

# S. J. McKee Archives



## North Lauder locale Radiocarbon Report 2

<http://archives.brandonu.ca/en/permalink/descriptions12328>

Part Of: RG 7 Beverley Nicholson fonds

Description Level: Sub sub series

Series Number: 2.5.2

Accession Number: 1-2010

GMD: multiple media

Date Range: 1997-2000

Physical Description: 2 pages

Material Details: Radiocarbon date reports have been scanned in multi-page PDF files.

## History /

## Biographical:

North Lauder Radiocarbon Date report by IsoTrace Laboratory for Atkinson site #TO-10640.

## Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.

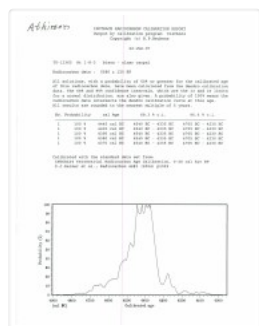
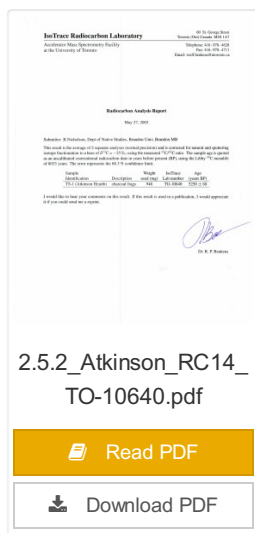
Scope and Content:

Sub sub series contains radiocarbon dates from: Atkinson site and Flintstone Hill.

Name Access: North Lauder locale Radiocarbon Report 2

Subject Access: Archaeology  
North Lauder locale  
North Lauder locale Radiocarbon Report 2

## Documents



## North Lauder locale Radiocarbon Report 3

<http://archives.brandonu.ca/en/permalink/descriptions12329>

Part Of: RG 7 Beverley Nicholson fonds

Description Level: Sub sub series

Series Number: 2.5.3

Accession Number: 1-2010

GMD: multiple media

Date Range: 1997-2000

Physical Description: 1 page

Material Details: Radiocarbon date reports have been scanned in multi-page PDF files.

History /  
Biographical:

North Lauder Radiocarbon Date report by IsoTrace Laboratory for Atkinson site #TO-13365.

### Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.



History /

Biographical:

North Lauder Radiocarbon Date report by Beta Analytic Inc. for Flintstone Hill #109529 and #109530.

#### Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.


Scope and Content:

Sub sub series contains radiocarbon dates from: Atkinson site and Flintstone Hill.


Name Access: North Lauder locale Radiocarbon Report 4


Subject Access: Archaeology  
North Lauder locale  
North Lauder locale Radiocarbon Report 4

## Documents



2.5.4\_FSH\_RC14\_Beta  
-109529\_109530.pdf

 Read PDF

 Download PDF

## North Lauder locale Radiocarbon Report 5

<http://archives.brandonu.ca/en/permalink/descriptions12331>



Part Of: RG 7 Beverley Nicholson fonds

Description Level: Sub sub series

Series Number: 2.5.5

Accession Number: 1-2010

GMD: multiple media

Date Range: 1997-2000

Physical Description: pages 3-5

Material Details: Radiocarbon date reports have been scanned in multi-page PDF files.

History /  
Biographical:

North Lauder Radiocarbon Date report by Beta Analytic Inc. for Flintstone Hill #111142 and #111143.

#### Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.


#### Scope and Content:

Sub sub series contains radiocarbon dates from: Atkinson site and Flintstone Hill.


Name Access: North Lauder locale Radiocarbon Report 5

Subject Access: Archaeology  
North Lauder locale  
North Lauder locale Radiocarbon Report 5

## Documents



2.5.5\_FSH\_RC14\_Beta  
\_111142\_111143.pdf

 Read PDF



## North Lauder locale Radiocarbon Report 6

<http://archives.brandonu.ca/en/permalink/descriptions12332>

Part Of: RG 7 Beverley Nicholson fonds

Description Level: Sub sub series

Series Number: 2.5.6

Accession Number: 1-2010

GMD: multiple media

Date Range: 1997-2000

Physical Description: 1 page

Material Details: Radiocarbon date reports have been scanned in multi-page PDF files.

History /  
Biographical:

North Lauder Radiocarbon Date report by Beta Analytic Inc. for Flintstone Hill #109900.

### Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.

### Scope and Content:

Sub sub series contains radiocarbon dates from: Atkinson site and Flintstone Hill.

Name Access: North Lauder locale Radiocarbon Report 6

Subject Access: Archaeology  
North Lauder locale  
North Lauder locale Radiocarbon Report 6

## Documents

[illegible][illegible]

History /

Biographical:

Crepeele locale Radiocarbon Dates. C14 report by IsoTrace Laboratory for Crepeele site 2005 XU 8.

From 2003 to 2008 field work took place at the Crepeele locale with 75 - 1m x1m units excavated.

To help establish the cultural sequence at the locale Radiocarbon dates were obtained from the three sites in the Crepeele locale.

Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.

Scope and Content:

Sub sub series contains radiocarbon dates from: Crepeele, Sarah and Graham sites.

Name Access: Crepeele locale Radiocarbon Report I

Subject Access: Archaeology  
Crepeele locale  
Crepeele locale Radiocarbon Dates

## Documents

**IsoTrace Radiocarbon Laboratory**  
Accelerator Mass Spectrometry Facility  
at the University of Toronto

Sample ID: 2005 XU 8  
Date: 2008-05-01

*Crepeele Black D suspension surrounding  
extensive bison skull/bone*

**Radiocarbon Analysis Report**  
Edition 20.000

Method: 14C/12C Ratio, Date of Sample: 2008-05-01, Sample ID: 2005 XU 8  
The report is a summary of the results of the analysis of the sample. The sample was analyzed for 14C/12C ratio and the results are reported in the table below. The sample was analyzed for 14C/12C ratio and the results are reported in the table below. The sample was analyzed for 14C/12C ratio and the results are reported in the table below.


Sample	14C/12C Ratio	Age (BP)	Age (Cal BP)
2005 XU 8	0.000123	1000 ± 50	1000 ± 50

The precision of the age of this sample is ±50 years. In a normal, this date may not be reliable if the sample is not properly calibrated.

*[Signature]*  
Dr. R. S. Bradley

1.5.1\_Crepeele05\_RC1  
4.pdf

 Read PDF

 Download PDF





## Crepeele locale Radiocarbon Report II

<http://archives.brandonu.ca/en/permalink/descriptions11969>

Part Of: RG 7 Beverley Nicholson fonds  
Description Level: Sub sub series  
Series Number: 1.5.2  
Accession Number: 1-2010  
GMD: multiple media  
Date Range: 2003-2008  
Physical Description: 8 pages  
Material Details: Radiocarbon date reports have been scanned in multi-page PDF files.

### History /

### Biographical:

Crepeele locale Radiocarbon Dates. C14 report by Beta Analytic Inc. for Crepeele site XU 48 and Graham site XU 54.

From 2003 to 2008 field work took place at the Crepeele locale with 75 - 1m x1m units excavated.

To help establish the cultural sequence at the locale Radiocarbon dates were obtained from the three sites in the Crepeele locale.

### Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

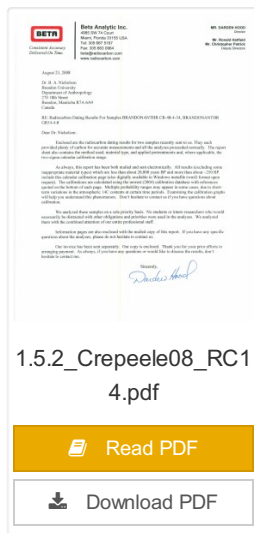
Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.

### Scope and Content:

Sub sub series contains radiocarbon dates from: Crepeele, Sarah and Graham sites.

Name Access: Crepeele locale Radiocarbon Report II  
Subject Access: Archaeology  
Crepeele locale  
Crepeele locale Radiocarbon Dates

### Documents



1.5.2\_Crepeele08\_RC1  
4.pdf



Read PDF



Download PDF

**BETA ANALYTIC INC.**  
14500 N.W. 14th Ave., Suite 100  
Fort Lauderdale, FL 33304

**BETA ANALYTIC INC.**  
14500 N.W. 14th Ave., Suite 100  
Fort Lauderdale, FL 33304  
Tel: 954.343.7500  
Fax: 954.343.7501  
www.betanalytic.com

## REPORT OF RADIOCARBON DATING ANALYSES

IN & OUTSIDE

Report Title: 157008

Material Source:

