



April 10, 2012

STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT

Parkhill Point of Interconnect Various Lots and Concessions Geographic Townships of East Williams and West Williams now Municipality of North Middlesex Middlesex County, Ontario

REVISED REPORT

Submitted to:

Mr. Thomas Bird,
NextEra Energy Canada, ULC,
Suite 205,
5500 North Service Road,
Burlington, ON, L7L 6W6
Tel: (905) 335-4904 Fax: (905) 335-5731

Licensee: Irena Jurakic, M.A.

License Number: P319

PIF Number: P319-018-2012

FIT Number: FIT-F2BNU4R (Bornish); FIT-FZEYQNB (Adelaide);
FIT-FRZYKJA (Jericho)

Report Number: 11-1154-0030-2000-R02

Distribution:

4 Copies - NextEra Energy Canada, ULC.
1 Copy and 1 CD Copy - Ontario Ministry of
Tourism, Culture and Sport
2 Copies - Golder Associates Ltd.





Executive Summary

This Stages 1 and 2 archaeological assessment was conducted by Golder Associates Ltd. (Golder) on behalf of NextEra Energy Canada, ULC (NEEC) for the proposed Parkhill point of interconnect (POI), which will connect the proposed Bornish, Adelaide and Jericho Wind Energy Centres' lands with the hydro lines on the east side of the Parkhill POI study area. The study area consists of two portions, the Parkhill POI itself and the proposed transmission line route. The Parkhill POI is a parcel of approximately 18.5 hectares, located on part of Lot 18, Concession 17 East of Centre Road, in the Geographic Township of East Williams, now Municipality of North Middlesex, Middlesex County, Ontario. The associated proposed transmission line route is a parcel of approximately 40.5 hectares, located on part of Lots 3 to 18 and part of Lot 19 East Side of Centre Road, Concession 17 East of Centre Road, part of Lots 3 to 13 and part of Lot 18 East Side of Centre Road, Concession 16 East of Centre Road, and part of Lot 15, Concession 6 East of Centre Road, in the Geographic Township of East Williams and part of Lots 3 to 10 and part of Lot 19 West Side of Centre Road, Concession 17 West of Centre Road and part of Lots 3 to 9 and part of Lot 18 West Side of Centre Road, Concession 16 West of Centre Road, in the Geographic Township of West Williams, now Municipality of North Middlesex, Middlesex County, Ontario.

The *Green Energy Act* (2009) enabled legislation governing project assessments and approvals to be altered to allow for a more streamlined Renewable Energy Approval (REA) process. Under Section 22(1) of the REA, an archaeological assessment must be conducted if the proponent concludes that engaging in the project may have an impact on archaeological resources. In this report, Golder determines that archaeological potential for the recovery of pre-contact Aboriginal and Euro-Canadian historic archaeological resources exists within the study area. Currently, Ontario Regulation 359/09 of the *Environmental Protection Act* governs the REA process for renewable energy projects such as wind, anaerobic digestions, solar and thermal treatment facilities. This assessment was undertaken in order to meet the requirements for an application for a REA, as outlined in Ontario Regulation 359/09 section 22(3) of the *Environmental Protection Act*.

The Stage 2 archaeological assessment resulted in the identification of one archaeological site, Location 1 (AgHj-9). Due to the fact that Location 1 (AgHj-9) is a spatially discrete site producing mid-to-late 19th century historic Euro-Canadian cultural material, **it is recommended that this site be subject to a Stage 3 archaeological assessment to further evaluate its cultural heritage value or interest.**

The Ministry of Tourism, Culture and Sport is asked to accept this report into the Ontario Public Register of Archaeological Reports. Additional archaeological assessment is still required; hence the archaeological sites recommended for further archaeological fieldwork remain subject to Section 48(1) of the *Ontario Heritage Act* and may not be altered, or have artifacts removed, except by a person holding an archaeological licence.

The Executive Summary highlights key points from the report only; for complete information and findings, as well as the limitations, the reader should examine the complete report.



Table of Contents

1.0 PROJECT CONTEXT	1
1.1 Development Context	1
1.2 Archaeological Context	2
1.2.1 The Natural Environment	2
1.2.2 Previously Known Archaeological Sites and Surveys	2
1.2.3 Potential for Pre-contact Aboriginal Archaeological Resources	4
1.2.4 Existing Conditions	5
1.3 Historical Context	5
1.3.1 Potential for Post-contact Aboriginal Archaeological Resources	5
1.3.2 Potential for Historic Euro-Canadian Archaeological Resources	6
1.3.3 Recent Reports	7
2.0 FIELD METHODS	9
3.0 RECORD OF FINDS	10
3.1 Location 1 (AgHj-9)	10
3.1.1 Domestic Artifacts	10
3.1.1.1 Ceramic Artifacts	11
3.1.1.2 Glass Artifacts	12
3.1.1.3 Faunal Remains	12
3.1.2 Structural Artifacts	13
3.1.3 Metal Artifacts	13
3.1.4 Miscellaneous Artifacts	13
3.1.5 Artifact Catalogue	13
4.0 ANALYSIS AND CONCLUSIONS	15
4.1 Preliminary Indication of Location 1 (AgHj-9) Possibly Requiring Stage 4 Archaeological Assessment	15
5.0 RECOMMENDATIONS	16
6.0 ADVICE ON COMPLIANCE WITH LEGISLATION	17
7.0 BIBLIOGRAPHY AND SOURCES	18
8.0 IMAGES	23



**STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT,
PARKHILL POI, MIDDLESEX COUNTY, ONTARIO**

9.0 MAPS..... 27

10.0 IMPORTANT INFORMATION AND LIMITATIONS OF THIS REPORT 43

TABLES

Table 1: Registered Archaeological Sites Located One Kilometre of the Study Area 3

Table 2: Cultural Chronology of Middlesex County 3

Table 3: Inventory of Documentary Record..... 10

Table 4: Stage 2 Artifact Summary for Location 1 (AgHj-9)..... 10

Table 5: Summary of Ceramic Collection According to Ware Type, Location 1 (AgHj-9)..... 11

Table 6: Summary of Ceramic Collection According to Decorative Style, Location 1 (AgHj-9) 11

Table 7: Location 1 (AgHj-9) Artifact Catalogue 13

FIGURES

Figure 1: Location of Study Area..... 28

Figure 2: Treaty Boundaries Based on Morris 1943..... 29

Figure 3: A Portion of the Township of East Williams in the 1878 Illustrated Historical Atlas 30

Figure 4: A Portion of the Township of West Williams in the 1878 Illustrated Historical Atlas..... 31

Figure 5: Stage 2 Survey Methods and Results for the Parkhill POI (see Supplementary Document A) 32

Figure 6-A: Key Plan 33

Figure 6-B: Stage 2 Survey Methods Overview 34

Figure 6-01: Stage 2 Survey Methods..... 35

Figure 6-02: Stage 2 Survey Methods..... 36

Figure 6-03: Stage 2 Survey Methods..... 37

Figure 6-04: Stage 2 Survey Methods..... 38

Figure 6-05: Stage 2 Survey Methods..... 39

Figure 6-06: Stage 2 Survey Methods..... 40

Figure 6-07: Stage 2 Survey Methods..... 41

Figure 6-08: Stage 2 Survey Methods..... 42

PLATES

Plate 1: Field Conditions, Northeastern Edge of Parkhill Point of Interconnect Study Area, Facing South 23

Plate 2: Pedestrian Survey, Northeastern Edge of Parkhill Point of Interconnect Study Area, Facing South..... 23

Plate 3: Proposed Transmission Line Route, Disturbed – Not Assessed, Facing East Along Nairn Road..... 24



STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

Plate 4: Proposed Transmission Line Route, Disturbed – Not Assessed, Facing South Along Kerwood Road	24
Plate 5: Selected Ceramics from Location 1 (AgHj-9)	25
Plate 6: Selected Machine-Cut Nails from Location 1 (AgHj-9)	26



