A DETAILED ARCHAEOLOGICAL ANALYSIS OF LDF-030D (47Vi257)
OF THE LAC DU FLAMBEAU RESERVATION,
VILAS COUNTY, WISCONSIN

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MAY, 2008

A SENIOR THESIS SUBMITTED IN PARTIAL FULFILLMENT OF THE
REQUIREMENTS FOR THE DEGREE OF
BACHELORS OF SCIENCE IN ARCHAEOLOGICAL STUDIES
UNIVERSITY OF WISCONSIN - LA CROSSE
Abstract

The Woodland Indians of Wisconsin were typically hunters and gatherers living in semi-permanent villages. They occupied regions of Wisconsin from about 500 B.C. to A.D. 1300.

Northern Wisconsin is home to mainly Middle to Late Woodland sites and there is one particular site that is the focus of this paper.

This paper is a detailed analysis of a tribal site which is numbered LDF-030D (State ID 47Vi257) (Sand Beach/Trading Post Site). It is located on Lac du Flambeau Reservation of Vilas County, Wisconsin. Previous excavations within the last decade have concluded that this site was a general area that was used for tool making and maintenance. However, a 1995 report of LDF-030D concludes that the collection of this site consists of mainly lithics and ceramics and it is my understanding that a use for ceramics were for domestic activities. By further analyzing and exploring the contents of this site it is possible to determine what domestic activities were taking place and the season(s) in which they were conducted.
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Introduction

Lac du Flambeau, WI is home to the Lac du Flambeau Band of Lake Superior Chippewa Indians and it is my home as well. I feel that the purpose of this paper will further educate and enhance the Lac du Flambeau peoples’ understandings of their ancestors and the material remains they left behind. However, archaeological analysis has not always been popular with some of the tribal members. They feel that cultural and spiritually designated areas on the reservation should not be further analyzed; what our ancestors put in the ground, i.e., human remains, material remains, etc, should be left alone. Although no human remains have been discovered at this site, it is still a possibility that there are. With that, I am bound and restricted from providing specific site locations. Considering this, the Lac du Flambeau Cultural Committee, which is consisted of elders and tribal members, has given me permission to study this site in order to determine seasonality.

Discussions with Mike LaRonge who is the current tribal archaeologist and Cynthia Stiles, the previous tribal archaeologist for the Lac du Flambeau Tribal Historic Preservation Office (LDFTHPO), about sites located within the Lac du Flambeau Reservation have interested me because no one has ever conducted a detailed analysis of any site within the reservation; and from what Mike has said there has never been samples sent out for radiocarbon dating. Also, the Tribal Historic Preservation Officer, Kelly Jackson, whom I have worked with in 2005, has fully supported my project ideas. The mission of LDFTHPO is to promote, educate, enhance, identify, encourage, and preserve cultural and traditional activities and materials for future generations. I believe with the work that I am doing and plan to do I will do just that.

LDF-030D was once a trading post in the early 1700s and before that, well no one is completely certain because there are no written records. But with systematic excavations, we
have discovered that the area was inhabited by Woodland Indians. I would like to find out what their main purpose was for occupying this stretch of shore line and how long they were there.

**Physical Background**

The site, which is located in Vilas County of Northern Wisconsin, is situated within the Northern Highland Geographical Province of Wisconsin and Michigan. This province covers about 15,000 square miles in Wisconsin and has an elevation of 1500 to 1700 feet (Martin 1965). Although this area is considered to have the highest elevation in the state, it is more of a smooth upland plain.

![Figure 1: Map of Wisconsin showing landforms and area of site (Martin 1965)](image-url)
The Highland Province is also mottled with hundreds of lakes, swamps, marshes, and bogs. Two lake districts are present: 1) the lakes district surrounding the headwaters of the Upper St. Croix River, the Bios Brule River and the western branches of the Chippewa River; and 2) the Highland Lake District (Stiles 2005a). The Highland Lake District lies within Vilas, Oneida, and adjacent counties (Martin 1965). LDF-030D falls within the Highland Lake District.

Glaciation that occurred in this region produced many of the main features. The soil is stonier and sandy which makes it more suited for forests than crops. The major wet soil areas of Wisconsin are confined largely to the glaciated region, and the vegetation adapted to such habitats is naturally best developed in that terrain (Curtis 1959). The marshes, swamps, and bogs cover about 21% of the Highland Lake District or about 425 square miles in Vilas, Oneida, and adjacent counties (Martin 1965). There are also cranberry and blueberry swamps and drier marshes and swamps; tree-covered tamarack swamps and hummocky, cedar swamps (Martin 1965). According to Martin in *The Physical Geography of Wisconsin*, the soils of the Northern Highland are not suitable for cultivation. About 1% of the land is under cultivation and about a sixth to a half is worthy of farm development (Martin 1965).
“The Northern Wisconsin Region is also the location of headwaters to most of the major river systems in the state: the Wisconsin River, which flows south to the Mississippi River; the Manitowish, Turtle, Flambeau and Jump Rivers, part of the Chippewa River drainage system which flow west and south to the Mississippi River; the Bois Brule, Bad, Montreal, Presque Isle and Ontonagon rivers which flow north into Lake Superior; the Namekagon, part of the St. Croix drainage system, which flows into the Mississippi River; the Black River, which also flows into the Mississippi; the Brule, Pine, Popple rivers, part of the Menominee River drainage system, which flows east to Green Bay; and the Wolf River, part of the Fox River drainage system, which flows to Green Bay (Stiles 2005a). These water regions provide important water transportation to the Mississippi River, Lake Superior, and Lake Michigan. As a result, most of the prehistoric and historic trails through this area of Wisconsin are water trails” (Stiles 2005a).
LDF-030D is located along the shore of one of the main waterways on the reservation. It is upland, and situated on a high bank. Over the years erosion has created a wider base and narrower hillside along the high bank.

