticeably thinner towards the end of the period. There is increased emphasis on gathered plant material, including maygrass, chenopodium, sunflower, and squash. Habitation sites have been encountered that include circular structures having a diameter of up to 18.3 m (Webb and Baby 1963) and often with paired posts (Cramer 1989). Artifacts dating from this period include leaf-shaped blades with parallel to lobate hafting elements, drilled slate pieces, ground stone, thick pottery, and increased use of copper. Early Woodland artifacts can be recovered from every region of Ohio.

The Middle Woodland period (ca 2200-1600 B.P.) is often considered to be equivalent to the Hopewell culture. The largest earthworks in Ohio date from this time period. There is dramatic increase in the appearance of exotic materials that appear most often in association with earthworks and burials. Artifacts representative of this period include grit-tempered and thinner pottery, dart-sized projectile points (Lowe Flared, Steuben, Snyders, and Chesser) [Justice 1987], exotic materials (mica, obsidian, and marine shell, etc.). The points are often thin, bifacially beveled, and with flat crosssections. There seems to have been a marked increase in the population as well as increased levels of social organization. Middle Woodland sites seem to reflect a seasonal exploitation of the environment. There is a notable increase in the amount of Eastern Agricultural Complex (EAC) plant cultigens, including chenopodium, knotweed, sumpweed, and little barley. This seasonal exploitation may have followed a scheduled resource extraction year in which the populations moved camp several times per year, stopping at known resource extraction loci. Middle Woodland land use appears to focus on the regions surrounding earthworks (Dancey 1992; Pacheco 1996); however, there is evidence of repeated occupation away from earthworks (Weller 2005). Household structures at this time vary with many of them being squares with rounded corners (Weller 2005). Exotic goods are often attributed to funerary activities associated with the mounds and earthworks. Utilitarian items are more frequently encountered outside of funerary/ritual contexts. The artifact most diagnostic of this period is the bladelet (and core), a prismatic and thin razor-like tool. Middle Woodland remains are more commonly recovered from central Ohio south and are lacking from most areas in the northern and southeastern part of the state.

The Late Woodland period (ca A.D. 400-900) is separable from the previous period in several ways. There appears to be a population increase and a more noticeable aggregation of groups into formative villages. The villages are often positioned along large streams, on terraces, and were likely seasonally occupied (Cowan 1987). This increased sedentism was due in part to a greater reliance on horticultural garden plots, much more so than in the preceding Middle Woodland period. The early Late Woodland groups were growing a wide variety of EAC crop plants that included maygrass, sunflower, and domesticated forms of goosefoot and sumpweed. This starch and protein diet was supplemented with wild plants and animals. Circa A.D. 800 to 1000, populations adopted maize agriculture, and around this same time, shell-tempered ceramics appear. Other technological innovations and changes during this time period included the bow and arrow and changes in ceramic vessel forms.

Newtown is an early Late Woodland phase in the Miami River Valley that has been dated to A.D. 450-800 (Seeman 1981). The geographic range of this phase is southern Ohio and northern Kentucky. Typical artifacts recovered from Newtown phase sites include Chesser Notched projectile points, flint and ground stone celts, rectangular slate gorgets, and limestone and shale discs. There is an absence of any triangular points or bladelets. Newtown phase pottery is typically vertically cord-marked with angular shoulders.

The Late Prehistoric period (ca A.D. 1000-1550) is distinctive from former periods. At this time, regions were a major focus of specific groups. Large and sometimes palisaded villages were usually tied to a regional focus such as Fort Ancient (southern half of Ohio) or Monongahela (east and southeast Ohio). There is a marked increase of evidence supporting residential sedentism. Population density rose sharply with new and more effective means of resource and land exploitation. Communal aggregations such as villages are comparably marked after 700 AD (Fuller 1981; Pollack and Henderson 2000). Maize or corn agriculture as well as other cultigens made up a significant portion of the prehistoric diet. There appears to be an increase in domestic pottery production. Social organization is presumed to have become more complex and possibly moved towards a chiefdom model during the Late Prehistoric period. Artifact types are similar to those from the previous period; however, pottery is often thinner with differing decorative treatments that express regional differences. Structures can be round or elongated ovals with larger sites often being located in large stream valleys.

In southwestern Ohio, the descendant of the Late Woodland Newtown culture was the Fort Ancient culture (A.D. 1000-1670) [Pollack and Henderson 2000: 195]. There were three distinct phases within the culture: the Turpin phase, the Shomaker phase, and the Mariemont phase. Type sites for the culture include the Turpin site along the Little Miami River in Hamilton County and the Shomaker site in the lower Great Miami River Valley. Artifacts commonly associated with Fort Ancient sites include shell-tempered pottery, spatula-shaped celts, stone discoidals, triangular projectile points, antler harpoon heads, spades, and wall trench architecture. Fort Ancient villages often have central plazas, as well as stockades that encircled the villages (Cowan 1987).

Protohistoric to Settlement

By the mid-1600s, French explorers traveled through the Ohio country as trappers, traders, and missionaries. They kept journals about their encounters and details of their travels. These journals are often the only resource historians have regarding the early occupants of seventeenth century Ohio. The earliest village encountered by the explorers in 1652 was a Tionontati village located along the banks of Lake Erie and the Maumee River. Around 1670, it is known that three Shawnee villages were located along the confluence of the Ohio River and. the Little Miami River. Because of the Iroquois Wars, which continued from 1641-1701, explorers did not spend much time in the Ohio region and little else is known about the natives of Ohio during the 1600s. Although the Native American tribes of Ohio may have been affected by the outcome of the Iroquois Wars, no battles occurred in Ohio (Tanner 1987).