Project Personnel

Project Director	Jim Wilson, M.A. (P001), Principal, Senior Archaeologist
Project Manager	Jeffrey Muir, B.A. (R304)
Licensed Field Directors	Krista Lane, B.A. (R382), Walter McCall, Ph.D. (R351)
Report Production	Scott Martin, Ph.D. (P218), Irena Jurakic, M.A. (P319), Jeff Muir, B.A. (R304)
Field Assistants	Jamie Davidson, B.A. (R305), Christopher Lemon, B.A. (R289), Carey Matthews, B.Sc. (R404), Kris McDougall, Jeff Morant, Jeffrey Muir, B.A. (R304), Shannon Neill-Sword, B.A., LL.B., Philip Rees, B.Sc., Jordan Steinmann, Lauren Zapishny, B.A.
Office Assistants	John Campo, B.Sc., Lindsay Foreman, Ph.D. (R300), Greta Francis, B.A., Adam Hossack, B.A. (P084)
First Nations Observers	Brandy George, Luis Machinho
Senior Review	Jim Wilson, M.A. (P001), Principal, Senior Archaeologist
Land Access Contact	Thomas Bird, NextEra Energy Canada, ULC

Acknowledgements

Proponent Contact	Thomas Bird, NextEra Energy Canada, ULC
Ministry of Tourism, Culture and Sport	Shari Prowse, M.A., Robert von Bitter, B.A.



1.0 PROJECT CONTEXT

1.1 Development Context

This Stages 1 and 2 archaeological assessment was conducted by Golder Associates Ltd. (Golder) on behalf of NextEra Energy Canada, ULC (NEEC) for the proposed Parkhill point of interconnect (POI), which will connect the proposed Bornish (FIT-F2BNU4R), Adelaide (FIT-FZEYQNB) and Jericho (FIT-FRYZKJA) Wind Energy Centres' lands with the hydro lines on the east side of the Parkhill POI study area. The study area consists of two portions, the Parkhill POI and the proposed transmission line route. The Parkhill POI is a parcel of approximately 18.5 hectares, located on part of Lot 18, Concession 17 East of Centre Road, in the Geographic Township of East Williams, now Municipality of North Middlesex, Middlesex County, Ontario. The associated proposed transmission line route is a parcel of approximately 40.5 hectares, located on part of Lots 3 to 18 and part of Lot 19 East Side of Centre Road, Concession 17 East of Centre Road, part of Lots 3 to 13 and part of Lot 18 East Side of Centre Road, Concession 16 East of Centre Road, and part of Lot 15, Concession 6 East of Centre Road, in the Geographic Township of East Williams and part of Lots 3 to 10 and part of Lot 19 West Side of Centre Road, Concession 17 West of Centre Road and part of Lots 3 to 9 and part of Lot 18 West Side of Centre Road, Concession 16 West of Centre Road, in the Geographic Township of West Williams, now Municipality of North Middlesex, Middlesex County, Ontario (Figure 1).

The *Green Energy Act* (2009) enabled legislation governing project assessments and approvals to be altered to allow for a more streamlined Renewable Energy Approval (REA) process. Under Section 22(1) of the REA, an archaeological assessment must be conducted if the proponent concludes that engaging in the project may have an impact on archaeological resources. Currently, Ontario Regulation 359/09 of the *Environmental Protection Act* governs the REA process for renewable energy projects such as wind, anaerobic digestions, solar and thermal treatment facilities. This assessment was undertaken in order to meet the requirements for an application for a REA, as outlined in Ontario Regulation 359/09 section 22(3) of the *Environmental Protection Act*.

The objectives of the Stage 1 archaeological assessment were to compile all available information about the known and potential cultural heritage resources within the study area and to provide specific direction for the protection, management and/or recovery of these resources. In compliance with the provincial standards and guidelines set out in the *Standards and Guidelines for Consultant Archaeologists* (Government of Ontario 2011), the objectives of the Stage 1 archaeological overview/background study are as follows:

- To provide information about the study area's geography, history, previous archaeological fieldwork and current land conditions;
- To evaluate in detail the study area's archaeological potential to support recommendations for Stage 2 survey for all or parts of the property; and
- To recommend appropriate strategies for Stage 2 survey.

To meet these objectives Golder archaeologists employed the following research strategies:

- A review of relevant archaeological, historic and environmental literature pertaining to the study area;
- A review of the land use history, including pertinent historic maps; and



- An examination of the Ontario Archaeological Sites Database (ASDB) to determine the presence of known archaeological sites in and around the project area.

The objectives of the Stage 2 archaeological assessment were to provide an overview of archaeological resources on the property and to determine whether any of the resources might be artifacts and archaeological sites with cultural heritage value or interest and to provide specific direction for the protection, management and/or recovery of these resources. In compliance with the provincial standards and guidelines set out in the *Standards and Guidelines for Consultant Archaeologists* (Government of Ontario 2011), the objectives of the Stage 2 property assessment are as follows:

- To document all archaeological resources on the property;
- To determine whether the property contains archaeological resources requiring further assessment; and
- To recommend appropriate Stage 3 assessment strategies for archaeological sites identified.

Permission to enter the property and to remove artifacts was given by Mr. Thomas Bird of NEEC.

1.2 Archaeological Context

1.2.1 The Natural Environment

The study area is situated within the “Horseshoe Moraines” physiographic region (Chapman and Putnam 1984: 127-129; Hagerty and Kingston 1992:11) and immediately east of the “Huron Slope” physiographic region (Chapman and Putnam 1984:160-161). The “Horseshoe Moraines” are discussed by Chapman and Putnam (1984:127) in this way:

The Port Huron Moraine system forms the core of a horseshoe-shaped region flanking the upland that lies to the west of the highest part of the Niagara cuesta. The associated meltwater stream deposits are also included giving the region two chief landform components (a) the irregular, stony knobs and ridges which are composed mostly of till and with some sand and gravel deposits (kames); and (b) the more or less pitted sand and gravel terraces and swampy valley floors. ...the southern part of Huron County, has a fairly simple landscape...consists of morainic ridges composed of pale, brown, hard, calcareous, fine-textured till, with a moderate degree of stoniness. ...Huron clay loam is the most representative soil type on the morainic ridges.

(Chapman and Putnam, 1984:127)

The extensive Ausable River system runs east and south of the study area. A tributary of the Ausable River is a potable source running immediately northeast of the study area. The soils surrounding this river drainage range from mucky clays to silty loams and sands.

1.2.2 Previously Known Archaeological Sites and Surveys

According to the Archaeological Sites Database (ASDB) (personal communication, Robert von Bitter, January 30, 2012; Government of Ontario n.d.), there is one registered archaeological site located within one kilometre of the study area and no previous fieldwork has been conducted within 50 metres of the study area. Table 1



STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

provides a summary description of this site, which was registered in 1988. Archaeological assessments have recently been conducted on nearby properties that are greater than 50 metres from the Parkhill POI study area as part of the NextEra Bornish Wind Energy Centre (ASI 2009a, 2009b, 2011 Golder 2012a), the NextEra Adelaide Wind Energy Centre (Golder 2009, 2010a, 2010b), and the NextEra Jericho Wind Energy Centre (Golder forthcoming a; Golder forthcoming b).

Table 1: Registered Archaeological Sites Located Within One Kilometre of the Study Area

Borden Number	Site Name	Cultural Affiliation	Recommendations
AgHj-2	none	undetermined, pre-contact Aboriginal	no recommendations, but site may be significant

Table 2 provides a general outline of the culture history of the Middlesex County area, based on chapters in Ellis and Ferris (1990).