Vegetation

Presettlement Vegetation

At about 12,000 B.C. is the time when people started moving into this continent and into this part of the country that was later named Wisconsin. The environment looked much different than it does today. Most of Wisconsin looked much like parts of Canada and Alaska today with sparse vegetation and cold climate (Ritzenthaler 1985).

However, as glaciers eventually started to melt and retreat as the climate warmed up, Wisconsin started to resemble its current vegetation patterns (Ritzenthaler 1985).

Present Vegetation

At the time of settlement (1830-1850), Curtis estimates that the total percent of land surface covered in forest in this state was about 63.32% and about 46.43% of the forested area is in the northern region of the state (Curtis 1959). The predominant type of forest called the Northern Mesic Forest covered 33.55% of the state land surface (Stiles 2005a, Curtis 1959:Table 3). This area receives moderate moisture and contains the dominant species sugar maple-107 average importance value (av. I.V.), hemlock-79.4 av. I.V., beech- 40.2 av. I.V., yellow birch-29.4 av. I.V., and basswood-15.7 av. I.V. Other types include ironwood, red oak, American elm, red maple, white birch, white ash, slippery elm, balsam fir, and white cedar (Curtis 1959, Table X-1).

Also about 6.48% of the state land surface was characterized by Northern Xeric Forest (Stiles 2005a, Curtis 1959:Table3). This includes a dry forest of Jack pine, red pine, white oak,
Hill’s oak, trembling aspen, white oak, and large-toothed aspen. This region also includes a dry-mesic forest. These stands are white pine, being the dominant species, red maple, red oak, white birch, sugar maple, red pine, hemlock, and trembling aspen (Curtis 1959). Vilas and Oneida counties are mapped as containing approximately 50% Northern Xeric Forest (Stiles 2005a).

Another type of forest covering this region is the northern lowland forest or wet forest. These are considered the swamp forests of northern Wisconsin. Table three of Curtis’s book labels this area as comprising 6.4% of the state land surface (Curtis 1959). The northern lowland forests are dominated by the tamarack-black spruce bog forests, the white cedar-balsam fir
conifer swamps, and the black ash-yellow birch-hemlock hardwood swamps. They are typically found in lake beds and river floodplains (Curtis 1959).

The present day vegetation of Lac du Flambeau is consisted mainly of these swamps, lakes, and dense forests.

**Regional Prehistoric Cultural History**

**Paleo-Indian Tradition**

The earliest residents of Wisconsin are called Paleo-Indian. They migrated across the Bering Strait during the Pleistocene around 12,000 B.C. and lived here until about 8500 B.C. As glaciers retreated, these people moved farther south as suggested by evidence of fluted points left behind in different parts of the country to the west and south. Paleo-Indians were gathered in small bands and moved about often following megafauna - mammoths, mastadons, and bison- as well as caribou and musk-ox, which were their main source of food. In the north woods, Late Paleo-Indians culture is represented by the Minocqua Phase (Salzer 1969).

**Archaic Tradition**

By about 8500 B.C. the glaciers had completely receded from the state and the large mammals had become extinct. The warmer climate changed the landscape from tundra and spruce forests to a mixed conifer/deciduous canopy (Stoltman 1997). A different variety of land-based flora and fauna as well as aquatic resources were available. A change in food preferences is reflected in the technology and lifestyle of the people called Archaic by archaeologists. The change in environment occurred over a long period of time and that the people already living in the region adapted to these changes. The change in lifestyle is not necessarily indicative of a replacement of population from Paleo Indian to Archaic times, but more likely a change in diet and technology developed in response to changes in climate and ecology (Stiles 2005a).
The Archaic Tradition is divided into three parts: Early Archaic 8500-6000 B.C., Middle Archaic 6000-3000 B.C., and Late Archaic 3000 to 1000 B.C. Like the Paleo-Indians, Archaic people lived in small bands. They still moved around hunting big game such as deer and caribou but also relied on fishing as well. Around 6000 B.C. it appears that there was an increase in emphasis on other resources (Ritzenthaler 1985). Nuts and other plant foods were being gathered and it is clear that these became an important part of their diet and it is during this period that ground stone tools first appeared.

The Middle Archaic period is characterized by an increase in social complexity, indications of the beginnings of trade, and burial in simple individual graves (Ritzenthaler 1985). The climate was a lot warmer during this time and it allowed people to stay in one place for longer periods of time as evidence by ground stone tools beginning to appear in quantities. It is also marked by the large, side-notched projectile point. Radiocarbon dates place this type of point between 3000 B.C. and 1200 B.C. (Birmingham, et al. 1997). According to Ritzenthaler in 1985, recent work in Illinois has expanded our knowledge of the Middle Archaic, but no major excavations concentrating on this time period have yet been done in Wisconsin (Ritzenthaler 1985). The earliest Archaic people in Wisconsin were apparently few in number since not many of their sites have been found.

The Middle Archaic stage is also the most famous manifestations of the Old Copper Complex (Birmingham et al. 1997). Copper from Lake Superior was used to shape tools and ornaments such as fish hooks, axes, awls, spear points and knives. Evidence of annealing, the process of heating and cooling copper to relieve internal stress during tool making, is one instance of technological experimentation and innovation (Stiles 2005a).
As stated in the 2005 Salvage Report of LDF-030D by Stiles, “It is important to note that copper tools and ornaments as well as unmodified copper nodules have been found in northern Wisconsin sites dating from the Archaic period through historic times. Copper sources from the Lake Superior area of Michigan are an important factor in the extensive trade network in later Woodland and Mississippian time periods in the state. Copper is also present in the glacial deposits and as “float” (found in the rivers and streams of the region) (Stiles 2005a).