French explorers traveled extensively through the Ohio region from 1720-1761. During these expeditions, the locations of many Native American villages were documented. In 1751, a Delaware village known as Maguck existed near present-day Chillicothe. In 1758, a Shawnee town known as Lower Shawnee 2 existed at the same location. The French also documented the locations of trading posts and forts, which were typically established along the banks of Lake Erie or the Ohio River (Tanner 1987).

While the French were establishing a claim to the Ohio country, many Native Americans were also entering new claims to the region. The Shawnee were being forced out of Pennsylvania because of English settlement along the eastern coast. The Shawnee created a new headquarters at Shawnee Town, which was located at the mouth of the Scioto River. This headquarters served as a way to pull together many of the tribes which had been dispersed because of the Iroquois Wars (Tanner 1987).

Warfare was bound to break out as the British also began to stake claims in the Ohio region by the mid-1700s. The French and Indian War (1754-1760) affected many Ohio Native Americans; however, no battles were recorded in Ohio (Tanner 1987). Although the French and Indian War ended in 1760, the Native Americans continued to fight against the British explorers. In 1764, Colonel Henry Bouquet led a British troop

from Fort Pitt, Pennsylvania to near Zanesville, Ohio.

In 1763, the Seven Years' War fought between France and Britain, also known as the French and Indian War ended with The Treaty of Paris. In this Peace of Paris, the French ceded their claims in the entire Ohio region to the British. When the American Revolution ended with the Second Treaty of Paris in 1783, the Americans gained the entire Ohio region from the British; however, they designated Ohio as Indian Territory. Native Americans were not to move south of the Ohio River but Americans were encouraged to head west into the newly acquired land to occupy and govern it (Tanner 1987).

By 1783, Native Americans had established fairly distinct boundaries throughout Ohio. The Shawnee tribes generally occupied southwest Ohio, while the Delaware tribes stayed in the eastern half of the state. Wyandot tribes were located in north-central Ohio, and Ottawa tribes were restricted to northeast Ohio. There was also a small band of Mingo tribes in eastern Ohio along the Ohio River, and there was a band of Mississauga tribes in northeastern Ohio along Lake Erie. The Shawnee people had several villages within Ross County along the Scioto River (Tanner 1987). Although warfare between tribes continued, it was not as intense as it had been in previous years. Conflicts were contained because boundaries and provisions had been created by earlier treaties.

In 1795, the Treaty of Greenville was signed as a result of the American forces defeat of the Native American forces at the Battle of Fallen Timbers. This allocated the northern portion of Ohio to the Native Americans, while the southern portion was opened for Euro-American settlement. Although most of the battles which led up to this treaty did not occur in Ohio, the outcome resulted in dramatic fluctuations in the Ohio region. The Greenville Treaty line was established, confining all Ohio Native Americans to northern Ohio, west of the Tuscarawas River (Tanner 1987).

Ohio Native Americans were again involved with the Americans and the British in the War of 1812. Unlike the previous wars, many battles were fought in the Ohio country during the War of 1812. By 1815, peace treaties began to be established between the Americans, British, and Native Americans. The Native Americans lost more and more of their territory in Ohio. By 1830, the Shawnee, Ottawa, Wyandot, and Seneca were the only tribes remaining in Ohio. These tribes were contained on reservations in northwest Ohio. By the middle 1800s, the last of the Ohio Native Americans signed treaties and were removed from the Ohio region.

Montgomery County History

Under the rule of Northwest Territory, Montgomery County was a small part of Dayton Township within the enormous Hamilton County. The division came in 1803 with Ohio's statehood. The newly formed county was named for General Richard Montgomery, a Revolutionary War hero. At that earliest time, Montgomery's territory extended north of Butler and Warren Counties along the western edge of Ohio, all the way to the northern extent of the state. In later years, with the formations of other counties, Montgomery was trimmed to its present size and shape (Drury 1909; Edgar 1976; Everts 1875; Reed 1880; Montgomery History Planning Committee 1990; W. H. Beers & Co. 1882).

The settlement of the region began before statehood with the ideological purchase of John Cleves Symmes. He bought the better portion of land between the Miamis with the idea of reselling it to homesteaders for large profits. His idea was sound, but his timing was terrible. Those who contracted with Symmes failed to migrate to the Miami Valley because of increased hostilities with the Native American Indians. Consequently because they did not remove there, they did not feel obligated to pay for the land which they had contracted. Symmes was ruined and sold two ranges of his purchase to four men: Aurthur St. Clair, James Wilkinson, Jonathan Dayton, and Israel Ludlow with the condition that they build three settlements in their tract (Drury 1909; Edgar 1976; Everts 1875; Reed 1880; Montgomery History Planning Committee 1990; W. H. Beers & Co. 1882).

Soon after the Treaty of Greenville assured peace in the west, the surveying parties of Daniel C. Cooper and John Dunlap left Cincinnati and foraged into the wild Miami Valley. Israel Ludlow laid out a town in November 1795 and named it for his colleague Jonathan Dayton. Cheap land was promised to any who would break it. Forty-six pioneers volunteered for the privilege, but only 19 of them carried through with their purchase and settlement of Dayton lots. These were the first residents of the city, of the county, and some of the very first in the Miami Valley. The earliest of these families came in the winter and spring of 1796. Some other remote settlements were made soon after these at Dayton, but it was Dayton that would predominate the region in growth and cultural significance (Edgar 1976; Everts 1875; Reed 1880; Montgomery History Planning Committee 1990).