Table 2: Cultural Chronology of Middlesex County

Period	Characteristics	Time Period	Comments
Early Palaeo-Indian	Fluted Projectiles	9000 - 8400 B.C.	spruce parkland/caribou hunters
Late Palaeo-Indian	Hi-Lo Projectiles	8400 - 8000 B.C.	smaller but more numerous sites
Early Archaic	Kirk and Bifurcate Base Points	8000 - 6000 B.C.	slow population growth
Middle Archaic	Brewerton-like points	6000 - 2500 B.C.	environment similar to present
Late Archaic	Lamoka (Narrow Points)	2000 - 1800 B.C.	increasing site size
	Broad Points	1800 - 1500 B.C.	large chipped lithic tools
	Small Points	1500 - 1100 B.C.	introduction of bow hunting
Terminal Archaic	Hind Points	1100 - 950 B.C.	emergence of true cemeteries
Early Woodland	Meadowood Points	950 - 400 B.C.	introduction of pottery
Middle Woodland	Dentate/Pseudo-Scallop Shell Pottery	400 B.C. - A.D.500	increased sedentism
Late Woodland	Cord-Wrapped Stick Pottery	A.D. 500 - 1000	introduction of corn
	Early Ontario Iroquoian	A.D. 900/1000 - 1300	emergence of agricultural villages
	Middle Ontario Iroquoian	A.D. 1300 - 1400	long longhouses (100m +)
	Late Ontario Iroquoian	A.D. 1400 - 1650	tribal warfare and displacement
Contact Aboriginal	Various Algonkian Groups	A.D. 1700 - 1875	early written records and treaties
Late Historic	Euro-Canadian	A.D. 1796 - present	European settlement

Information concerning specific site locations is protected by provincial policy, and is not fully subject to the Freedom of Information Act. The release of such information in the past has led to looting or various forms of illegally conducted site destruction. Confidentiality extends to all media capable of conveying location, including maps, drawings, or textual descriptions of a site location. The Ministry of Tourism, Culture and Sport will provide



information concerning site location to the party or an agent of the party holding title to a property, or to a licensed archaeologist with relevant cultural resource management interests.

1.2.3 Potential for Pre-contact Aboriginal Archaeological Resources

Archaeological potential is established by determining the likelihood that archaeological resources may be present on a subject property. Golder applied archaeological potential criteria commonly used by the Ontario Ministry of Tourism, Culture and Sport (Government of Ontario 2011) to determine areas of archaeological potential within the study area. These variables include proximity to previously identified archaeological sites, distance to various types of water sources, soil texture and drainage, glacial geomorphology, elevated topography and the general topographic variability of the area.

Distance to modern or ancient water sources is generally accepted as the most important determinant of past human settlement patterns and, considered alone, may result in a determination of archaeological potential. However, any combination of two or more other criteria, such as well-drained soils or topographic variability, may also indicate archaeological potential. Finally, extensive land disturbance can eradicate archaeological potential (Wilson and Horne 1995).

In archaeological potential modeling a distance to water criterion of 300 metres is generally employed. The closest potable water source is a tributary of the Ausable River that runs just outside the study area to the north (Figure 1). The Ausable River flows approximately one kilometre east of the study area.

Soil texture can be an important determinant of past settlement, usually in combination with other factors such as topography. The area surrounding the study area is mainly glacial till with predominantly clay soils (Chapman and Putnam 1986). These areas of glacial till have been called Horseshoe Moraines (Hagerty and Kingston 1992:11). The soils of the study area consist of Huron Brookston silt loam characterised by moderately well to imperfect drainage (Hagerty and Kingston 1992: Sheet 1). Spring drainage is relatively slow, delaying warming of the soil and restricting root growth (Hagerty and Kingston 1992:52). As such, these soils benefit from tile drainage “to reach their capability for common field crops (Hagerty and Kingston 1992:52; cf Brock 1972:586). These soils, therefore, can be considered relatively unsuitable for pre-contact Aboriginal agriculture and do not contribute to the archaeological potential for Aboriginal sites.

The study area falls within a climatic region, which is slightly cooler, slightly wetter and providing slightly fewer frost-free days than the surrounding areas of Middlesex County, nearer the shores of Lake Huron and Lake Erie (Hagerty and Kingston 1992:16). This may have presented risks for pre-contact Aboriginal gathering, gardening or agriculture.

The Ontario Ministry of Tourism, Culture and Sport also views the presence of previously registered archaeological resources as a prime indicator of archaeological potential. There is one pre-contact Aboriginal site within a one kilometre radius of the study area to the south. Somewhat further from the study area, but within the Ausable River catchment, however, Palaeo-Indian sites (Deller and Ellis 1992; Ellis and Deller (eds.) 2000), a Late Archaic site (Ellis et al. 2009) and a multi-component site, featuring a Middle Woodland component (Kenyon and Fox 1983), have been investigated downstream from the study area within the Ausable River valley and watershed.



Glacial till chert can be found in the moraines of the area (Chapman and Putnam 1984:Figure16) and relatively high quality Kettle Point chert occurs to the west between Kettle Point and Ipperwash, on Lake Huron. Currently, Kettle Point occurs as submerged outcrops extending for approximately 1350 metres into Lake Huron. Secondary deposits of Kettle Point chert have been reported in Essex County and in the Ausable Basin (Eley and von Bitter 1989; Fox 2009:362). Natural resources, such as game and wild berries, have also been considered plentiful in the pre-contact period (Brock 1972:586; North Middlesex Historical Society 2010a).

Due to the proximity of a tributary of the Ausable River northeast of the study area, which functioned as a potable water source, as well as the Ausable River to the east and south, which served as a transportation route, and due to the presence of natural resources, the potential for pre-contact Aboriginal archaeological resources was judged to be moderate to high.

1.2.4 Existing Conditions

The Parkhill POI study area consists of a ploughed agricultural field. The proposed transmission line routes study area consists of the disturbed municipal right-of-way running north on Kerwood Road, east along Elginfield Road, then becoming Nairn Road, and ending at the Parkhill POI. The assessment of the study area was conducted on January 10, 2012, under archaeological consulting licence P319, issued to Irena Jurakic, M.A. The weather during the Stage 2 assessment was overcast and cold. At no time were the conditions detrimental to the recovery of archaeological material. Field visibility during the Stage 2 pedestrian survey was excellent.

1.3 Historical Context

1.3.1 Potential for Post-contact Aboriginal Archaeological Resources

The criteria used by the Ontario Ministry of Tourism, Culture and Sport to determine potential for post-contact Aboriginal archaeological sites includes the presence of: previously identified archaeological sites; particularly, resource-specific features that would have attracted past subsistence or extractive uses; early historic transportation routes; elevated topography; and properties designated under the *Ontario Heritage Act*.

The post-contact Aboriginal occupation of Southern Ontario was heavily influenced by the dispersal of various Iroquoian-speaking communities by the New York State Iroquois and the subsequent arrival of Algonkian-speaking groups from northern Ontario at the end of the 17th century and beginning of the 18th century (Konrad 1981; Schmalz 1991). By 1690, Algonkian speakers from the north appear to have begun to repopulate Bruce County (Rogers 1978:761). This is the period in which the Mississaugas are known to have moved into southern Ontario and the Lower Great Lakes watersheds (Konrad 1981). In southwestern Ontario, however, members of the Three Fires Confederacy (Chippewa, Ottawa and Potawatomi) were immigrating from Ohio and Michigan in the late 1700s (Feest and Feest 1978:778-779).

The southeastern-most portion of the Township of East Williams was ceded to the Crown in 1819 with Treaty 21 (Dunlop et al. 2010a; Morris 1943:24-25). The entire study area falls slightly northwest of this treaty boundary, but first enters the Euro-Canadian historic record as part of Treaty No. 27 1/2 with the Ojibway and Chippewa (Figure 2):



...being an agreement made at Amherstburg in the Western District of the Province of Upper Canada on the 26th of April, 1825, between James Givens, Esquire, Superintendent of Indian Affairs, on behalf of His Majesty King George the Fourth and the Chiefs and Principal Men of the part of the Chippewa Nation of Indians, inhabiting and claiming the tract of land Wawanosh Township in the County of Huron was named after Way-way-nosh the principal Chief of the Band making this Treaty.

(Morris 1943: 26-27)

Treaty No. 27 1/2 was subsequently confirmed on July 10, 1827 as Treaty Number 29 with only a minor change in the legal description of the boundaries of the land surrender (Morris 1943:27). While it is difficult to delineate treaty boundaries exactly today, Figure 2 provides an approximate outline of the limits of Treaty No. 27 1/2.