Material Source: 157008

Sample Name	Material	Age (BP)	Conventional Radiocarbon Age (BP)
157008-1	157008-1	157008	157008
157008-2	157008-2	157008	157008
157008-3	157008-3	157008	157008
157008-4	157008-4	157008	157008
157008-5	157008-5	157008	157008
157008-6	157008-6	157008	157008
157008-7	157008-7	157008	157008
157008-8	157008-8	157008	157008
157008-9	157008-9	157008	157008
157008-10	157008-10	157008	157008

This report contains the results of radiocarbon dating analyses performed by Beta Analytic, Inc. (BETA) on the sample(s) identified above. The results are presented in the table(s) above. The results are based on the analysis of the sample(s) by BETA. The results are based on the analysis of the sample

## Crepeele locale Radiocarbon Report III

<http://archives.brandonu.ca/en/permalink/descriptions11970>

Part Of: RG 7 Beverley Nicholson fonds

Description Level: Sub sub series

Series Number: 1.5.3

Accession Number: 1-2010

GMD: multiple media

Date Range: 2003-2008

Physical Description: 9 pages

Material Details: Radiocarbon date reports have been scanned in multi-page PDF files.

## History /

### Biographical:

Crepeele locale Radiocarbon Dates. C14 report by Beta Analytic Inc. for Crepeele site XUs 8, 30, 50.

From 2003 to 2008 field work took place at the Crepeele locale with 75 - 1m x1m units excavated.

To help establish the cultural sequence at the locale Radiocarbon dates were obtained from the three sites in the Crepeele locale.

### Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.


### Scope and Content:

Sub sub series contains radiocarbon dates from: Crepeele, Sarah and Graham sites.

Name Access: Crepeele locale Radiocarbon Report III

Subject Access: Archaeology  
Crepeele locale  
Crepeele locale Radiocarbon Dates


## Documents


**BETA ANALYTIC INC.**  
250 W. 146th St., Suite 100  
New York, NY 10032  
Tel: 212-345-1000  
Fax: 212-345-1001  
www.betainc.com

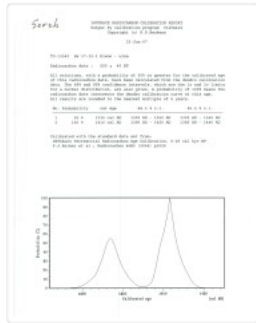
**REPORT OF RADIOCARBON DATING ANALYSES**  
Dr. R. A. Nicholson  
Report No.: 10112008  
Material Received: 10/11/2008

Sample ID	Material	13C (‰)	Conventional Radiocarbon Age (BP)
10112008-001	10112008-001	-25.1	100 ± 40
10112008-002	10112008-002	-25.1	100 ± 40
10112008-003	10112008-003	-25.1	100 ± 40
10112008-004	10112008-004	-25.1	100 ± 40
10112008-005	10112008-005	-25.1	100 ± 40
10112008-006	10112008-006	-25.1	100 ± 40
10112008-007	10112008-007	-25.1	100 ± 40
10112008-008	10112008-008	-25.1	100 ± 40
10112008-009	10112008-009	-25.1	100 ± 40
10112008-010	10112008-010	-25.1	100 ± 40

1.5.3\_Crepeele08\_RC1  
4.pdf

 Read PDF

 Download PDF



## Crepeelee locale Radiocarbon Report IV

<http://archives.brandonu.ca/en/permalink/descriptions11971>

Part Of: RG 7 Beverley Nicholson fonds  
 Description Level: Sub sub series  
 Series Number: 1.5.4  
 Accession Number: 1-2010  
 GMD: multiple media  
 Date Range: 2003-2008  
 Physical Description: 2 pages  
 Material Details: Radiocarbon date reports have been scanned in multi-page PDF files.

### History /

### Biographical:

Crepeelee locale Radiocarbon Dates. C14 report by IsoTrace Analytic Laboratory for Sarah site XU17.

From 2003 to 2008 field work took place at the Crepeelee locale. The Crepeelee, Graham and Sarah sites were excavated with 75 - 1m x1m units excavated

To help establish the cultural sequence at the locale Radiocarbon dates were obtained from the three sites in the Crepeelee locale.

### Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

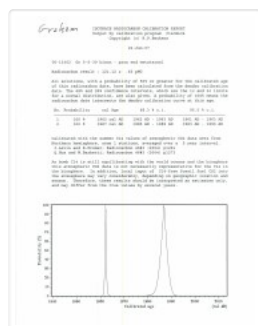
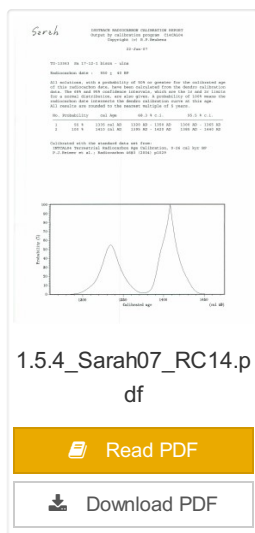
Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.

### Scope and Content:

Sub sub series contains radiocarbon dates from: Crepeelee, Sarah and Graham sites.

Name Access: Crepeelee locale Radiocarbon Report IV  
 Subject Access: Archaeology  
 Crepeelee locale  
 Crepeelee locale Radiocarbon Dates

### Documents



## Crepeele locale Radiocarbon Report V

<http://archives.brandonu.ca/en/permalink/descriptions11972>

Part Of: RG 7 Beverley Nicholson fonds

Description Level: Sub sub series

Series Number: 1.5.5

Accession Number: 1-2010

GMD: multiple media

Date Range: 2003-2008

Physical Description: 2 pages

Material Details: Radiocarbon date reports have been scanned in multi-page PDF files.

## Biographical:

Crepeele locale Radiocarbon Dates. C14 report by IsoTrace Analytic Laboratory for Graham site XUs 5 and 8.

From 2003 to 2008 field work took place at the Crepeele locale. The Crepeele, Graham and Sarah sites were excavated with 75 - 1m x1m units excavated

To help establish the cultural sequence at the locale Radiocarbon dates were obtained from the three sites in the Crepeele locale.

## Radiocarbon dating

The technique of radiocarbon dating was developed by Willard Libby and his colleagues at the University of Chicago in 1949.

Radiocarbon dating is used to estimate the age of organic remains from archaeological sites. Organic matter has a radioactive form of carbon (C14) that begins to decay upon death. C14 decays at a steady, known rate of a half life of 5,730 years. The technique is useful for material up to 50,000 years. Fluctuations of C14 in the atmosphere can affect results so dates are calibrated against dendrochronology. Radiocarbon dates are calibrated to calendar years.

Dates are reported in radiocarbon years or Before Present. Before Present refers to dates before 1950. The introduction of massive amounts of C14, due to atomic bomb and surface testing of atomic weapons, has widely increased the standard deviation on all dates after A.D. 1700 causing these dates to be unreliable.

Accelerated mass spectrometry can more accurately measure C14 with smaller samples and can date materials to 80,000 years.

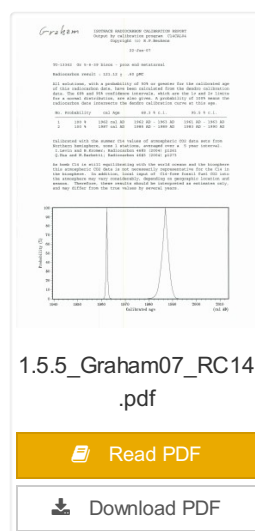
### Scope and Content:

Sub sub series contains radiocarbon dates from: Crepeele, Sarah and Graham sites.

Name Access: Crepeele locale Radiocarbon Report V

Subject Access: Archaeology  
Crepee locale  
Crepee locale Radiocarbon Dates

## Documents





## Atkinson site DiMe-27 2003

<http://archives.brandonu.ca/en/permalink/descriptions12081>

Part Of:	RG 7 Beverley Nicholson fonds
Description Level:	Sub sub series
Series Number:	2.1.1
Accession Number:	1-2010
GMD:	multiple media
Date Range:	2003
Material Details:	Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.

### History /

#### Biographical:

Based on the results of the testing in 2002 and the radiocarbon date of 6,500 years before present, further excavation was warranted at the Atkinson site. In 2003 Field Chief Holly Alston and crew Shayne Kolesar and Andrea Richards opened a 42m test excavation (units 1 - 4) that included the hearth area.