Government land offices opened the area further in 1801. With statehood came real growth. When Montgomery County was formed in March of 1803, Dayton was naturally chosen as the county seat. The first court in the new county was held four months later. A proper courthouse and jail was built in 1806. The War of 1812 spurred regional industry as Dayton lay on the main road of westward travel for the military (Reed 1880). A further impetus was the Miami Canal which commenced operation in May of 1827. Dayton found itself linked to other metropolises by rail in 1851. Gas and Iron ruled the industry of that day. Electricity came in 1881, automobiles in 1903 – the same year that two Dayton brothers broke into the history books by recording the first manned flight (Drury 1909; Edgar 1976; Everts 1875; Reed 1880; Montgomery History Planning Committee 1990; W. H. Beers & Co. 1882).

Manufacturing continued to play an important role in Montgomery County through the 20th century. DELCO and General Motors built and build mechanisms of every kind for land, sea, and air. Farming is a stable industry in the outlying areas of the county as it has been since the first. Technology is present in the form of several research institutions and the US Wright-Patterson Air Force Base. Service industries abound as they do in every metropolitan environment. Transportation is still a large industry. Though the rivers are no longer used, there are other, more modern avenues. There are three interstate highways in and around Montgomery County. Dayton International Airport is a super-hub for Emery Worldwide's national airfreight division. Dayton is also home to five Fortune 500 companies: National Cash Register Corporation, Mead Corporation, Philips Industries, Standard Register, and Reynolds & Reynolds Company (Reed 1880; Montgomery History Planning Committee 1990).

Dayton was home to the state's first public library (Everts 1875). It opened in 1835. Through the work of Mrs. H. G. Carnell, the Dayton Art Institute became one of the Midwest's greatest galleries in the 1920's. The county is home to many institutions of higher learning, hospitals, and religious places of worship (Reed 1880; Montgomery History Planning Committee 1990). Dayton is currently the 5th largest city in the state.

In 1913, a major flood took numerous lives and caused a large of amount of property damage. After this, Ohio Governor James Cox created a Citizens Relief Commision headed by Civil Engineer Arthur E. Morgan. Stream modification and the construction of dams in the Dayton area began in 1915 to help control flood waters. The Great Miami River stream bed was widened within the city of Dayton and dams were built between 1918 and 1922. The Miami Conservation District now manages these structures (Miami Conservancy District 2009; Rogers 2013; Ohio History Central 2005).

Butler Township History

Butler Township is located in the northeastern part of Montgomery County. The township's namesake is a field office in the militia with the name 'Butler'. The township was initially settled circa 1800 by Henry Yount, George Sinks, Thomas Newman, and John Quillan. These first settlers lived in the vicinity of Little York and along the Stillwater River. Most of the early activities were associated with agriculture including the development of mills. Joseph Cooper constructed the first sawmill and Andrew Waymire the first grist mill. The county is noted as having ample timber, gravel, and construction materials. One of the unique religious aspects of the township was the early establishment of the Society of Friends Church to the east of Little York (Everts 1875:24; Howe 1888).

Some of the larger communities dating to the nineteenth century include Vandalia, Chambersburg, little York, and Johnson. As the City of Dayton grew into the twentieth century, it urban sprawl extended into the county. The area northwest of Vandalia was fairly level upland and was well suited for the establishment of the Dayton International Airport. Many of the related businesses and corporations sprouted in the abutting terrain as a result. Other factors that have contributed to the economic growth and population include Interstate highways (I-70 & I-75), railroads, and the short-lived Miami-Erie Canal. Agricultural pursuits are still a large part of the local economy in this township as much of the northern part remains rural.

Research Design

The purpose of a Phase I survey is to locate and identify cultural resources that will be affected by the planned pipeline. This includes archaeological deposits as well as architectural properties that are older than 50 years regarded as being in the APE; however, the impact of an installed underground utility is typically minimal to above ground structures. Once these resources are identified, they are evaluated for their eligibility or potential eligibility to the NRHP. These investigations are directed to answer or address the following questions:

- 1) Did the literature review reveal anything that suggests the project area had been previously surveyed, and what is the relationship of previously recorded properties to the project area?
- 2) Are cultural resources likely to be identified in the project area?

Archaeological Field Methods

The survey conducted for this project used two methods of sampling/testing to identify and evaluate cultural resources. These included surface collection, shovel probing, shovel testing, and visual inspection.

Shovel test unit excavation. Shovel test units were placed at 15-m intervals. Shovel test units measure 50 cm on a side and are excavated to 5 cm below the topsoil/subsoil interface. Individual shovel test units were documented regarding their depth, content and color (Munsell). Wherever sites are encountered, Munsell color readings are taken per shovel test unit. All of the undisturbed soil matrices from shovel test units are screened using .6 cm hardware mesh. When sites are encountered, additional shovel test units will be excavated at 7.5 m intervals extending on grid and in the two cardinal directions within the corridor from the positive locations.

Shovel probe excavation. Shovel probes were excavated during these investigations to document the extent of the disturbance associated with modern construction activities. These probes were excavated similarly to shovel test units. They had the same dimensions of 50 cm on a side, but were not screened. They were excavated at 15-m and/or 30 m intervals and to a depth of 15-20 cm or deep enough to establish lack of soil integrity.

Surface Collection. The fields that were investigated utilizing this method had been planted to winter wheat, standing corn, or were soybean stubble. The surface visibility was sufficient for this methodology and it was conducted before the snow cover. Surface collection was conducted in areas where conditions were amiable and offered between 40-60 percent bare ground visibility. Pedestrian transects were spaced at 5 m intervals. Upon the identification of cultural materials, the surface collection was

intensified. The location of any prehistoric cultural materials was plotted using a Trimble GeoXT global positioning system.