As of 1836, a small Aboriginal community of about 50 warriors and their families, including Chief Big Bow, are said to have 'squatted' for the winter, hunting game, near what is now the town of Ailsa Craig (North Middlesex District Historical Society 2012). A few Aboriginal residents continued to live in the Township of East Middlesex in 1889 on or near the John Doyle property in the Wylie neighbourhood (Brock 1972:586).

Game was considered plentiful surrounding the study area in the early to mid-1800s (Brock 1972:586; North Middlesex District Historical Society 2012). In the late 1800s, the odd bear and wolf were still seen in the area.

Due to the proximity of a tributary of the Ausable River northeast of the study area, which likely functioned as a potable water source, as well as the Ausable River to the east and south, which likely served as a transportation route, the potential for post-contact Aboriginal archaeological resources was judged to be moderate.

1.3.2 Potential for Historic Euro-Canadian Archaeological Resources

The criteria used by the Ontario Ministry of Tourism, Culture and Sport to determine potential for historic Euro-Canadian archaeological sites includes the presence of: previously identified archaeological sites; particular, resource-specific features that would have attracted past subsistence or extractive uses; areas of initial, non-Aboriginal settlement; early historic transportation routes; elevated topography; and properties designated under the *Ontario Heritage Act*.

The lands of the present Townships of East Williams and West Williams were patented in 1830 by the Canada Company, formed in London, England in 1824 to survey, develop and sell land (Archaeological Services Inc. 2009:4; Dunlop et al. 2010a). Originally united as Williams Township, named after a Canada Company employee, William Williams, the township began to be surveyed in 1831 by John McDonald, with the first six concessions surveyed between the boundary of Lobo Township to the east and the village of Nairn, approximately two kilometres east of the Parkhill POI study area (North Middlesex District Historical Society 2012). Concessions 7 to 20 followed, on a different orientation (North Middlesex District Historical Society 2012). Donald McIntosh, an agent of the Canada Company, established the first grist mill and saw mill in Nairn in 1831 (Brock 1972:586). As of 1835, a small number of Euro-Canadians were settling in the Ailsa Craig area (North Middlesex District Historical Society 2012). In 1842, the first meeting that would appoint council members for the Township of Williams and become North Middlesex's first local government was held at Nairn (Dunlop et al. 2010a). The Township of West Williams was settled in 1850 by Henry Saul, who began farming on Concession 21, and others took up residence along the Ausable River (Brock 1972:598). Williams Township was subsumed within Middlesex County about 1850 (Dunlop et al. 2010b), before being divided in two at Centre



STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

Road in 1860, when Nairn was seen to be too distant for those travelling from the western part (Brock 1972:598; Dunlop et al. 2010b; Grainger 2002:62). Scottish place names attest to many of the settlers being of Scottish descent (Archaeological Services Inc. 2009:4; Grainger 2002:62) and the area is said to have been settled by “Highland Scotch” (Brock 1972:586) in 1833.

Through much of the mid-1800s, a stage coach brought mail to Nairn, from where it was picked up for delivery to other villages, such as Springbank (Grainger 2002:76). By 1859, the mainline of the Grand Trunk Railway ran east-west approximately 3 kilometres north of the Parkhill POI study area (Grainger, 2002; Page, H.R. & Co. 1878). This railway running from Montreal to the American Grand Trunk Railway had an important station at Ailsa Craig, some 5 kilometres to the northeast of the study area. This route was a major route from the east to the American West (Dunlop et al. 2010b).

It has been pointed out that homesteads are frequently found in the wider area, particularly along settlement roads, such as Concession 17 (Archaeological Services Inc. 2009:4). A homestead and possible orchard belonging to a Jno Scafe are depicted in a south-central location on Lot 18, Concession 17 East of Centre Road within the Parkhill POI study area as of 1878 (Page, H.R. & Co. 1878). Figure 3 illustrates the Parkhill POI study area and the eastern portion of the proposed transmission line route on part of H.R. Page & Co.’s (1878) map of the Township of East Williams, while Figure 4 illustrates the western portion of the proposed transmission line route on part of H.R. Page & Co.’s (1878) map of the Township of West Williams.

Due to the proximity of the study area of a tributary of the Ausable River, which functioned as a potable water source, as well as the larger Ausable River to the east and south, which served as a transportation route, as well as the presence of a historic reference to a homestead within the study area, the proximity of the study area to the historic village of Nairn and to historic transportation routes, the potential for historic Euro-Canadian resources was judged to be high.

1.3.3 Recent Reports

In addition to the existing historic documentation, the properties surrounding the Parkhill point of interconnect have been reported on in recent archaeological assessments. The Stage 1 archaeological assessment of the nearby NextEra Bornish Wind Energy Centre was conducted by Archaeological Services Inc. (ASI) and was entitled *Stage 1 Archaeological Assessment, Canadian Greenpower Wind Project, Counties of Huron, Middlesex and Lambton, Ontario* (ASI 2009a) produced by ASI in May 2009 under PIF P057-456-2008. The first part of the NextEra Bornish Wind Energy Centre Stage 2 archaeological assessment was also conducted by ASI and was entitled *Stage 2 Property Assessment (June 2009 Field Season), Bornish Wind Farm Project Environmental Assessment, East Williams, West Williams, and Adelaide Townships, Middlesex County, Ontario* (ASI 2009b) produced by ASI in October 2009 under PIF P057-534-2009. The second part of the Stage 2 archaeological assessment for the NextEra Bornish Wind Energy Centre was again conducted by ASI and was entitled *Stage 2 Archaeological Assessment (Property Assessment), Bornish Wind Farm Project, East Williams, West Williams, and Adelaide Townships, Middlesex County, Ontario* (ASI 2011) produced by ASI in March 2011 under PIF P057-534-2009. Recently, Golder conducted additional Stage 2 archaeological assessment for the 2011 layout of the NextEra Bornish Wind Energy Centre. This report was entitled *Stage 2 Archaeological Assessment, NextEra Bornish Wind Energy Centre, Municipality of North Middlesex, Middlesex County, Ontario* (Golder 2012a) and was produced on February 14, 2012 under PIF numbers P218-097-2011 and P319-013-2012.



STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

The Parkhill POI will also connect the nearby NextEra Adelaide Wind Energy Centre's lands with the hydro lines on the east side of the study area. The Stage 1 archaeological assessment for this project was conducted by Golder in 2008 and was entitled *Stage 1 Archaeological Assessment, Air Energy TCI Adelaide Wind Farm, Various Lots, Concession 1 to 5 N.E.R. and 1 to 4 S.E.R., Geographic Township of Adelaide, Middlesex County, Ontario* (Golder 2009) produced in April 2009 under PIF P001-422-2008. The first part of the NextEra Adelaide Wind Energy Centre Stage 2 archaeological assessment was conducted by Golder in 2008, 2009, and 2010 and was entitled *Stage 2 Archaeological Assessment, NextEra Adelaide Wind Farm, Various Lots, Concession 1 to 5 N.E.R. and 1 to 4 S.E.R., Geo. Township of Adelaide, Middlesex County, Ontario* (Golder 2010a) produced in March 2010 under PIF numbers P001-452-2008, P001-526-2009, and P084-197-2010. The initial Stage 3 archaeological assessment for the NextEra Adelaide Wind Energy Centre was conducted by Golder in 2009 and 2010 and was entitled *Stage 3 Archaeological Assessment, NextEra Adelaide Wind Farm, Various Lots, Concession 1 to 5 N.E.R. and 1 to 4 S.E.R., Geo. Township of Adelaide, Middlesex County, Ontario* (Golder 2010b), produced by Golder in April 2010 under PIFs P084-220-2009, P084-221-2009 and P084-198-2010. Additional Stage 2 archaeological assessment was conducted by Golder in 2011 and was entitled *Stage 2 Archaeological Assessment, NextEra Adelaide Wind Energy Centre, Various Lots, Concessions 1 to 5 N.E.R. and 1 to 4 S.E.R., Geographic Township of Adelaide, Middlesex County, Ontario*, produced by Golder (2012b) on February 21, 2012 under PIFs P218-096-2011 and P319-015-2012.