The site area was covered with a huge sand dune that was slowly sliding into the river as the supporting bank eroded away. As the dune was removed a late woodland camp was found at the dune interface and a large chunk of charcoal dated this occupation to 440+/-60 B.P. cal.1440A.D. This indicated that the dune was a relatively late incursion over the site. This occupation is likely connected to subsequent testing to the east in 2005 that came to be known as Atkinson II.

#### Methodology:

The crew began shovel shaving the upper strata with the intention of establishing an arbitrary datum when artifacts were encountered or when a level 25cm above the hearth was reached. At 25cm above the hearth an arbitrary surface datum was established and excavation in 5cm levels began. The overbank deposited matrix was a dense, compacted silt clay and it was necessary to soak the excavated materials in buckets and then water screen the material with a high pressure pump over ¼ inch hardware cloth.

Lithic flakes were found at 10cm below datum, above the hearth level. In the next level, large bone, a broken projectile point and additional flakes were found. Increasing amounts of bone and lithic flakes were found as the excavation continued through levels 3 to 5. The top of the hearth was identified at 28cm below datum, below a 2cm layer of well-sorted sand. This sand layer was confined to a small area directly overlying the hearth. It was considered to be a deliberate quenching of the hearth.

After the conclusion of excavating level 6 the hearth was profiled and photographed. The charcoal and ash layer of the hearth was shown to be directly below the sand layer. Levels 6 and 7 revealed a bison bone bed that was consistent with primary and secondary butchering including elements from the vertebral column and appendicular skeleton. Two additional Gowen (Mummy Cave Series) projectile points were also recovered adjacent to the hearth. Level 8 continued to produce larger amounts of bone and many lithic flakes. Level 9 produced a few bone fragments and a small number of lithic flakes. At the conclusion of the excavations, the crew shoveled sand down from the dune to protect the site over winter and through any subsequent spring flooding.

#### Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and co-ordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Atkinson site 2003  
Subject Access: Archaeology  
North Lauder locale  
Atkinson site DiMe-27  
Atkinson site 2003



### Atkinson site DiMe-27 2004

<http://archives.brandonu.ca/en/permalink/descriptions12190>

Part Of: RG 7 Beverley Nicholson fonds  
Description Level: Sub sub series  
Series Number: 2.1.2  
Accession Number: 1-2010  
GMD: multiple media  
Date Range: 2004  
Material Details: Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.



In 2004 Tomasin Playford and her crew of Andrea Richards, Sarah Graham and Shane Kolesar cleared sand cover from over the 2003 excavations and extended sand clearing back from the north edge of the 2003 units to permit implementation of four additional units. During this sand clearing a hearth was identified together with small numbers of lithics and pottery body sherds. This occupation had been noted during sand clearing in 2003 and a charcoal sample was collected and radiocarbon dated to 1440 A.D. This hearth was assigned to Atkinson II, a later occupation.

Four units (5, 6, 7, & 8) were surveyed in adjacent to the 2003 units. Excavation proceeded by means of shovel shaving until the datum pegs from the previous year were located. The new units were then given datum pegs and string boundaries and the high pressure pump was set up for water screening of silt/clay matrix.

Continued to shovel shave levels 1 - 4 and recovered small burned and unburned bone fragments. Level 5 produced a projectile point, an end scraper and a large heat-treated Swan River Chert (SRC) flake. Other SRC flakes were also recovered. Levels 6 and 7 yielded large numbers of flake debitage. The matrix in levels 5-7 contained a scatter of small, bright red ochre particles. The river began to rise on the ninth of June and the site was sandbagged on June 11th, temporarily bringing an end to excavation for Atkinson 1. Tomasin and her crew were relocated to the Crepee site, west of Lauder.

On July 20th, Tomasin and her crew returned to the Atkinson site and commenced cleaning up the earlier excavation following the flooding. Following the clean up, excavations were resumed on the units that had been opened. An additional Gowen point was recovered from level 8 as well as some poorly preserved bison bone. A lot flakes and small amounts of bone were recovered on west side of block and larger bone and flakes in bone bed along the east side in levels 8 - 10. Two bifaces were recovered in level 11 and a third in level 13. The excavations were terminated at level 18 when water started coming up through the unit floors.

Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and co-ordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Atkinson site 2004  
Subject Access: Archaeology  
North Lauder locale  
Atkinson site DiMe-27  
Atkinson site 2004



## Atkinson site DiMe-27 2006

<http://archives.brandonu.ca/en/permalink/descriptions12258>

Part Of: RG 7 Beverley Nicholson fonds  
Description Level: Sub sub series  
Series Number: 2.1.4

Accession Number: 1-2010  
GMD: multiple media  
Date Range: 2006  
Material Details: Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.

History /

Biographical:

The Atkinson site had been flooded in 2005 and there was concern about the amount of damage that might have occurred. A small crew of Tomasin Playford, Michelle Drysdale and Jessica McKenzie returned to the Atkinson site with the goals of obtaining a detailed profile of the stratigraphy at the north end of the occupation and to determine if the site extended contiguously towards the east. Two test pits were planned as well as the investigation of a couple of hearths found eroding from the riverbank. Work commenced July 4th and finished July 21st.

To the north of XU 8 (Gowen occupation) an excavation unit 18 was opened and shovel shaved to a depth of 200cm. At 195cm below surface a point bar deposit was identified indicating that any lower occupations would likely have been eroded by an earlier channel cutting event prior to formation of this point bar depositional event. Golf tees were inserted into the edge of the profile to indicate the 5cm levels superimposed on a digital photo of the section. Lithic flakes and bone fragments were scattered throughout the stratigraphic column. A radiocarbon date of 440 B.P. was obtained from the unit, indicating a much later occupation than Gowen.

Unit 19 was excavated but only yielded a small Besant component containing a small hearth (H#3). In level 9, a point tip and a small biface as well as a few undecorated pot sherds were recovered. These two units defined the extent of the Atkinson I site. An unknowable area of the site has been eroded away by the encroaching Souris River.

The two small exposed hearths were excavated but only yielded a small amount of material. Hearth 4, at the western edge of the Atkinson block yielded only a small amount of charcoal, mixed with burnt bone and a few small lithic flakes. Hearth 5, located in the high cut bank west of the main site yielded a small amount of bone from a small ungulate, a muskrat and a bird as well as a percussion cap. This latter recovery indicated that this was an early historic period site.

Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and coordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Atkinson site 2006  
Subject Access: Archaeology  
North Lauder locale  
Atkinson site DiMe-27  
Atkinson site 2006



## Flintstone Hill 1997

<http://archives.brandonu.ca/en/permalink/descriptions12284>

Part Of: RG 7 Beverley Nicholson fonds  
Description Level: Sub sub series  
Series Number: 2.2.1  
Accession Number: 1-2010  
GMD: multiple media  
Date Range: 1997  
Material Details: Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.

History /

Biographical:

During the mid 1990's to the early 2000's archaeological surveying and testing took place on Flintstone Hill. In 1997 testing at the site revealed a bison skull eroding from the cutbank. A field crew dug a series of overlapping trenches down the slope of the profile and produced a schematic drawing. A radiocarbon date from the lower edge of the profile gave a date of 10,400 RCY.

Test units along the cutbank recovered lithics, soil samples, fire-cracked rock, charcoal, bison remains including a very large bison skull measuring 430-440 cm and thought to be an ancient species.

Radiocarbon dates at Flintstone hill gave dates of: a hearth dating to 3250+/-70 R.C.Y. (BETA 109529); a butchered atlas bone 4090+/-70 R.C.Y. (BETA 109990); and bone fragments accompanied by Swan River Chert and Knife River Flint lithic flakes 5350+/-50 (BETA 109530). While no diagnostic tools were recovered, these dates suggest that this occupation, which is contemporary with the Atkinson site, may be a Gowen occupation.

Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and co-ordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Flintstone Hill 1997  
Subject Access: Archaeology  
North Lauder locale  
Flintstone Hill - DiMe-26  
Flintstone Hill 1997



## Atkinson II site DiMe-27 2004

<http://archives.brandonu.ca/en/permalink/descriptions12223>

Part Of: RG 7 Beverley Nicholson fonds  
Description Level: Sub sub series

Series Number: 2.1.3  
Accession Number: 1-2010  
GMD: multiple media  
Date Range: 2004  
Material Details: Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.

History /

Biographical:

After the flooding of the Souris River in 2004 receded, Tomasin Playford and her crew of Andrea Richards, Sarah Graham and Shane Kolesar returned to the Atkinson site and commenced cleaning up the earlier excavation of Atkinson.