Visual inspection. This method was conducted to document the nature of the project area and its setting. This method was used to verify the absence or likelihood of any cultural resources within and around the project area to assist in defining the APE.

The application of the resulting field survey methods was documented in field notes, field maps, and project plan maps.

Historic Period Artifact Analysis

The artifacts recovered during these investigations will be inventoried and analyzed. The inventory will be specific to type and age if the artifact is temporally diagnostic. The functional inventory of the site will be similar to that of South (1977) where artifacts are segregated into categories such as kitchen, arms, architecture, and etcetera. South's (1977) theoretical approach also emphasizes the development and interpretation of artifact patterns found at sites. This method can be used to understand depositional patterning on the intra- and inter-site level. Ball (1984) modified this approach, making it applicable for use in the Ohio Valley.

Artifacts recovered from the subsurface testing will be inventoried and the results analyzed to identify differential patterning of functionally specific artifact groups within areas of high and low artifact density. The specific historic period temporal affiliation of the artifacts will be determined by relative dating. The identification of historic artifacts for purposes of determining age is guided by ceramic/artifact analyses or source books by Carskadden et al. (1985); Cushion (1980); Dalrymple (1989); Deiss (1981); Esary (1982); Ewins (1997); Greer (1981); Hughes and Lester (1981); Hume (1991); Lang (1995); Majewski and O'Brien (1987); Mansberger (1981); Manson and Snyder (1997); McConnell (1992); McCorvie (1987); Miller (1987); Newman (1970); Ramsay (1976); Sonderman (1979); Spargo (1926); Sprague (2002); Stelle (2001); Sunbury (1979); Sussman (1977); Visser (1997); and Zimler (1987).

Curation

The landowner for site 33MY901 had not been contacted at the time this report was being completed. A letter determining the disposition of the collected materials will be sent and the artifacts addressed accordingly. Notes and maps affiliated with this project will be maintained at Weller's files.

Literature Review

The literature review study area is defined as a one mile radius from the center of the project. In conducting the literature review, the following resources were consulted at OHPO, at the Columbus Metropolitan Library, at the State Library of Ohio, and from various online resources:

An Archaeological Atlas of Ohio (Mills 1914);
 OHPO United States Geological Survey (USGS) 7.5' series topographic maps;
 Ohio Archaeological Inventory (OAI) files;
 Ohio Historic Inventory (OHI) files;
 National Register of Historic Places (NRHP) files;
 OHPO consensus Determinations of Eligibility (DOE) files;
 OHPO CRM/contract archaeology files; and
 Montgomery County atlases, histories, historic USGS 15' series topographic map(s), and current USGS 7.5' series topographic map(s).

A review of the *Atlas* (Mills 1914) was conducted. There were no resources situated within or adjacent the project.

The OHPO topographic maps indicated 23 previously recorded archaeological sites within the project study radius (Table 2). These sites include 16 prehistoric, 2 historic, and 5 prehistoric and historic components. There are four sites that yield prehistoric period temporally diagnostic materials, and date from the Late Archaic. The majority of the sites are unassigned prehistoric period components. None of these sites are located within the project area. Many of these sites were identified during professional surveys. Site 33MY380 (Figure 4) is near the project corridor; this is an unassigned prehistoric site.

| Table 2. Previously Recorded Archaeological Sites Located in the Study Radius. | | | | |
|--|---------------------------------|------------------------|-------------|--|
| Site Number | Site Type | Temporal Association | Diagnostics | |
| MY892 | Lithic Scatter | Unassigned Prehistoric | | |
| 893 | Lithic Scatter | Unassigned Prehistoric | | |
| 894 | lithic scatter | Unassigned Prehistoric | | |
| 803 | Open-historic/lithic scatter | Unassigned | Unknown | |
| 352 | Open-lithic scatter | Late Archaic | points | |
| 353 | Open-lithic scatter | Late Archaic | points | |
| 354 | Open-Lithic Scatter | Late Archaic | points | |
| 355 | Open-lithic scatter | Unassigned Prehistoric | | |
| 356 | Open-lithic scatter | Unassigned Prehistoric | | |
| 365 | Historic scatter | Unassigned | Unknown | |
| 611 | Historic scatter | Unassigned | Unknown | |
| 405 | Open-historic/lithic scatter | Unassigned | Unknown | |
| 406 | Open-historic/lithic scatter | Unassigned | Unknown | |
| 654 | Open-lithic scatter | Unassigned Prehistoric | | |
| 655 | Open-lithic scatter | Unassigned Prehistoric | | |
| 656 | Open-historic/lithic scatter | Unassigned | Unknown | |
| 377 | Open-lithic scatter | Unassigned Prehistoric | | |
| 378 | Open-lithic scatter | Unassigned Prehistoric | | |
| 379 | Open-lithic scatter | Unassigned Prehistoric | | |
| 380 | Open-lithic scatter | Unassigned Prehistoric | | |
| 381 | Open-lithic scatter | Unassigned Prehistoric | | |

| 407 | Open-lithic scatter | Late Archaic | points |
|-----|---------------------|--------------|--------|
| | | | |

A review of the OHI files was conducted. There are 22 OHI resources recorded within the study radius (Table 3). These resources are not located within or immediately adjacent to the project corridor. These will not be impacted or affected by the planned construction as it is an underground utility corridor. Sites MOT0176413, MOT0176213, and MOT0174313 are near the project corridor. No buildings are being taken as part of this project.