The Late Archaic stage is marked by the appearance of new projectile point styles, small stemmed and corner-notched points, along with a drastic decline in the utilization of native copper to make utilitarian implements (Birmingham, et al. 1997). It is possible that environmental changes are the reason for these cultural changes. Most evidence relating to the Late Archaic stage stems from rockshelter excavations. According to Carol Mason, some rare evidence was found in the bottom levels of rockshelters in southern Wisconsin (Mason 1988). Such rockshelters include the Durst Rockshelter and Preston Rockshelter. They are distinguished by the different projectile point styles. Squirrel River Phase and Burnt-Rollways Phase describe the Archaic culture in the north woods (Stiles 2005a, Salzer 1969).

Woodland Tradition

Overlapping the Archaic period, sometime after 1000 B.C., significant technological and social changes began to appear in the Midwest (Stiles 2005a). Pottery, burial mounds, and plant cultivation began to appear during the Woodland period. People became more sedentary and relying on local plants and animals. Since social and economic strategies changed several times during the Woodland period, this period has been divided into Initial Woodland and Terminal Woodland in the north woods (Stiles 2005a).
In northern Wisconsin, Initial Woodland was first identified in two sites, the Robinson Site and the Squirrel Dam Site in Oneida County. These sites defined the Initial Woodland Nokomis Phase for the region through a distinctive pottery style. This pottery is characterized by stamp and incised decoration. Typically these vessels are small, grit-tempered jars with thick walls and flattened lips (Birmingham, et al. 1997). Terminal Woodland in the Highland Lake District is characterized by the Lakes Phase, which included pottery with cord-impressed decoration and later styles with collared rim vessels (Salzer 1969).

Nokomis phase projectile points range from contracting- to straight-stemmed forms and also side-notched or expanding-stemmed types (Birmingham, et al. 1997).

Woodland Indians typically used stone and bone tools. Raw materials extracted from the ground consisted of quartz, orthoquartzite, and chert. Copper was also utilized during this period but not extensively. Woodland people began settling in semi-permanent villages of small hut-like homes. The frames were made of thin trees and the covering made from reeds woven together to create a water tight covering. These homes that were easily constructed and easier to take down made is much more convenient for the natives to continue their seasonal round of hunting and wild foods gathering. So using the village as a base, people would travel short distances in certain times of the year and construct small camps. The seasonal round consisted of: early spring/maple sugar gathering; late spring/early summer-catching spawning fish, gathering berries; summer/planting, gathering wild plants, shellfish, fish and turtle; late summer into late fall/ gathering wild rice, hunting deer, harvesting plants; and winter/trapping and hunting small game. Cultivated foods like corn, beans, and squash are also found on Terminal Woodland sites, and ridged fields where these crops were grown can be found near the villages (Stiles 2005a).
Mississippian Tradition

In the cultural sequence in the Midwest, Mississippian cultures, migrating from the south and west, appear after A.D. 900. In northern Wisconsin, Mississippian pottery vessels have been found on a few Terminal Woodland sites. This may indicate trade between the two groups. The possibility of Mississippian habitation of the area is being explored, however to date no definitive Mississippian sites have been recorded for the counties including the project area. Mississippian lifestyles were heavily centered around the seasons for cultivating plants and may not have found most portions of northern Wisconsin suitable for that activity (Stiles 2005a).

Historic Native American and Euro-American Cultural History

By the time Europeans began filtering through and taking up residence in the New World, Wisconsin was inhabited by the Menominee, Fox, and Sioux Indians around A.D. 1600. Long before the advent of the white trader, inter-tribal commercial intercourse existed (Turner 1977). Trade between the “moundbuilders” and “stone age” lasted centuries (Turner 1977).
However European contact changed all that. Eastern tribes such as the Ottawa and Huron who had been pushed westward by European expansion brought European made goods and traded with the local tribes of the north woods (Stiles 2005a). A mass migration in the 1600’s caused eastern tribes to move from region to region in response to the threat of disease and the fear of warfare (Stiles 2005a). Historical documentation suggests that Indian peoples of Wisconsin were dislocated and moved far from their original homelands. By 1695, the Ojibwe had also migrated west and south from the east coast and permanently settled in parts of northern Wisconsin.

During the middle and late 1600’s and into the 1700’s, the Ojibwe and other surrounding tribes of Wisconsin were continuously visited by French explorers, missionaries, and fur traders. The French period of exploration began in 1634 with Jean Nicolet’s landing at Green Bay and ended with the French defeat in the French and Indian War in 1763. French trading posts were erected throughout Indian territories during this time and created many alliances with the native peoples. However, after the French defeat in 1763, the British came to control trade in the Northwest Territory, including present day Wisconsin. The British trade was organized by companies, specifically the Northwest Fur Company, the XY Company, and the Hudson’s Bay Company (Stiles 2005a). It wasn’t until the end of the War of 1812 that British domination of the trade ended. It was then passed on to American hands. The American Fur Company monopolized the trade in the Northwest Territory from 1815 until the demise of the industry (Stiles 2005a).