As noted in Section 1.1, the Parkhill POI will also connect the nearby NextEra Jericho Wind Energy Centre's lands with the hydro lines on the east side of the current study area. The Stage 1 and 2 archaeological assessments for this project are ongoing and will be reported on in 2012. The Stage 1 archaeological assessment is being conducted by Golder under PIF P001-607-2010 (Golder forthcoming a), while the Stage 2 archaeological assessment is being conducted by Golder under PIFs P218-007-2010 and P218-039-2011 (Golder forthcoming b).



2.0 FIELD METHODS

The Stage 2 archaeological assessment was conducted on January 10, 2012, under archaeological consulting licence P319, issued to Irena Jurakic, M.A. The weather during the Stage 2 assessment was overcast and cold. At no time were the conditions detrimental to the recovery of archaeological material. Field visibility during the pedestrian survey was excellent.

Approximately 31% of the study area to be impacted by the POI and its associated transmission line was subject to pedestrian survey, while the remaining 69% was deemed disturbed by previous ditching and road construction activities within the municipal right of way. In the former case, the Parkhill POI study area is characterized by ploughed and well-weathered agricultural fields (Plate 1) and the Stage 2 archaeological assessment was conducted using pedestrian survey at five metre intervals (Plate 2; see also Figure 5 in Supplementary Document A and Figure 6). In the latter case, the disturbed area is located along the municipal right-of-way along roadsides where a transmission line will be erected (Plates 3 and 4, see also Figure 6). The width of the right-of-way assessed on either side of Kerwood Road measured approximately 7.5 to 8.5 metres from the edge of the road inwards, for each property. Similarly, the width of the right-of-way assessed on either side of Elginfield/Nairn Road varied from 8 to 13 metres from the edge of the road inwards, for each property. When archaeological resources were identified, the survey transect was decreased to a one metre interval and spanned a minimal 20 metre radius around the identified artifact. This approach established if the artifact was an isolated find or rather, if it was part of a larger artifact scatter. If the artifact was part of a larger scatter, the one metre interval was continued until the full extent of the scatter was defined (Government of Ontario 2011).

All formal and diagnostic artifact types identified in the field were collected and a UTM reading was taken using a Trimble Recon handheld GPS unit with a Holux GR-271 CF GPS Receiver, using the North American Datum (NAD) 83, with a minimal accuracy of two metres. UTM coordinates are presented in Supplementary Document B. Figure 5 in Supplementary Document A and Figure 6 illustrate the Stage 2 field assessment methods and results for the project area. First Nations monitors also participated in the Stage 2 archaeological assessment. Their roles are summarised in Supplementary Document C.



3.0 RECORD OF FINDS

The Stage 2 archaeological assessment was conducted employing the methods described in Section 2.0 and resulted in the identification of one historic Euro-Canadian archaeological site, Location 1 (AgHj-9). Material culture recovered from Location 1 (AgHj-9) is contained in one banker's box and will be temporarily housed at Golder's Mississauga office until formal arrangements can be made for its transfer to an Ontario Ministry of Tourism, Culture and Sport collections facility. Table 3 provides an inventory of the documentary record generated in the field.

Table 3: Inventory of Documentary Record

Document Type	Current Location of Document	Additional Comments
Field Notes	Golder offices in Mississauga	In original field book and photocopied in project file
Hand Drawn Maps	Golder offices in Mississauga	In original field book and photocopied in project file
Maps Provided by Client	Golder offices in Mississauga	Stored in project file
Digital Photographs	Golder offices in Mississauga	Stored digitally in project file

3.1 Location 1 (AgHj-9)

Location 1 (AgHj-9), a Historic Euro-Canadian site, was identified on January 10, 2012, during the Stage 2 pedestrian survey (Plate 2) of the proposed POI on a property designated by NEEC as BOR2197, north of Nairn Road (Figure 5 in Supplementary Document A and Figure 6). Location 1 (AgHj-9) is an 80-metre (north to south) by 60-metre (east to west) scatter of approximately 225 fragments of mid-to-late 19th century Euro-Canadian domestic debris. In total, 75 Euro-Canadian artifacts were collected during the Stage 2 assessment and approximately 150 artifacts were left behind. The collected artifacts include: 64 domestic items, seven structural items, three metal artifacts, and one miscellaneous artifact (Table 4). Each artifact class is discussed in greater detail below and the Stage 2 artifact catalogue is presented in Section 3.1.7.

Table 4: Stage 2 Artifact Summary for Location 1 (AgHj-9)

Artifact	Frequency	%
domestic	64	85.33
structural	7	9.33
metal	3	4
miscellaneous	1	1.34
Total	75	100.00

3.1.1 Domestic Artifacts

A total of 64 domestic artifacts were collected during the Stage 2 assessment of Location 1 (AgHj-9). This collection includes 57 ceramic artifacts, four fragments of domestic glass, and three faunal remains.



3.1.1.1 Ceramic Artifacts

In total, 57 fragments of ceramic hollowwares and flatwares were collected during the Stage 2 assessment of Location 1 (AgHj-9). Included in this total are 28 fragments of ironstone, 23 whiteware, five utilitarian earthenwares, and one fragment of pearlware. Table 5 provides a breakdown of the ceramic assemblage by ware type, while Table 6 provides a more detailed breakdown of the ceramic assemblage by decorative style.

Table 5: Summary of Ceramic Collection According to Ware Type, Location 1 (AgHj-9)

Artifact	Frequency	%
ironstone	28	49.13
whiteware	23	40.35
utilitarian earthenware	5	8.77
pearlware	1	1.75
Total	57	100.00

Table 6: Summary of Ceramic Collection According to Decorative Style, Location 1 (AgHj-9)

Artifact	Frequency	%
ironstone, plain	10	17.54
ironstone, transfer printed	8	14.04
whiteware, sponged	8	14.04
ironstone, moulded	4	7.02
whiteware, painted	4	7.02
whiteware, transfer printed	4	7.02
earthenware, red	3	5.26
ironstone, edged	3	5.26
ironstone, flow transfer printed	3	5.26
whiteware, plain	3	5.26
whiteware, edged	2	3.51
whiteware, stamped	2	3.51
pearlware, transfer printed	1	1.75
stoneware, salt glazed	2	3.51
Total	57	100.00

Ironstone

The most common ceramic type collected during Stage 2 assessment is ironstone (n=28 or 49.13%). Ironstone or graniteware is a variety of refined white earthenware introduced in the 1830s that became extremely popular in Upper Canada by the 1860s (Kenyon 1985). The ironstone assemblage includes 10 plain, undecorated



fragments including a partial manufacturer's mark of "...NAWARE" (likely chinaware) (Plate 5:1), eight blue willow pattern transfer printed (Plate 5:2), four moulded fragments including three popular "wheat" pattern and one moulded floral (Plate 5:3), three blue edged including one with a plain edge, not moulded or incised and likely dating from 1850 to 1897 (Plate 5:4) and three blue flow transfer printed fragments (Plate 5:5).

White Earthenware

Twenty-three fragments of whiteware are in the Location 1 (AgHj-9) ceramic assemblage. Whiteware is a variety of earthenware with a near colourless glaze that replaced earlier near white ceramics such as pearlware and creamware by the early 1830s. Whitewares in the assemblage include a variety of red and blue sponge decorated fragments (Plate 5:6), four transfer printed fragments in blue or black (Plate 5:7), four hand painted, including some polychrome pieces (Plate 5:8), three plain (Plate 5:9), two red and blue stamped respectively (Plate 5:10) and two blue edged fragments dating from 1850 to 1897 (Plate 5:11).

Pearlware

Transfer printing on pearlware was developed as early as 1780, but did not become common in Upper Canada until around 1810 (Kenyon 1985). The early transfer printed pearlwares were most frequently decorated in blue. Other colours, such as black, green, red and purple became popular post-1820. A single fragment of blue transfer printed pearlware was identified in the Location 1 (AgHj-9) Stage 2 assemblage (Plate 5:12).