| Table 3. OHIs filed in the study radius. | | | | | |
|--|---|--------------------------------------|--------------------------------|----------------------------|------|
| OHI # | PresentName & other name | Address | Arch. Style | Historic Use | Date |
| MOT0164113 | Wilson Farm | 10016 N Frederick Pike | Not Discernible from OHI Form | Single Dwelling | 1865 |
| MOT0173113 | | 2117 Old Springfield Rd | Vernacular | Single Dwelling | 1870 |
| MOT0173213 | Palivec House | 2260 Old Springfield Rd | Vernacular | Single Dwelling | 1870 |
| MOT0174113 | Polk Grove Church | 9190 Frederick Pike | Gothic Revival | Church/Religious Structure | 1860 |
| MOT0174213 | | 9250 Dog Leg Rd | Vernacular | Single Dwelling | 1830 |
| MOT0174313 | | 9261 Dog Leg Rd | Prairie | Single Dwelling | 1910 |
| MOT0175613 | | 8501 Frederick Pike | Vernacular | Single Dwelling | 1880 |
| MOT0175713 | | 2075 Kershner Rd | Colonial Revival | Single Dwelling | 1900 |
| MOT0175813 | | 8525 Dog Leg Rd | Not Discernible from OHI Form | Single Dwelling | 1870 |
| MOT0176213 | | SWC Peters Pike & Old Springfield Rd | Colonial Revival | Single Dwelling | 1915 |
| MOT0176313 | | 2473 Old Springfield Rd | Vernacular | Single Dwelling | 1890 |
| MOT0176413 | | 11008 Dog Leg Rd | Vernacular | Single Dwelling | 1860 |
| MOT0200413 | Jesse Jackson House | 1810 Old Springfield Rd | Gothic Revival | Single Dwelling | 1870 |
| MOT0543113 | WE Llewellyn, Jr House | 321 Kirkwood Dr | No academic style - Vernacular | Single Dwelling | 1957 |
| MOT0543213 | Quest for Independence Sprague Electric Company; Alpha School | 300 W National Rd | Modern Movements | Office | 1962 |
| MOT0543413 | Fox Cleaners | 417 Helke Rd | Modern Movements | Retail store/shop | 1968 |
| MOT0545413 | Richard E Partlow House | 827 Stewville Dr | Colonial Revival | Single Dwelling | 1956 |
| MOT0545513 | Continental Square Apartments | 806-810 Continental Ct | Modern Movements | Apartment House | 1969 |
| MOT0545613 | James H Grimsley House | 547 Adeline Ave | Colonial Revival | Single Dwelling | 1956 |
| MOT0546613 | St John's Lutheran Church | 122 W National Rd | Modern Movements | Church/Religious Structure | 1958 |
| MOT0034213 | Amateur Trapshooting Assoc Hdqtrs | 601 W National Rd (US 40) | Colonial Revival | SOCIAL | 1924 |
| MOT0012913 | Miami Conservancy Dist; James Patty House | Patty Rd | Federal | Single Dwelling | 1845 |

A review of the NRHP files and OHPO consensus determination of eligibility files was conducted. The National Road is affiliated with this project, but no relative buildings or structures are within or near the project corridor.

A review of the CRM/contract files indicates that there have been surveys conducted in the vicinity of the project corridor (Keel 1976; Riordan 1984; Baker et al. 1992; Clifford 2001; Harper 2007; Versluis 2010). These surveys identified many of the sites that were documented in the study radius. Keel's survey (1976) was conducted for the airport's access road and is bisected by the current project corridor. This survey did not identify any sites relative to this project.

Cartographic/atlas resources were reviewed for the project area. The *Combination Atlas for Montgomery County, Ohio* (Everts 1875) was reviewed. This resource indicated numerous previous landowners as the pipeline is miles long. Most of the time, the project area avoids where older residences are indicated. However, the preparation/staging area this is situated north of Dogleg Road was owned by Davis

Waymire in 1875 (Figure 5). This residence continues to be indicated on early twentieth century mapping (Figure 6) and buildings are noted into the modern era (Figure 2). It seems likely that archaeological material would be identified from this area as well as architectural remains.

Evaluation of Research Questions 1 and 2

There were two questions presented in the research design that will be addressed at this point. These are:

- 1) Did the literature review reveal anything that suggests the project area had been previously surveyed?
- 2) Are cultural resources likely to be identified in the project area?

The literature review of the recorded body of data did not identify any recorded cultural resources within or adjacent to the project corridor. The project area is located in an upland situation and little is anticipated in regards to evidence for intensive prehistoric period activity. The project corridor briefly intercepts (goes under) the National Road; however, associated structures/buildings with this are not in the vicinity of the corridor. Only a small part of the subject area has been previously investigated (Keel 1976). This was for the roadway extending to the airport and no sites were identified that are close to the current area of investigation.

Fieldwork Results

The field investigations for this project were conducted in December of 2013 (Figures 7-32). The surface collection aspect of the fieldwork was accomplished prior to the blanket of snow cover. The subsurface methods of sampling were applicable to the areas where surface visibility was lacking regardless of the snowfall. The weather conditions did hinder a more timely completion of the field investigations as two prospective field days were abandoned due to poor driving conditions and severe weather warnings. The field investigations for this project involved visual inspection, surface collection, and subsurface testing. Subsurface testing dominated the sampling methods as many locations, despite being agricultural fields, lacked sufficient bare surface visibility. Severe disturbances associated with modern road construction activities and locations near the airport account for a sizeable amount of this project corridor. The fieldwork resulted in the identification of one previously unrecorded archaeological site, 33MY901. This is a historic period component that was identified to the northwest of the airport.

