

Appendix 1: Age Analyses Associated with This Study

Radiocarbon Analyses

<u>Site Description</u>	<u>Age (¹⁴ C ka BP)</u>	<u>δ¹³ C</u>	<u>Description of sample</u>	<u>Source</u>	<u>Sample ID</u>
<u>Base varve series 1</u>					
	>39,900		organic debris	Bloom, 1972	I-6046 (conventional)
“	27,000±360		<i>Dryas integrifolia</i> leaf	Miller, 1996	Beta-27680
	33,900±710		<i>Salix</i> twig	“	Beta-32973
“	21,820±390		beetle chiton	Ashworth & Willenbring, 1998	CAMS 39878
“	38,350±980	-26.9	plant macrofossils	This study (Karig)	AA94456
“	41,000±1900		9 <i>Salix herbacea</i> leaves	“ (Miller)	CAMS-45917
“	38,790±930		6 <i>D. integrifolia</i> leaves	“ “	CAMS-45918
“	43,000±1600	-23.3	9 <i>Claytonia</i> seeds	“ “	CAMS-45919
“	34,510±960	-25.0	beetle chiton	“ “	CAMS-45920
<u>Base varve series 4</u>					
	33,950±220		conifer twigs	This study (Miller)	Beta-100442
“	35,190±240		“ “	“ “	Beta-100443
“	37,200±500	-27.28	plant macrofossils	“ (Karig)	WW 8529
<u>Unit 3</u>	41,900±900		<i>Picea</i> knot	Bloom, 1972	Y-1401 (conventional)
<u>Deposit beneath unit 3</u>					
“	>35,000		twigs and bark	Muller, 1965	W-504 (conventional)
“	42,300±1500		plant macrofossils	This study (Karig)	WW 8289
“	43,800±4900	-26.24	plant macrofossils	This study (Miller)	OS-98037
“	40,100±630	-25	<i>D. integrifolia</i> leaves and <i>Salix</i> bud	This study (Karig, Peteet)	WW 9396

<u>Site Description</u>	<u>Age (¹⁴ C ka BP)</u>	<u>δ¹³ C</u>	<u>Description of sample</u>	<u>Source</u>	<u>Sample ID</u>
<u>Andrews bog</u>					
AB-1 (16')	12,060±73	-29.8	organic black mud		AA94092
AB-1 (17')	12,282±69	-26.6	organic mud		AA97977
AB-2 (16')	11,599±69	-26.7	spruce wood		AA102047
AB-2 (16')	11,684±71	-25.5	terrigenous plant macrofossils		AA103066
<u>Willseyville Channel</u>					
PR-3 (15')	12,293±70	-25.2	separated plant fragment		AA100253
BS-1 (11.5')	11,691±45	-27.7	separated plant fragment		AA98904

Where data are available, the labs responsible for the data are: U. Arizona (AA samples), Beta Analytic (Beta), L. Livermore (CAMS), USGS,Reston (WW). Woods Hole –NOSAMS (OS), Isotopes, Inc (I), Yale (Y). All analyses were AMS unless labeled conventional.

Optically Stimulated Luminescence (OSL) Analyses

<u>Site Description</u>	<u>Age (Calendar)</u>	<u>Description of sample</u>	<u>Over-dispersion (%)</u>	<u>Lab</u>
Basal post-glacial Lacustrine	17,840 ± 890	Fine sand	19±2	USGS (Maher)
Interglacial gorge Lacustrine fill	37,085±3830	fine sand	50.6	Univ. of Illinois at Chicago (Foreman)