An area east of the Atkinson excavations was also opened for testing in 2004. This area was designated as Atkinson II. In some of the field notes it is referred to as Atkinson East. A test block was opened and fenced off from the cattle with snow fence. A 4m2 block was surveyed in (units 13 - 16) and two partial units that were truncated by the riverbank (units 11 & 12) were also placed to the south of the 4m2 block.

Three of the students who had completed the recent field school were hired as crew. Jessica McKenzie, Evie Fevez and Emily Ansell joined the crew at the Atkinson II site.

Recoveries from XU 13 - 16:

Large bison bone was recovered from units 11 and 12 and a metal tobacco box seal was recovered from unit 12. More small pieces of metal found in levels 2 and three together with small bone fragments. A bone fragment with butchering marks from a metal tool was recovered from level 6 and pottery was found in level 9. A few lithic flakes were found in level 13 and in a trench at the bottom of unit 13 above a calcite cemented layer. Recoveries from these tests were sparse and diminished as the excavation series became more distant from the river. It is likely that the remains that were recovered represent the northern edge of these occupations.

The upper occupation at Atkinson II appears to be an early historic occupation with a sparse scatter of bone and a few pieces of metal. The lower layers, below level 7 are likely precontact. Units 9 and 10 were dug as test pits and produced very little in the way of cultural materials.

Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and co-ordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Atkinson II site DiMe-27 2004  
Subject Access: Archaeology  
North Lauder locale  
Atkinson site DiMe-27  
Atkinson II site 2004



## Flintstone Hill 1998-2000

<http://archives.brandonu.ca/en/permalink/descriptions12290>

Part Of: RG 7 Beverley Nicholson fonds  
Description Level: Sub sub series  
Series Number: 2.2.2  
Accession Number: 1-2010  
GMD: multiple media  
Date Range: 1998-2000  
Material Details: Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.

### History /

#### Biographical:

In 1998, 1999 and 2000 further testing took place on Flintstone Hill. Five test units were excavated and a series of small exploratory tests took place. Recoveries included: lithics, soil samples, fire-cracked rock, charcoal, and bison bones.

Unfortunately, despite the encouraging radiocarbon dates and scattered recoveries there was no area where extensive excavations were feasible. The unstable nature of the river bank with frequent spring flooding and erosion of the dunes has impacted potential sites.

#### Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and co-ordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Flintstone Hill 1998-2000  
Subject Access: Archaeology  
North Lauder locale  
Flintstone Hill - DiMe-26  
Flintstone Hill 1998-2000



## Lovstrom Block H 1988

<http://archives.brandonu.ca/en/permalink/descriptions12639>

Part Of: RG 7 Beverley Nicholson fonds  
Description Level: Sub sub series  
Series Number: 3.9.1  
Accession Number: 1-2010  
GMD: multiple media  
Date Range: 1988  
Material Details: Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.

Directed by Dr. Nicholson and with Ian Kuijt as crew chief, eight units were excavated in Block H in 1988. The vegetation is similar to other areas in the locale with an open oak forest with a light understory of saskatoon, hazelnut, poison ivy and sarsaparilla.

Radiocarbon dates from this block indicate two occupations separated in time by some 300 years. The excavation of the eight 1m<sup>2</sup> units resulted in the recovery of over 650 ceramic fragments including 20 rim sherds from at least four vessels, a grooved maul, fire-cracked rock, lithic debitage and a reworked Avonlea projectile point. A large amount of bison bone, including a number of axial elements and a fragmented skull were also recovered.

The 650 ceramics recovered are of two kinds, representing at least four vessels. Stylistically, two of these vessels appear to be from the Vickers Focus and the third vessel may be Mortlach ware. The fourth vessel appears to be Blackduck and probably comes from the lower occupation. Also encountered were what is possibly a thin ash deposit in unit 180. The presence of a large number of bison axial elements is suggestive of primary butchering activities. Several canid bones were recovered scattered among the bison bone. Although there is no visible stratigraphic evidence, the 14C dates and the different ceramic types indicate more than one occupation in this area and it is likely that several types of behavior and use of space are represented.

High numbers of ceramic fragments are often assumed to be associated with activities characteristic of habitation areas, rather than hunting or butchering behavior. The lithic material assemblage is intermediate between Blocks G and E with KRF being the most frequent material category followed by local cherts.

Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and co-ordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Lovstrom Block H 1988  
Subject Access: Archaeology  
Lovstrom locale  
Lovstrom Block H



## Lovstrom Block E 1991

<http://archives.brandonu.ca/en/permalink/descriptions12655>

Part Of: RG 7 Beverley Nicholson fonds  
Description Level: Sub sub series  
Series Number: 3.6.3  
Accession Number: 1-2010  
GMD: multiple media  
Date Range: 1991  
Material Details: Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.

### History /

#### Biographical:

Excavations took place in block E in 1987 and 1988 with 21 units opened. Ten further units were excavated in 1991 as part of the Brandon University Archaeological Field School, directed by Dr. Nicholson with Brett Waddell as crew chief and Theresa Hill as field assistant.

In 1991 a hearth was identified in Block E as well as a cluster of spoil dirt piles believed to represent material from a pit feature identified in the 1988 excavations. The pit feature is believed to be related to the recovery of clay that may have been used to build ceramic vessels.

Stratigraphic evidence of distinct activity areas at successive depths and radiocarbon dates indicate at least three occupations (380 BP, 700 BP and 860 B P). Three identified activity clusters occur stratigraphically, supporting these dated occupations.

Large numbers of lithics were recovered, forming an assemblage dominated by SRC and KRF with lesser amounts of porcellanite and quartzite. The upper occupation contained some Tongue River Silicified Sediment (TRSS). Eight Prairie Side-Notched points were recovered as well as a lunate biface and an end scraper. Fragments from a grey soapstone tube were also recovered.

#### Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and co-ordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Lovstrom Block E 1991  
Subject Access: Archaeology  
Lovstrom locale  
Lovstrom Block E



## Lovstrom Block H 1991

<http://archives.brandonu.ca/en/permalink/descriptions12671>

Part Of: RG 7 Beverley Nicholson fonds

Description Level: Sub sub series

Series Number: 3.9.2

Accession Number: 1-2010

GMD: multiple media

Date Range: 1991

Material Details: Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.

### History /

#### Biographical:

Based on the recoveries at the Block H in 1988, further excavations took place in 1991. Nine excavation units were opened next to the previous excavations. Another 250 ceramic sherds were recovered in 1991. Nine vessels have been identified based on rim sherds. Vickers Focus and Woodland vessels have been identified and two vessels similar to Scattered Village Complex were recovered.

The lithic material assemblage is intermediate primarily KRF followed by local cherts. Two features, a hearth and a curvilinear arrangement of rock were recovered during the 1991 excavations.

The high numbers of ceramic fragments suggests a habitation area, rather than hunting or butchering behavior. However, the separation of occupations at the site is difficult to establish and there may be different uses of the site by successive occupations.

#### Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and co-ordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Lovstrom Block H 1991

Subject Access: Archaeology  
Lovstrom locale  
Lovstrom Block H





## Lovstrom Block D 1987

<http://archives.brandonu.ca/en/permalink/descriptions12541>

Part Of: RG 7 Beverley Nicholson fonds  
Description Level: Sub sub series  
Series Number: 3.5.1  
Accession Number: 1-2010  
GMD: multiple media  
Date Range: 1987  
Material Details: Field journals have been scanned in multi-page PDF files. Artifact catalogues are PDF files in spreadsheet format. Photographs are in jpeg format.

### History /

#### Biographical:

Block D is a wooded with oak and an understory of saskatoon and hazelnut with a thick ground cover of poison ivy and sarsaparilla. Root and rodent disturbance was extensive.

Directed by Dr. Nicholson and with Jane Gibson as crew chief, two units were opened in Block D in 1987. A hearth was identified with a ring of stones containing charcoal and burnt bone. Recoveries included two rim sherds with tool-impressed decorations along the outer edge and two prairie side-notched points. Associated bone was primarily appendicular, indicating secondary butchering.

A radiocarbon date of 230+/-90 B.P. recovered in 1987 from 17 cm below surface is consistent with a Protohistoric occupation.

#### Scope and Content:

Sub-sub-sub series contains: Summary information of field methodology, number and co-ordinates of excavations, personnel and their staff position; Field journals are daily records of recoveries, features and activities at the site; Site records include excavation level and unit summaries, feature sheets, profiles; sample records and maps; Artifact catalogues are lists and identifications of all artifacts recovered; Photographs are of excavation units, features, the landscape and personnel.

Name Access: Lovstrom Block D 1987  
Subject Access: Archaeology  
Lovstrom locale  
Lovstrom Block D