The project area is located in upland, glaciated terrain that is nearly level to gently undulating. The majority of the investigations traversed through farm fields that had either been harvested or standing, mature cornfields. The pipeline corridor and its alternate skirt any buildings or structures and will utilize directional drilling techniques to go under roadways. The survey was also conducted within these pull-backs and set up areas associated with the directional drilling; most are positioned to the south of the airport. A staging, storage, and preparation area was investigated that is north of Dogleg Road and northwest of the airport. This was a former farmstead location. The southeastern terminus of the project is located within an urban setting and hooks up to an existing pipeline in Vandalia. From this point, it extends westward through largely undeveloped country before turning northward in eastern part of Section 13. The pipeline turns northward, crosses under the National Road and follows along the northern right-ofway for about .8 km (.5 mi) and turns north again. The corridor then extends in a northeasterly direction and along the north side of the proposed and existing Dogleg Road right-of-way. In the central part of Section 7, the Preferred and Alternate routes split. Both routes extend northward and then eastward. The Alternate terminates just south of County Line Road and the Preferred is just north of Old Springfield Road (Figure 2).

Surface collection methods were accomplished in several soybean stubble and winter wheat fields. These were all located on the south side of the airport and this work was completed prior to snowfall. The bare ground surface visibility of these fields was near 50 percent and noticeably higher on any slight elevations. The range of surface visibility was 50-80 percent. There were no cultural materials identified during the surface collection conducted for this project.

The field investigations involved the excavation of 1300 shovel test units and 53 shovel probes (Figures 7-32). Occasionally, saturated locations, streams, and severe disturbance precluded archaeological examination. However, the majority of the project corridor was subjected to these subsurface forms of investigation. Site 33MY901 was identified during shovel testing and visual inspection (Figures 9 and 22). The testing consisted of the excavation of two or three transects through most of the area. In areas along property lines and abutting roads, the survey accounted for a 30 m area, which involved the excavation of two shovel test unit transects. There were three transects excavated in the corridor for areas that cut cross-country.

The shovel testing most frequently identified a plowzone throughout this project. There were no deep alluvial floodplain situations identified. The plowzone in this area is comprised of silt loam and silty clay loam soils that extend below the ground surface to about 25 cm. Regardless of the location, the hue of the topsoil is fairly consistent as its parent materials/formation processes are similar. The topsoil in this area is dark brown (10YR 3/3) silt loam. It is generally free of any gravels or rocky material except on elevations where glacial gravels are present. The topsoils are noticeably lighter in hue (brown, 10YR 5/3) on elevations and shallower due to erosion. The subsoil has a sub-angular blocky texture and contains a higher amount of clay. Its hue was dark yellowish brown (10YR 4/4 or 4/6) and its content was reflective of the content of the superior topsoil. A typical shovel test unit that is indicative of this description was excavated in Celina silt loam north of Dogleg Road and the airport (Figure 33).

Severe disturbance precluded testing for some portions of the project corridor. Disturbance in the form of grading and urban-related constructions was present in the southeastern part of the project and at the terminus. Right-of-way disturbances were encountered consistently as many roads are involved in this project. On the north side of airport, construction activities were underway for the relocation of Dogleg Road. Visual observation in the field and inspection of aerial maps determined that grading and fill soils comprised much of the area near the airport, especially in the northern part of the project where the Preferred and Alternate Routes terminate.

The field investigations were largely reliant upon the results of the subsurface testing. Cultural materials were lacking from most of the area examined (minus 33MY901). This is a reflection of the types of prehistoric sites that have been previously identified in the surrounding uplands. These are limited to numerically low amount of artifacts per site or isolated finds. It would be anticipated that early historic period and prehistoric period activity would be more focused along the Stillwater and Great Miami River Valleys in this area. The excavation of shovel test units in this area is unlikely to result in the identification of sites such as these. There was one site identified and it is associated with a former farmstead, something that was visually apparent and expected based on inspection of atlases/maps. The following is a description and evaluation of this site, 33MY901.

Site Description for 33MY901

This site is a historic period scatter of artifacts that was identified during shovel testing of a fallow, former yard. What would have been regarded as the residential yard along with its agricultural outbuildings is recognizable. There remain two modern outbuildings on the north end of this rectangle that is surrounded by fields. The driveway access stems northward from Dogleg Road to the nearly vacant lot that still has many older trees intact. However, any vestiges of the nineteenth century occupation are not visible above the surface. Shovel testing identified severe disturbance throughout the northern majority of the area that is related to grading upon the demolition of the residence and presumed other older buildings. Testing in the southern part of the site identified the historic period archaeological deposits. The site size is considered to be 11,613 sq m (125,000 sq f) and includes the lot and disturbed areas; however, intact archaeological deposits are only considered for an approximately 50 by 50 feet area in the southern part. The dimensions of the site are 500 feet north-south by 250 feet east-west.

The site is located to the north of Dogleg Road and in an upland environment/setting. This is in the Southwest Quarter of Section 7, Butler Township. It is drained by an unnamed tributary of the Great Miami River and is near the watershed with Mill Creek. Currently, this location is northwest of the Dayton International Airport.