“Beginning in the 1870’s, United States government policy makers began to listen to reformers who believed that the native people throughout the country should be assimilated into the mainstream Protestant, European-based culture. For the next 60 years, Congress passed a number of laws. Tribal land was allotted to members within the reservation to promote individual land ownership (vs. tribal or communal ownership). Local and off reservation boarding schools were built, stipulating mandatory attendance in order to immerse Indian children in Euro-American culture and remove them from the influence of their parents and tribal elders. Mandatory abandonment of Indian language within the schools and ceremony within the reservations were new policies. Punishment for disobeying these laws and policies
could mean withholding of government payments and food rations, and sometimes jail terms. Ideally, the purpose of these reforms was to transform the reservations and their inhabitants into self-sufficient farmers and productive Christian citizens. However, the underlying purpose was to erase tribal control of unoccupied land within the reservation boundaries and eradicate the Indian culture and religion. In addition to the fact that most reservation lands contained poor soils for sustained production of crops, Congress never appropriated enough money to supply tools and livestock to the reservations or food, clothing, competent employees, and medical personnel to schools. Poverty, disease and displacement were the norm on most reservations; however, most of the damage was done. It has taken the last 60 years to begin the repair done to the reservations and Indian cultures during the assimilation period.” (Stiles 2005a).

History of Lac du Flambeau

The Lac du Flambeau Reservation was officially established by treaties at La Pointe in 1842 and 1854. Oral traditions of the Lac du Flambeau Ojibwe claim that this area had been inhabited since 1745 when Chief Keeshkenum led his band here from the east. However, other oral stories have stated they, the Ojibwe, have always been here.

The name Lac du Flambeau comes from the French meaning “Lake of Flames or Torches” because of the Ojibwe ritual of spearing fish in birch bark canoes by torchlight. The Ojibwe called the fire hunters Waswaagon, and the community became known to other bands as Was-waagaming (Leow 2001).

Lac du Flambeau became an important center for trade for many years between the French and British then eventually becoming an even greater important center for logging in the 1800’s and into the early 1900’s. With the extension of the railroad lines into northern Wisconsin in the 1890’s, loggers could go deeper into the woods by building smaller rail spurs from the main lines (Stiles 2005a). By the 1930’s, the expansive forests that covered much of the reservation were virtually depleted. The Civilian Conservation Corps eventually came in to help replenish the forests and control fires.
As early as the 1890’s tourists from southern Wisconsin and Illinois have been coming to this area to vacation. As a result, resorts and campgrounds began popping up along the many beautiful lakes which was, and still is, a very attractive setting to many.

Short History of Site LDF-030D

Considering the fact that I am not allowed to name the site location and surrounding location markers, this part will be short. LDF-030D is located along a shoreline terrace that raises high above the beach. The large rounded ridge on top of this terrace contains loose sugary sand which suggests that it once was a very ancient ice ridge from ice pushing in the spring (Stiles 2005a). It also shows that a continuous ice ridge was once present along the north shore of the nearby lake. Pieces of this ridge are still visible however the longest stretch is along the beach shore. This long ancient ice ridge was said by tribal members to have been used as a footpath in historic and recent times (Stiles 2005a).

The beach and ridge that this site is located on was originally divided into two allotments and a portion for the government school property. Houses owned by non-tribal members are visible along the west to northwestern part of this ridge but do not lie within the site. However, according to Stiles, it is possible that the pre-contact materials found to the east of the current site boundaries extend into this area (Stiles 2005a). A mound site, probably dating to the Late or Terminal Woodland is present about 200m west of the site boundaries (Stiles 2005a).

In the 1940’s and early 1950’s a wayside was constructed over the site. Fill was brought in to raise the area to level off the ancient ice ridge. This fill was present in the excavations of 1997, 2002, and 2003 (Stiles 2005a). A campground was constructed behind the wayside, which is just north of the site but somewhat south of the allotted lands in the early 1960’s. This area remained a campground until 1983. Use of the shoreline for night parties and campfire pits
probably began in the off-seasons around the time that the wayside was developed in the 1950’s, and continues today (Stiles 2005a). In the 1990’s until now, the tribe has had various plans for improvements for the park which include picnic tables, grills, and a new bathroom facility. These improvements prompted the investigations in 1995, 2002, 2003, and 2005.

**Previous Archaeological Investigations** (map of all investigations located on page 30)

Beginning in 1995, the site located on the Lac du Flambeau Reservation, was discovered during a fur trading post investigation directed by Cynthia Stiles, former tribal archaeologists for the LDF THPO. Since then there have been five other archaeological investigations conducted on the site area due to wayside and highway improvements. These are the years in which all site investigations took place: 1995, 1997, 1998, 2002, 2003, and 2005.

LDF-030D has been considered an important place for tribal members, both culturally and socially. The site contains three main components: a Woodland occupation, a transportation corridor from Old Village to the mill site, and a recreational site beginning in the early 20th century to the present (Stiles 2005a).

 Taken from Stiles 2005 report: “In 1992, the Burnett County Historical Society conducted a survey prior to the connection of housing to the city water system. The survey was conducted on the north side of the site area, specifically north of the tree line, to a road that heads into a residential area. This survey defined the current boundaries of the site area, since shovel tests in the area north of the tree line uncovered heavy disturbance and borrow pits from past road and facility construction. The survey also noted butchered animal bones from a cow in one of the shovel tests. Since 1992, the boundaries of the site have extended north from the lakeshore to the tree line”.
1995 Phase I Archaeological Investigation

The 1995 archaeological investigation was conducted due to a proposal to rehabilitate the beach that surrounded the western half of the site. The site was also investigated as part of the search for the Northwest Company and American Fur Company trading posts.