Utilitarian Earthenware

Five fragments of utilitarian earthenwares were collected including three lead glazed red earthenware fragments and two fragments of salt glazed stoneware, both with buff paste and clear exterior salt glaze and Albany slip interior. Red and yellow earthenware vessels were manufactured throughout the late 18th and 19th centuries and were the most common utilitarian ware in the first half of the 19th century, eventually being replaced by more durable stoneware vessels.

3.1.1.2 Glass Artifacts

Four fragments of glass bottle are in the Location 1 (AgHj-9) domestic assemblage including two clear or colourless and two fragments of aqua coloured glass. Bottle glass colours are very limited with regards to providing a temporal date to a site (Lindsey 2012) but the one aqua coloured open-pontil base *circa* 1850.

3.1.1.3 Faunal Remains

Three faunal specimens were collected during Stage 2 assessment. They include two fragments of bivalve shell and a single fragment of rib bone from a medium-to-large mammal.



3.1.2 Structural Artifacts

Seven machine cut nails were collected during Stage 2 assessment of Location 1 (AgHj-9) (Plate 6:1). Cut nails were machine cut and have a flat head. They were available as early as 1790, but did not become prevalent in Ontario until 1830. They were replaced by wire drawn nails in the 1890s (Adams 1994:92).

3.1.3 Metal Artifacts

Two fragments of miscellaneous unidentified metal were collected. Both are heavily corroded miscellaneous unidentified iron fragments. One piece of miscellaneous metal hardware, a chain link, was also collected.

3.1.4 Miscellaneous Artifacts

A single fragment of coal was also collected during the Stage 2 assessment of Location 1 (AgHj-9).

3.1.5 Artifact Catalogue

Table 7 provides the Stage 2 artifact catalogue for Location 1 (AgHj-9).

Table 7: Location 1 (AgHj-9) Artifact Catalogue

Cat. #	Context	Depth	Artifact	Freq.	Comments
1	surface	0 cm	pearlware, transfer printed	1	blue; hollowware fragment
2	surface	0 cm	whiteware, transfer printed	2	2 black dish with scalloped edge
3	surface	0 cm	ironstone, transfer printed	4	willow pattern
4	surface	0 cm	whiteware, stamped	1	red hollowware
5	surface	0 cm	whiteware, sponged	4	blue hollowware
6	surface	0 cm	whiteware	3	1 basal fragment; 2 assorted
7	surface	0 cm	glass, bottle	3	2 clear or colourless; 1 aqua
8	surface	0 cm	ironstone, flow transfer printed	3	blue
9	surface	0 cm	nail, cut	7	
10	surface	0 cm	coal	1	fragment
11	surface	0 cm	ironstone, edged	1	blue; plain edge, not moulded or incised, 1850 to 1897
12	surface	0 cm	whiteware, edged	2	blue; plain edge, not moulded or incised, 1850 to 1897
13	surface	0 cm	earthenware, red	3	lead glazed; 1 basal hollowware fragment
14	surface	0 cm	whiteware, painted	3	red and blue hollowware
15	surface	0 cm	chain	1	single small link; heavily corroded



STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

Cat. #	Context	Depth	Artifact	Freq.	Comments
16	surface	0 cm	ironstone, moulded	1	floral motif
17	surface	0 cm	shell	2	bivalve fragments
18	surface	0 cm	faunal remains	1	fragment of rib; medium-to-large size mammal
19	surface	0 cm	stoneware, salt glazed	2	buff paste with clear exterior salt glaze/Albany slip interior
20	surface	0 cm	metal, miscellaneous unidentified	2	heavily corroded
21	surface	0 cm	ironstone	1	partial makers mark: "...NAWARE"
22	surface	0 cm	whiteware, transfer printed	2	blue hollowware
23	surface	0 cm	ironstone, transfer printed	4	willow pattern
24	surface	0 cm	whiteware, stamped	1	blue hollowware
25	surface	0 cm	whiteware, sponged	3	blue hollowware
26	surface	0 cm	whiteware, sponged	1	red hollowware
27	surface	0 cm	glass, bottle	1	aqua (with open pontil base circa 1850s)
28	surface	0 cm	ironstone, edged	2	damaged indeterminate type
29	surface	0 cm	whiteware, painted	1	blue stripe hollowware
30	surface	0 cm	ironstone, moulded	3	wheat pattern
31	surface	0 cm	ironstone	9	3 basal fragments; 2 assorted; 5 hollowware



4.0 ANALYSIS AND CONCLUSIONS

Location 1 (AgHj-9) is a spatially discrete historic Euro-Canadian site. The artifacts recovered during the Stage 2 archaeological assessment of Location 1 (AgHj-9) represent a range of predominantly mid-to-late 19th century Euro-Canadian ceramics such as ironstone and whiteware and a smaller assemblage of structural material in the form of machine cut nails and assorted metal. Given the age of this site in the second half of the 1800s, as well as the number of artifacts identified and recovered, further assessment is required. Based on these considerations; the artifacts identified fulfill the criteria for a Stage 3 archaeological investigation as per Section 2.2 Standard 1a(i)(3) of the *Standards and Guidelines for Consultant Archaeologists* (Government of Ontario 2011). The site has been registered with the Ministry of Tourism, Culture and Sport and has been assigned Borden number AgHj-9.

4.1 Preliminary Indication of Location 1 (AgHj-9) Possibly Requiring Stage 4 Archaeological Assessment

The preliminary indication of whether any site could eventually be recommended for Stage 4 archaeological assessment is required under the *Standards and Guidelines for Consultant Archaeologists* Section 7.8.3 Standard 2c (Government of Ontario 2011). No firm recommendation for, or against, Stage 4 archaeological assessment will be made until the forthcoming Stage 3 archaeological assessment has been conducted. However, based on the recovered artifacts, which could date the occupation prior to 1870, Location 1 (AgHj-9) can be recommended for Stage 4 archaeological assessment.



5.0 RECOMMENDATIONS

The Stage 2 archaeological assessment of the Parkhill POI resulted in the identification of one historic Euro-Canadian site, Location 1 (AgHj-9).

Due to the fact that Location 1 (AgHj-9) is a spatially discrete site producing mid-to-late 19th century historic Euro-Canadian cultural material, **it is recommended that it be subject to a Stage 3 archaeological assessment to further evaluate its cultural heritage value or interest.** The Stage 3 assessment should employ both the controlled surface pick-up and hand excavated test unit methodology as outlined in Table 3.1 of the Ministry of Tourism, Culture and Sport's *Standards and Guidelines for Consultant Archaeologists* (Government of Ontario 2011). Prior to conducting the field work the area should be re-ploughed and allowed to weather for the controlled surface pick-up. The test unit excavation should consist of one metre by one metre square test units laid out in a five metre grid and should be excavated by hand to a depth of five centimetres within the subsoil in order to further determine the presence of buried artifacts, structures, stratigraphy and cultural features, as well as to collect a representative sample of artifacts. Further archival research to supplement the Stage 1 archaeological overview/background study concerning the land use and occupation history specific to Location 1 (AgHj-9) will also be conducted.

The Ministry of Tourism, Culture and Sport is asked to accept this report into the Ontario Public Register of Archaeological Reports. Additional archaeological assessment is still required; hence the archaeological sites recommended for further archaeological fieldwork remain subject to Section 48(1) of the *Ontario Heritage Act* and may not be altered, or have artifacts removed, except by a person holding an archaeological licence.



6.0 ADVICE ON COMPLIANCE WITH LEGISLATION

This report is submitted to the Minister of Tourism, Culture and Sport as a condition of licensing in accordance with Part VI of the *Ontario Heritage Act*, R.S.O. 1990, c 0.18. The report is reviewed to ensure that it complies with the standards and guidelines that are issued by the Minister, and that the archaeological fieldwork and report recommendations ensure the conservation, protection and preservation of the cultural heritage of Ontario. When all matters relating to archaeological sites within the project area of a development proposal have been addressed to the satisfaction of the Ministry of Tourism, Culture and Sport, a letter will be issued by the ministry stating that there are no further concerns with regard to alterations to archaeological sites by the proposed development.