Review of the county histories indicated that this location was once owned by Davis Waymire (Everts 1875). His residence is noted at this location and additional outbuildings were present on later maps. Waymire arrived in this area circa 1805 as a toddler with his father from Randolph County, North Carolina. He was Justice of the Peace for 40 years as well as County Commissioner for nine years (Everts 1875: 30 & 33). This location is not the same as his father's, who was an early settler for this area along Troy Road.

| Bag | D | D | A 4° P 4 | Madantal | Class | E | G |
|-----|-------|-------|-------------------------------|----------|--------------|--------------|-------|
| Ħ | Prov. | Prov. | Artilact | Material | Class | Function | Count |
| 1 | 100N | 75E | Redware | Ceramic | Kitchen | Storage | 6 |
| 2 | 100N | 100E | Brown transfer print | Ceramic | Kitchen | Serving | 1 |
| | | | plain whiteware | Ceramic | Kitchen | Serving | 1 |
| | | | blue-green bottle glass | Glass | Kitchen | Storage | 4 |
| | | | clear bottle glass | Glass | Kitchen | Storage | 1 |
| | | | Redware | Ceramic | Kitchen | Storage | 2 |
| | | | pane glass | Glass | Architecture | hardware | 1 |
| | | | wire nail | iron | Architecture | hardware | 2 |
| | | | misc iron | iron | Misc. | unknown | 1 |
| | | | hoe blade | iron | hardware | tool | 1 |
| | | | cut animal bone, beef rib | bone | Kitchen | food | 1 |
| | | | brick fragments, hand made | Ceramic | Architecture | construction | 6 |
| 3 | 125N | 100E | hand-painted whiteware | Ceramic | Kitchen | Serving | 1 |

 Table 4. Artifact Inventory for Site 33MY0901.

There were 28 historic period artifacts identified during the excavations of this site (Table 4). The artifacts are mostly indicative of middle nineteenth century occupation including: redware, transfer print ware, and hand-painted whiteware (Miller 1980; Majewski and O'Brien 1987) [Figure 34]. There were fragments of hand-made brick identified that is often regarded as pre-dating 1860 (Greer 1981; Mansberger 1981). The majority of the materials recovered are ceramic and kitchen-related. The testing recovered all the material from the topsoil and not from any sealed or buried stratigraphic contexts.

There are two extant and modern buildings associated with this site. This includes a Quonset hut-style machine storage structure (Figure 22). These buildings are apparent on the modern topographic map as 'purple' squares (Figure 2). This indicates that they were added to the 1965 map as part of its revision in the 1990s. They were built sometime after 1965 and are not older than 50 years; there were not recorded on OHI forms.

This site was evaluated for its eligibility for the NRHP and is not regarded as significant as it is considered to lack integrity. The majority of the site area has been subject to razing/grading activities that has severely degraded its integrity. Because this site lacks integrity (Little et al. 2000:39-43; U.S. Department of the Interior, National Park Service [USDI, NPS] 1997:44-45) and the ability to yield further and important information regarding history of this area, no further work is considered to be necessary.

This site is not considered to be eligible for inclusion into the NRHP, and further work at this site is not deemed necessary.

Fieldwork Summary

These investigations were conducted were conducted over a couple weeks in December of 2013. The initial conditions were free of snow and surface collection methods were accomplished at that time, where applicable. The remainder of the investigations at this location involved subsurface testing due to ground cover and/or snowfall. There were no situations present where the ground was frozen. The terrain in this area is fairly homogenous and not topographically dynamic. There were no prehistoric artifacts identified during this survey and perhaps not surprisingly considering the setting. The project corridor winds through upland terrain that is between two large river valleys, the Stillwater and the Great Miami. These are considered to be more attractive for habitation and use and where such cultural materials would be expected. The project corridor is within a setting that lacks defined landforms and it would be expected that transient or short-termed hunting-foraging behavior would transpire in these conditions. Evidence for this type of land use is difficult to define or identify during the excavation of shovel test units. However, these types of sites are generally not considered to be significant or important. The literature review indicated that prehistoric period sites had been identified in this setting. These sites contain few artifacts and limited temporally diagnostic materials. These sites were mostly identified during surface collection methods. Despite the efforts during these investigations, there were no prehistoric materials identified; however, this is congruent with expectations.

APE Definition and NRHP Determination

The APE is a term that must be applied on an individual project basis. The nature of the project or undertaking is considered in determining the APE. This may include areas that are off the property or outside of the actual project's boundaries to account for possible visual impacts. When construction is limited to underground activity, the APE may be contained within the footprint of the project area. The APE for this project includes the footprint of the construction limits, which is generally a corridor that is 80 feet wide. This includes the temporary and permanent easements. The undertaking is for a planned underground gas pipeline, so above ground cultural resources will have very limited impacts if any. The project plans do not involve the demolition of any buildings or structures.

The planned pipeline is located within multi-variant setting, but is largely within a rural area that is dominated by an agricultural fields and patchy woods. These are areas that are on the western side of the Dayton International Airport and near the City of Vandalia in northern Montgomery County. The southeastern terminus of the project is located in an urban setting affiliated with Vandalia. The project continues westward along the south side of the airport before turning north and crossing National Road towards the western end of the airport. There are single-family residences positioned

along the roadway along with occasional businesses. The route and alternate routes of the pipeline avoid the residential/building areas.

The field investigations identified one archaeological site, 33MY901. This is an historic period component that is within a setup/staging area north of Dogleg Road. The site is not regarded as being significant and is not considered to be eligible for inclusion into the NR. Considering the footprint of the project area and what is regarded as the APE, a finding of no historic properties affected is deemed appropriate for this project.

Recommendations

In December of 2013, Weller & Associates, Inc. completed Phase I Cultural Resource Management Investigations for approximately 10.5 km (6.5 mi) Vectren/Dayton Airport Z-167 Pipeline Relocation Project in Butler Township, Montgomery County, Ohio. The fieldwork involved surface collection, shovel testing, shovel probing, and visual inspection. Severe disturbances, especially in the vicinity of the airport and Dogleg Road were experienced and these precluded physical testing. There was one previously unrecorded archaeological site, 33MY901, identified during these investigations (Figure 35). This site dates from the middle of the nineteenth century to the modern era. This site is not considered to be significant and it does not possess qualities and aspects of integrity and significance that are necessary to meet the minimum requirements to be considered eligible for the National Register of Historic Places (33 CFR 60.4) and it is not regarded as a historic property as defined by 36 CFR 800.16(1). The proposed underground pipeline is not considered to adversely affect any historic properties. No further cultural resource management work is deemed necessary for this project.