Field Procedures

Pedestrian survey, metal detecting, and shovel test survey were conducted throughout the park area. Nothing was found during the pedestrian walk-over survey, however, there were ten positive shovel tests and metal detecting recovered many historic artifacts along with a pre-contact copper projectile point (see figure 21). The shovel tests were conducted in three 5m transects with holes placed 5m apart along each transect on the northern side of the park (Stiles 2005a). A hide scraper manufactured from chert, a quartz platform core, quartz, quartzite, chert, and basalt flaking debris – tertiary and secondary and grit-tempered pottery were collected in the positive shovel tests. All soil was screened through ¼ in mesh hardware cloth screens. Metal detecting was conducted between 1 and 10 meters of the shoreline and the area to the south of the road. Metal detecting coverage was 100% from the highway to the property line and from the shoreline to the campground road (Stiles and Oerichbauer 1995). (See Figure 15 for map)

Results

The pottery pieces are small exfoliated body sherds. Their presence and the presence of the copper point indicate a Woodland occupation (more discussion of copper point at end of paper in Results section). The lithic debris suggests tool making and maintenance. No other time diagnostic artifacts were found in 1995, and no features were uncovered (Stiles 2005a). No artifacts were from the fur trade era (Stiles and Oerichbauer 1995).
1997 Phase II Archaeological Investigation

The Wisconsin Department of Transportation contracted with the THPO to conduct Phase II investigations on a portion of the site area that is located within the highway right-of-way (Stiles 2005a).

Field Procedures

For this project, pedestrian walk-over survey, shovel test survey, and test excavations were conducted. Pedestrian survey was conducted throughout the site boundaries in which thirty-eight artifacts were found in the form of lithic flaking debris. The vast majority of lithic materials were quartz – 89%; artifacts also included one wedge as well as secondary and tertiary flakes, and shatter debris. One quartzite secondary flake was also recovered as well as a chert biface fragment and one tertiary flake. It was noted that the chert biface fragment was found in the same general area as the chert scraper and debris in 1995 (Stiles 2005a).

Shovel tests were conducted in three transects parallel to the right-of-way and at a 5 meters interval with 5 meters between each transect. Fifty-eight tests were performed in which six were positive for pre-contact materials. In the six positive shovel tests, ten items were recovered- quartz shatter, chert flake, and bone fragments, as well as a historic iron ring (Thomas and Anderson 1997).

Two 1m X 1m excavation units were placed within the right-of-way and the eastern end of the wayside (Stiles 2005a. These units were excavated with hand trowels and shovels; all soils were screened through ¼ in mesh hardware cloth screens. Unit 1 was excavated in 5cm thick arbitrary levels while the levels in unit 2 varied due the recognizable disturbed fill. Each unit produced ten lithic artifacts in the form of flakes and core. At least four calcite bone fragments
were also found at a depth ranging from 25 to 60 cm below surface (cm bs). (See Figure 15 for map)

**Results**

The excavations conducted within this area which is located along the right-of-way contained many historic and prehistoric artifacts intermixed. Anything that would not have been disturbed or placed out of context would lie well beneath the fill. Some intact subsurface soil layers may be present under the upper layer of disturbed soils and fill (Thomas and Anderson 1997).

All recovered artifacts were taken back to the THPO lab to be washed and catalogued. They are currently curated in the George W. Brown Cultural Museum in Lac du Flambeau.

**1998 Salvage Excavation**

A proposal to open up more areas for residential development (LDF-030D was included as a possible area) was submitted to the Tribal Council, and subsequently to the THPO for review (Stiles 2005a). The proposal was denied, however a new proposal to rehabilitate the area was suggested.

**Field Procedures/Results**

Pedestrian walk-over survey was conducted and two tertiary flakes were found – one quartz and one chert.

**2002 Salvage Excavation**

In 2002, Indian Health Services proposed a plan to replace the septic tank, sewer line, and water line for the new bathroom facility that was to be placed in the park in July of 2002. Salvage excavation was needed in the proposed tank area (Stiles 2005a).

**Methodology**
Excavations for the water tank began on June 28th; four 1m X 1m units were placed east of the proposed new bathroom facility. Units 1 and 2 were abandoned since the tank was moved further south of the original area (Stiles 2005a). Units 3 and 4 had begun and were excavated in 3cm arbitrary levels. After fill depth was determined, 5cm levels were excavated and/or shovel scraped to the base of the fill then excavation in 3cm levels preceded from there to the base of the unit (Stiles 2005a).

Unit 3 resulted in five quartz flakes – tertiary and chunk; ten chert tertiary flakes; and twenty-one grit-tempered pottery sherds, some with cord impressions. These materials were found within 15 to 37 cm below datum (cm bd). Soil profiles for this unit showed the horizon between the fill and original ground surface very clearly (Stiles 2005a) (Figure 5).

Unit 4 was placed near the edge of the asphalt drive and sidewalks (Stiles 2005a). It contained both modern materials and prehistoric in the first level (0-3 cm bd). Modern materials continued throughout the unit. Pottery sherds were found in level 3 (8-15 cm bd) and level 4 (15-
Recognizable pre-contact materials began to appear by 12 cm bd and continued to 20 cm bd (Stiles 2005a). Soil profiles for this unit show a fill level and also disturbance from the wayside development as well as the mingling of soils and the root maze (Stiles 2005a). (Figure 6).

![Figure 6: Profile of Unit 4, north wall, 2002 salvage investigations (Stiles 2005)](image)

All artifacts were mapped in situ and bagged separately. Any modern materials and fire-cracked rocks encountered were discarded due to the fact that this place was once a campground/party spot that contained fire pits with charred and uncharred wood. Artifacts were brought back to the laboratory to be washed, analyzed, and catalogued.