It is an offence under Sections 48 and 69 of the *Ontario Heritage Act* for any party other than a licensed archaeologist to make any alteration to a known archaeological site or to remove any artifact or other physical evidence of past human use or activity from the site, until such time as a licensed archaeologist has completed fieldwork on the site, submitted a report to the Minister stating that the site has no further cultural heritage value or interest, and the report has been filed in the Ontario Public Register of Archaeology Reports referred to in Section 65.1 of the *Ontario Heritage Act*.

Should previously undocumented archaeological resources be discovered, they may be a new archaeological site and therefore subject to Section 48(1) of the *Ontario Heritage Act*. The proponent or person discovering the archaeological resources must cease alteration of the site immediately and engage a licensed consultant archaeologist to carry out archaeological fieldwork, in compliance with Section 48(1) of the *Ontario Heritage Act*.

The *Cemeteries Act*, R.S.O. 1990 c. C.4 and the *Funeral, Burial and Cremation Services Act*, 2002, R.S.O. 2002, c.33 (when proclaimed in force) require that any person discovering human remains must notify the police or coroner and the Registrar of Cemeteries at the Ministry of Consumer Services.

Additional archaeological assessment is still required. Archaeological sites recommended for further archaeological fieldwork or protection remain subject to Section 48(1) of the *Ontario Heritage Act* and may not be altered, or have artifacts removed, except by a person holding an archaeological licence.



7.0 BIBLIOGRAPHY AND SOURCES

Adams, Nick

- 1994 *Field Manual for Avocational Archaeologists in Ontario*. Ontario Archaeological Society Incorporated Archaeological Stewardship Project. Ontario Archaeological Society, North York.

Archaeological Services Inc.

- 2009a *Stage 1 Archaeological Assessment: Canadian Greenpower Wind Project, Counties of Huron, Middlesex and Lambton, Ontario*. Report submitted to the Ontario Ministry of Tourism, Culture and Sport, Toronto.
- 2009b *Stage 2 Property Assessment (June 2009 Field Season): Bornish Wind Farm Project Environmental Assessment, East Williams, West Williams, and Adelaide Townships, Middlesex County, Ontario*. Report submitted to the Ontario Ministry of Tourism, Culture and Sport, Toronto.
- 2011 *Stage 2 Archaeological Assessment (Property Assessment): Bornish Wind Farm Project, East Williams, West Williams, and Adelaide Townships, Middlesex County, Ontario*. Report submitted to the Ontario Ministry of Tourism, Culture and Sport, Toronto.

Brock, Daniel (ed.)

- 1972 *The History of the County of Middlesex*. New Edition. Mika Studio, Belleville.

Chapman, Lyman John and Donald F. Putnam

- 1984 *The Physiography of Southern Ontario*. 3rd ed. Ontario Geological Survey Special Volume 2. Ontario Ministry of Natural Resources, Toronto.

Deller, D. Brian and Christopher J. Ellis

- 1992 *Thedford II: A Paleo-Indian Site in the Ausable River Watershed of Southwestern Ontario*. Memoirs, Museum of Anthropology, University of Michigan, No. 24. University of Michigan, Ann Arbor.

Dunlop, Robert, Arne Larsen and Edward Bodfish

- 2010a The Impact of World and Canadian History North Middlesex from 1800 to 1849. Electronic Document: <http://150years.ca/histmenu.aspx>. Last Accessed February 1, 2012.



STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

Dunlop, Robert, Arne Larsen and Edward Bodfish

2010b *The Impact of World and Canadian History on North Middlesex from 1850 to 1899*. Electronic Document: <http://150years.ca/histmenu.aspx>. Last Accessed February 1, 2012.

Eley, Betty and Peter von Bitter

1989 *Cherts of Southern Ontario*. Royal Ontario Museum, Toronto.

Ellis, C. and D.B. Deller (eds.)

2000 *An Early Paleo-Indian Site Near Parkhill, Ontario*. Archaeological Survey of Canada, Mercury Series Paper 159. Canadian Museum of Civilization, Hull.

Ellis, Chris J. and Neal Ferris (eds.)

1990 *The Archaeology of Southern Ontario to A.D. 1650*. Occasional Publication of the London Chapter, Ontario Archaeological Society, Number 5. London Chapter, Ontario Archaeological Society, London.

Ellis, C., E. Eastaugh, J. Keron and L. Foreman

2009 A Preliminary Overview of the 2008 Excavations at the Davidson (AhHk-54) 'Broad Point' Archaic Site. *KEWA* 09(1-2):1-19.

Feest, Johanna and Christian Feest

1978 Ottawa. In *Handbook of North American Indians. Volume 15, Northeast*, edited by Bruce Trigger, pp. 772-786. Smithsonian Institution Press, Washington.

Fox, William

2009 Ontario Cherts Revisited. In *Painting the Past With a Broad Brush: Papers in Honour of James Valliere Wright*, edited by David Keenlyside and Jean-Luc Pilon, pp. 353-370. Mercury Series, Archaeology Paper 170. Canadian Museum of Civilization, Gatineau.



STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

Golder Associates Ltd.

- 2009 *Stage 1 Archaeological Assessment, Air Energy TCI Adelaide Wind Farm Various Lots, concession 1 to 5 N.E.R. and 1 to 4 S.E.R., Geographic Township of Adelaide, Middlesex County, Ontario.* Report on file with the Ministry of Tourism, Culture, and Sport, Toronto.
- 2010a *Stage 2 Archaeological Assessment, NextEra Adelaide Wind Farm, Various Lots, Concession 1 to 5 N.E.R. and 1 to 4 S.E.R., Geo. Township of Adelaide, Middlesex County, Ontario.* Report on file with the Ministry of Tourism, Culture and Sport, Toronto.
- 2010b *Stage 3 Archaeological Assessment, NextEra Adelaide Wind Farm, Various Lots, Concession 1 to 5 N.E.R. and 1 to 4 S.E.R., Geo. Township of Adelaide, Middlesex County, Ontario.* Report on file with the Ministry of Tourism, Culture and Sport, Toronto.
- 2012a *Stage 2 Archaeological Assessment, NextEra Bornish Wind Energy Centre, Municipality of North Middlesex, Middlesex County, Ontario.* Report on file with the Ontario Ministry of Tourism, Culture and Sport, Toronto.
- 2012b *Stage 2 Archaeological Assessment, NextEra Adelaide Wind Energy Centre, Various Lots, Concessions 1 to 5 N.E.R. and 1 to 4 S.E.R., Geographic Township of Adelaide, Middlesex County, Ontario.* Report on file with the Ministry of Tourism, Culture and Sport, Toronto.
- Forthcoming a *Stage 1 Archaeological Assessment, NextEra Jericho Wind Energy Centre, Lambton and Middlesex Counties, Ontario.*
- Forthcoming b *Stage 2 Archaeological Assessment, NextEra Jericho Wind Energy Centre, Lambton and Middlesex Counties, Ontario.*

Government of Canada

- 2000 *Topographic Map Sheet 40P/04: Parkhill, Ontario. (Edition 8).* Scale 1:50,000. Centre for Topographic Information, Natural Resources Canada, Ottawa.

Government of Ontario

- 2011 *Standards and Guidelines for Consultant Archaeologists.* Ontario Ministry of Tourism, Culture and Sport, Toronto.
- n.d. *Archaeological Sites Database (ASDB) Files.* Culture Services Unit, Ontario Ministry of Tourism, Culture and Sport, Toronto.

Grainger, Jennifer

- 2002 *Vanished Villages of Middlesex.* Natural Heritage/Natural History, Inc., Toronto.



STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

Hagerty, T.P. and M.S. Kingston

1992 *The Soils of Middlesex County*. Volume 1. Report No. 56 of the Ontario Centre for Soil Resource Evaluation. Resources Management Branch, Ontario Ministry of Agriculture and Food. Guelph, Ontario.

Kenyon, Ian

1985 "A History of Ceramic Tableware in Ontario, 1780-1840". *Arch Notes* May/June 1985.