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Figure 1. Political map of Ohio showing the approximate location of the project.



CONTOUR INTERVAL 10 FEET NATIONAL GEODETIC VERTICAL DATUM 1929



Figure 3. Aerial view of the project.





Figure 5. The *Combination Atlas Map of Montgomery County, Ohio* (Everts 1875) indicating the portion of the project on the Davis Waymire property.



Figure 6. Portion of the USGS *1906 Dayton*, and the *1907 Brookville*, *Ohio 15 Minute Series* (*Topographic*) maps indicating the approximate location of the project.









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39°54'30"N



39°54'30"N

39°54'45"N

39°54'45"N

Figure 10. Aerial map of the project indicating results of testing and photo orientations for sheet 4.

84°14'0'W-





39°55'0"N

39°55'0"N

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Figure 12. View of the disturbed conditions within the southeastern portion of the project.



Figure 13. Another view of the conditions within the southeastern portion of the project.



Figure 14. View of the disturbed conditions within the southeastern portion of the project south of U.S. 40.



Figure 15. View of the surface collected soybean field west of Peters Pike within the southern portion of the project.



Figure 16. View of typical road right of way disturbance.



Figure 17. View of the surface collected soybean field east of Dog Leg Road within the southern portion of the project.



Figure 18. The typical visibility within the surface collected soybean fields within the project.



Figure 19. View of the surface collected soybean field west of Dog Leg Road within the southern portion of the project.



Figure 20. View of the typical conditions within the shovel tested southwestern portion of the project.



Figure 21. View of the typical conditions within the shovel tested western portion of the project.



Figure 22. View of the Quonset Hut and Grain Bin associated with Site 33MY0901.



Figure 23. View of the typical conditions within the shovel tested northwestern portion of the project.



Figure 24. View of the disturbed visually inspected conditions along Old Springfield Road.



Figure 25. View of the typical conditions within the shovel tested northwestern portion of the project.



Figure 26. View of the typical conditions within the shovel tested northeastern portion of the project.



Figure 27. View of the disturbed area south of Lightner Road.



Figure 28. View of the typical conditions within the shovel tested northeastern portion of the project south of Lightner Road.



Figure 29. View of the disturbed conditions within the north eastern portion of the preferred route.



Figure 30. View of the conditions east of Peters Pike within the preferred route.



Figure 31. View of the disturbed south of Old Springfield Road.



Figure 32. A typical disturbed shovel probe from within the project.



Figure 33. A typical shovel test unit excavated within the project.





Figure 34. Some of the artifacts from Site 33MY0901.





In reply refer to 2013-MOT-25439

January 7, 2014

Melinda Stahl, Environmental Coordinator Utility Technologies International 4700 Homer Ohio Lane Groveport, OH 43125

Dear Ms. Stahl:

Re: Dayton International Airport Relocation Project, Montgomery County, Ohio

This is in response to the receipt, on December 30, 2013, of *Phase I Cultural Resource Management Investigations for the Approximately 10.5 km (6.5 mi) Vectren/Dayton Airport Z-167 Pipeline Relocation Project in Butler Township, Montgomery County, Ohio* (dated 12/23/2013). This project involves the relocation of a portion of pipeline around the Dayton International Airport. My comments are made pursuant to Section 106 of the National Historic Preservation Act of 1966, as amended, and the regulations at 36 CFR Part 800 and Ohio Power Siting Board rules for siting this project (OAC 4906-15-01).

The intention of the current survey was to locate and identify any cultural resources within the project area that may be eligible for the National Register of Historic Places (NRHP). For this project, the relocation of approximately 6.5 miles of pipeline is necessary to remove it front its current location within the Dayton International Airport. The survey report noted that portions of the survey corridor were within plowed agricultural fields with good visibility for surface collection while other areas within agricultural fields were not suitable for surface collection and were subjected to subsurface testing. Other areas outside the agricultural fields with poor visibility were also subjected to subsurface testing. One newly identified archaeological site was located during the survey (33MY901). The site was described as a historic scatter from the mid-nineteenth century into the modern period. A structure shows on the historic mapping and was still present into the modern quadrangle maps. However, the structure has since been razed. Although a scatter of historic artifacts associated with the property were identified, the razing of the structure has left the ground severely disturbed and the site lacks integrity. Weller & Associates, Inc., recommends that the site is not eligible for listing in the NRHP and no further work is recommended. I concur with this recommendation.

No further coordination is requested for this project unless the project changes or archaeological remains are discovered during the course of the project. In this situation, this office should be contacted as per 36 CFR § 800.13.

If you have any questions, please contact me at (614) 298-2000, or by email at cnelson@ohiohistory.org.

Sincerely,

Christopher Nelson, Project Reviews Manager

Cc: Ryan Weller, Weller & Associates Ed Steele, Ohio Power Siting Board

> OHIO HISTORICAL SOCIETY Ohio Historic Preservation Office 800 East 17th Avenue, Columbus, Ohio 43211 ph: 614.298.2000 fx: 614.298.2037 www.ohiohistory.org

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Case No(s). 13-1651-GA-BTX

Summary: Correspondence of Vectren Energy Delivery of Ohio, Inc. Transmitting Phase I Cultural Resource Mnagement Investigations Report electronically filed by Teresa Orahood on behalf of Sally Bloomfield