Results and Discussion

This area is clearly heavily disturbed. Each of the four units contained modern and prehistoric materials intermixed. Some of the shatter/chunks could be possible gravel fill. “During construction of the original wayside in the 1940s -1950s, fill was placed on top of the original ground surface. Prior to placing the fill, there was probably scraping in some areas to level the ground. During the scraping and filling episode, there was mixing of fill and original
topsoil, mixing the modern and pre-contact artifacts as well. All this probably happened in the depths above 26 cmbd in all the units. The lighter subsoil or intact B horizon begins to show in Units 3 and 4 about 25-26 cmbd and continues undisturbed, which suggests that this soil is original strata and artifacts in this depth are in situ” (Stiles 2005a).

Pre-contact materials that consisted of grit-tempered pottery suggest domestic activities. Flaking debris, a bipolar wedge, and a hammerstone suggests tool making and maintenance in the general area (Stiles 2005a).

2003 Salvage Excavation

Renovations had been proposed for the park again and this included replacing picnic tables and grills and adding more sets to the shoreline terrace that overlooks the lake and beach, and wayside area. Twenty units were planned. Units were excavated to cover the same or slightly larger dimensions of the cement pads for the picnic tables and grills- 1m X 1m for picnic tables, 50cm X 50cm for grill slabs (Stiles 2005a).

Methodology

Before units were put in, pedestrian walk-over survey was first conducted. These were done between the state marker (located on site) and the erosion control area (Stiles 2005a). 100 pieces of possible flaking debris were collected. Out of the 100, only 43 could be claimed as actual artifacts.

Twenty units were put in place and each unit was excavated in 3cm levels, unless there was an unusual situation in which case they would vary by 4 or 5cm in thickness (Stiles 2005a). All units were excavated with hand trowels and soil was screened through ¼ in mesh screens. The base of each unit was probed to an additional 20-30cm to be sure that no buried ground surfaces were missed (Stiles 2005a). If a high level of modern disturbance from recent
recreational activity was present and/or few pre-contact materials were recovered, the unit was closed as soon as two sterile levels were reached, sometimes as shallow as 9cm bd (Stiles 2005a).

As with previous excavations, all artifacts were mapped in situ and bagged separately. All depths were taken from a datum located at ground surface of the SW corner of each unit (Stiles 2005a). All modern materials were discarded after being analyzed. All materials were brought back to the lab to be washed, analyzed, and catalogued.

Results

Ten 50cm X 50cm units that were placed along the slope contained modern materials as well as pre-contact materials and were found within the first three centimeters from the surface. Considering the location of the units, the flaking debris collected along this slope may have been from slopewash and erosion.

About 9 units contained modern fire pits. Most were located on level ground. Each of these units also contained modern and prehistoric materials intermixed. They were also located near the surface.

Unit 3, which was located between the asphalt driveway and the slope down to the beach revealed a projectile point made from heat-treated chert at about 9.5 cm bd.

Unit 6 contained a modern fire pit near the surface, but pre-contact materials in between 3 and 12cm bd. There were also fish vertebrae, turtle carapace, and mussel shell. The unit also contained small pieces of copper.

Unit 9 was excavated down to 56cm bd because pre-contact materials were being found throughout the western half. The people working on this unit were unfortunately unable to finish due to time constraints.
Units 1 and 11 exhibited wayside fill in thin layers on the top of the original ground surface. These layers were not treated differently from the original surfaces since they were so thin (Stiles 2005a).

Modern debris as well as a modern firepit was found on the surface of unit 1. Five pre-contact artifacts, secondary and tertiary flakes, were found between the surface and 6cm bd outside and below the modern firepit (Stiles 2005a). The profile of this unit showed a mottled soil across the northern portion of the unit which is probably fill from the original wayside development (Stiles 2005a) (Figure 7).

![Profile of Unit 1, east wall, 2003 salvage investigations (Stiles 2005)](image)

**Figure 7: Profile of Unit 1, east wall, 2003 salvage investigations (Stiles 2005)**

The units in this area were moderately disturbed due to fill and heavy traffic from previous years. The intensity of historic and modern use of the area was certainly responsible for some artifact movement up and down the slope (Stiles 2005a).

The artifact concentration along the shoreline is great and shows that this part of the site was heavily used in pre-historic times. Lithic debris, pottery, and copper working suggest so. The animal remains –aquatic and land- suggests the site was used extensively during warm months. The projectile point is small, about 4cm in length and 2cm wide. It was probably used on an arrow for hunting small mammals.
2005 Salvage Excavation

The proposal to build a new group picnic shelter and a large “fishing guide lunch spot grill” made of stone and mortar prompted archaeological investigations in the summer of 2005. This type of grill would be similar to the style built by the Civilian Conservation Corps of the 1930’s. Four salvage excavation units were completed for picnic tables and grills associated with the shelter (Stiles 2005b). We began excavation in July where the proposed building was to be erected which is on the northwestern half of the site within the old dirt road that runs up through the park. The road bed was heavily used by automobiles during the campground years and ATVs in the subsequent years until now, the soil beneath the surface would be fairly compact with little disturbance.

Figures 8 and 9: Author and others working on Unit 3, 2005 salvage investigations. Pottery found within 15-18 cmbd, below fill.

Methodology

The first field procedures conducted for this project included shovel tests where six posts were to be erected for the shelter. The holes were approximately ten inches wide and three feet deep. All soil was screened through ¼ in. mesh screen. None of the six holes produced pre-contact materials.
Two 1m X 1m units were then placed inside the shelter where picnic tables were planned and one 50cm X 50cm unit was placed to the east of the shelter for a grill (Stiles 2005b). To the north, we placed a 1.5m X 1.5m unit for the stone and mortar grill.