Kenyon, I. and W. Fox

1983 The Wyoming Rapids Saugeen Component: 1983 Investigations. *KEWA* 83(7):2-10.

Konrad, Victor

1981 An Iroquois Frontier: The North Shore of Lake Ontario during the Late Seventeenth Century. *Journal of Historical Geography* 7(2):129-144.

Lindsey, Bill

2012 *Historic Glass Bottle Identification and Information Website*. Electronic document: <http://www.sha.org/bottle/index.htm>. Last accessed on February 1, 2012.

Morris, J.L.

1943 *Indians of Ontario*. Ontario Department of Lands and Forests, Toronto.

North Middlesex District Historical Society

2012 *A Bit of N. Middlesex*. Electronic Document: http://www.ailsacraigmuseum.ca/copy_news.html. Last Accessed February 1, 2012.

Page, H.R. & Co.

1878 *Illustrated Historical Atlas of the County of Middlesex, Ontario*. H.R. Page & Co., Toronto.



STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

Rogers. E.S.

1978 Southeast Ojibwa. In *Handbook of North American Indians. Volume 15, Northeast*, edited by Bruce Trigger, pp. 760-771. Smithsonian Institution Press, Washington, D.C.

Schmalz, Peter S.

1991 *The Ojibwa of Southern Ontario*. University of Toronto Press, Toronto.

Wilson, J.A. and M. Horne

1995 *City of London Archaeological Master Plan*. City of London, Department of Planning and Development, London.



8.0 IMAGES

Plate 1: Field Conditions, Northeastern Edge of Parkhill POI Study Area (BOR2197), Facing South, January 10, 2012



Plate 2: Pedestrian Survey, Northeastern Edge of Parkhill POI Study Area (BOR2197), Facing South, January 10, 2012





STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

Plate 3: Proposed Transmission Line Route, Disturbed – Not Assessed, Facing East Along Nairn Road, January 10, 2012



Plate 4: Proposed Transmission Line Route, Disturbed – Not Assessed, Facing South Along Kerwood Road, January 10, 2012





STAGES 1 AND 2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POI, MIDDLESEX COUNTY, ONTARIO

Plate 5: Selected Ceramics from Location 1 (AgHj-9)



1: Plain Ironstone
cat. #21



2: Transfer Printed Ironstone
cat. #3



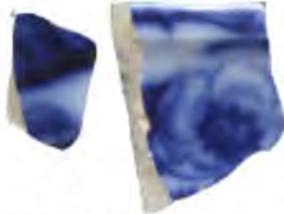
3: Moulded Ironstone
cat. #16



4: Edged Ironstone
cat. #11



5: Flow Transfer Printed Ironstone
cat. #8



7: Transfer Printed Whiteware
cat. #22 and cat. #2



8: Painted Whiteware
cat. #14



10: Stamped Whiteware
cat. #24 and cat. #4



11: Edged Whiteware
cat. #12



12: Transfer Printed Pearlware
cat. #1





Plate 6: Selected Machine-Cut Nails from Location 1 (AgHj-9)

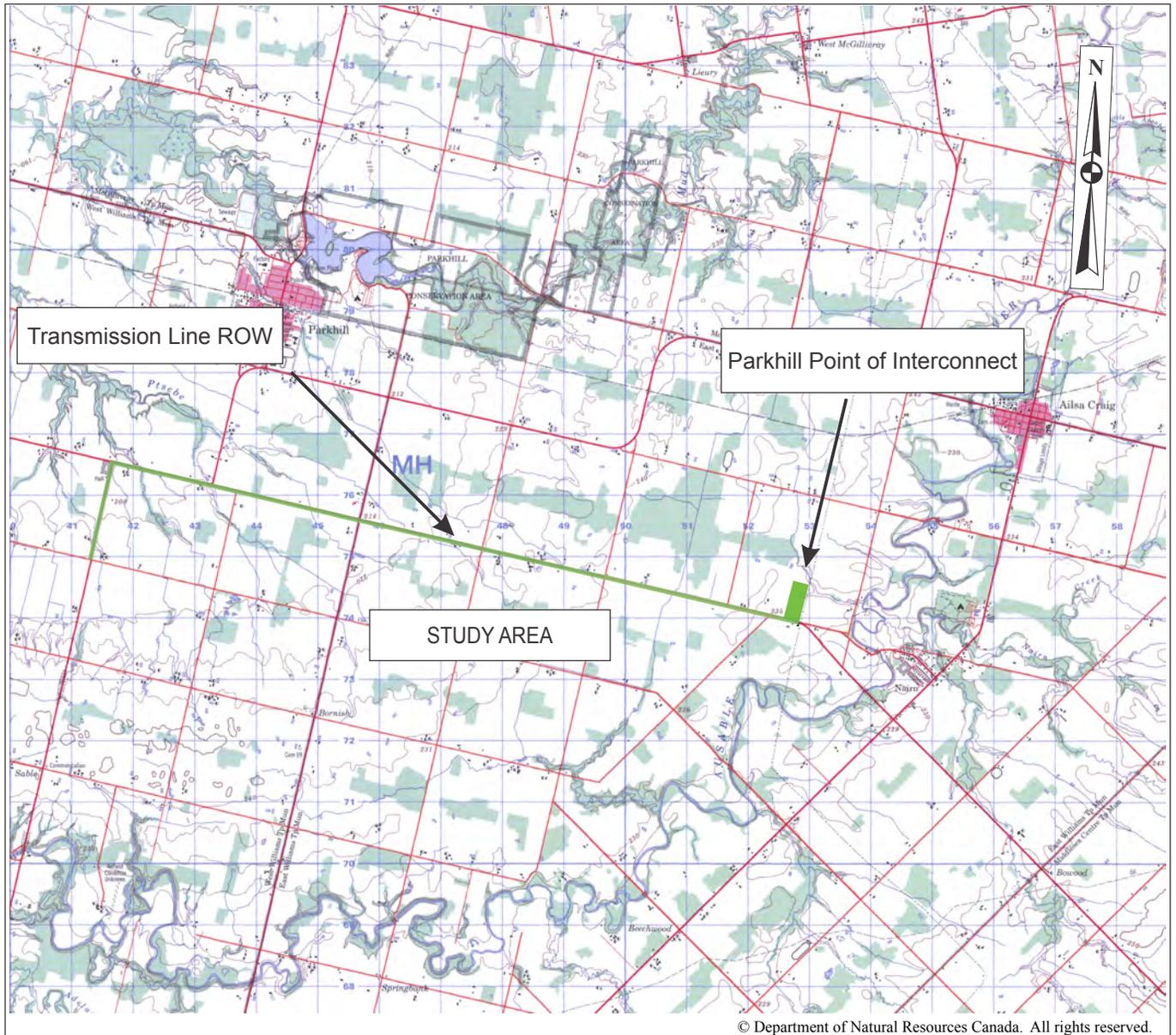


1: Machine Cut Nails
cat. #9



9.0 MAPS

All maps will follow on succeeding pages and in Supplementary Document A.



© Department of Natural Resources Canada. All rights reserved.



LEGEND

STUDY AREA

REFERENCE

DRAWING BASED ON

Government of Canada
 2000 *Topographic Map Sheet 40 P/04: Parkhill, Ontario.*
 (Edition 8). Scale 1:50,000. Centre for Topographic
 Information, Natural Resources Canada, Ottawa.

NOTES

THIS DRAWING IS SCHEMATIC ONLY AND IS TO BE READ
 IN CONJUNCTION WITH ACCOMPANYING TEXT.

ALL LOCATIONS ARE APPROXIMATE.

PROJECT		STAGE 1-2 ARCHAEOLOGICAL ASSESSMENT, PARKHILL POINT OF INTERCONNECT, MIDDLESEX COUNTY, ONTARIO	
TITLE			
LOCATION OF STUDY AREA			
PROJECT No. 11-1154-0030-2000		FILE No. 1111540030-2000-R02001	
CADD	SW/JM	Feb. 2/12	SCALE AS SHOWN REV.
CHECK			FIGURE 1