Each unit was excavated in levels of 3cm each, and all soils were screened through ¼ in mesh screens. Half of unit 1 located inside the shelter was shovel scraped to about 2 ft below ground surface in order to be sure that no buried surfaces existed below the level that a probe could not penetrate (Stiles 2005b). This unit did not produce any pre-contact materials.

The second unit within the shelter contained six quartz flakes and one pottery sherd in between 3 and 12cm bd. These units which were located within the road bed had very little to no disturbances.

The next unit was placed outside the shelter about 4-5 feet north of it. The 1.5m X 1.5m unit was taken down to sterile level at about 33cm bd. A modern hearth was found in level 2 (6-9cm bd) as well as some modern materials. Flakes, bone, and shell began to appear in level 3 (9-12cm bd) and continued until about 27cm bd. A high density of artifacts- quartz, quartzite, chert, and chalcedony- was located between 12 and 24cm bd. This also included a possible copper awl (Figure 10) and grit-tempered, cord-impressed pottery (Figure 11). The copper awl closely
resembles the awl found in Ronald Mason’s book *Great Lakes Archaeology* (Figure 13). Soil samples taken from the firepit in this unit was water screened. It contained charred and uncharred wood. The fire pit was clearly modern. The profile map shows little disturbance. (Figure 12)

Unit 4 was placed within the road bed just south of the shelter. Only two possible flakes (quartz) were found but were within the first three centimeters from the surface. It is hard to say if they are actual artifacts or from gravel fill.

Results and Discussion

The units located within the road bed contained very few artifacts as well modern materials. The unit located north and outside the road bed contained a higher concentration of pre-contact materials and it would be suggested that this area was probably used intensely as a place for tool manufacture, and possible area for a house/wigwam. The modern fire pit is evidence of the campground that was once in this area.

According to the report written at the end of 2005 by Stiles, “These deposits (pre-contact materials) date to the Late or Terminal Woodland, between A.D. 500 and A.D. 1300 to 1500 (Stiles 2005b).
Figure 13: Arrow points to copper awl (Mason 1981)

Figure 14: Map showing all archaeological investigations at LDF-030D (Stiles 2005)
Results of Complete Analysis

After careful examination of the contents of this site it can be said that this site is definitely of the Woodland period. However, it is hard to tell from which stage. It is either a Middle/Initial, or Late/Terminal stage, or the evidence left behind could be from both.

The Nokomis Phase of the Initial Woodland period has recently been identified for the lakes district in extreme north-central Wisconsin, in Oneida and Vilas counties (Green 1986). Nokomis peoples produced pottery vessels similar to those of North Bay, with heavy emphasis on cord-wrapped stick stamping over plain surfaces.…these people also depend to a great extent on southern Wisconsin and Illinois for cherts because there are no locally available cherts in the lakes district (Green 1986).

The prehistoric materials found within this site are very similar to what Robert Salzer has described as the Nokomis Phase in the Middle Woodland period. But there are also prehistoric materials that could be dated to the Late Woodland or Terminal period. The Terminal Woodland Stage in the Highland Lake District was originally represented by Salzer’s Lakes Phase (Howell 2006, Salzer 1974). The Lakes Phase was defined on the basis of small, triangular projectile points, ceramics similar to Madison, Heins Creek and Clam River wares, and burial sites that included mound groups and open cemeteries (Howell 2006). As originally defined, the Lakes Phase included earlier Late Woodland occupations and a later stage that included the addition of collared, grit-tempered vessels and the arrival of shell-tempered ceramics via trade from the Oneota or Mississippian populations from the south (Howell 2006). Salzer estimated the age of the Lakes Phase to be from A.D. 600 to A.D. 1400 (Howell 2006).
The collection for this site contained a bag labeled “Odd Sand” from Unit 2003-19 level 5 – accession number T03.030D-001.081.0001. I took out the contents and dry screened it first through #20 of the USA Standard Testing Sieve for the heavy fraction and then I used #40 for the light fraction. After collecting the samples and separating them I put each fraction under a high powered microscope to analyze the contents. Unfortunately there were no floral materials, only very small pieces of charcoal. The amount was not enough to be radiocarbon dated.

Faunal remains within the collection were very small fragments of fish, turtle, small mammals, and a possible deer (see figures 15, 16, and 17). A total of 22 bone fragments have been found. It has been suggested that these are warm climate animals, hinting that these Woodland people camped here during summer months.

Figure 15: Fish vertebra
Figure 16: Small mammal bone fragments and possible deer bone.
The lithic raw materials, in the form of tertiary and secondary waste flakes and few scrapers, used to manufacture tools were mainly quartz, chert, and basalt; the highest quantity being quartz: a total of 444 quartz flakes were found, 29 quartzite flakes, 36 chert flakes including 1 being a projectile point, and 4 basalt flakes (see figure 18). A list of artifacts from all investigations has been produced by the author and each artifact is classified into categories. This can be found on page 39. The projectile point is made of local chert and it appears to be an unfinished product and is characterized by side notches with no basal grinding, which is indicative of the Late Woodland period (Goldstein and Osborn 1988) (see figure 19). Copper artifacts were also collected. These are in the form of nodules, a possible awl, and a projectile point-a total of 5 copper artifacts. The copper projectile point is corroded, but still retains its basic shape and thickness (Figure 20). It has a length of 6cm, a width of 2.5 cm, thickness of about .6cm, and a weight of about 15 ½ grams. It is also side-notched, with a rounded base. This is probably not associated with the archaic period because most archaic copper points are long and narrow, with slotted or straight bases, or rat-tailed tangs. The evidence of ceramic sherds also indicates that this is a Woodland Period occupation site.
Figure 18: Percentages of Lithic Raw Materials

Lithic Raw Materials at LDF-030D

- Quartz: 88%
- Quartzite: 4%
- Chert: 7%
- Basalt: 1%

Figure 18: Percentages of Lithic Raw Materials
The presence of a scraper also suggests hide processing, joining tool making/maintenance as an activity in this area (Stiles 2005) which is probably a warm weather activity. Pottery suggests food cooking. So it would seem more than likely that these Woodland people set up
camp during the summer to late fall for fishing and tool making/maintenance. Unfortunately I was unable to obtain any other types of seasonal indicators such as floral remains because none was collected or found in the soil samples that were water-screened by Cindi.

**Conclusion**

At the beginning of this project I had intended to examine the artifacts, screen any soil that I thought was collected in hopes of obtaining an indication of the season in which this site was occupied. However there wasn’t any soil to be floated nor were there any other definite indicators, besides the faunal fragments, for seasonal occupation. The evidence of tool manufacturing in the form of waste flakes, a few end scrapers, pottery sherds and copper artifacts and given the fact that one of the main characteristics of Woodland people is their subsistence patterns and annual work cycle- (spring/maple sugaring; summer/planting, fishing, gathering materials and manufacturing products, gathering and processing foods; fall/harvesting plants, hunting and trapping; and winter/mainly trapping), it would have to be suggested that this area was used significantly as a summer to late summer habitation site. During this time these people would have been subsisting on many different species of fish, small mammals, aquatic animals, berries, wild rice in the late summer and deer in the late summer to early fall.

Another possible clue for identifying the usage of this site is by examining the location of the site. It is located on a high embankment/ridge near the shore of a large lake that is connected to a chain of many other lakes in the area which was an important waterway for traveling by canoe and for possible inter-tribal trading as well as trading with Europeans after contact with them. It is also highly unlikely that any Woodland people would set up camp and live right next to a lake throughout the cold winter months because. It has been proven by excavation that most Woodland winter camps are located inland in a more forested area to shelter them from the cold.
This site basically has information on what we already know about Woodland Indians in northern Wisconsin. Without floral remains or enough radiocarbon dating material it is impossible to gain any more knowledge. I believe that further excavations are in order if we want to more about these people that inhabited this site.
Table 1: List of artifacts from all investigations

<table>
<thead>
<tr>
<th>Site</th>
<th>Phase</th>
<th>Artifacts</th>
</tr>
</thead>
<tbody>
<tr>
<td>S1</td>
<td>1861</td>
<td>Prehistoric, Present, Historic, Modern, Projectile Point</td>
</tr>
<tr>
<td>S2</td>
<td>1862</td>
<td>Biface, Fragment, Scraper, Bipolar core/wedge, Platform core, Primary Flake, Secondary Flake, Tertiary Flake, Shatter</td>
</tr>
<tr>
<td>S3</td>
<td>1863</td>
<td>Faunal, Copper, Histories</td>
</tr>
<tr>
<td>S4</td>
<td>1864</td>
<td></td>
</tr>
</tbody>
</table>

Note: The table continues with more entries for different sites and phases.
Acknowledgments

I would like to first thank Mike La Ronge of the Lac du Flambeau Tribal Historic Preservation. Without his help I would not have been able to complete my project. I am also grateful for the Cultural Committee’s approval for the study of the artifacts for this project as well. I appreciate them allowing me to borrow the artifact collection and transportation of them here to MVAC. I would also like to thank Dr. Jim Theler for his faunal analysis, and those employed at MVAC for helping me identify materials in the collection. I thank Dr. Connie Arzigian for her proof-reading and I’d like to thank Cindi Stiles for her help and input on this project as well. I also need to thank my family for their continued support throughout my time at UW-La Crosse. And last, but not least, Dad, without your support and telling me “Never give up!” I would not have been able to make it.
References Cited

Birmingham, Robert A., Carol I. Mason and James B. Stoltman (ed)
1997 Wisconsin Archaeology. The Wisconsin Archeologist 78(1-2).

Curtis, John T.

Goldstein, Lynne G. and Sannie K. Osborn

Green, William, James B. Stoltman and Alice B. Kehoe (ed)
1986 Introduction to Wisconsin Archaeology. The Wisconsin Archeologist 67(3-4).

Howell, Ryan J.
www.townofgarfield.com/GarfieldPark/Archeology/Archeological_Report.pdf

Leow, Patty

Martin, Lawrence

Mason, Carol I.

Mason, Ronald

Ritzenhaler, Robert E.

Salzer, Robert J.

Stiles, Cynthia
2005a Salvage Excavations on LDF-030D-001 (Formerly LDF-042) Keeshkenum Site (Sand Beach) Old Indian Village, Lac du Flambeau Reservation, Vilas County, Wisconsin. Tribal Survey #02-027T. Copy on file with the Lac du Flambeau Tribal Historic Preservation Office.
2005b 2005 Salvage Excavations on LDF-030D-001 (Formerly LDF-042) Keeshkenum Site (Sand Beach) Old Indian Village, Lac du Flambeau Reservation, Vilas County, Wisconsin. Tribal Survey #02-027T Addendum. Copy on file with the Lac du Flambeau Tribal Historic Preservation Office.

Stiles, Cynthia and Edgar Oerichbauer
1995 Field Reports for Keeshkenum Site. Copy of file with the Lac du Flambeau Tribal Historic Preservation Office.

Stoltman, James B.

Thomas, Mathew M. and Kelly S. Anderson

Turner, Frederick Jackson

Vennum Jr., Thomas